

PROSPECTUS SUPPLEMENT
(To Prospectus dated June 18, 2008)



27,500,000 Shares of Common Stock
Warrants to Purchase 13,750,000 Shares of Common Stock

We are offering an aggregate of 27,500,000 shares of our common stock and warrants to purchase an aggregate of 13,750,000 shares of our common stock in this offering (and the shares of common stock issuable from time to time upon exercise of the warrants). The common stock and warrants will be sold in units, with each unit consisting of one share of common stock and a warrant to purchase one half of a share of common stock, at an exercise price of \$0.85 per share. Each unit will be sold at a public offering price of \$0.60 per unit. Units will not be issued or certificated. The shares of common stock and warrants are immediately separable and will be issued separately. Our common stock is listed on The Nasdaq Global Market under the symbol "DSCO." On February 17, 2010, the last reported sale price of our common stock on The Nasdaq Global Market was \$0.71 per share.

Investing in our common stock involves significant risks. See "Risk Factors" beginning on page S-6 of this prospectus supplement and page 2 of the accompanying prospectus.

Neither the Securities and Exchange Commission nor any other regulatory body has approved or disapproved of these securities, or passed upon the accuracy or adequacy of this prospectus supplement or the accompanying prospectus. Any representation to the contrary is a criminal offense.

| | | Per Unit | Total |
|---|----|--------------|----------------------|
| Public offering price | \$ | 0.600 | \$ 16,500,000 |
| Underwriting discount | \$ | 0.042 | \$ 1,155,000 |
| Proceeds to us (before expenses) | \$ | 0.558 | \$ 15,345,000 |

We estimate the total expenses of this offering payable by us, excluding underwriting discount, will be approximately \$230,000.

We anticipate that delivery of the shares and warrants will be made on or about February 23, 2010, subject to customary closing conditions.

LAZARD CAPITAL MARKETS

Prospectus Supplement dated February 18, 2010

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ABOUT THIS PROSPECTUS SUPPLEMENT

This document is in two parts. The first part is the prospectus supplement, which describes the specific terms of the securities we are offering, including the price, the amount of common stock being offered and the risks of investing in our common stock, and also adds to and updates information contained in the accompanying prospectus and the documents incorporated by reference into the accompanying prospectus. The second part, the accompanying prospectus, including the documents incorporated by reference, provides more general information, some of which may not apply to our common stock. This prospectus supplement and the accompanying prospectus are part of a “shelf” registration statement on Form S-3 that we filed with the Securities and Exchange Commission on June 13, 2008. Generally, when we refer to this prospectus, we are referring to both parts of this document combined. You should read both this prospectus supplement and the accompanying prospectus together with the additional information about us described in the section entitled “Where You Can Find More Information and Incorporation by Reference.” To the extent there is a conflict between the information contained in this prospectus supplement, on the one hand, and the information contained in the accompanying prospectus or in any document incorporated by reference that was filed with the SEC before the date of this prospectus supplement, on the other hand, you should rely on the information in this prospectus supplement. If any statement in one of these documents is inconsistent with a statement in another document having a later date — for example, a document incorporated by reference in the accompanying prospectus — the statement in the document having the later date modifies or supersedes the earlier statement.

You should rely only on the information contained in this prospectus supplement, the accompanying prospectus and the documents incorporated by reference herein or therein. We have not, and the underwriter has not, authorized anyone to provide you with information different from that contained in any of these documents. If anyone provides you with different or inconsistent information, you should not rely on it. The information contained in these documents is accurate only as of the date of each document, as the case may be, regardless of the time of delivery of this prospectus supplement and accompanying prospectus or of any sale of common stock. Our business, financial condition, results of operations and prospects may change after the date set forth in each document in which the information is presented.

We are making offers to sell and seeking offers to buy shares of common stock and warrants only in jurisdictions where offers and sales are permitted. Persons outside the United States who come into possession of this prospectus must inform themselves about, and observe any restrictions relating to, the offering of the common stock and warrants to purchase common stock and the distribution of this prospectus outside the United States. You should not consider this prospectus supplement and the accompanying prospectus to be an offer to sell, or a solicitation of an offer to buy, shares of common stock and warrants if the person making the offer or solicitation is not qualified to do so or if it is unlawful for you to receive the offer or solicitation.

References in the prospectus supplement, the accompanying prospectus and the documents incorporated by reference herein and therein to “we,” “our,” “us” and the “company” refer to Discovery Laboratories, Inc. and its subsidiary, unless the context requires otherwise.

PROSPECTUS SUPPLEMENT SUMMARY

This summary highlights certain information about us, this offering and information appearing elsewhere in this prospectus supplement and in the accompanying prospectus and in the documents we incorporate by reference. This summary is not complete and does not contain all of the information that you should consider before investing in our securities. The following summary is qualified in its entirety by, and should be read in conjunction with, the more detailed information and financial statements and notes thereto appearing elsewhere in this prospectus supplement and the accompanying prospectus. Before you decide to invest in our securities, to fully understand this offering and its consequences to you, you should carefully read the entire prospectus supplement and the accompanying prospectus carefully, including the risk factors beginning on page S-6 of this prospectus supplement and beginning on page 2 of the accompanying prospectus, and the consolidated financial statements and related notes included or incorporated by reference in this prospectus supplement, the accompanying prospectus and the other documents incorporated by reference herein and therein.

Our Business

We are a biotechnology company developing Surfactant Replacement Therapies (SRT) to treat respiratory disorders and diseases for which there frequently are few or no approved therapies. Our novel KL₄ proprietary technology produces a synthetic, peptide-containing surfactant (KL₄ surfactant) that is structurally similar to pulmonary surfactant, a substance produced naturally in the lung and essential for survival and normal respiratory function. In addition, our proprietary capillary aerosol generating technology (Capillary Aerosolization Technology) produces a dense aerosol with a defined particle size, to potentially deliver our aerosolized KL₄ surfactant to the deep lung. As many respiratory disorders are associated with surfactant deficiency or surfactant degradation, we believe that our proprietary technology platform makes it possible, for the first time, to develop a significant pipeline of surfactant products targeted to treat a wide range of previously unaddressed respiratory problems.

Recent Developments

Financial Update. As of December 31, 2009, we had cash and marketable securities of \$15.7 million, representing a net decrease of \$1.9 million from the previous quarter ended September 30, 2009.

Surfaxin[®] for the Prevention of Respiratory Distress Syndrome (RDS) in Premature Infants. On November 17, 2009, after collaborating with leading academic neonatologists, we announced that we had submitted to the U.S. Food and Drug Administration (FDA) a proposed protocol for a Surfaxin[®] limited clinical trial that incorporated a PD-based clinical trial design. On February 4, 2010, we received a letter from the FDA advising us that, since an acceptable and well-established animal model (preterm lamb) of Respiratory Distress Syndrome (RDS) already exists, which could be used as an acceptable alternative to a clinical trial in human preterm infants, a PD clinical trial approach is not appropriate. Accordingly, we now plan to focus on a pathway that would entail solely performing additional preclinical work, instead of conducting a limited clinical trial, to potentially gain FDA marketing approval for Surfaxin[®]. Compared to the conduct of a PD clinical trial, a comprehensive preclinical program, if successful, presents an opportunity to significantly reduce the time and expense required to gain potential Surfaxin[®] approval and Discovery Labs believes that a Complete Response could be submitted to the FDA in the first quarter of 2011.

Non-Compliance with Minimum Bid Price Requirement. On December 2, 2009, we received a letter from The Nasdaq Stock Market indicating that for 30 consecutive business days our common stock did not maintain a minimum closing bid price of \$1.00 per share as required by Nasdaq Listing Rule 5450(a) (1). Under the Nasdaq Listing Rules, if during the 180 calendar days following the date of the notification, or prior to June 1, 2010, the closing bid price of our stock is at or above \$1.00 for a minimum of 10 consecutive business days, we will regain compliance with the minimum bid price requirement and the common stock will continue to be eligible for listing on the Nasdaq Global Market.

If we do not achieve compliance with the minimum bid price requirement by June 1, 2010, Nasdaq will provide us with written notification that the common stock is subject to delisting. We may, at that time, appeal Nasdaq's determination to a Nasdaq Hearing Panel. Such an appeal, if granted, would stay delisting until a ruling by the panel. Alternatively, if we are at that time in compliance with all initial listing standards for the Nasdaq Capital Market other than the minimum bid price requirement, we could apply to transfer the listing of our common stock to the Nasdaq Capital Market and thereby receive an additional grace period of 180 days to regain compliance with the minimum bid price requirement.

If our stock price does not exceed the minimum bid price of \$1.00 within the time frames set forth above, our common stock will be subject to delisting. If our common stock were no longer listed on The Nasdaq Global Market or the Nasdaq Capital Market, investors might only be able to trade in the over-the-counter market in the Pink Sheets[®] (a quotation medium operated by Pink OTC Markets Inc.) or on the OTC Bulletin Board[®] of the Financial Industry Regulatory Authority, Inc. This would impair the liquidity of our securities not only in the number of shares that could be bought and sold at a given price, which might be depressed by the relative illiquidity, but also through delays in the timing of transactions and reduction in media coverage.

Company Information

We maintain our principal offices and research at 2600 Kelly Road, Suite 100, Warrington, Pennsylvania. Our telephone number is 215-488-9300. Our website address is www.discoverylabs.com. Information contained in, or accessible through, our website does not constitute a part of this prospectus supplement or the accompanying prospectus.

THE OFFERING

| | |
|---|--|
| Common Stock offered | 27,500,000 shares |
| Warrants offered | Warrants to purchase up to 13,750,000 shares of common stock. The warrants are exercisable beginning on the date of original issuance and at any time up to the date that is five years after such date at an exercise price of \$0.85 per share of common stock. This prospectus also relates to the offering of the shares of common stock issuable upon exercise of the warrants. |
| Common stock to be outstanding after this offering ⁽¹⁾ | 149,199,850 shares |
| Risk Factors | See "Risk Factors" beginning on page S-6 of this prospectus supplement and page 2 of the accompanying prospectus for a discussion of factors you should consider carefully when making an investment decision. |
| Use of proceeds | <p>The net proceeds from this offering will be used for general corporate purposes, which may include:</p> <ul style="list-style-type: none">• Expenses related to resolving the remaining issue (related to optimization and revalidation of our fetal rabbit biological activity test (BAT, an important quality control release and stability test) and establishing that the BAT is capable of discriminating changes in Surfaxin drug product over time) that must be addressed to secure the potential approval of Surfaxin[®] for the prevention of RDS, including implementing a comprehensive pre-clinical program.• Expenses related to ongoing development of our Surfaxin LS[™] and Aerosurf[®] programs, which, together with Surfaxin[®], are focused on addressing the most significant respiratory conditions affecting pediatric populations, beginning with RDS.• Expenses related to completing the final stages of our Phase 2 trials: to determine if restoration of surfactant with Surfaxin[®] will improve lung function and result in a shorter duration of mechanical ventilation and hospital stay for children up to two years of age suffering with Acute Respiratory Failure; and an investigator-initiated Phase 2a clinical trial in Cystic Fibrosis patients that has been designed to assess the safety, tolerability and short-term effectiveness of aerosolized KL₄ surfactant in CF patients. <p>See "Use of Proceeds" on page S-9.</p> |
| The Nasdaq Global Market Symbol | DSCO |

(1) The number of shares of common stock to be outstanding immediately after this offering as shown above is based on 121,699,850 shares of common stock outstanding as of September 30, 2009. This number excludes the 13,750,000 shares issuable upon the exercise of the warrants offered hereby and also excludes: (i) 16,020,134 shares of our common stock subject to options outstanding as of September 30, 2009, which have a weighted average exercise price of \$3.78 per share; (ii) 14,839,196 shares of common stock issuable upon exercise of warrants outstanding as of September 30, 2009, at a weighted average exercise price of \$2.89; (iii) 34,419 shares of common stock issuable upon the vesting of restricted stock awards outstanding as of September 30, 2009; (iv) 239,022 shares of common stock reserved for potential future issuance pursuant to our 401(k) Plan as of September 30, 2009; and (v) 24,453,621 shares of common stock reserved for potential future issuance pursuant to two Committed Equity Financing Facilities, as of September 30, 2009.

FORWARD-LOOKING STATEMENTS

This prospectus supplement, the accompanying prospectus and the documents incorporated by reference herein and therein, including in “Risk Factors,” contain “forward-looking statements” within the meaning of Section 27A of the Securities Act of 1933 and Section 21E of the Securities Exchange Act of 1934. The forward-looking statements are only predictions and provide our current expectations or forecasts of future events and financial performance and may be identified by the use of forward-looking terminology, including the terms “believes,” “estimates,” “anticipates,” “expects,” “plans,” “intends,” “may,” “will” or “should” or, in each case, their negative, or other variations or comparable terminology, though the absence of these words does not necessarily mean that a statement is not forward-looking. Forward-looking statements include all matters that are not historical facts and include, without limitation statements concerning: our business strategy, outlook, objectives, future milestones, plans, intentions, goals, and future financial condition, including the period of time for which our existing resources will enable us to fund our operations; plans regarding our efforts to gain U.S. regulatory approval for our lead product, Surfaxin[®] (lucinactant) for the prevention of Respiratory Distress Syndrome in premature infants; the possibility, timing and outcome of submitting regulatory filings for our products under development; our research and development programs for our KL₄ surfactant technology and our capillary aerosolization technology platform, including planning for and timing of any clinical trials and potential development milestones; the development of financial, clinical, manufacturing and distribution plans related to the potential commercialization of our drug products, if approved; and plans regarding potential strategic alliances and other collaborative arrangements with pharmaceutical companies and others to develop, manufacture and market our products.

We intend that all forward-looking statements be subject to the safe-harbor provisions of the Private Securities Litigation Reform Act of 1995. Forward-looking statements are subject to many risks and uncertainties that could cause our actual results to differ materially from any future results expressed or implied by the forward-looking statements. Examples of the risks and uncertainties include, but are not limited to:

- risks related generally to our efforts to gain regulatory approval, in the United States and elsewhere, for our drug product candidates, including our lead products that we are developing to address Respiratory Distress Syndrome (RDS) in premature infants: Surfaxin[®] (lucinactant) for the prevention of RDS, Surfaxin LS[™] (our lyophilized KL₄ surfactant) and Aerosurf[®] (our initial aerosolized KL₄ surfactant);
- the risk that we and the U.S. Food and Drug Administration (FDA) or other regulatory authorities will not be able to agree on matters raised during the regulatory review process, or that we may be required to conduct significant additional activities to potentially gain approval of our product candidates, if ever;
- the risk that the FDA or other regulatory authorities may not accept, or may withhold or delay consideration of, any applications that we may file, or may not approve our applications or may limit approval of our products to particular indications or impose unanticipated label limitations;
- risks relating to the rigorous regulatory approval processes, including pre-filing activities, required for approval of any drug or combination drug-device products that we may develop, whether independently, with strategic development partners or pursuant to collaboration arrangements;
- the risk that the FDA will not be satisfied with the results of our efforts to optimize and revalidate our fetal rabbit biological activity test (BAT) and to demonstrate that the BAT has the ability to distinguish change in Surfaxin drug product over time, which is needed to advance our KL₄ surfactant pipeline;
- the risk that changes in the national or international political and regulatory environment may make it more difficult to gain FDA or other regulatory approval of our drug product candidates;
- risks relating to our research and development activities, which involve time-consuming and expensive preclinical studies and other efforts, and potentially multiple clinical trials, which may be subject to potentially significant delays or regulatory holds, or fail, and which must be conducted using sophisticated and extensive analytical methodologies, including an acceptable biological activity test, if required, as well as other quality control release and stability tests to satisfy the requirements of the regulatory authorities;
- risks relating to our ability to develop and manufacture drug products and drug-device combination products based on our capillary aerosolization technology for clinical studies and, if approved, for commercialization of our products;
- risks relating to the transfer of our manufacturing technology to third-party contract manufacturers and assemblers;
- the risk that we, our contract manufacturers or any of our third-party suppliers may encounter problems or delays in manufacturing or assembling drug products, drug product substances, capillary aerosolization devices and related components and other materials on a timely basis or in an amount sufficient to support our development efforts and, if our products are approved, commercialization;

- the risk that we may be unable to identify potential strategic partners or collaborators with whom we can develop and, if approved, commercialize our products in a timely manner, if at all;
- the risk that we or our strategic partners or collaborators will not be able to attract or maintain qualified personnel;
- the risk that, if approved, market conditions, the competitive landscape or otherwise may make it difficult to launch and profitably sell our products;
- the risk that we, in a challenging financial market, may not be able to raise additional capital or enter into strategic alliances or collaboration agreements (including strategic alliances for development or commercialization of our drug products and combination drug-device products);
- risks that the unfavorable credit environment will adversely affect our ability to fund our activities, that our share price will not reach or remain at the price level necessary for us to access capital under our Committed Equity Financing Facilities (CEFFs), that the CEFFs may expire before we are able to access the full dollar amount potentially available thereunder, and that additional equity financings could result in substantial equity dilution;
- the risk that we will be unable to regain compliance with the Minimum Bid Price Requirement of The Nasdaq Global Market prior to the expiration of the grace period currently in effect, which could increase the probability that our stock will be delisted from Nasdaq and cause our stock price to decline;
- the risk that recurring losses, negative cash flows and the inability to raise additional capital could threaten our ability to continue as a going concern;
- the risks that we may be unable to maintain and protect the patents and licenses related to our products and that other companies may develop competing therapies and/or technologies;
- the risk that we may become involved in securities, product liability and other litigation;
- risks related to reimbursement and health care reform that may adversely affect us;
- the risk that the FDA may not approve Surfaxin[®] or may subject the marketing of Surfaxin[®] to onerous requirements that significantly impair marketing activities;
- the risk that we may identify unforeseen problems that have not yet been discovered or the FDA could in the future impose additional requirements to gain approval of Surfaxin[®]; and
- other risks and uncertainties, including those described in our most recent Annual Report on Form 10-K, as amended, and other filings with the Securities and Exchange Commission, on Forms 10-Q and 8-K, and any amendments thereto.

Pharmaceutical and biotechnology companies have suffered significant setbacks in advanced clinical trials, even after obtaining promising earlier trial results. Data obtained from such clinical trials are susceptible to varying interpretations, which could delay, limit or prevent regulatory approval. After gaining approval of a drug product, pharmaceutical companies face considerable challenges in marketing and distributing their products, and may never become profitable.

The forward-looking statements contained in this prospectus supplement, the accompanying prospectus or the documents incorporated by reference herein or therein speak only of their respective dates. Except to the extent required by applicable laws, rules and regulations, we do not undertake to publicly announce revisions to any of the forward-looking statements in this prospectus supplement, the accompanying prospectus or the documents incorporated by reference herein or therein, whether as a result of new information, future events or otherwise.

RISK FACTORS

Investing in our securities involves a high degree of risk. You should consider the following risk factors, as well as other information contained or incorporated by reference in this prospectus supplement and the accompanying prospectus, including those risks discussed in Part I, Item 1A – Risk Factors of our Annual Report on Form 10-K for the year ended December 31, 2008, and of our Quarterly Report on Form 10-Q for the quarter ended September 30, 2009, before deciding to purchase any of our securities. The risks and uncertainties described below and incorporated by reference herein are not the only ones we face. Additional risks and uncertainties not presently known to us or that we currently deem immaterial also may become important factors that affect us. If any of these risks occur, our business could suffer, the market price of our common stock could decline and you could lose all or part of your investment in our securities.

Risks Related to Our Products

Our pending NDA for Surfaxin for the prevention of RDS in premature infants may not be approved by the FDA in a timely manner, or at all, which would prevent our commercializing this product in the United States.

On November 17, 2009, we announced that we had submitted to the U.S. Food and Drug Administration (FDA) our proposed protocol for a Surfaxin[®] (lucinactant) limited clinical trial. We proposed this trial in response to a comment by the FDA that a limited clinical trial could potentially resolve the remaining issue for approval of Surfaxin[®] for the prevention of Respiratory Distress Syndrome (RDS) in premature infants. The protocol incorporated a clinical trial design that was primarily intended to assess a pharmacodynamic (PD) response following Surfaxin administration in preterm infants with RDS. On February 4, 2010, we received a letter from the FDA advising us that, since an acceptable and well-established animal model (preterm lamb) of RDS already exists, which could be used as an acceptable alternative to a clinical trial in human preterm infants, a PD clinical trial approach is not appropriate.

Therefore, to address the remaining issue to potentially gain marketing approval for Surfaxin, we are now developing a comprehensive preclinical program that will consist of a series of prospectively-designed, side-by-side preclinical studies employing an optimized and revalidated fetal rabbit Biological Activity Test (BAT, an important quality control release and stability test) and the well-established preterm lamb model of RDS. The results of these studies are intended to satisfy the FDA as to the BAT's ability to adequately discriminate biologically active from inactive Surfaxin drug product and establish the Surfaxin drug product's final acceptance criteria (with respect to biological activity as assessed by the BAT). See "Recent Developments – Surfaxin[®] for the Prevention of Respiratory Distress Syndrome (RDS) in Premature Infants." Although the FDA indicated that our proposed program to optimize and revalidate the BAT is reasonable, it also indicated that, to gain approval of Surfaxin, data generated from the preterm lamb model and BAT studies must demonstrate, in a point-to-point analysis, the same relative changes in respiratory compliance between both models over time. Even if our current efforts to optimize and revalidate the BAT (which are well underway and presently meet pre-specified acceptance criteria) are successful, we may not succeed with our side-by-side studies or, even if we do succeed with our side-by-side studies, the FDA may not accept the results or may interpret the data in a different manner such that, ultimately, the FDA may not approve Surfaxin for RDS in premature infants. Any failure to secure FDA approval or further delay associated with the FDA's review process could potentially delay or prevent the approval of our other products and would have a material adverse effect on our business.

Risks Related to Our Common Stock

If we are unable to regain compliance with the Minimum Bid Price Requirement of The Nasdaq Global Market prior to June 1, 2010, our stock price may decline and our common stock may be subject to delisting from Nasdaq. If our stock were no longer listed on Nasdaq, the liquidity of our securities would be impaired.

On December 2, 2009, we received a letter from The Nasdaq Stock Market indicating that for 30 consecutive business days our common stock did not maintain a minimum closing bid price of \$1.00 per share as required by Nasdaq Listing Rule 5450(a)(1). Under the Nasdaq Listing Rules, if during the 180 calendar days following the date of the notification, or prior to June 1, 2010, the closing bid price of our stock is at or above \$1.00 for a minimum of 10 consecutive business days, we will regain compliance with the minimum bid price requirement and the common stock will continue to be eligible for listing on The Nasdaq Global Market.

If we do not achieve compliance with the minimum bid price requirement by June 1, 2010, Nasdaq will provide us with written notification that the common stock is subject to delisting. We may, at that time, appeal Nasdaq's determination to a Nasdaq Hearing Panel. Such an appeal, if granted, would stay delisting until a ruling by the panel. Alternatively, if we are at that time in compliance with all initial listing standards for the Nasdaq Capital Market other than the minimum bid price requirement, we could apply to transfer the listing of our common stock to the Nasdaq Capital Market and thereby receive an additional grace period of 180 days to regain compliance with the minimum bid price requirement.

If our stock price does not exceed the minimum bid price of \$1.00 within the time frames set forth above, our common stock will be subject to delisting. If our common stock were no longer listed on The Nasdaq Global Market or the Nasdaq Capital Market, investors might only be able to trade in the over-the-counter market in the Pink Sheets[®] (a quotation medium operated by Pink OTC Markets Inc.) or on the OTC Bulletin Board[®] of the Financial Industry Regulatory Authority, Inc. (FINRA). This would impair the liquidity of our securities not only in the number of shares that could be bought and sold at a given price, which might be depressed by the relative illiquidity, but also through delays in the timing of transactions and reduction in media coverage.

Risks Related to This Offering

A substantial number of shares may be sold in the market following this offering, which may depress the market price for our common stock.

Sales of a substantial number of shares of our common stock in the public market following this offering could cause the market price of our common stock to decline. Upon completion of this offering, we will have outstanding an aggregate of approximately 153.9 million shares of common stock, assuming no exercise of outstanding options or warrants. A substantial majority of the outstanding shares of our common stock are, and all of the shares sold in this offering upon issuance will be, freely tradable without restriction or further registration under the Securities Act of 1933 unless these shares are purchased by affiliates. In addition, as of February 1, 2010, 30,417,122 shares of our common stock are issuable upon exercise of outstanding options and warrants granted by us, which also have been registered for resale on registration statements filed with the Securities and Exchange Commission. The outstanding options have a weighted average exercise price of \$3.76 per share and expire between May 3, 2010 and December 7, 2019. The outstanding warrants have a weighted average exercise price of \$2.65 per share and expire between September 19, 2010 and November 3, 2014.

Our management will have broad discretion with respect to the use of the proceeds of this offering.

Although we have highlighted the intended use of proceeds for this offering, our management will have broad discretion as to the application of these net proceeds and could use them for purposes other than those contemplated at the time of this offering. Our stockholders may not agree with the manner in which our management chooses to allocate and spend the net proceeds.

You will experience immediate dilution in the book value per share of the common stock you purchase.

You will suffer substantial immediate dilution in the net tangible book value of the common stock you purchase in this offering because the price per share of our common stock being offered hereby is substantially higher than the book value per share of our common stock. Based on the public offering price of \$0.60 per share and the sale of 27,500,000 shares in this offering, if you purchase shares of common stock in this offering, you will suffer immediate and substantial dilution of \$0.46 per share in the net tangible book value of the common stock. See "Dilution" on page S-10 for a more detailed discussion of the dilution you will incur in this offering.

RECENT DEVELOPMENTS

Financial Update

As of December 31, 2009, we had cash and marketable securities of \$15.7 million, representing a net decrease of \$1.9 million from the previous quarter ended September 30, 2009, primarily due to: (i) \$6.0 million used for operating activities and \$0.2 million used for debt service, partially offset by (ii) aggregate proceeds of \$4.3 million from the issuance of 4.6 million shares of common stock pursuant to financings under our Committed Equity Financing Facilities (CEFFs). We had approximately 126.4 million common shares outstanding as of December 31, 2009 and February 16, 2010.

As of December 31, 2009, we had \$10.5 million outstanding under our loan with Novaquest, a strategic investment group of Quintiles Transnational Corp. The outstanding principal and all accrued interest is due and payable on April 30, 2010. Although we are planning, and have had discussions with Quintiles, to potentially extend or otherwise strategically restructure this loan, if Quintiles does not wish to restructure the loan, and we are unable to use our CEFFs to provide funds to satisfy all or a portion of the loan, we may have to rely on other sources of financing to repay the loan. There can be no assurance that any such restructuring will occur or financing alternatives will be available. In addition, as previously disclosed, (i) if we receive net cash proceeds of at least \$20 million from one or more corporate partnering or strategic alliance transactions, certain business combinations or public or private financings that are completed between August 13, 2009 and August 1, 2010 or (ii) if we are acquired in a business combination or other similar transaction prior to May 3, 2010 in which the consideration paid to our stockholders, in cash or securities, is at least \$20 million, we may become obligated to make a lump sum additional severance payment of up to approximately \$1 million to Robert G. Capetola, Ph.D., our former President and Chief Executive Officer, under a Separation of Employment Agreement and General Release dated August 13, 2009 between ourselves and Dr. Capetola.

Surfaxin[®] for the Prevention of Respiratory Distress Syndrome (RDS) in Premature Infants

At a September 2009 teleconference with the FDA, we and the FDA focused on the remaining Chemistry, Manufacturing & Control (CMC) issue regarding the final validation of the BAT that must be addressed to gain marketing approval for Surfaxin[®] (lucinactant) for the prevention of RDS in premature infants. We discussed in detail with the FDA our plans to optimize the precision of the BAT method and its subsequent validation. We also discussed the design of a proposed limited clinical trial and whether conducting such a trial while simultaneously employing the optimized BAT could potentially resolve the remaining FDA requirement for Surfaxin approval. We proposed a limited clinical trial design intended primarily to assess a pharmacodynamic (PD) response following Surfaxin administration in preterm infants with RDS. The FDA indicated that a PD-based approach is consistent with their expectation for a limited clinical trial and, subject to further review and ethical consideration, provided direction regarding trial design specifics.

On November 17, 2009, after collaborating with leading academic neonatologists, we announced that we had submitted to the FDA a proposed protocol for a Surfaxin limited clinical trial that incorporated a PD-based clinical trial design. On February 4, 2010, we received a letter from the FDA advising us that, since an acceptable and well-established animal model (preterm lamb) of RDS already exists, which could be used as an acceptable alternative to a clinical trial in human preterm infants, a PD clinical trial approach is not appropriate. Accordingly, we now plan to focus on a pathway that would entail solely performing additional preclinical work, instead of conducting a limited clinical trial, to potentially gain FDA marketing approval for Surfaxin. Compared to the conduct of a PD clinical trial, a comprehensive preclinical program, if successful, presents an opportunity to significantly reduce the time and expense required to gain potential Surfaxin approval and Discovery Labs believes that a Complete Response could be submitted to the FDA in the first quarter of 2011.

Upon successful conclusion of BAT optimization and revalidation, a process which is well underway and presently meets all pre-specified acceptance criteria, we plan to conduct a series of prospectively-designed, side-by-side preclinical studies employing the optimized BAT and the well-established preterm lamb model of RDS. The results from these studies are intended to demonstrate to the FDA's satisfaction that the BAT is able to adequately discriminate biologically active Surfaxin drug product from inactive Surfaxin drug product and establish the Surfaxin drug product's final acceptance criteria with respect to biological activity (as assessed by the BAT) for release and ongoing stability. We believe that implementing the method improvements to optimize the BAT makes it more likely that the results of the planned preclinical program will demonstrate the level of comparability between data generated using the BAT and the preterm lamb model that the FDA requires.

The comprehensive preclinical program will employ several different Surfaxin batches to assess the short-term physiologic responses to Surfaxin (via measurement of respiratory compliance) after administration in both the preterm lamb model and the optimized BAT at various time points. The resulting data will be examined to evaluate the relative changes, over time, in biological activity upon Surfaxin administration to determine the degree of comparability between the optimized BAT and the preterm lamb model. The FDA has previously invited us to seek FDA advice with respect to the ongoing BAT optimization and revalidation process and we plan to seek FDA advice regarding important aspects of the preclinical program, including study design and appropriate success criteria. We believe that continued interactions with the FDA are an important element in assuring the adequacy of the preclinical program.

Non-Compliance with Minimum Bid Price Requirement

On December 2, 2009, we received a letter from The Nasdaq Stock Market indicating that for 30 consecutive business days our common stock did not maintain a minimum closing bid price of \$1.00 per share as required by Nasdaq Listing Rule 5450(a)(1). Under the Nasdaq Listing Rules, if during the 180 calendar days following the date of the notification, or prior to June 1, 2010, the closing bid price of our stock is at or above \$1.00 for a minimum of 10 consecutive business days, we will regain compliance with the minimum bid price requirement and the common stock will continue to be eligible for listing on The Nasdaq Global Market. The consequences of not achieving compliance by that date are described above in *"Risk Factors - Risks Related to Our Common Stock - If we are unable to regain compliance with the Minimum Bid Price Requirement of The Nasdaq Global Market prior to June 1, 2010, our stock price may decline and our common stock may be subject to delisting from Nasdaq. If our stock were no longer listed on Nasdaq, the liquidity of our securities would be impaired."*

USE OF PROCEEDS

We estimate the net proceeds from the securities offered pursuant to this prospectus to be approximately \$15.1 million after deducting the underwriting discount and other estimated offering expenses, based on the public offering price of \$0.60 per share. Except as described in any later prospectus supplement or post-effective amendment, we currently anticipate using the net proceeds from the sale of our common stock and warrants primarily to support our general corporate activities and for expenses associated with maintaining our research and development operations, including manufacturing, quality and analytical capabilities, product development and clinical operations, which include:

- Expenses related to resolving the remaining issue (related to optimization and revalidation of the BAT and establishing that the BAT is capable of discriminating changes in Surfaxin[®] drug product over time) that must be addressed to secure the potential approval of Surfaxin[®] for the prevention of RDS, including implementing a comprehensive pre-clinical program.
- Expenses related to ongoing development of our Surfaxin LS[™] and Aerosurf[®] programs, which, together with Surfaxin, are focused on addressing the most significant respiratory conditions affecting pediatric populations, beginning with RDS. Surfaxin LS is a lyophilized formulation of Surfaxin that is manufactured as a dry powder and reconstituted as a liquid prior to administration and offers ease of administration and other potential benefits. Aerosurf, our KL₄ surfactant in aerosolized form, is a drug-device combination product based on our proprietary capillary aerosolization technology and potentially can be administered without the invasive procedures that are required for the currently-approved surfactants. Expenses related to Surfaxin LS include our preclinical development program and costs to meet with the FDA and the European regulatory authorities to discuss our proposed Phase 3 global registration clinical program. Expenses related to Aerosurf include activities to advance our ongoing device development and preclinical work and the costs of preparing an IND filing in anticipation of our planned Phase 2 clinical program. We plan to initiate the Surfaxin LS and Aerosurf clinical development programs after we have secured additional capital resources in the form of strategic alliances or other financial alternatives.
- Expenses related to completing the final stages of our Phase 2 trials: to determine if restoration of surfactant with Surfaxin will improve lung function and result in a shorter duration of mechanical ventilation and hospital stay for children up to two years of age suffering with Acute Respiratory Failure; and an investigator-initiated Phase 2a clinical trial in Cystic Fibrosis patients that has been designed to assess the safety, tolerability and short-term effectiveness of aerosolized KL₄ surfactant in CF patients. Results from these trials are anticipated in 2010.

The amounts and timing of the expenditures may vary significantly depending on numerous factors, such as the progress of our research and development efforts, technological advances and the competitive environment for Surfaxin and our other SRT drug candidates and their intended uses. Pending the application of the net proceeds, we intend to invest the proceeds in short-term, interest-bearing instruments or other investment-grade securities.

DILUTION

The net tangible book value of our common stock on September 30, 2009, was approximately \$5.4 million, or approximately \$0.04 per share. Net tangible book value per share is equal to the amount of our total tangible assets, less total liabilities, divided by the aggregate number of shares of common stock outstanding. Dilution in net tangible book value per share represents the difference between the amount per share paid by purchasers of shares of our common stock in this offering and the net tangible book value per share of our common stock immediately after this offering. For purposes of this calculation, the entire purchase price for the unit is being allocated to the common stock contained in the unit. After giving effect to the sale of 27,500,000 shares of our common stock in this offering at a public offering price equal to \$0.60 per share, and after deducting the underwriting discount and the estimated offering expenses, but excluding any effects of potential exercises of the warrants issued in this offering, our net tangible book value on September 30, 2009 would have been approximately \$20.6 million, or approximately \$0.14 per share. This represents an immediate increase in the net tangible book value of \$0.10 per share to existing shareholders and an immediate dilution of \$0.46 per share to new investors purchasing shares of common stock in this offering. The following table illustrates this dilution:

| | |
|--|--------|
| Public offering price per share included in each unit | \$0.60 |
| Net tangible book value per share as of September 30, 2009 | \$0.04 |
| Increase per share after the offering | \$0.10 |
| Pro forma net tangible book value per share as of September 30, 2009, after giving effect to this offering | \$0.14 |
| Dilution per share to new investors | \$0.46 |

In addition, investors that purchase common stock upon the exercise of the warrants offered hereby may experience dilution depending on our net tangible book value at the time of exercise. The foregoing table does not take into account further dilution to new investors that could occur upon the exercise of outstanding options and warrants having a per share exercise price less than the per share offering price to the public in this offering. As of September 30, 2009, there were 121,699,850 shares of common stock outstanding, which does not include:

- 16,020,134 shares of common stock issuable upon exercise of options outstanding as of September 30, 2009, at a weighted average exercise price of \$3.78 per share;
- 14,839,196 shares of common stock issuable upon exercise of warrants outstanding as of September 30, 2009, at a weighted average exercise price of \$2.89;
- 34,419 shares of common stock issuable upon the vesting of restricted stock awards outstanding as of September 30, 2009;
- 239,022 shares of common stock reserved for potential future issuance pursuant to our 401(k) Plan as of September 30, 2009; and
- 24,453,621 shares of common stock reserved for potential future issuance pursuant to two Committed Equity Financing Facilities, as of September 30, 2009.

DESCRIPTION OF SECURITIES WE ARE OFFERING

In this offering, we are offering a maximum of 27,500,000 units, consisting of 27,500,000 shares of common stock and warrants to purchase up to an additional 13,750,000 shares of common stock. Each unit consists of one share of common stock and a warrant to purchase one half of a share of common stock at an exercise price of \$0.85 per share. Units will not be issued or certificated. The shares of common stock and warrants are immediately separable and will be issued separately. This prospectus supplement also relates to the offering of shares of our common stock upon exercise, if any, of the warrants.

Common Stock

The material terms and provisions of our common stock and each other class of our securities which qualifies or limits our common stock are described under the caption "Description of Common Stock" starting on page 31 of the accompanying prospectus.

Warrants

The following summary of certain terms and provisions of the warrants offered hereby is not complete and is subject to, and qualified in its entirety by reference to, the terms and provisions set forth in the form of warrant attached as Annex A to this prospectus supplement. Prospective investors should carefully review the terms and provisions set forth in the form of warrant.

Exercisability. The warrants are exercisable beginning on the date of original issuance and at any time up to the date that is five years after such date. The warrants will be exercisable, at the option of each holder, in whole or in part by delivering to us a duly executed exercise notice accompanied by payment in full for the number of shares of our common stock purchased upon such exercise (except in the case of a cashless exercise as discussed below). Unless otherwise specified in the warrant, the holder will not have the right to exercise any portion of the warrant if the holder (together with its affiliates) would beneficially own in excess of 9.99% of the number of shares of our common stock outstanding immediately after giving effect to the exercise, as such percentage ownership is determined in accordance with the terms of the warrants.

Cashless Exercise. In the event that a registration statement covering shares of common stock underlying the warrants, or an exemption from registration, is not available for the resale of such shares of common stock underlying the warrants, the holder may, in its sole discretion, exercise the warrant in whole or in part and, in lieu of making the cash payment otherwise contemplated to be made to us upon such exercise in payment of the aggregate exercise price, elect instead to receive upon such exercise the net number of shares of common stock determined according to the formula set forth in the warrant.

Exercise Price. The exercise price per share of common stock purchasable upon exercise of the warrants is \$0.85 per share of common stock being purchased. The exercise price is subject to appropriate adjustment in the event of certain stock dividends and distributions, stock splits, stock combinations, reclassifications or similar events affecting our common stock and also upon any distributions of assets, including cash, stock or other property to our stockholders.

Transferability. Subject to applicable laws, the warrants may be offered for sale, sold, transferred or assigned without our consent.

Exchange Listing. We do not plan on making an application to list the warrants on The Nasdaq Global Market, any other national securities exchange or other nationally recognized trading system.

Fundamental Transactions. We will not enter into or be party to a fundamental transaction, which is a merger or other change of control transaction, as described in the warrants, unless the successor entity, as described in the warrants, assumes the warrants and delivers new warrants that are substantially similar. If we enter into, or are a party to, a fundamental transaction pursuant to which our stockholders are entitled or required to receive securities issued by another company or cash or other assets in exchange for shares of our common stock, which we refer to as a corporate event, a holder of a warrant will have the right to receive, upon an exercise of the warrant, consideration as if the holder had exercised its warrant immediately prior to such corporate event.

Rights as a Stockholder. Except as otherwise provided in the warrants or by virtue of such holder's ownership of shares of our common stock, the holder of a warrant does not have the rights or privileges of a holder of our common stock, including any voting rights, until the holder exercises the warrant.

Waivers and Amendments. Any term of the warrants may be amended or waived with our written consent and the written consent of the holders of warrants.

UNDERWRITING

Under the terms and subject to the conditions in an underwriting agreement dated the date of this prospectus supplement, Lazard Capital Markets LLC, as the sole underwriter, has agreed to purchase, and we have agreed to sell to it, the number of units (each unit consisting of one share of common stock and one warrant to purchase one half of a share of common stock) at the public offering price, less the underwriting discount, as set forth on the cover page of this prospectus supplement, as indicated below:

| Underwriter | Number of Units |
|----------------------------|----------------------------|
| Lazard Capital Markets LLC | 27,500,000 |
| Total: | 27,500,000 |

The underwriter is offering the units subject to its acceptance of the securities included in the units from us and subject to prior sale. The underwriting agreement provides that the obligations of the underwriter to pay for and accept delivery of the units offered by this prospectus supplement are subject to the approval of certain legal matters by its counsel and to other conditions. The underwriter is obligated to take and pay for all of the units offered by this prospectus supplement if any such units are taken.

The underwriter initially proposes to offer the units directly to the public at the public offering price listed on the cover page of this prospectus supplement. After the initial offering of the units, the offering price and other selling terms may from time to time be varied by the underwriter.

The underwriting agreement provides that the obligations of the underwriter is subject to certain conditions precedent, including the absence of any material adverse change in our business and the receipt of customary legal opinions, letters and certificates.

Commissions and Discounts

The following table summarizes the public offering price, underwriting discount and proceeds before expenses to us:

| | Per Unit | Total |
|----------------------------------|-----------------|---------------|
| Public offering price | \$ 0.600 | \$ 16,500,000 |
| Underwriting discount | \$ 0.042 | \$ 1,155,000 |
| Proceeds, before expenses, to us | \$ 0.558 | \$ 15,345,000 |

The expenses of the offering, not including the underwriting discount, payable by us are estimated to be \$230,000, which includes \$75,000 that we have agreed to reimburse the underwriter for its legal fees incurred by it in connection with this offering. Lazard Frères & Co. LLC referred this transaction to Lazard Capital Markets LLC and will receive a referral fee from Lazard Capital Markets LLC in connection therewith; however, such referral fee is not in addition to the fee paid by us to Lazard Capital Markets LLC described above.

Quotation on The Nasdaq Global Market

Our shares of common stock included in the units are listed on The Nasdaq Global Market under the symbol "DSCO." Our registrar and transfer agent for all shares of common stock is Continental Stock Transfer & Trust Company.

No Sales of Similar Securities

We, each of our executive officers and directors and certain of our stockholders, subject to certain exceptions, have agreed with Lazard Capital Markets LLC not to dispose of or hedge any of our shares of common stock or securities convertible into or exercisable or exchangeable for common stock for 90 days after the date of this prospectus without first obtaining the written consent of Lazard Capital Markets LLC. The 90-day "lock-up" period is subject to extension such that, in the event that either (i) during the last 17 days of the "lock-up" period, we issue an earnings or financial results release or material news or a material event relating to us occurs, or (ii) prior to the expiration of the "lock-up" period, we announce that we will release earnings or financial results during the 16-day period beginning on the last day of the "lock-up" period, then in either case the expiration of the "lock-up" period will be extended until the expiration of the 18-day period beginning on the issuance of the earnings or financial results release or the occurrence of the material news or material event, as applicable, unless Lazard Capital Markets LLC waives, in writing, such an extension. However, commencing on (a) March 6, 2010, we may issue shares of common stock pursuant to the CEFFs with Kingsbridge Capital Limited for the purpose of satisfying up to \$3 million of our obligations under our loan with Novaquest, a strategic investment group of Quintiles Transnational Corp., (b) March 21, 2010, we may issue shares of common stock pursuant to the CEFFs for any purpose (but in no event may the aggregate number of shares of common stock issued under the CEFFs pursuant to (a) and (b) prior to May 4, 2010 exceed, in the aggregate, 2.0% of our outstanding common stock), and (c) May 5, 2010, there will be no limitation on our issuance of shares of common stock pursuant to the CEFFs. Other exceptions to our "lock-up" include our right to issue securities (i) in connection with strategic alliances involving us and other entities and (ii) to Quintiles Transnational Corp. in connection with the restructuring or satisfaction of our obligations in whole or in part with respect to the loan mentioned above.

Price Stabilization, Short Positions

In order to facilitate the offering of the units, the underwriter may engage in transactions that stabilize, maintain or otherwise affect the price of our common stock. Specifically, the underwriter may sell more units than it is obligated to purchase under the underwriting agreement, creating a short position. The underwriter must close out any short position by purchasing shares of common stock in the open market. A short position may be created if the underwriter is concerned that there may be downward pressure on the price of the common stock in the open market after pricing that could adversely affect investors who purchased in this offering. As an additional means of facilitating this offering, the underwriter may bid for, and purchase, shares of our common stock in the open market to stabilize the price of the common stock. These activities may raise or maintain the market price of our common stock above independent market levels or prevent or slow a decline in the market price of our common stock. The underwriter is not required to engage in these activities, and may end any of these activities at any time.

We and the underwriter have agreed to indemnify each other, and we have also agreed to indemnify Lazard Frères & Co. LLC, against certain liabilities, including liabilities under the Securities Act of 1933, as amended, and liabilities arising from breaches of representations and warranties contained in the underwriting agreement. We have also agreed to contribute to payments the underwriter and Lazard Frères & Co. LLC may be required to make in respect of such liabilities.

A prospectus in electronic format may be made available on websites maintained by the underwriter. The underwriter may agree to allocate a number of units to other underwriters for sale to its online brokerage account holders. Internet distributions will be allocated by the underwriter on the same basis as other allocations.

United Kingdom

This document is only being distributed to and is only directed at (i) persons who are outside the United Kingdom or (ii) to investment professionals falling within Article 19(5) of the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005 (the “Order”) or (iii) high net worth entities, and other persons to whom it may lawfully be communicated, falling within Article 49(2)(a) to (e) of the Order (all such persons together being referred to as “relevant persons”). The units are only available to, and any invitation, offer or agreement to subscribe, purchase or otherwise acquire such units will be engaged in only with, relevant persons. Any person who is not a relevant person should not act or rely on this document or any of its contents.

The underwriter has represented and agreed that:

(a) it has only communicated or caused to be communicated and will only communicate or cause to be communicated an invitation or inducement to engage in investment activity (within the meaning of Section 21 of the Financial Services and Markets Act 2000 or FSMA) received by it in connection with the issue or sale of the units in circumstances in which Section 21(1) of the FSMA does not apply to us, and

(b) it has complied with, and will comply with all applicable provisions of FSMA with respect to anything done by it in relation to the units in, from or otherwise involving the United Kingdom.

European Economic Area

To the extent that the offer of the units is made in any Member State of the European Economic Area that has implemented the Prospectus Directive before the date of publication of a prospectus in relation to the units which has been approved by the competent authority in the Member State in accordance with the Prospectus Directive (or, where appropriate, published in accordance with the Prospectus Directive and notified to the competent authority in the Member State in accordance with the Prospectus Directive), the offer (including any offer pursuant to this document) is only addressed to qualified investors in that Member State within the meaning of the Prospectus Directive or has been or will be made otherwise in circumstances that do not require us to publish a prospectus pursuant to the Prospectus Directive.

In relation to each Member State of the European Economic Area which has implemented the Prospectus Directive (each, a “Relevant Member State”), the underwriter has represented and agreed that with effect from and including the date on which the Prospectus Directive is implemented in that Relevant Member State (the “Relevant Implementation Date”) it has not made and will not make an offer of shares to the public in that Relevant Member State prior to the publication of a prospectus in relation to the shares which has been approved by the competent authority in that Relevant Member State or, where appropriate, approved in another Relevant Member State and notified to the competent authority in that Relevant Member State, all in accordance with the Prospectus Directive, except that it may, with effect from and including the Relevant Implementation Date, make an offer of units to the public in that Relevant Member State at any time:

(a) to legal entities which are authorized or regulated to operate in the financial markets or, if not so authorized or regulated, whose corporate purpose is solely to invest in securities,

(b) to any legal entity which has two or more of (1) an average of at least 250 employees during the last financial year; (2) a total balance sheet of more than €43,000,000 and (3) an annual net turnover of more than €50,000,000, as shown in its last annual or consolidated accounts, or

(c) in any other circumstances which do not require the publication by us of a prospectus pursuant to Article 3 of the Prospectus Directive. For the purposes of this provision, the expression an “offer of units to the public” in relation to any shares in any Relevant Member State means the communication in any form and by any means of sufficient information on the terms of the offer and the units to be offered so as to enable an investor to decide to purchase or subscribe the units, as the same may be varied in that Relevant Member State by any measure implementing the Prospectus Directive in that Relevant Member State and the expression “Prospectus Directive” means Directive 2003/71/EC and includes any relevant implementing measure in each Relevant Member State.

The EEA selling restriction is in addition to any other selling restrictions set out below. In relation to each Relevant Member State, each purchaser of units (other than the underwriter) will be deemed to have represented, acknowledged and agreed that it will not make an offer of units to the public in any Relevant Member State, except that it may, with effect from and including the date on which the Prospectus Directive is implemented in the Relevant Member State, make an offer of units to the public in that Relevant Member State at any time in any circumstances which do not require the publication by us of a prospectus pursuant to Article 3 of the Prospectus Directive, provided that such purchaser agrees that it has not and will not make an offer of any units in reliance or purported reliance on Article 3(2)(b) of the Prospectus Directive. For the purposes of this provision, the expression an “offer of units to the public” in relation to units in any Relevant Member State has the same meaning as in the preceding paragraph.

LEGAL MATTERS

The validity of the issuance of the securities offered hereby will be passed upon by Sonnenschein Nath & Rosenthal LLP, New York, New York. Proskauer Rose LLP, New York, New York, is acting as counsel for the underwriter in connection with this offering.

EXPERTS

Ernst & Young LLP, independent registered public accounting firm, has audited our consolidated financial statements included in our Annual Report on Form 10-K for the year ended December 31, 2008, and the effectiveness of our internal control over financial reporting as of December 31, 2008, as set forth in their reports, which are incorporated by reference in this prospectus supplement and elsewhere in the registration statement. Our financial statements are incorporated by reference in reliance on Ernst & Young LLP’s reports, given on their authority as experts in accounting and auditing.

WHERE YOU CAN FIND MORE INFORMATION AND INCORPORATION BY REFERENCE

We file annual, quarterly and periodic reports, proxy statements and other information with the SEC. You may read and copy any materials that we file with the SEC at the SEC’s Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the Public Reference Room by calling the SEC at 1-800-SEC-0330. Many of our SEC filings are also available to the public from the SEC’s Website at “<http://www.sec.gov>.” We make available free of charge our annual, quarterly and current reports, proxy statements and other information upon request. To request such materials, please send an e-mail to ir@DiscoveryLabs.com or contact John G. Cooper, our Executive Vice President, Chief Financial Officer, at our address as set forth in the accompanying prospectus.

We maintain a website at “<http://www.DiscoveryLabs.com>” (this is not a hyperlink, you must visit this website through an Internet browser). Our website and the information contained therein or connected thereto are not incorporated into this prospectus supplement.

We have filed with the Securities and Exchange Commission a registration statement on Form S-3 under the Securities Act relating to the common stock we are offering by this prospectus supplement. The SEC allows us to “incorporate by reference” the information that we file with it, which means that we can disclose important information to you by referring you to those documents. The information incorporated by reference is considered to be part of this prospectus supplement, and information that we file later with the SEC will automatically update and supersede information in this prospectus supplement. We incorporate by reference the documents listed below and any future filings we make with the SEC pursuant to Section 13(a), 13(c), 14 or 15(d) of the Securities Exchange Act of 1934, as amended, until this offering is completed:

1. Our Annual Report on Form 10-K for the fiscal year ended December 31, 2008, filed on March 13, 2009, and Amendment No. 1 thereto, filed on April 30, 2009;
2. Our Quarterly Reports on Form 10-Q for the quarters ended March 31, 2009, June 30, 2009 and September 30, 2009, filed on May 11, 2009, August 10, 2009 and November 9, 2009, respectively;
3. Our Current Reports on Form 8-K filed with the SEC on March 13, 2009 (excluding the matters in Item 2.02 and Exhibit 99.1 therein, which are not incorporated by reference herein), April 24, 2009, April 29, 2009 (excluding the matters in Item 2.02 and Exhibit 99.1 therein, which are not incorporated by reference herein), May 8, 2009, May 12, 2009, May 15, 2009, July 2, 2009, August 3, 2009 (excluding the matters in Item 2.02 and Exhibit 99.1 therein, which are not incorporated by reference herein), August 19, 2009, September 4, 2009, September 11, 2009, September 30, 2009, November 4, 2009 (excluding the matters in Item 2.02 and Exhibit 99.1 therein, which are not incorporated by reference herein), November 18, 2009, December 4, 2009, December 9, 2009, February 16, 2010 and February 18, 2010; and

4. The description of our common stock contained in our Registration Statement on Form 8-A filed with the SEC on July 13, 1995 and February 6, 2004.

Furthermore, all reports and other documents subsequently filed (but not furnished) by us with the SEC pursuant to Sections 13(a), 13(c), 14, or 15(d) of the Securities Exchange Act of 1934 prior to the termination of this offering shall be deemed to be incorporated by reference in this prospectus supplement and to be a part of this prospectus supplement from the date of filing of such reports and documents. We are not incorporating by reference any documents or portions thereof that are not deemed "filed" with the SEC, including information "furnished" pursuant to Items 2.02 or 7.01 of Form 8-K. Any statement contained in any document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this prospectus supplement to the extent that a statement contained in this prospectus supplement or in any other subsequently filed document which also is or is deemed to be incorporated by reference in this prospectus supplement modifies or supersedes such statement. Any statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this prospectus supplement.

This prospectus supplement and the accompanying prospectus are only part of a registration statement on Form S-3 that we have filed with the SEC under the Securities Act and therefore omits certain information contained in the registration statement. We have also filed exhibits and schedules with the registration statement that are excluded from this prospectus supplement and the accompanying prospectus. Statements contained in this prospectus supplement as to the contents of any contract or other document are qualified by reference to the copy of that contract or document filed as an exhibit to the registration statement or that will be filed as an exhibit to the current report on Form 8-K upon completion of this offering.

Each person to whom a copy of this prospectus supplement is delivered may request a copy of any or all of the information incorporated by reference in this prospectus supplement, including the exhibits to any filings incorporated by reference herein, from us, at no charge, or from the Securities and Exchange Commission in the above described manner.

DISCOVERY LABORATORIES, INC.

FORM OF WARRANT TO PURCHASE COMMON STOCK

Warrant No.: _____
 Number of Shares of Common Stock: _____
 Date of Issuance: [], 2010 ("**Issuance Date**")

Discovery Laboratories, Inc., a Delaware corporation (the "**Company**"), hereby certifies that, for good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, [INVESTOR NAME], the registered holder hereof or its permitted assigns (the "**Holder**"), is entitled, subject to the terms set forth below, to purchase from the Company, at the Exercise Price (as defined below) then in effect, upon surrender of this Warrant to Purchase Common Stock (including any Warrants to Purchase Common Stock issued in exchange, transfer or replacement hereof, the "**Warrant**"), at any time or times on or after the date hereof (the "**Exercisability Date**"), but not after 11:59 p.m., New York time, on the Expiration Date (as defined below), [_____] ()¹ fully paid nonassessable shares of Common Stock (as defined below) (the "**Warrant Shares**"). Except as otherwise defined herein, capitalized terms in this Warrant shall have the meanings set forth in Section 15. This Warrant is the Warrant to purchase Common Stock (this "**Warrant**") issued pursuant to (i) Sections 1 and 2 of that certain Underwriting Agreement (the "**Underwriting Agreement**"), dated as of February 18, 2010 (the "**Pricing Date**"), by and between the Company and Lazard Capital Markets LLC, as underwriter and (ii) the Company's Registration Statement on Form S-3 (File number 333-151654) (the "**Registration Statement**").

¹ Insert a number of shares equal to 50% of the number of shares of common stock purchased under the Underwriting Agreement.

1. EXERCISE OF WARRANT.

(a) Mechanics of Exercise. Subject to the terms and conditions hereof, this Warrant may be exercised by the Holder on any day on or after the Exercisability Date, in whole or in part, by (i) delivery of a written notice, in the form attached hereto as Exhibit A (the "**Exercise Notice**"), of the Holder's election to exercise this Warrant and (ii) (A) payment to the Company of an amount equal to the applicable Exercise Price multiplied by the number of Warrant Shares as to which this Warrant is being exercised (the "**Aggregate Exercise Price**") in cash or by wire transfer of immediately available funds or (B) provided the conditions for cashless exercise set forth in Section 1(d) are satisfied, by notifying the Company that this Warrant is being exercised pursuant to a Cashless Exercise (as defined in Section 1(d)). The Holder shall not be required to deliver the original Warrant in order to effect an exercise hereunder. Execution and delivery of the Exercise Notice with respect to less than all of the Warrant Shares shall have the same effect as cancellation of the original Warrant and issuance of a new Warrant evidencing the right to purchase the remaining number of Warrant Shares. On or before the first (1st) Business Day following the date on which the Company has received each of the Exercise Notice and the Aggregate Exercise Price (or notice of a Cashless Exercise) (collectively, the "**Exercise Delivery Documents**"), the Company shall transmit by facsimile or electronic mail an acknowledgment of receipt of the Exercise Delivery Documents to the Holder and Continental Stock Transfer & Trust Company (the Company's "**Transfer Agent**"). On or before the third (3rd) Business Day following the date on which the Company has received all of the Exercise Delivery Documents (the "**Share Delivery Date**"), the Company shall (X) provided that the Transfer Agent is participating in The Depository Trust Company ("**DTC**") Fast Automated Securities Transfer Program, upon the request of the Holder, credit such aggregate number of Warrant Shares to which the Holder is entitled pursuant to such exercise to the Holder's or its designee's balance account with DTC through its Deposit/Withdrawal At Custodian ("**DWAC**") system, or (Y) if the Transfer Agent is not participating in the DTC Fast Automated Securities Transfer Program or the Holder does not request delivery of the Warrant Shares via DWAC, issue and dispatch by overnight courier to the address as specified in the Exercise Notice, a certificate, registered in the Company's share register in the name of the Holder or its designee, for the number of Warrant Shares to which the Holder is entitled pursuant to such exercise. Upon delivery of the Exercise Delivery Documents, the Holder shall be deemed for all corporate purposes to have become the holder of record of the Warrant Shares with respect to which this Warrant has been exercised, irrespective of the date such Warrant Shares are credited to the Holder's DTC account or the date of delivery of the certificates evidencing such Warrant Shares, as the case may be. If this Warrant is submitted in connection with any exercise pursuant to this Section 1(a) and the number of Warrant Shares represented by this Warrant submitted for exercise is greater than the number of Warrant Shares being acquired upon an exercise, then the Company shall as soon as practicable and in no event later than three Business Days after any exercise and at its own expense, issue a new Warrant (in accordance with Section 1(d)) representing the right to purchase the number of Warrant Shares purchasable immediately prior to such exercise under this Warrant, less the number of Warrant Shares with respect to which this Warrant is exercised. No fractional shares of Common Stock are to be issued upon the exercise of this Warrant, but rather the number of shares of Common Stock to be issued shall be rounded down to the nearest whole number. The Company shall pay any and all taxes which may be payable with respect to the issuance and delivery of Warrant Shares upon exercise of this Warrant.

(b) Exercise Price. For purposes of this Warrant, "**Exercise Price**" means \$0.85, subject to adjustment as provided herein.

(c) Company's Failure to Timely Deliver Securities. If the Company shall fail for any reason or for no reason to issue to the Holder within three (3) Business Days of receipt of the Exercise Delivery Documents in compliance with the terms of this Section 1, a certificate for the number of shares of Common Stock to which the Holder is entitled and register such shares of Common Stock on the Company's share register or to credit the Holder's balance account with DTC for such number of shares of Common Stock to which the Holder is entitled upon the Holder's exercise of this Warrant, and if on or after such Trading Day the Holder purchases (in an open market transaction or otherwise) shares of Common Stock to deliver in satisfaction of a sale by the Holder of shares of Common Stock issuable upon such exercise that the Holder anticipated receiving from the Company (a "**Buy-In**"), then the Company shall, within three (3) Business Days after the Holder's request and in the Holder's discretion, either (i) pay cash to the Holder in an amount equal to the Holder's total purchase price (including brokerage commissions, if any) for the shares of Common Stock so purchased (the "**Buy-In Price**"), at which point the Company's obligation to deliver such certificate (and to issue such Warrant Shares) shall terminate, or (ii) promptly honor its obligation to deliver to the Holder a certificate or certificates representing such Warrant Shares and pay cash to the Holder in an amount equal to the excess (if any) of the Buy-In Price over the product of (A) such number of shares of Common Stock, times (B) the Closing Bid Price on the date of exercise.

(d) **Cashless Exercise.** Notwithstanding anything contained herein to the contrary, if and only if neither (i) a registration statement covering the Warrant Shares that are the subject of the Exercise Notice (the "**Unavailable Warrant Shares**"), nor (ii) an exemption from registration, is available for the resale of such Unavailable Warrant Shares, the Holder may, in its sole discretion, exercise this Warrant in whole or in part and, in lieu of making the cash payment otherwise contemplated to be made to the Company upon such exercise in payment of the Aggregate Exercise Price, elect instead to receive upon such exercise the "Net Number" of shares of Common Stock determined according to the following formula (a "**Cashless Exercise**"):

$$\text{Net Number} = \frac{(A \times B) - (A \times C)}{B}$$

For purposes of the foregoing formula:

A= the total number of shares with respect to which this Warrant is then being exercised.

B= the arithmetic average of the Closing Sale Prices of the shares of Common Stock for the five (5) consecutive Trading Days ending on the Trading Day immediately preceding the date of the Exercise Notice.

C= the Exercise Price then in effect for the applicable Warrant Shares at the time of such exercise.

(e) **Rule 144.** For purposes of Rule 144(d) promulgated under the Securities Act, as in effect on the date hereof, it is intended that the Warrant Shares issued in a Cashless Exercise shall be deemed to have been acquired by the Holder, and the holding period for the Warrant Shares shall be deemed to have commenced, on the date this Warrant was originally issued pursuant to the Underwriting Agreement.

(f) **Disputes.** In the case of a dispute as to the determination of the Exercise Price or the arithmetic calculation of the Warrant Shares, the Company shall promptly issue to the Holder the number of Warrant Shares that are not disputed, and all such disputes shall be resolved pursuant to **Section 12**.

(g) **Beneficial Ownership.** The Company shall not effect the exercise of this Warrant, and the Holder shall not have the right to exercise this Warrant, to the extent that after giving effect to such exercise, such Person (together with such Person's affiliates) would beneficially own in excess of 9.99% (the "**Maximum Percentage**") of the shares of Common Stock outstanding immediately after giving effect to such exercise. For purposes of the foregoing sentence, the aggregate number of shares of Common Stock beneficially owned by such Person and its affiliates shall include the number of shares of Common Stock issuable upon exercise of this Warrant with respect to which the determination of such sentence is being made, but shall exclude shares of Common Stock which would be issuable upon (i) exercise of the remaining, unexercised portion of this Warrant beneficially owned by such Person and its affiliates and (ii) exercise or conversion of the unexercised or unconverted portion of any other securities of the Company beneficially owned by such Person and its affiliates (including, without limitation, any convertible notes or convertible preferred stock or warrants) subject to a limitation on conversion or exercise analogous to the limitation contained herein. Except as set forth in the preceding sentence, for purposes of this paragraph, beneficial ownership shall be calculated in accordance with Section 13(d) of the Securities Exchange Act of 1934, as amended. For purposes of this Warrant, in determining the number of outstanding shares of Common Stock, the Holder may rely on the number of outstanding shares of Common Stock as reflected in (1) the Company's most recent Form 10-K, Form 10-Q, Current Report on Form 8-K or other public filing with the Securities and Exchange Commission, as the case may be, (2) a more recent public announcement by the Company or (3) any other notice by the Company or the Transfer Agent setting forth the number of shares of Common Stock outstanding. To the extent that the limitation contained in this Section 1(g) applies, the determination of whether this Warrant is exercisable (in relation to other securities owned by such Holder) and of which a portion of this Warrant is exercisable shall be in the sole discretion of a Holder, and the submission of an Exercise Notice of shall be deemed to be each Holder's determination of whether this Warrant is exercisable (in relation to other securities owned by such Holder) and of which portion of this Warrant is exercisable, in each case subject to such aggregate percentage limitation, and the Company shall have no obligation to verify or confirm the accuracy of such determination. For any reason at any time, upon the written or oral request of the Holder, the Company shall within two (2) Business Days confirm to the Holder the number of shares of Common Stock then outstanding. In any case, the number of outstanding shares of Common Stock shall be determined after giving effect to the conversion or exercise of securities of the Company, including this Warrant, by the Holder and its affiliates since the date as of which such number of outstanding shares of Common Stock was reported. By written notice to the Company, the Holder may from time to time increase or decrease the Maximum Percentage to any other percentage not in excess of 9.99% specified in such notice; *provided* that (i) any such increase will not be effective until the sixty-first (61st) day after such notice is delivered to the Company, and (ii) any such increase or decrease will apply only to the Holder. The provisions of this paragraph shall be construed and implemented in a manner otherwise than in strict conformity with the terms of this Section 1(g) to correct this paragraph (or any portion hereof) which may be defective or inconsistent with the intended beneficial ownership limitation herein contained or to make changes or supplements necessary or desirable to properly give effect to such limitation.

2. ADJUSTMENT OF EXERCISE PRICE AND NUMBER OF WARRANT SHARES. The Exercise Price and the number of Warrant Shares shall be adjusted from time to time as follows:

(a) Adjustment upon Subdivision or Combination of Common Stock. If the Company at any time on or after the Pricing Date subdivides (by any stock split, stock dividend, recapitalization, reorganization, scheme, arrangement or otherwise) one or more classes of its outstanding shares of Common Stock into a greater number of shares, the Exercise Price in effect immediately prior to such subdivision will be proportionately reduced and the number of Warrant Shares will be proportionately increased. If the Company at any time on or after the Pricing Date combines (by any stock split, stock dividend, recapitalization, reorganization, scheme, arrangement or otherwise) one or more classes of its outstanding shares of Common Stock into a smaller number of shares, the Exercise Price in effect immediately prior to such combination will be proportionately increased and the number of Warrant Shares will be proportionately decreased. Any adjustment under this Section 2(a) shall become effective at the close of business on the date the subdivision or combination becomes effective.

(b) Other Events. If any event occurs of the type contemplated by the provisions of this Section 2 but not expressly provided for by such provisions (including, without limitation, the granting of stock appreciation rights, phantom stock rights or other rights with equity features), then the Company's Board of Directors will make an appropriate adjustment in the Exercise Price and the number of Warrant Shares so as to protect the rights of the Holder; provided that no such adjustment pursuant to this Section 2(b) will increase the Exercise Price or decrease the number of Warrant Shares as otherwise determined pursuant to this Section 2.

3. RIGHTS UPON DISTRIBUTION OF ASSETS. If the Company shall declare or make any dividend or other distribution of its assets (or rights to acquire its assets) to all holders of shares of Common Stock, by way of return of capital or otherwise (including, without limitation, any distribution of cash, stock or other securities, property or options by way of a dividend, spin off, reclassification, corporate rearrangement, scheme of arrangement or other similar transaction) (a "**Distribution**"), at any time after the issuance of this Warrant, then, in each such case:

(a) any Exercise Price in effect immediately prior to the close of business on the record date fixed for the determination of holders of shares of Common Stock entitled to receive the Distribution shall be reduced, effective as of the close of business on such record date, to a price determined by multiplying such Exercise Price by a fraction of which (i) the numerator shall be the Closing Bid Price of the shares of Common Stock on the Trading Day immediately preceding such record date minus the value of the Distribution (as determined in good faith by the Company's Board of Directors) applicable to one share of Common Stock, and (ii) the denominator shall be the Closing Bid Price of the shares of Common Stock on the Trading Day immediately preceding such record date; and

(b) the number of Warrant Shares shall be increased to a number of shares equal to the number of shares of Common Stock obtainable immediately prior to the close of business on the record date fixed for the determination of holders of shares of Common Stock entitled to receive the Distribution multiplied by the reciprocal of the fraction set forth in the immediately preceding paragraph (a); *provided* that in the event that the Distribution is of shares of Common Stock (or common stock) ("**Other Shares of Common Stock**") of a company whose shares of common stock are traded on a national securities exchange or a national automated quotation system, then the Holder may elect to receive a warrant to purchase Other Shares of Common Stock in lieu of an increase in the number of Warrant Shares, the terms of which shall be identical to those of this Warrant, except that such warrant shall be exercisable into the number of shares of Other Shares of Common Stock that would have been payable to the Holder pursuant to the Distribution had the Holder exercised this Warrant immediately prior to such record date and with an aggregate exercise price equal to the product of the amount by which the exercise price of this Warrant was decreased with respect to the Distribution pursuant to the terms of the immediately preceding paragraph (a) and the number of Warrant Shares calculated in accordance with the first part of this paragraph (b).

4. PURCHASE RIGHTS; FUNDAMENTAL TRANSACTIONS.

(a) Purchase Rights. In addition to any adjustments pursuant to Section 2 above, if at any time the Company grants, issues or sells any Options, Convertible Securities or rights to purchase stock, warrants, securities or other property pro rata to the record holders of any class of shares of Common Stock (the "**Purchase Rights**"), then the Holder will be entitled to acquire, upon the terms applicable to such Purchase Rights, the aggregate Purchase Rights which the Holder could have acquired if the Holder had held the number of shares of Common Stock acquirable upon complete exercise of this Warrant (without regard to any limitations on the exercise of this Warrant) immediately before the date on which a record is taken for the grant, issuance or sale of such Purchase Rights, or, if no such record is taken, the date as of which the record holders of shares of Common Stock are to be determined for the grant, issue or sale of such Purchase Rights.

(b) Fundamental Transactions. The Company shall not enter into or be party to a Fundamental Transaction unless the Successor Entity assumes this Warrant in accordance with the provisions of this Section 4(b), including agreements to deliver to each holder of Warrants in exchange for such Warrants a security of the Successor Entity evidenced by a written instrument substantially similar in form and substance to this Warrant, including, without limitation, an adjusted exercise price equal to the value for the shares of Common Stock reflected by the terms of such Fundamental Transaction, and exercisable for a corresponding number of shares of capital stock equivalent to the shares of Common Stock acquirable and receivable upon exercise of this Warrant (without regard to any limitations on the exercise of this Warrant) prior to such Fundamental Transaction, and satisfactory to the Holder. Upon the occurrence of any Fundamental Transaction, the Successor Entity shall succeed to, and be substituted for (so that from and after the date of such Fundamental Transaction, the provisions of this Warrant referring to the "Company" shall refer instead to the Successor Entity), and may exercise every right and power of the Company and shall assume all of the obligations of the Company under this Warrant with the same effect as if such Successor Entity had been named as the Company herein. Upon consummation of the Fundamental Transaction, the Successor Entity shall deliver to the Holder confirmation that there shall be issued upon exercise of this Warrant at any time after the consummation of the Fundamental Transaction, in lieu of the shares of the Common Stock (or other securities, cash, assets or other property) purchasable upon the exercise of the Warrant prior to such Fundamental Transaction, such shares of stock, securities, cash, assets or any other property whatsoever (including warrants or other purchase or subscription rights) which the Holder would have been entitled to receive upon the happening of such Fundamental Transaction had this Warrant been converted immediately prior to such Fundamental Transaction, as adjusted in accordance with the provisions of this Warrant. In addition to and not in substitution for any other rights hereunder, prior to the consummation of any Fundamental Transaction pursuant to which holders of shares of Common Stock are entitled to receive securities or other assets with respect to or in exchange for shares of Common Stock (a "**Corporate Event**"), the Company shall make appropriate provision to insure that the Holder will thereafter have the right to receive upon an exercise of this Warrant at any time after the consummation of the Fundamental Transaction but prior to the Expiration Date, in lieu of the shares of the Common Stock (or other securities, cash, assets or other property) purchasable upon the exercise of the Warrant prior to such Fundamental Transaction, such shares of stock, securities, cash, assets or any other property whatsoever (including warrants or other purchase or subscription rights) which the Holder would have been entitled to receive upon the happening of such Fundamental Transaction had the Warrant been exercised immediately prior to such Fundamental Transaction. If holders of Common Stock are given any choice as to the securities, cash or property to be received in a Fundamental Transaction, then the Holder shall be given the same choice as to the consideration it receives upon any exercise of this Warrant following such Fundamental Transaction. The provisions of this Section 4 shall apply similarly and equally to successive Fundamental Transactions and Corporate Events and shall be applied without regard to any limitations on the exercise of this Warrant.

5. NONCIRCUMVENTION. The Company hereby covenants and agrees that the Company will not, by amendment of its Certificate of Incorporation, Bylaws or through any reorganization, transfer of assets, consolidation, merger, scheme of arrangement, dissolution, issue or sale of securities, or any other voluntary action, avoid or seek to avoid the observance or performance of any of the terms of this Warrant, and will at all times in good faith carry out all the provisions of this Warrant and take all action as may be required to protect the rights of the Holder. Without limiting the generality of the foregoing, the Company (i) shall not increase the par value of any shares of Common Stock receivable upon the exercise of this Warrant above the Exercise Price then in effect, (ii) shall take all such actions as may be necessary or appropriate in order that the Company may validly and legally issue fully paid and nonassessable shares of Common Stock upon the exercise of this Warrant, and (iii) shall, so long as this Warrant is outstanding, take all action necessary to reserve and keep available out of its authorized and unissued shares of Common Stock, solely for the purpose of effecting the exercise of this Warrant, 100% of the number of shares of Common Stock issuable upon exercise of this Warrant then outstanding (without regard to any limitations on exercise).

6. WARRANT HOLDER NOT DEEMED A STOCKHOLDER. Except as otherwise specifically provided herein, the Holder, solely in such Person's capacity as a holder of this Warrant, shall not be entitled to vote or receive dividends or be deemed the holder of share capital of the Company for any purpose, nor shall anything contained in this Warrant be construed to confer upon the Holder, solely in such Person's capacity as the Holder of this Warrant, any of the rights of a stockholder of the Company or any right to vote, give or withhold consent to any corporate action (whether any reorganization, issue of stock, reclassification of stock, consolidation, merger, conveyance or otherwise), receive notice of meetings, receive dividends or subscription rights, or otherwise, prior to the issuance to the Holder of the Warrant Shares which such Person is then entitled to receive upon the due exercise of this Warrant. In addition, nothing contained in this Warrant shall be construed as imposing any liabilities on the Holder to purchase any securities (upon exercise of this Warrant or otherwise) or as a stockholder of the Company, whether such liabilities are asserted by the Company or by creditors of the Company.

7. REISSUANCE OF WARRANTS.

(a) Transfer of Warrant. If this Warrant is to be transferred, the Holder shall surrender this Warrant to the Company together with a written assignment of this Warrant in the form attached hereto as Exhibit B duly executed by the Holder or its agent or attorney, whereupon the Company will forthwith, subject to compliance with any applicable securities laws, issue and deliver upon the order of the Holder a new Warrant (in accordance with Section 7(d)), registered as the Holder may request, representing the right to purchase the number of Warrant Shares being transferred by the Holder and, if less than the total number of Warrant Shares then underlying this Warrant is being transferred, a new Warrant (in accordance with Section 7(d)) to the Holder representing the right to purchase the number of Warrant Shares not being transferred.

(b) Lost, Stolen or Mutilated Warrant. Upon receipt by the Company of evidence reasonably satisfactory to the Company of the loss, theft, destruction or mutilation of this Warrant, and, in the case of loss, theft or destruction, of any indemnification undertaking by the Holder to the Company in customary form and, in the case of mutilation, upon surrender and cancellation of this Warrant, the Company shall execute and deliver to the Holder a new Warrant (in accordance with Section 7(d)) representing the right to purchase the Warrant Shares then underlying this Warrant.

(c) Exchangeable for Multiple Warrants. This Warrant is exchangeable, upon the surrender hereof by the Holder at the principal office of the Company, for a new Warrant or Warrants (in accordance with Section 7(d)) representing in the aggregate the right to purchase the number of Warrant Shares then underlying this Warrant, and each such new Warrant will represent the right to purchase such portion of such Warrant Shares as is designated by the Holder at the time of such surrender; provided, however, that no Warrants for fractional shares of Common Stock shall be given.

(d) Issuance of New Warrants. Whenever the Company is required to issue a new Warrant pursuant to the terms of this Warrant, such new Warrant (i) shall be of like tenor with this Warrant, (ii) shall represent, as indicated on the face of such new Warrant, the right to purchase the Warrant Shares then underlying this Warrant (or in the case of a new Warrant being issued pursuant to Section 7(a) or Section 7(c), the Warrant Shares designated by the Holder which, when added to the number of shares of Common Stock underlying the other new Warrants issued in connection with such issuance, does not exceed the number of Warrant Shares then underlying this Warrant), (iii) shall have an issuance date, as indicated on the face of such new Warrant, which is the same as the Issuance Date, and (iv) shall have the same rights and conditions as this Warrant.

8. **NOTICES.** The Company shall provide the Holder with prompt written notice of all actions taken pursuant to this Warrant, including in reasonable detail a description of such action and the reason therefore. Whenever notice is required to be given under this Warrant, unless otherwise provided herein, such notice shall be given in writing, will be mailed (a) if within the domestic United States by first-class registered or certified airmail, or nationally recognized overnight express courier, postage prepaid, or by facsimile or (b) if delivered from outside the United States, by International Federal Express or facsimile, and (c) will be deemed given (i) if delivered by first-class registered or certified mail domestic, three business days after so mailed, (ii) if delivered by nationally recognized overnight carrier, one business day after so mailed, (iii) if delivered by International Federal Express, two business days after so mailed and (iv) if delivered by facsimile, upon electronic confirmation of receipt, and will be delivered and addressed as follows:

(a) if to the Company, to:

Discovery Laboratories, Inc.
2600 Kelly Road
Warrington, Pennsylvania 18976
Attention: John G. Cooper
Facsimile: 215-488-9301

with copies to:

Sonnenschein Nath & Rosenthal LLP
Two World Financial Center
New York, New York 10281
Attention: Ira L. Kotel, Esq.
Facsimile: 212-768-6800

(b) if to the Holder, at its address on the Exercise Notice in the form attached as Exhibit A hereto, or at such other address or addresses as may have been furnished to the Company in writing.

9. AMENDMENT AND WAIVER. Except as otherwise provided herein, the provisions of this Warrant may be amended only with the written consent of the Company and the Holder, and the Company may take any action herein prohibited, or omit to perform any act herein required to be performed by it, only with the written consent of the Holder.

10. GOVERNING LAW. This Warrant shall be governed by and construed and enforced in accordance with, and all questions concerning the construction, validity, interpretation and performance of this Warrant shall be governed by, the internal laws of the State of New York, without giving effect to any choice of law or conflict of law provision or rule (whether of the State of New York or any other jurisdictions) that would cause the application of the laws of any jurisdictions other than the State of New York.

11. CONSTRUCTION; HEADINGS. This Warrant shall be deemed to be jointly drafted by the Company and the Holder and shall not be construed against any person as the drafter hereof. The headings of this Warrant are for convenience of reference and shall not form part of, or affect the interpretation of, this Warrant.

12. DISPUTE RESOLUTION. In the case of a dispute as to the determination of the Exercise Price or the arithmetic calculation of the Warrant Shares, the Company shall submit the disputed determinations or arithmetic calculations via facsimile or electronic mail within two (2) Business Days of receipt of the Exercise Notice giving rise to such dispute, as the case may be, to the Holder. If the Holder and the Company are unable to agree upon such determination or calculation of the Exercise Price or the Warrant Shares within three Business Days of such disputed determination or arithmetic calculation being submitted to the Holder, then the Company shall, within two (2) Business Days submit via facsimile or electronic mail (a) the disputed determination of the Exercise Price to an independent, reputable investment bank selected by the Company and approved by the Holder or (b) the disputed arithmetic calculation of the Warrant Shares to the Company's independent, outside accountant. The Company shall cause at its expense the investment bank or the accountant, as the case may be, to perform the determinations or calculations and notify the Company and the Holder of the results no later than ten Business Days from the time it receives the disputed determinations or calculations. Such investment bank's or accountant's determination or calculation, as the case may be, shall be binding upon all parties absent demonstrable error.

13. REMEDIES, OTHER OBLIGATIONS, BREACHES AND INJUNCTIVE RELIEF. The remedies provided in this Warrant shall be cumulative and in addition to all other remedies available under this Warrant, at law or in equity (including a decree of specific performance and/or other injunctive relief), and nothing herein shall limit the right of the Holder to pursue actual damages for any failure by the Company to comply with the terms of this Warrant.

14. **TRANSFER.** Subject to compliance with any applicable securities laws, this Warrant may be offered for sale, sold, transferred or assigned without the consent of the Company.

15. **CERTAIN DEFINITIONS.** For purposes of this Warrant, the following terms shall have the following meanings:

(a) "**Bloomberg**" means Bloomberg Financial Markets.

(b) "**Business Day**" means any day other than Saturday, Sunday or other day on which commercial banks in The City of New York are authorized or required by law to remain closed.

(c) "**Change of Control**" means any Fundamental Transaction other than (A) any reorganization, recapitalization or reclassification of the Common Stock, in which holders of the Company's voting power immediately prior to such reorganization, recapitalization or reclassification continue after such reorganization, recapitalization or reclassification to hold publicly traded securities and, directly or indirectly, the voting power of the surviving entity or entities necessary to elect a majority of the members of the board of directors (or their equivalent if other than a corporation) of such entity or entities, or (B) pursuant to a migratory merger effected solely for the purpose of changing the jurisdiction of incorporation of the Company.

(d) "**Closing Bid Price**" and "**Closing Sale Price**" means, for any security as of any date, the last closing bid price and last closing trade price, respectively, for such security on the Principal Market, as reported by Bloomberg, or, if the Principal Market begins to operate on an extended hours basis and does not designate the closing bid price or the closing trade price, as the case may be, then the last bid price or the last trade price, respectively, of such security prior to 4:00:00 p.m., New York time, as reported by Bloomberg, or, if the Principal Market is not the principal securities exchange or trading market for such security, the last closing bid price or last trade price, respectively, of such security on the principal securities exchange or trading market where such security is listed or traded as reported by Bloomberg, or if the foregoing do not apply, the last closing bid price or last trade price, respectively, of such security in the over-the-counter market on the electronic bulletin board for such security as reported by Bloomberg, or, if no closing bid price or last trade price, respectively, is reported for such security by Bloomberg, the average of the bid prices, or the ask prices, respectively, of any market makers for such security as reported in the "pink sheets" by Pink Sheets LLC (formerly the National Quotation Bureau, Inc.). If the Closing Bid Price or the Closing Sale Price cannot be calculated for a security on a particular date on any of the foregoing bases, the Closing Bid Price or the Closing Sale Price, as the case may be, of such security on such date shall be the fair market value as determined by the Board of Directors of the Company in the exercise of its good faith judgment. All such determinations to be appropriately adjusted for any stock dividend, stock split, stock combination or other similar transaction during the applicable calculation period.

(e) "**Common Stock**" means (i) the Company's shares of Common Stock, par value \$0.001 per share, and (ii) any share capital into which such Common Stock shall have been changed or any share capital resulting from a reclassification of such Common Stock.

(f) RESERVED

(g) "**Convertible Securities**" means any stock or securities (other than Options) directly or indirectly convertible into or exercisable or exchangeable for shares of Common Stock.

(h) "**Eligible Market**" means the Principal Market, The New York Stock Exchange, Inc., The American Stock Exchange, The NASDAQ Global Select Market or The NASDAQ Capital Market.

(i) "**Expiration Date**" means the date five (5) years following the Date of Issuance or, if such date falls on a day other than a Business Day or on which trading does not take place on the Principal Market (a "**Holiday**"), the next date that is not a Holiday.

(j) "**Fundamental Transaction**" means that the Company shall, directly or indirectly, in one or more related transactions, (i) consolidate or merge with or into (whether or not the Company is the surviving corporation) another Person, or (ii) sell, assign, transfer, convey or otherwise dispose of all or substantially all of the properties or assets of the Company to another Person, or (iii) allow another Person to make a purchase, tender or exchange offer that is accepted by the holders of more than the 50% of the outstanding shares of Common Stock (not including any shares of Common Stock held by the Person or Persons making or party to, or associated or affiliated with the Persons making or party to, such purchase, tender or exchange offer), or (iv) consummate a stock purchase agreement or other business combination (including, without limitation, a reorganization, recapitalization, spin-off or scheme of arrangement) with another Person whereby such other Person acquires more than the 50% of the outstanding shares of Common Stock (not including any shares of Common Stock held by the other Person or other Persons making or party to, or associated or affiliated with the other Persons making or party to, such stock purchase agreement or other business combination), (v) reorganize, recapitalize or reclassify its Common Stock, or (vi) any "person" or "group" (as these terms are used for purposes of Sections 13(d) and 14(d) of the Exchange Act) is or shall become the "beneficial owner" (as defined in Rule 13d-3 under the Exchange Act), directly or indirectly, of 50% of the aggregate ordinary voting power represented by issued and outstanding Common Stock.

(k) "**Options**" means any rights, warrants or options to subscribe for or purchase shares of Common Stock or Convertible Securities.

(l) "**Parent Entity**" of a Person means an entity that, directly or indirectly, controls the applicable Person and whose common stock or equivalent equity security is quoted or listed on an Eligible Market, or, if there is more than one such Person or Parent Entity, the Person or Parent Entity with the largest public market capitalization as of the date of consummation of the Fundamental Transaction.

(m) "**Person**" means an individual, a limited liability company, a partnership, a joint venture, a corporation, a trust, an unincorporated organization, any other entity and a government or any department or agency thereof.

(n) "**Principal Market**" means The NASDAQ Global Market.

(o) RESERVED

(p) "**Successor Entity**" means the Person (or, if so elected by the Holder, the Parent Entity) formed by, resulting from or surviving any Fundamental Transaction or the Person (or, if so elected by the Holder, the Parent Entity) with which such Fundamental Transaction shall have been entered into.

(q) "**Trading Day**" means any day on which the Common Stock are traded on the Principal Market, or, if the Principal Market is not the principal trading market for the Common Stock, then on the principal securities exchange or securities market on which the Common Stock are then traded; *provided* that "Trading Day" shall not include any day on which the Common Stock are scheduled to trade on such exchange or market for less than 4.5 hours or any day that the Common Stock are suspended from trading during the final hour of trading on such exchange or market (or if such exchange or market does not designate in advance the closing time of trading on such exchange or market, then during the hour ending at 4:00:00 p.m., New York time).

(r) "**Weighted Average Price**" means, for any security as of any date, the dollar volume-weighted average price for such security on the Principal Market during the period beginning at 9:30:01 a.m., New York City time, and ending at 4:00:00 p.m., New York City time, as reported by Bloomberg through its "Volume at Price" function or, if the foregoing does not apply, the dollar volume-weighted average price of such security in the over-the-counter market on the electronic bulletin board for such security during the period beginning at 9:30:01 a.m., New York City time, and ending at 4:00:00 p.m., New York City time, as reported by Bloomberg, or, if no dollar volume-weighted average price is reported for such security by Bloomberg for such hours, the average of the highest closing bid price and the lowest closing ask price of any of the market makers for such security as reported in the "pink sheets" by Pink Sheets LLC (formerly the National Quotation Bureau, Inc.). If the Weighted Average Price cannot be calculated for such security on such date on any of the foregoing bases, the Weighted Average Price of such security on such date shall be the fair market value as mutually determined by the Company and the Holder. If the Company and the Holder are unable to agree upon the fair market value of such security, then such dispute shall be resolved pursuant to Section 12 with the term "Weighted Average Price" being substituted for the term "Exercise Price." All such determinations shall be appropriately adjusted for any share dividend, share split or other similar transaction during such period.

[Signature Page Follows]

IN WITNESS WHEREOF, the Company has caused this Warrant to Purchase Common Stock to be duly executed as of the Issuance Date set out above.

DISCOVERY LABORATORIES, INC.

By: _____
Name:
Title:

EXERCISE NOTICE

TO BE EXECUTED BY THE REGISTERED HOLDER TO EXERCISE THIS
WARRANT TO PURCHASE COMMON STOCK

DISCOVERY LABORATORIES, INC.

The undersigned holder hereby exercises the right to purchase _____ of the shares of Common Stock ("**Warrant Shares**") of Discovery Laboratories, Inc, a Delaware corporation (the "**Company**"), evidenced by the attached Warrant to Purchase Common Stock (the "**Warrant**"). Capitalized terms used herein and not otherwise defined shall have the respective meanings set forth in the Warrant.

1. Form of Exercise Price. The Holder intends that payment of the Exercise Price shall be made as:

- _____ a "Cash Exercise" with respect to _____ Warrant Shares; and/or
- _____ a "Cashless Exercise" with respect to _____ Warrant Shares.

2. Payment of Exercise Price. In the event that the holder has elected a Cash Exercise with respect to some or all of the Warrant Shares to be issued pursuant hereto, the holder shall pay the Aggregate Exercise Price in the sum of \$_____ to the Company in accordance with the terms of the Warrant.

3. Delivery of Warrant Shares. The Company shall deliver _____ Warrant Shares in the name of the undersigned holder or in the name of _____ in accordance with the terms of the Warrant to the following DWAC Account Number or by physical delivery of a certificate to:

Date: _____, _____

Name of Registered Holder

By: _____
Name:
Title:

ACKNOWLEDGMENT

The Company hereby acknowledges this Exercise Notice and hereby directs Continental Stock Transfer & Trust Company to issue the above indicated number of shares of Common Stock in accordance with the Transfer Agent Instructions dated [], 2010 from the Company and acknowledged and agreed to by Continental Stock Transfer & Trust Company.

DISCOVERY LABORATORIES, INC

By: _____

Name:

Title:

ASSIGNMENT FORM

(To assign the foregoing warrant, execute this form and supply required information. Do not use this form to exercise the warrant.)

FOR VALUE RECEIVED, [____] all of or [_____] shares of the foregoing Warrant and all rights evidenced thereby are hereby assigned to

_____ whose address is

_____.

Dated: _____, _____

Holder's Signature: _____

Holder's Address: _____

Signature Guaranteed: _____

NOTE: The signature to this Assignment Form must correspond with the name as it appears on the face of the Warrant, without alteration or enlargement or any change whatsoever, and must be guaranteed by a bank or trust company. Officers of corporations and those acting in a fiduciary or other representative capacity should file proper evidence of authority to assign the foregoing Warrant.

\$150,000,000



Discovery Laboratories, Inc.

Debt Securities, Preferred Stock, Common Stock,
Debt Warrants and Equity Warrants

We may sell from time to time in one or more offerings up to \$150,000,000 in the aggregate of:

- our secured or unsecured debt securities, in one or more series, which may be either senior, senior subordinated or subordinated debt securities;
- shares of our preferred stock in one or more series;
- shares of our common stock;
- debt warrants;
- equity warrants; and
- any combination of the foregoing.

When we decide to sell particular securities, we will provide you with the specific terms and the public offering price of the securities we are then offering in one or more prospectus supplements to this prospectus. The prospectus supplement may add to, change or update information contained in this prospectus. The prospectus supplement may also contain important information about U.S. Federal income tax consequences. You should carefully read this prospectus, together with any prospectus supplements and information incorporated by reference in this prospectus and any prospectus supplements, before you decide to invest. **This prospectus may not be used to offer or sell any securities unless accompanied by a prospectus supplement.**

Our common stock is quoted on The Nasdaq Global Market under the trading symbol "DSCO." Any common stock sold pursuant to this prospectus or any prospectus supplement will be listed on that exchange, subject to official notice of issuance. Each prospectus supplement to this prospectus will contain information, where applicable, as to any other listing on any national securities exchange or The Nasdaq Global Market of the securities covered by the prospectus supplement.

Investing in our securities involves significant risks. See "Risk Factors" beginning on page 6.

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

The date of this prospectus is June 18, 2008.

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This prospectus is part of a registration statement we filed with the Securities and Exchange Commission. You should rely only on the information we have provided or incorporated by reference in this prospectus or any prospectus supplement. We have not authorized anyone to provide you with additional or different information. We are not making an offer of these securities in any state where the offer is not permitted. You should not assume that the information in this prospectus is accurate as of any date other than the date on the front of the prospectus.

ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement that we filed with the Securities and Exchange Commission (the “SEC”) utilizing a “shelf” registration process or continuous offering process, which allows us to offer and sell any combination of the securities described in this prospectus in one or more offerings. Using this prospectus, we may offer up to a total dollar amount of \$150,000,000 of these securities.

This prospectus provides you with a general description of the securities we may offer. Each time we offer to sell securities pursuant to this registration statement and the prospectus contained herein, we will provide a prospectus supplement that will contain specific information about the terms of that offering. That prospectus supplement may include additional risk factors about us and the terms of that particular offering. Prospectus supplements may also add to, update or change the information contained in this prospectus. To the extent that any statement that we make in a prospectus supplement is inconsistent with statements made in this prospectus, the statements made in this prospectus will be deemed modified or superseded by those made in such prospectus supplement. In addition, as we describe in the section entitled “Where You Can Find More Information,” we have filed and plan to continue to file other documents with the SEC that contain information about us and the business conducted by us and our subsidiaries. Before you decide whether to invest in any of these securities, you should read this prospectus, the prospectus supplement that further describes the offering of these securities and the information we file with the SEC.

In this prospectus and any prospectus supplement, unless otherwise indicated, the terms “Discovery”, “the Company”, “we”, “us” and “our” refer and relate to Discovery Laboratories, Inc., and its consolidated subsidiaries.

ABOUT DISCOVERY

Discovery Laboratories, Inc. is a biotechnology company developing Surfactant Replacement Therapies (SRT) for respiratory disorders and diseases. Our proprietary technology produces a peptide-containing synthetic surfactant that is structurally similar to pulmonary surfactant, a substance produced naturally in the lung and essential for survival and normal respiratory function. We believe that our proprietary technology makes it possible, for the first time, to develop a series of SRT respiratory therapies to treat conditions for which there are few or no approved therapies available for patients in the Neonatal Intensive Care Unit (NICU), Pediatric Intensive Care Unit (PICU), Intensive Care Unit (ICU) and other hospital settings.

Our SRT pipeline is focused initially on the most significant respiratory conditions prevalent in the NICU and PICU. We have filed a New Drug Application (NDA) with the U.S. Food and Drug Administration (FDA) for our lead product, Surfaxin[®] (lucinactant) for the prevention of Respiratory Distress Syndrome (RDS) in premature infants. The FDA recently issued to us an Approvable Letter, which does not require additional clinical trials. We are also developing Surfaxin for other neonatal and pediatric respiratory conditions, including Bronchopulmonary Dysplasia (BPD), a debilitating and chronic lung disease typically affecting premature infants who have suffered RDS, and Acute Respiratory Failure (ARF). Aerosurf[™] is our proprietary SRT in aerosolized form and is being developed initially to treat premature infants in the NICU. Aerosurf has the potential to obviate the need for endotracheal intubation and conventional mechanical ventilation and holds the promise to significantly expand the use of SRT in respiratory medicine.

We also believe that our SRT will potentially address a variety of debilitating respiratory conditions such as Acute Lung Injury (ALI), cystic fibrosis (CF), chronic obstructive pulmonary disease (COPD), and asthma, that affect other pediatric, young adult and adult patients in the ICU and other hospital settings.

We have implemented a long-term business strategy that includes: (i) ongoing investment in the development of our SRT pipeline programs, with a primary focus on efforts intended to gain regulatory approval to market and sell Surfaxin for the prevention of RDS in premature infants in the United States, life cycle development of Surfaxin for other respiratory conditions prevalent in the NICU and PICU, and developing Aerosurf for neonatal and pediatric conditions; (ii) preparing for the potential commercial launch of Surfaxin in the United States; (iii) seeking collaboration agreements and strategic partnerships in the international and domestic markets for the development and potential commercialization of our SRT pipeline; (iv) continued investment in our quality systems and manufacturing capabilities to meet the anticipated pre-clinical, clinical and potential future commercial requirements of Surfaxin, Aerosurf and our other SRT products; and (v) seeking investments of additional capital, including potentially from business alliances, commercial and development partnerships, equity financings and other similar opportunities, although there can be no assurance that we will identify or enter into any specific actions or transactions.

Corporate Information

Surfaxin[®] and Aerosurf[™] are our trademarks. This prospectus also includes product names, trademarks and trade names of other companies, which names are the exclusive property of the holders thereof.

Our principal offices located at 2600 Kelly Road, Suite 100, Warrington, Pennsylvania. Our telephone number is 215-488-9300 and our facsimile number is (215) 488-9301. We maintain a website on the Internet at www.discoverylabs.com. Information contained in our web site is not a part of this prospectus. Our common stock is listed on The Nasdaq Global Market, where our symbol is DSCO.

RISK FACTORS

An investment in our common stock involves significant risks. You should carefully consider the risks described below or in any applicable prospectus supplement and other information, including our financial statements and related notes previously included in our periodic reports filed with the SEC, and in the documents incorporated therein by reference before deciding to invest in our securities. The risks described below are not the only ones that we face. Additional risks not presently known to us or that we currently deem immaterial may also impair our business operations. The following risks, among others, could cause our actual results, performance, achievements or industry results to differ materially from those expressed in our forward-looking statements contained herein and presented elsewhere by management from time to time. If any of the following risks actually occurs, our business prospects, financial condition or results of operations could be materially harmed. In such case, the market price of our securities would likely and you could lose all or part of your investment.

We may not successfully develop and market our products, and even if we do, we may not become profitable.

We currently have no products approved for marketing and sale and are conducting research and development on our product candidates. As a result, we have not begun to market or generate revenues from the commercialization of any of our products. Our long-term viability will be impaired if we are unable to obtain regulatory approval for, or successfully market, our product candidates.

To date, we have only generated revenues from investments, research grants and collaborative research and development agreements. We need to continue to engage in significant, time-consuming and costly research, development, pre-clinical studies, clinical testing and regulatory approval activities for our products under development before their commercialization. In addition, pre-clinical or clinical studies may show that our products are not effective or safe for one or more of their intended uses. We may fail in the development and commercialization of our products. As of March 31, 2008, we have an accumulated deficit of approximately \$298.0 million and we expect to continue to incur significant increasing operating losses over the next several years. If we succeed in the development of our products, we still may not generate sufficient or sustainable revenues or we may not be profitable.

The regulatory approval process for our products is expensive and time-consuming, and the outcome is uncertain. We may not obtain required regulatory approvals for the commercialization of our products.

To sell our products under development, including Surfaxin, we must receive regulatory approvals for each product. The FDA and foreign regulators extensively and rigorously regulate the testing, manufacture, distribution, advertising, pricing and marketing of drug products like our products. This approval process includes preclinical studies and clinical trials of each pharmaceutical compound to establish the safety and effectiveness of each product and the confirmation by the FDA and foreign regulators that, in manufacturing the product, we maintain good laboratory and manufacturing practices during testing and manufacturing. Even if favorable testing data are generated by clinical trials of drug products, the FDA or a foreign regulator, such as the European Medicines Agency (EMA), may not accept or approve an NDA or Marketing Authorization Application (MAA) filed by a pharmaceutical or biotechnology company for such drug product. To market our products or conduct clinical trials outside the United States, we also must comply with foreign regulatory requirements governing marketing approval for pharmaceutical products and the conduct of human clinical trials.

We have filed an NDA with the FDA for Surfaxin for the prevention of RDS in premature infants, which is the subject of a third Approvable Letter. On May 1, 2008, the FDA issued a third Approvable Letter to us. We have requested a meeting with the FDA, which is scheduled to occur on June 18, 2008 by teleconference, to confirm our approach to responding to certain items identified in this Approvable Letter. If our approach is confirmed, we anticipate submitting our response to the Approvable Letter in June 2008. This timeline could be extended based on our discussions with the FDA as well as other factors. If the FDA accepts our formal response to the Approvable Letter as a complete response, we believe that the FDA may classify our response as a Class 1 resubmission, which will result in a 60-day target review period. The FDA might still delay its approval of our NDA or reject our NDA, which would have a material adverse effect on our business. See also “Risk Factors – Our pending NDA for Surfaxin for the prevention of RDS in premature infants may not be approved by the FDA in a timely manner, or at all, which would prevent our commercializing this product in the United States and adversely impact our ability to commercialize this product elsewhere.”

We filed an MAA with the EMEA for clearance to market Surfaxin for the prevention of RDS in premature infants in Europe. In April 2006, ongoing analysis of Surfaxin process validation batches that had been manufactured for us in 2005 by our then-contract manufacturer as a requirement for our NDA indicated that certain stability parameters no longer met acceptance criteria. As we determined that we could not resolve the related manufacturing issues within the regulatory time frames mandated by the EMEA procedure for consideration of our MAA, in June 2006, we voluntarily withdrew the MAA without fully resolving certain outstanding clinical issues related to the Surfaxin Phase 3 clinical trials. We plan in the future to have further discussions with the EMEA and potentially develop a strategy to gain approval for Surfaxin in Europe.

If the FDA and foreign regulators do not approve our products, we will not be able to market our products.

The FDA and foreign regulators have not yet approved any of our products under development for marketing in the United States or elsewhere. Without regulatory approval, we are not able to market our products. Further, even if we were to succeed in gaining regulatory approvals for any of our products, the FDA or a foreign regulator could at any time withdraw any approvals granted if there is a later discovery of unknown problems or if we fail to comply with other applicable regulatory requirements at any stage in the regulatory process, or the FDA or a foreign regulator may restrict or delay our marketing of a product or force us to make product recalls. In addition, the FDA could impose other sanctions such as fines, injunctions, civil penalties or criminal prosecutions. Any failure to obtain regulatory approval or any withdrawal or significant restriction on our ability to market our products after approval would have a material adverse effect on our business.

Our pending NDA for Surfaxin for the prevention of RDS in premature infants may not be approved by the FDA in a timely manner, or at all, which would prevent our commercializing this product in the United States and adversely impact our ability to commercialize this product elsewhere.

In April 2006, the FDA issued a second Approvable Letter to us with respect to our NDA for Surfaxin for the prevention of RDS in premature infants. In October 2007, we filed our complete response to the second Approvable Letter and the FDA established May 1, 2008 as its target to complete review of our NDA. On May 1, 2008, the FDA issued to us a third Approvable Letter. Of the items listed in the Approvable Letter, we believe that the most important involve justifying and finalizing one acceptance criterion for Surfaxin biological activity and limited acceptance criteria for lipid drug substance impurities and that we and the FDA can reach agreement on these acceptance criteria. We have requested a meeting with the FDA, which is scheduled to occur on June 18, 2008 by teleconference, to confirm our approach to respond to these and certain other limited items identified in this Approvable Letter. If this meeting confirms our approach, we anticipate submitting our response to the Approvable Letter in June 2008. However, this timeline could be extended based on our discussions with the FDA as well as other factors. If the FDA accepts our response as a complete response, we believe that the FDA may classify our complete response as a Class 1 resubmission, which will result in a 60-day target review period (as compared to a Class 2 resubmission would result in a 6-month target review period). Ultimately, the FDA may not approve Surfaxin for RDS in premature infants. Any failure to obtain FDA approval or further delay associated with the FDA's review process would adversely impact our ability to commercialize our lead product.

Even though some of our drug candidates have qualified for expedited review, the FDA may not approve them at all or any sooner than other drug candidates that do not qualify for expedited review.

The FDA has notified us that two of our intended indications for our precision-engineered SRT, BPD in premature infants and ARDS in adults have been granted designation as “Fast Track” products under provisions of the Food and Drug Administration Modernization Act of 1997. We believe that other potential products in our SRT pipeline may also qualify for Fast Track designation. Designation as a “Fast Track” product means that the FDA has determined that the drug is intended for the treatment of a serious or life-threatening condition and demonstrates the potential to address unmet medical needs, and that the FDA will facilitate and expedite the development and review of the application for the approval of the product. The FDA generally will review an NDA for a drug granted Fast Track designation within six months. Fast Track designation does not accelerate clinical trials nor does it mean that the regulatory requirements are less stringent. Our products may cease to qualify for expedited review and our other drug candidates may fail to qualify for Fast Track designation or expedited review. Moreover, even if we are successful in gaining Fast Track designation, other factors could result in significant delays in our development activities with respect to our Fast Track products.

Our research and development activities involve significant risks and uncertainties that are inherent in the clinical development and regulatory approval processes.

Development risk factors include, but are not limited to whether we, or our third party collaborators and providers, will be able to:

- complete our pre-clinical and clinical trials of our SRT product candidates with scientific results that are sufficient to support further development and/or regulatory approval;
- receive the necessary regulatory approvals;
- obtain adequate supplies of surfactant active drug substances, manufactured to our specifications and on commercially reasonable terms;
- perform under agreements to supply the drug substances, medical device components and related services necessary to manufacture our SRT drug product candidates, including Surfaxin and Aerosurf;
- successfully resolve the remaining matters identified by the FDA in the May 1, 2008 Approvable Letter;
- provide for sufficient manufacturing capabilities, at our manufacturing operations in Totowa and with third-party contract manufacturers, to produce sufficient SRT drug product, including Surfaxin, and aerosolization systems to meet our pre-clinical and clinical development requirements;
- successfully develop and implement a manufacturing strategy for our aerosolization systems and related materials to support clinical studies of Aerosurf; and
- obtain capital necessary to fund our research and development efforts, including our supportive operations, manufacturing and clinical trials requirements.

Because these factors, many of which are outside our control, could have a potentially significant effect on our development activities, the success, timing of completion, and ultimate cost of development of any of our product candidates is highly uncertain and cannot be estimated with any degree of certainty. The timing and cost to complete drug trials alone may be impacted by, among other things:

- slow patient enrollment;
- long treatment time required to demonstrate effectiveness;
- lack of sufficient clinical supplies and material;
- adverse medical events or side effects in treated patients;
- lack of compatibility with complementary technologies;
- failure of a product candidate to demonstrate effectiveness; and
- lack of sufficient funds.

If we do not successfully complete clinical trials, we will not receive regulatory approval to market our SRT products. Failure to obtain and maintain regulatory approval and generate revenues from the sale of our products would have a material adverse effect on our financial condition and results of operations and could reduce the market value of our common stock.

Our ongoing clinical trials may be delayed, or fail, which will harm our business.

Clinical trials generally take two to five years or more to complete. Like many biotechnology companies, we may suffer significant setbacks in advanced clinical trials, even after obtaining promising results in earlier trials or in preliminary findings for such clinical trials. Data obtained from clinical trials are susceptible to varying interpretations that may delay, limit or prevent regulatory approval. In addition, we may be unable to enroll patients quickly enough to meet our expectations for completing any or all of these trials. The timing and completion of current and planned clinical trials of our product candidates depend on many factors, including the rate at which patients are enrolled. Delays in patient enrollment in clinical trials may occur, which would be likely to result in increased costs, program delays, or both.

Patient enrollment is a function of many factors, including:

- the number of clinical sites;
- the size of the patient population;
- the proximity of patients to the clinical sites;
- the eligibility and enrollment criteria for the study;
- the willingness of patients or their parents or guardians to participate in the clinical trial;
- the existence of competing clinical trials;
- the existence of alternative available products; and
- geographical and geopolitical considerations.

If we succeed in achieving our patient enrollment targets, patients that enroll in our clinical trials could suffer adverse medical events or side effects that are known to occur with the administration of the surfactant class of drugs generally, such as a decrease in the oxygen level of the blood upon administration. It is also possible that the FDA or foreign regulators could interrupt, delay or halt any one or more of our clinical trials for any of our product candidates. If we or any regulator believe that trial participants face unacceptable health risks, any one or more of our trials could be suspended or terminated. We also may not reach agreement with the FDA or a foreign regulator on the design of any one or more of the clinical studies necessary for approval. Conditions imposed by the FDA and foreign regulators on our clinical trials could significantly increase the time required for completion of such clinical trials and the costs of conducting the clinical trials.

In addition to our efforts to gain approval of Surfaxin for the prevention of RDS in premature infants, we are currently conducting a Phase 2 clinical trial to evaluate the use of Surfaxin in children up to two years of age suffering from Acute Respiratory Failure. We are also planning to initiate clinical studies in support of other products in our SRT pipeline, including planned Phase 2 clinical trials with respect to Aerosurf for the treatment and prevention of RDS in premature infants in the NICU. All of these clinical trials will be time-consuming and potentially costly. Should we fail to complete our clinical development programs or should such programs yield unacceptable results, such failures would have a material adverse effect on our business.

The manufacture of our drug products is a highly exacting and complex process, and if we, our contract manufacturers or any of our materials suppliers encounter problems manufacturing our products or drug substances, this could cause us to delay any potential clinical program or product launch or, following approval, cause us to experience shortages of products inventories.

The FDA and foreign regulators require manufacturers to register manufacturing facilities. The FDA and foreign regulators also periodically inspect these facilities to confirm compliance with current good manufacturing procedures (cGMP) or other similar requirements that the FDA or foreign regulators establish. Surfaxin is a complex drug and, unlike many drugs, contains four active ingredients. It must be aseptically manufactured at our facility as a sterile, liquid suspension and requires ongoing monitoring of drug product stability and conformance to specifications.

The manufacture of pharmaceutical products requires significant expertise and compliance with strictly enforced federal, state and foreign regulations. We, our contract manufacturers or our materials and drug substances suppliers may experience manufacturing or quality control problems that could result in a failure to maintain compliance with the FDA's cGMP requirements, or those of foreign regulators, which is necessary to continue manufacturing our drug products, materials or drug substances. Other problems that may be encountered include:

- the need to make necessary modifications to qualify and validate a facility;
- difficulties with production and yields, including scale-up requirements and achieving adequate capacity;
- availability of raw materials and supplies;
- quality control and assurance; and
- shortages of qualified personnel.

Such a failure could result in product production and shipment delays or an inability to obtain materials or drug substances supplies.

Manufacturing or quality control problems have already occurred and may again occur at our Totowa, New Jersey facility or may occur at the facilities of a contract manufacturer or our materials or drug substances suppliers. Such problems may require potentially complex, time-consuming and costly comprehensive investigations to determine the root causes of such problems and may also require detailed and time-consuming remediation efforts, which can further delay a return to normal manufacturing and production activities. Any failure by our own manufacturing operations or by the manufacturing operations of any of our suppliers to comply with cGMP requirements or other FDA or foreign regulatory requirements could adversely affect our ability to manufacture our drug products, which in turn would adversely affect our clinical research activities and our ability to develop and gain regulatory approval to market our drug products.

Since we acquired our manufacturing operations in Totowa, New Jersey in December 2005, we have been manufacturing our drug products. This is the only facility at which we produce our drug product. Any interruption in manufacturing operations at this location could result in our inability to satisfy our needs for planned clinical trials, and, if approved, commercial requirements for Surfaxin. A number of factors could cause interruptions, including:

- equipment malfunctions or failures;
- technology malfunctions;
- work stoppages or slowdowns;
- damage to or destruction of the facility;
- regional power shortages; and
- product tampering.

To assure adequate drug supplies and continued compliance with cGMP and other FDA or foreign regulatory requirements, we own certain specialized manufacturing equipment, employ experienced manufacturing senior executive and managerial personnel, and continue to invest in enhanced quality systems and manufacturing capabilities. However, we may nevertheless be unable to produce Surfaxin and our other SRT drug candidates to appropriate standards. If we are unable to successfully develop and maintain our manufacturing capabilities and comply with cGMP, it will adversely affect our clinical development activities and, potentially, the sales of our products.

If we fail to maintain relationships with our manufacturers, assemblers and integrator of our aerosolization systems, or if we fail to identify additional, qualified replacement manufacturers, assemblers and integrators to manufacture subcomponents and integrate our initial prototype aerosolization system or our anticipated next-generation and later development versions of our capillary aerosolization technology, the timeline of our plans for the development and, if approved, commercialization of Aerosurf could suffer.

In connection with the development of aerosol formulations of our SRT, including Aerosurf, we currently plan to rely on third-party contract manufacturers to manufacture, assemble and integrate the subcomponents of our capillary aerosolization technology to support our clinical studies and potential commercialization of Aerosurf. Certain of these key components must be manufactured in an environmentally-controlled area and, when assembled, the critical product-contact components and patient interface systems must be packaged and sterilized. Each of the aerosolization system devices must be quality-control tested prior to release and monitored for conformance to designated product specifications, and each manufacturer, assembler and integrator must be registered with the FDA and conduct its manufacturing activities in compliance with cGMP requirements or other FDA or foreign regulatory requirements.

We currently have identified component manufacturers and an integrator to manufacture and integrate our initial prototype aerosolization system that we currently plan to use in early Phase 2 clinical trials. However, we may not be able to identify qualified additional or replacement manufacturers and integrators to manufacture subcomponents and integrate our current prototype or next generation and later development versions of our aerosolization systems or we may not be able to enter into agreements with them on terms and conditions favorable and acceptable to us. In addition, the manufacturers and assemblers and integrators that we identify may be unable to timely comply with FDA, or other foreign regulatory agency, requirements regulating manufactures of combination drug-device products. If we do not successfully identify and enter into a contractual agreements with aerosolization systems and components manufacturers, assemblers and integrators, it will adversely affect the timeline of our plans for the development and, if approved, commercialization of Aerosurf.

If the parties we depend on for supplying our active drug substance and certain manufacturing-related services do not timely supply these products and services, it may delay or impair our ability to develop, manufacture and market our products.

We rely on suppliers for our active drug substances, materials and excipient products, and third parties for certain manufacturing-related services to produce drug material that meets appropriate content, quality and stability standards for use in clinical trials and, if approved, for commercial distribution. To succeed, clinical trials require adequate supplies of drug substance and drug product, which may be difficult or uneconomical to procure or manufacture. The manufacturing process for Aerosurf, a combination drug-device product, includes the integration of a number of components, many of which are comprised of a large number of subcomponent parts that we expect will be produced by potentially a number of manufacturers. We and our suppliers may not be able to (i) produce our drug substances, drug product or drug product devices or related subcomponent parts to appropriate standards for use in clinical studies, (ii) perform to applicable specifications under any definitive manufacturing, supply or service agreements with us, or (iii) remain in business for a sufficient time to successfully produce and market our product candidates.

In some cases, we are dependent upon a single supplier to produce our full requirement of drug substances, drug product or drug product devices. If we do not maintain important manufacturing and service relationships, we may fail to find a replacement supplier or vendor and may not be able to develop our own manufacturing capabilities, which could delay or impair our ability to obtain regulatory approval for our products and substantially increase our costs or deplete our profit margins, if any. Even if we are able to find replacement manufacturers, suppliers and vendors when needed, we may not be able to enter into agreements with them on terms and conditions favorable to us or there could be a substantial delay before such manufacturer, vendor or supplier, or a related new facility is properly qualified and registered with the FDA or other foreign regulatory authorities. Such delays could have a material adverse effect on our development activities and our business.

If we do not adequately forecast customer demand for our product candidates, including Surfaxin, if approved, our business could suffer.

The timing and amount of customer demand is difficult to predict and the commercial requirements to meet changing customer demand is difficult to predict. If we are successful in gaining regulatory approval of our products, we may not be able to accurately forecast customer demand for our product candidates, including Surfaxin, or respond effectively to unanticipated increases in demand. This could have an adverse effect on our business. If we overestimate customer demand, or attempt to commercialize products for which the market is smaller than we anticipate, we could incur significant unrecoverable costs from creating excess capacity. In addition, if we do not successfully develop and timely commercialize our product candidates, we may never require the production capacity that we expect to have available.

Our limited sales and marketing experience may restrict our success in commercializing our product candidates.

We have limited experience in marketing or selling pharmaceutical products and have a limited marketing and sales team. In the second quarter 2006, following receipt of the second Approvable Letter and the occurrence of the process validation stability failures, we discontinued our commercial activities. Therefore, if we are successful in gaining approval to market Surfaxin, we will have to re-establish satisfactory marketing, sales and distribution capabilities necessary to commercialize and gain market acceptance for Surfaxin or our other product candidates, if approved.

We expect to rely primarily on our marketing and sales team to market Surfaxin, if approved, in the United States. Our pre-approval preparations have included the hiring of experienced management personnel. We have also begun to invest in our medical affairs capabilities to provide for increased scientific and medical educational activities. We do not plan to hire our sales representatives until after we have received approval to market Surfaxin. Developing a marketing and sales team to market and sell products is a difficult, expensive and time-consuming process. Recruiting, training and retaining qualified sales personnel is critical to our success. Competition for skilled personnel can be intense, and we may be unable to attract and retain a sufficient number of qualified individuals to successfully launch Surfaxin. Additionally, we may not be able to provide adequate incentive to our sales force. If we are unable to successfully motivate and expand our marketing and sales force and further develop our sales and marketing capabilities, we will have difficulty selling, maintaining and increasing the sales of our products.

We expect to incur significant expenses in developing our marketing and sales team. Our ability to make that investment and also execute our current operating plan is dependent on numerous factors, including, potentially, the performance of third party collaborators with whom we may contract. Accordingly, we may not have sufficient funds to successfully commercialize Surfaxin or any other potential product in the United States or elsewhere.

The commercial success of our product candidates will depend upon the degree of market acceptance by physicians, patients, healthcare payers and others in the medical community.

Any potential products that we bring to market may not gain or maintain market acceptance by governmental purchasers, group purchasing organizations, physicians, patients, healthcare payers and others in the medical community. If any products that we develop do not achieve an adequate level of acceptance, we may not generate material revenues with these products. The degree of market acceptance of our product candidates, if approved for commercial sale, will depend on a number of factors, including:

- the perceived safety and efficacy of our products;
- the potential advantages over alternative treatments;
- the prevalence and severity of any side effects;
- the relative convenience and ease of administration;
- cost effectiveness;
- the willingness of the target patient population to try new products and of physicians to prescribe our products;
- the effectiveness of our marketing strategy and distribution support; and
- the sufficiency of coverage or reimbursement by third parties.

Our strategy with respect to development and marketing of our products, in many cases, is to enter into collaboration agreements and strategic partnerships with third parties. If we fail to enter into these agreements, or if we or the third parties fail to perform under such agreements, it could impair our ability to develop and commercialize our products.

To fund development, clinical testing and marketing and commercialization of our products, our strategy, in many cases, depends upon collaboration arrangements and strategic partnerships with pharmaceutical and other biotechnology companies to develop, market, commercialize and distribute our products. In addition to funding our activities, we may depend on our collaborators' expertise and dedication of sufficient resources to develop and commercialize the covered products. In addition, if our current collaboration arrangements fail to timely meet our objectives, we may need to enter into additional collaboration agreements and our success may depend upon obtaining such additional collaboration partners.

Our collaboration arrangement with Esteve for Surfaxin and certain other of our product candidates is focused on key southern European markets. If we or Esteve should fail to conduct our respective collaboration-related activities in a timely manner, or otherwise breach or terminate the agreements that make up our collaboration arrangements, or if a dispute should arise under our collaboration arrangements, such events could impair our ability to commercialize or develop our products for the Esteve territory in Europe covered by the arrangement. In such events, we may need to seek other partners and collaboration agreements, or we may have to develop our own internal capabilities to market the covered products in the Esteve territory without a collaboration arrangement.

We have recently restructured our strategic alliance with Philip Morris USA, Inc. d/b/a/ Chrysalis (PM USA). Under the restructured arrangement, we are now responsible for finalizing design development for the initial prototype aerosolization device platform and disposable dose packets. Prior to June 30, 2008, PM USA is responsible to make a technology transfer to us of its capillary aerosolization technology to permit us to fully practice our license to this technology in all respects. We expect to rely on our own engineering expertise as well as design engineers, medical device experts and other third party collaborators to advance the development of our capillary aerosolization technology. If PM USA should fail to complete the technology transfer to us, or if we are unable to identify design engineers and medical device experts to support our program in the future, or if we should fail to complete development of the initial prototype aerosolization system as well as next generation versions of the aerosolization system, such events could impair our ability to commercialize or develop our aerosolized SRT products.

We may, in the future, grant to our present or additional collaboration partners rights to license and commercialize our pharmaceutical products. Under such arrangements, our collaboration partners may control key decisions relating to the development and commercialization of the covered products. By granting such rights to our collaboration partners, we would likely limit our flexibility in considering alternative strategies to develop and commercialize our products. If we were to fail to successfully develop these relationships, or if our collaboration partners were to fail to successfully develop, market or commercialize any of the covered products, such failures may delay or prevent us from developing or commercializing our products in a competitive and timely manner and would have a material adverse effect on the commercialization of Surfaxin and our other SRT product candidates. See “Risk Factors – Our limited sales and marketing experience may restrict our success in commercializing our product candidates.”

Under our restructured collaboration arrangement with PM USA, we are responsible for future development of the capillary aerosolization technology, which will require us to build internal development capabilities or enter into future collaboration or other arrangements to gain the engineering expertise required to further develop the technology.

In March 2008, we restructured our collaboration arrangement with PM USA. We now have responsibility for the development of the capillary aerosolization technology and will not have development support from PM USA after June 30, 2008. Our future development of the capillary aerosolization technology is subject to certain risks and uncertainties, including, without limitation:

- We may not be able to complete the development of the initial prototype aerosolization device, if at all, on a timely basis and such inability may delay or prevent initiation of our planned Phase 2 clinical trials;
- We will require sophisticated engineering expertise to continue the development of the capillary aerosolization technology. Although we are building our own internal medical device engineering expertise and have recently begun working with a leading engineering and design firm that has a successful track record of developing innovative devices for major companies in the medical and pharmaceutical industries, there is no assurance that our efforts will be successful or that we will be able to identify other potential collaborators to complete the development of the next-generation aerosolization system and enter into agreements with such collaborators on terms and conditions that are favorable to us, and, if we are unable to identify or retain design engineers and medical device experts to support our development program, this could impair our ability to commercialize or develop its aerosolized drug products;

- We currently hold an exclusive license to the capillary aerosolization technology in the United States from PM USA and outside the United States from Philip Morris Products S.A. (PMPA). PM USA and PMPA are no longer affiliated entities; as such, there is a risk that, if we were to require the consent of PMPA and PM Philip Morris Products S.A. (PMPA) under the License Agreements, they may not agree on the appropriate course and we may be forced to develop the capillary aerosolization technology in the two territories under different circumstances. Such inconsistencies could have an adverse effect on our ability to develop the capillary aerosolization technology or to successfully commercialize the Licensed Products in one or both of the territories; and
- We have additional rights under the US License Agreement that are not provided under the International License Agreement. Although the International License Agreement provides for the potential expansion of rights with the consent of PMPA, there can be no assurance that PMPA would agree to any such expansion and, as a result, we may be unable to develop and commercialize Licensed Products under its expanded rights outside the United States markets.

To market and distribute our products, we may enter into distribution arrangements and marketing alliances, which could require us to give up rights to our product candidates.

We may rely on third-party distributors to distribute our products or enter into marketing alliances to sell our products, either internationally or in the United States. We may not be successful in identifying such third parties or finalizing such arrangements on terms and conditions that are favorable to us. Our failure to successfully enter into these arrangements on favorable terms could delay or impair our ability to commercialize our product candidates and could increase our costs of commercialization. Our dependence on distribution arrangements and marketing alliances to commercialize our product candidates will subject us to a number of risks, including:

- we may be required to relinquish important rights to our products or product candidates;
- we may not be able to control the amount and timing of resources that our distributors or collaborators may devote to the commercialization of our product candidates;
- our distributors or collaborators may experience financial difficulties;
- our distributors or collaborators may not devote sufficient time to the marketing and sales of our products thereby exposing us to potential expenses in terminating such distribution agreements; and
- business combinations or significant changes in a collaborator's business strategy may adversely affect a collaborator's willingness or ability to complete its obligations under any arrangement.

We also may need to enter into additional co-promotion arrangements with third parties where our own sales force is neither well situated nor large enough to achieve maximum penetration in the market. We may not be successful in entering into any co-promotion arrangements, and the terms of any co-promotion arrangements may not be favorable to us. In addition, if we enter into co-promotion arrangements or market and sell additional products directly, we may need to further expand our sales force and incur additional costs.

If we fail to enter into arrangements with third parties in a timely manner or if such parties fail to perform, it could adversely affect sales of our products. We and our third-party collaborators must also market our products in compliance with federal, state and local laws relating to the providing of incentives and inducements. Violation of these laws can result in substantial penalties.

We intend to market and sell Surfaxin outside of the United States, if approved, through one or more marketing partners. Although our agreement with Esteve provides for collaborative efforts in directing a global commercialization effort, we have somewhat limited influence over the decisions made by Esteve or its sublicensees or the resources that they may devote to the marketing and distribution of Surfaxin products in their licensed territory, and Esteve or its sublicensees may not meet their obligations in this regard. Our marketing and distribution arrangement with Esteve may not be successful, and, as a result, we may not receive any revenues from it. Also, we may not be able to enter into marketing and sales agreements for Surfaxin on acceptable terms, if at all, in territories not covered by the Esteve agreement, or for any of our other product candidates.

We will need additional capital and our ability to continue all of our existing planned research and development activities is uncertain. Any additional financing could result in equity dilution.

We will need substantial additional funding to conduct our presently planned research and product development activities. Our operating plans require that expenditures will only be committed if we achieve important development and regulatory milestones and have the necessary working capital resources. Therefore, our existing capital will allow us to continue operations into 2009. Our future capital requirements will depend on a number of factors that are uncertain, including the results of our research and development activities, clinical studies and trials, competitive and technological advances and the regulatory process, among others. We will likely need to raise substantial additional funds through collaborative ventures with potential corporate partners and through additional debt or equity financings. We may also continue to seek additional funding through new capital financing arrangements, if available. In some cases, we may elect to develop products on our own instead of entering into collaboration arrangements, which would increase our cash requirements for research and development.

We have not entered into arrangements to obtain any additional financing, except for the Committed Equity Financing Facility that we entered with Kingsbridge Capital Limited (Kingsbridge) in April 2006 (the 2006 CEFF), the Committed Equity Financing Facility that we entered with Kingsbridge on May 22, 2008 (the 2008 CEFF), our loan with PharmaBio Development Inc. d/b/a NovaQuest (PharmaBio), the strategic investment group of Quintiles Transnational Corp., and our equipment financing facility with GE Business Financial Services Inc. (formerly known as Merrill Lynch Business Financial Services Inc.) (GE). Any future financing could be on unattractive terms or result in significant dilution of stockholders' interests and, in such event, the market price of our common stock may decline. Furthermore, if the market price of our common stock were to decline, we could cease to meet the financial requirements to maintain the listing of our securities on The Nasdaq Global Market.

If we fail to enter into collaborative ventures or to receive additional funding, we may have to delay, scale back or discontinue certain of our research and development operations and consider licensing the development and commercialization of products that we consider valuable and which we otherwise would have developed ourselves. If we are unable to raise required capital, we may be forced to limit many, if not all, of our research and development programs and related operations, curtail commercialization of our product candidates and, ultimately, cease operations. See also "Risk Factors – Our Committed Equity Financing Facilities may have a dilutive impact on our stockholders."

We continue to consider multiple strategic alternatives, including, but not limited to potential additional financings as well as potential business alliances, commercial and development partnerships and other similar opportunities, although we cannot assure you that we will take any further specific actions or enter into any transactions.

The terms of our indebtedness may impair our ability to conduct our business.

Our capital requirements are funded in part by an \$8.5 million loan with PharmaBio, which is secured by substantially all of our assets and contains a number of covenants and restrictions that, with certain exceptions, restricts our ability to, among other things, incur additional indebtedness, borrow money or issue guarantees, use assets as security in other transactions, and sell assets to other companies. We may not be able to engage in these types of transactions, even if we believe that a specific transaction would be in our best interests. Moreover, our ability to comply with these restrictions could be affected by events outside our control. A breach of any of these restrictions could result in a default under the PharmaBio loan documents. If a default were to occur, PharmaBio would have the right to declare all borrowings to be immediately due and payable. If we are unable to pay when due amounts owed to PharmaBio, whether at maturity or in connection with acceleration of the loan following a default, PharmaBio would have the right to proceed against the collateral securing the indebtedness.

We have financed the acquisition of personal property, machinery and equipment through a \$12.5 million equipment financing facility with GE under a Credit and Security Agreement that we entered with GE in May 2007. Our ability to draw under this facility expired in May 2008; however, we and GE recently agreed to extend this facility for six months into November 2008 to finance capital expenditure of up to \$300,000, which represents our anticipated capital requirements for this period. If we require additional funds to support our activities during this period, as well as after this facility expires, there can be no assurance that GE or any other lender will be willing to provide us funding to support our capital programs.

In addition, the aggregate amount of our indebtedness may adversely affect our financial condition, limit our operational and financing flexibility and negatively impact our business.

Our Committed Equity Financing Facilities may have a dilutive impact on our stockholders.

The issuance of shares of our common stock under the 2006 CEFF and the 2008 CEFF (the CEFFs) and upon exercise of the warrants we issued to Kingsbridge will have a dilutive impact on our other stockholders and the issuance, or even potential issuance, of such shares could have a negative effect on the market price of our common stock. In addition, if we access the CEFFs, we will issue shares of our common stock to Kingsbridge at a discount (6% to 10% for the 2006 CEFF and 6% to 12% for the 2008 CEFF) to the daily volume weighted average price of our common stock during the eight trading-day period after we access the CEFF. Issuing shares at a discount will further dilute the interests of other stockholders.

To the extent that Kingsbridge sells to third parties the shares of our common stock that we issue to Kingsbridge under the CEFFs, our stock price may decrease due to the additional selling pressure in the market. The perceived risk of dilution from sales of stock to or by Kingsbridge may cause holders of our common stock to sell their shares, or it may encourage short sales of our common stock or other similar transactions. This could contribute to a decline in the stock price of our common stock.

If we are unable to meet the conditions provided under the CEFFs, we may not be able to issue any portion of the shares potentially available for issuance for future financings, subject to the terms and conditions of the CEFFs. Kingsbridge has the right under certain circumstances to terminate the CEFFs, including in the event of a material adverse event. In addition, even if we meet all conditions provided under the CEFFs, we are dependent upon the financial ability of Kingsbridge to perform its obligations and purchase shares of our common stock under the CEFFs. Any inability on our part to use at least one of the CEFFs or any failure by Kingsbridge to perform its obligations under the CEFFs could have a material adverse effect upon us.

The market price of our stock may be adversely affected by market volatility.

The market price of our common stock, like that of many other development stage pharmaceutical or biotechnology companies, has been and is likely to be volatile. In addition to general economic, political and market conditions, the price and trading volume of our stock could fluctuate widely in response to many factors, including:

- announcements of the results of clinical trials by us or our competitors;
- patient adverse reactions to drug products;
- governmental approvals, delays in expected governmental approvals or withdrawals of any prior governmental approvals or public or regulatory agency concerns regarding the safety or effectiveness of our products;
- changes in the United States or foreign regulatory policy during the period of product development;
- changes in the United States or foreign political environment and the passage of laws, including tax, environmental or other laws, affecting the product development business;
- developments in patent or other proprietary rights, including any third party challenges of our intellectual property rights;
- announcements of technological innovations by us or our competitors;
- announcements of new products or new contracts by us or our competitors;
- actual or anticipated variations in our operating results due to the level of development expenses and other factors;
- changes in financial estimates by securities analysts and whether our earnings meet or exceed the estimates;
- conditions and trends in the pharmaceutical and other industries;
- new accounting standards; and
- the occurrence of any of the risks described in these “Risk Factors” or elsewhere in our Annual Report on Form 10-K or our other public filings.

Our common stock is listed for quotation on The Nasdaq Global Market. During the 12 months ended June 3, 2008, the price of our common stock ranged from \$1.29 to \$3.58. We expect the price of our common stock to remain volatile. The average daily trading volume in our common stock varies significantly. For the 12 months ended June 3, 2008, the average daily trading volume in our common stock was approximately 1,017,594 shares and the average number of transactions per day was approximately 2,576. The variability of our average volume and average number of transactions per day may affect the ability of our stockholders to sell their shares in the public market at prevailing prices and a more active market may never develop.

In addition, we may not be able to continue to adhere to the strict listing criteria of The Nasdaq Global Market. If the common stock were no longer listed on The Nasdaq Global Market, investors might only be able to trade in the over-the-counter market in the Pink Sheets[®] (a quotation medium operated by the National Quotation Bureau, LLC) or on the OTC Bulletin Board[®] of the National Association of Securities Dealers, Inc. This would impair the liquidity of our securities not only in the number of shares that could be bought and sold at a given price, which might be depressed by the relative illiquidity, but also through delays in the timing of transactions and reduction in media coverage.

In the past, following periods of volatility in the market price of the securities of companies in our industry, securities class action litigation has often been instituted against companies in our industry. We recently won dismissal of such an action, which was brought against us and certain of our former and current executive officers. Even if they or other actions that we may face in the future are ultimately determined to be meritless or unsuccessful, such actions involve substantial costs and a diversion of management attention and resources, which could negatively impact our business.

Future sales and issuances of our common stock or rights to purchase our common stock, including pursuant to our stock incentive plans and upon the exercise of outstanding securities exercisable for shares of our common stock, could result in substantial additional dilution of our stockholders, cause our stock price to fall and adversely affect our ability to raise capital.

We expect that we will require significant additional capital to continue to execute our business plan and advance our research and development efforts. To the extent that we raise additional capital through the issuance of additional equity securities and through the exercise of outstanding warrants, our stockholders may experience substantial dilution. We may sell shares of our common stock in one or more transactions at prices that may be at a discount to the then-current market value of our common stock and on such other terms and conditions as we may determine from time to time. Any such transaction could result in substantial dilution of our existing stockholders. If we sell shares of our common stock in more than one transaction, stockholders who purchase our common stock may be materially diluted by subsequent sales. Such sales could also cause a drop in the market price of our common stock. As of June 3, 2008, we had 96,693,377 shares of common stock issued and outstanding.

We have a universal shelf registration statement on Form S-3 (File No. 333-128929), filed with the SEC on October 11, 2005, for the proposed offering from time to time of up to \$100 million of our debt or equity securities, of which \$24.8 million is remaining. We may issue securities pursuant to this shelf registration statement from time to time in response to market conditions or other circumstances on terms and conditions that will be determined at such time.

Additionally, there are (i) 375,000 shares of our common stock that are currently reserved for issuance with respect to the Class B Investor Warrant, (ii) approximately 5.2 million shares of our common stock that are currently reserved for issuance under the 2006 CEFF, including 490,000 shares reserved for issuance with respect to the Class C Investor Warrant issued to Kingsbridge in connection with the 2006 CEFF, and (iii) approximately 19.33 million shares of our common stock that are currently reserved for issuance under the new 2008 CEFF with Kingsbridge dated May 22, 2008, and 825,000 shares of our common stock reserved for issuance with respect to the Warrant that we issued to Kingsbridge in connection with the new 2008 CEFF. See "Risk Factors: Our Committed Equity Financing Facility may have a dilutive impact on our stockholders."

As of June 3, 2008, 18,631,821 shares of our common stock are reserved for issuance pursuant to our equity incentive plans (including 13,880,283 shares underlying outstanding stock options and 55,913 shares underlying unvested restricted stock awards), 7,164,196 shares of our common stock are reserved for issuance upon exercise of outstanding warrants, and 169,756 shares of our common stock are reserved for issuance pursuant to our 401(k) Plan. The exercise of stock options and other securities could cause our stockholders to experience substantial dilution. Moreover, holders of our stock options and warrants are likely to exercise them, if ever, at a time when we otherwise could obtain a price for the sale of our securities that is higher than the exercise price per security of the options or warrants. Such exercises, or the possibility of such exercises, may impede our efforts to obtain additional financing through the sale of additional securities or make such financing more costly. It may also reduce the price of our common stock.

If, during the term of certain of our warrants, we declare or make any dividend or other distribution of our assets to holders of shares of our common stock, by way of return of capital or otherwise (including any distribution of cash, stock or other securities, property or options by way of a dividend, spin off, reclassification, corporate rearrangement or other similar transaction), then the exercise price of such warrants may adjust downward and the number of shares of common stock issuable upon exercise of such warrants would increase. As a result, we may be required to issue more shares of common stock than previously anticipated, which could result in further dilution of our existing stockholders.

Directors, executive officers, principal stockholders and affiliated entities own a significant percentage of our capital stock, and they may make decisions that you do not consider to be in your best interest.

As of March 31, 2008, our directors, executive officers, principal stockholders and affiliated entities beneficially owned, in the aggregate, approximately 17% of the issued and outstanding shares of our common stock. For the purpose of computing this amount, an affiliated entity includes any entity that is known to us to be the beneficial owner of more than five percent of our issued and outstanding common stock. As a result, if some or all of them acted together, they would have the ability to exert substantial influence over the election of our Board of Directors and the outcome of issues requiring approval by our stockholders. This concentration of ownership may have the effect of delaying or preventing a change in control of our company that may be favored by other stockholders. This could prevent transactions in which stockholders might otherwise recover a premium for their shares over current market prices.

Our technology platform is based solely on our proprietary precision-engineered surfactant technology.

Our technology platform is based solely on the scientific rationale of using our precision-engineered surfactant technology to treat life-threatening respiratory disorders and as the foundation for the development of novel respiratory therapies and products. Our business is dependent upon the successful development and approval of our product candidates based on this technology platform. Any material problems with our technology platform could have a material adverse effect on our business.

If we cannot protect our intellectual property, other companies could use our technology in competitive products. If we infringe the intellectual property rights of others, other companies could prevent us from developing or marketing our products.

We seek patent protection for our drug candidates to prevent others from commercializing equivalent products in substantially less time and at substantially lower expense. The pharmaceutical industry places considerable importance on obtaining patent and trade secret protection for new technologies, products and processes. Our success will depend in part on our ability and that of parties from whom we license technology to:

- defend our patents and otherwise prevent others from infringing on our proprietary rights;
- protect trade secrets; and
- operate without infringing upon the proprietary rights of others, both in the United States and in other countries.

The patent position of firms relying upon biotechnology is highly uncertain and involves complex legal and factual questions for which important legal principles are unresolved. To date, the United States Patent and Trademark Office (USPTO) has not adopted a consistent policy regarding the breadth of claims that it will allow in biotechnology patents or the degree of protection that these types of patents afford. As a result, there are risks that we may not develop or obtain rights to products or processes that are or may appear to be patentable.

Even if we obtain patents to protect our products, those patents may not be sufficiently broad or they may expire and others could then compete with us.

We, and the parties licensing technologies to us, have filed various United States and foreign patent applications with respect to the products and technologies under our development, and the USPTO and foreign patent offices have issued patents with respect to our products and technologies. These patent applications include international applications filed under the Patent Cooperation Treaty. Our pending patent applications, those we may file in the future or those we may license from third parties may not result in the USPTO or foreign patent office issuing patents. In addition, if patent rights covering our products are not sufficiently broad, they may not provide us with sufficient proprietary protection or competitive advantages against competitors with similar products and technologies. Furthermore, even if the USPTO or foreign patent offices were to issue patents to us or our licensors, others may challenge the patents or circumvent the patents, or the patent office or the courts may invalidate the patents. Thus, any patents we own or license from or to third parties may not provide us any protection against competitors.

The patents that we hold also have a limited life. We have licensed a series of patents from Johnson & Johnson and its wholly-owned subsidiary, Ortho Pharmaceutical Corporation (Ortho Pharmaceutical), and from PM USA and PMPSA, which are important, either individually or collectively, to our strategy of commercializing our surfactant technology. These patents, which include relevant European patents, expire on various dates beginning in 2009 and ending in 2017 or, in some cases, possibly later. For our aerosolized SRT, we hold exclusive licenses in the United States and outside the United States to PM USA's capillary aerosolization technology for use with pulmonary surfactants for all respiratory diseases. Our exclusive license in the United States also extends to other drugs to treat specified target indications in specified target populations. The capillary aerosolization technology patents expire on various dates beginning in May 2016 and ending in 2022, or, in some cases, possibly later. We have filed, and when possible and appropriate, will file, other patent applications with respect to our products and processes in the United States and in foreign countries. We may not be able to develop enhanced or additional products or processes that will be patentable under patent law and, if we do enhance or develop additional products that we believe are patentable, additional patents may not be issued to us. See also "Risk Factors – If we cannot meet requirements under our license agreements, we could lose the rights to our products."

Intellectual property rights of third parties could limit our ability to develop and market our products.

Our commercial success also depends upon our ability to operate our business without infringing the patents or violating the proprietary rights of others. The USPTO keeps United States patent applications confidential while the applications are pending. As a result, we cannot determine in advance what inventions third parties may claim in their pending patent applications. We may need to defend or enforce our patent and license rights or to determine the scope and validity of the proprietary rights of others through legal proceedings, which would be costly, unpredictable and time consuming. Even in proceedings where the outcome is favorable to us, they would likely divert substantial resources, including management time, from our other activities. Moreover, any adverse determination could subject us to significant liability or require us to seek licenses that third parties might not grant to us or might only grant at rates that diminish or deplete the profitability of our products. An adverse determination could also require us to alter our products or processes or cease altogether any product sales or related research and development activities.

If we cannot meet requirements under our license agreements, we could lose the rights to our products.

We depend on licensing agreements with third parties to maintain the intellectual property rights to our products under development. Presently, we have licensed rights from Johnson & Johnson, Ortho Pharmaceutical, PM USA and PMPSA. These agreements require us to make payments and satisfy performance obligations to maintain our rights under these licensing agreements. All of these agreements last either throughout the life of the patents, or with respect to other licensed technology, for a number of years after the first commercial sale of the relevant product.

In addition, we are responsible for the cost of filing and prosecuting certain patent applications and maintaining certain issued patents licensed to us. If we do not meet our obligations under our license agreements in a timely manner, we could lose the rights to our proprietary technology.

Finally, we may be required to obtain licenses to patents or other proprietary rights of third parties in connection with the development and use of our products and technologies. Licenses required under any such patents or proprietary rights might not be made available on terms acceptable to us, if at all.

We rely on confidentiality agreements that could be breached and may be difficult to enforce.

Although we believe that we take reasonable steps to protect our intellectual property, including the use of agreements relating to the non-disclosure of our confidential information to third parties, as well as agreements that provide for disclosure and assignment to us of all rights to the ideas, developments, discoveries and inventions of our employees and consultants while we employ them, such agreements can be difficult and costly to enforce. Although we generally seek to enter into these types of agreements with our consultants, advisors and research collaborators, to the extent that such parties apply or independently develop intellectual property in connection with any of our projects, disputes may arise concerning allocation of the related proprietary rights. If a dispute were to arise, enforcement of our rights could be costly and the result unpredictable. In addition, we also rely on trade secrets and proprietary know-how that we seek to protect, in part, through confidentiality agreements with our employees, consultants, advisors or others.

Despite the protective measures we employ, we still face the risk that:

- agreements may be breached;
- agreements may not provide adequate remedies for the applicable type of breach;
- our trade secrets or proprietary know-how may otherwise become known;
- our competitors may independently develop similar technology; or
- our competitors may independently discover our proprietary information and trade secrets.

We depend upon key employees and consultants in a competitive market for skilled personnel. If we are unable to attract and retain key personnel, it could adversely affect our ability to develop and market our products.

We are highly dependent upon the principal members of our management team, especially our Chief Executive Officer, Robert J. Capetola, Ph.D., and our directors, as well as our scientific advisory board members, consultants and collaborating scientists. Many of these people have been involved in our formation or have otherwise been involved with us for many years, have played integral roles in our progress and we believe that they will continue to provide value to us. A loss of any of our key personnel may have a material adverse effect on aspects of our business and clinical development and regulatory programs.

Following receipt of the second Approvable Letter and the occurrence of the process validation stability failures in April 2006, we reduced our staff levels by approximately 50 people and reorganized our corporate structure. To retain and provide incentives to our key executives and certain officers, in 2006, we entered into amended and new employment agreements that generally include provisions such as a stated term, enhanced severance benefits in the event of a change of control and equity incentives in the form of stock and option grants. As of February 29, 2008, we have employment agreements with 13 officers, three of which expire in May 2010 and the remainder in December 2008. Each employment agreement provides that its term shall automatically be extended for one additional year, unless at least 90 days prior to the renewal date either party gives notice that it does not wish to extend the agreement. Although these employment agreements generally include non-competition covenants and provide for severance payments that are contingent upon the applicable employee's refraining from competition with us, the applicable noncompete provisions can be difficult and costly to monitor and enforce. The loss of any of these persons' services would adversely affect our ability to develop and market our products and obtain necessary regulatory approvals. Further, we do not maintain key-man life insurance.

Our future success also will depend in part on the continued service of our key scientific and management personnel and our ability to identify, hire and retain additional personnel. We may experience intense competition for qualified personnel and the existence of non-competition agreements between prospective employees and their former employers may prevent us from hiring those individuals or subject us to suit from their former employers.

While we attempt to provide competitive compensation packages to attract and retain key personnel, some of our competitors are likely to have greater resources and more experience than we have, making it difficult for us to compete successfully for key personnel.

Our industry is highly competitive and we have less capital and resources than many of our competitors, which may give them an advantage in developing and marketing products similar to ours or make our products obsolete.

Our industry is highly competitive and subject to rapid technological innovation and evolving industry standards. We compete with numerous existing companies intensely in many ways. We intend to market our products under development for the treatment of diseases for which other technologies and treatments are rapidly developing and, consequently, we expect new companies to enter our industry and that competition in the industry will increase. Many of these companies have substantially greater research and development, manufacturing, marketing, financial, technological, personnel and managerial resources than we have. In addition, many of these competitors, either alone or with their collaborative partners, have significantly greater experience than we do in:

- developing products;
- undertaking preclinical testing and human clinical trials;
- obtaining FDA and other regulatory approvals or products; and
- manufacturing and marketing products.

Accordingly, our competitors may succeed in obtaining patent protection, receiving FDA or comparable foreign approval or commercializing products before us. If we commence commercial product sales, we will compete against companies with greater marketing and manufacturing capabilities who may successfully develop and commercialize products that are more effective or less expensive than ours. These are areas in which, as yet, we have limited or no experience. In addition, developments by our competitors may render our product candidates obsolete or noncompetitive.

We also face, and will continue to face, competition from colleges, universities, governmental agencies and other public and private research organizations. These competitors are becoming more active in seeking patent protection and licensing arrangements to collect royalties for use of technology that they have developed. Some of these technologies may compete directly with the technologies that we are developing. These institutions will also compete with us in recruiting highly qualified scientific personnel. We expect that therapeutic developments in the areas in which we are active may occur at a rapid rate and that competition will intensify as advances in this field are made. As a result, we need to continue to devote substantial resources and efforts to research and development activities.

If product liability claims are brought against us, it may result in reduced demand for our products or damages that exceed our insurance coverage and we may incur substantial costs.

The clinical testing, marketing and use of our products exposes us to product liability claims if the use or misuse of our products causes injury, disease or results in adverse effects. Use of our products in clinical trials, as well as commercial sale, could result in product liability claims. In addition, sales of our products through third party arrangements could also subject us to product liability claims. We presently carry product liability insurance with coverage of up to \$10 million per occurrence and \$10 million in the aggregate. However, this insurance coverage includes various deductibles, limitations and exclusions from coverage, and in any event might not fully cover any potential claims. We may need to obtain additional product liability insurance coverage, including by insurers licensed in countries where we conduct our clinical trials, before initiating clinical trials. We expect to obtain product liability insurance coverage before commercializing any of our product candidates; however, such insurance is expensive and may not be available when we need it.

In the future, we may not be able to obtain adequate insurance, with acceptable limits and retentions, at an acceptable cost. Any product liability claim, even one that is within the limits of our insurance coverage or one that is meritless and/or unsuccessful, could adversely affect the availability or cost of insurance generally and our cash available for other purposes, such as research and development. In addition, such claims could result in:

- uninsured expenses related to defense or payment of substantial monetary awards to claimants;
- a decrease in demand for our product candidates;
- damage to our reputation; and
- an inability to complete clinical trial programs or to commercialize our product candidates, if approved.

Moreover, the existence of a product liability claim could affect the market price of our common stock.

Our corporate compliance program cannot ensure that we are in compliance with all applicable laws and regulations affecting our activities in the jurisdictions in which we may sell our products, if approved, and a failure to comply with such regulations or prevail in litigation related to noncompliance could harm our business.

Many of our activities, including the research, development, manufacture, sale and marketing of our products, are subject to extensive laws and regulation, including without limitation, health care "fraud and abuse" laws, such as the federal false claims act, the federal anti-kickback statute, and other state and federal laws and regulations. We have developed and implemented a corporate compliance policy and oversight program based upon what we understand to be current industry best practices, but we cannot assure you that this program will protect us from governmental investigations or other actions or lawsuits stemming from a failure to be in compliance with such laws or regulations. If any such investigations, actions or lawsuits are instituted against us, and if we are not successful in defending or disposing of them without liability, such investigations, actions or lawsuits could result in the imposition of significant fines or other sanctions and could otherwise have a significant impact on our business.

We expect to face uncertainty over reimbursement and healthcare reform.

In both the United States and other countries, sales of our products will depend in part upon the availability of reimbursement from third-party payers, which include governmental health administration authorities, managed care providers and private health insurers. Third party payers are increasingly challenging the price and examining the cost effectiveness of medical products and services. Moreover, the current political environment in the United States and abroad may result in the passage of significant legislation that could, among other things, restructure the markets in which we operate and restrict pricing strategies of drug development companies. If, for example, price restrictions were placed on the distribution of drugs such as our SRT, we may be forced to curtail development of our pipeline products and this could have a material adverse effect on our business, results of operations and financial condition. Even if we succeed in commercializing our SRT, uncertainties regarding health care policy, legislation and regulation, as well as private market practices, could affect our ability to sell our products in quantities or at prices that will enable us to achieve profitability.

To obtain reimbursement from a third party payer, it must determine that our drug product is a covered benefit under its health plan, which is likely to require a determination that our product is:

- safe, effective and medically necessary;
- appropriate for the specific patient;
- cost-effective; and
- neither experimental nor investigational.

Obtaining a determination that a product is a covered benefit may be a time-consuming and costly process that could require us to provide supporting scientific, clinical and cost-effectiveness data about our products to each payer. We may not be able to provide sufficient data to gain coverage.

Even when a payer determines that a product is covered, the payer may impose limitations that preclude payment for some uses that are approved by the FDA or other regulatory authorities. Moreover, coverage does not imply that any product will be covered in all cases or that reimbursement will be available at a rate that would permit a health care provider to cover its costs of using our product.

Provisions of our Restated Certificate of Incorporation, Shareholder Rights Agreement and Delaware law could defer a change of our management and thereby discourage or delay offers to acquire us.

Provisions of our Restated Certificate of Incorporation, as amended, our Shareholder Rights Agreement and Delaware law may make it more difficult for someone to acquire control of us or for our stockholders to remove existing management, and might discourage a third party from offering to acquire us, even if a change in control or in management would be beneficial to our stockholders. For example, our Restated Certificate of Incorporation, as amended, allows us to issue shares of preferred stock without any vote or further action by our stockholders. Our Board of Directors has the authority to fix and determine the relative rights and preferences of preferred stock. Our Board of Directors also has the authority to issue preferred stock without further stockholder approval. As a result, our Board of Directors could authorize the issuance of a series of preferred stock that would grant to holders the preferred right to our assets upon liquidation, the right to receive dividend payments before dividends are distributed to the holders of common stock and the right to the redemption of the shares, together with a premium, before the redemption of our common stock. In addition, our Board of Directors, without further stockholder approval, could issue large blocks of preferred stock. We have adopted a Shareholder Rights Agreement, which under certain circumstances would significantly impair the ability of third parties to acquire control of us without prior approval of our Board of Directors thereby discouraging unsolicited takeover proposals. The rights issued under the Shareholder Rights Agreement would cause substantial dilution to a person or group that attempts to acquire us on terms not approved in advance by our Board of Directors.

The failure to prevail in litigation or the costs of litigation, including securities class action and patent claims, could harm our financial performance and business operations.

We are potentially susceptible to litigation. For example, as a public company, we are subject to claims asserting violations of securities laws. In early May 2006, four shareholder class actions and two derivative actions were filed in the United States District Court for the Eastern District of Pennsylvania naming as defendants the Company and certain of its current and former executive officers and directors. The derivative actions were consolidated under the caption “In re: Discovery Laboratories Securities Litigation” and the class actions were consolidated under the caption “In re: Discovery Laboratories Securities Litigation”. The District Court granted our motions to dismiss two Consolidated Amended Complaints in each proceeding. The derivative actions were not appealed and that matter is concluded. In April 2008, the Third Circuit Court of Appeals affirmed the District Court’s dismissal of the second Consolidated Amended Complaint in the class actions for the reasons set forth in the District Court opinion, and this matter is now concluded.

Even if actions such as these are found to be without merit, the potential impact of such actions, all of which generally seek unquantified damages, attorneys fees and expenses, is uncertain. Additional actions based upon similar allegations, or otherwise, may be filed in the future. There can be no assurance that an adverse result in any future proceeding would not have a potentially material adverse effect on our business, results of operations and financial condition.

We have from time to time been involved in disputes and proceedings arising in the ordinary course of business, including in connection with the conduct of clinical trials and the termination of certain pre-launch commercial programs following the April 2006 manufacturing issues. Such claims, with or without merit, if not resolved, could be time-consuming and result in costly litigation. Although we believe such claims are unlikely to have a material adverse effect on our financial condition or results of operations, it is impossible to predict with certainty the eventual outcome of such claims and there can be no assurance that we will be successful in any proceeding to which we may be a party.

In addition, as the USPTO keeps United States patent applications confidential while the applications are pending, we cannot ensure that our products or methods do not infringe upon the patents or other intellectual property rights of third parties. As the biotechnology and pharmaceutical industries expand and more patents are filed and issued, the risk increases that our patents or patent applications for our product candidates may give rise to a declaration of interference by the USPTO, or to administrative proceedings in foreign patent offices, or that our activities lead to claims of patent infringement by other companies, institutions or individuals. These entities or persons could bring legal proceedings against us seeking substantial damages or seeking to enjoin us from conducting research and development activities.

FORWARD-LOOKING STATEMENTS

This prospectus contains “forward-looking statements” within the meaning of Section 27A of the Securities Act and Section 21E of the Securities Exchange Act of 1934 (Exchange Act). The forward-looking statements are only predictions and provide our current expectations or forecasts of future events and financial performance and may be identified by the use of forward-looking terminology, including the terms “believes,” “estimates,” “anticipates,” “expects,” “plans,” “intends,” “may,” “will” or “should” or, in each case, their negative, or other variations or comparable terminology, though the absence of these words does not necessarily mean that a statement is not forward-looking. Forward-looking statements include all matters that are not historical facts and include, without limitation statements concerning: our business strategy, outlook, objectives, future milestones, plans, intentions, goals, and future financial condition; plans regarding the May 2008 Approvable Letter that we received from the FDA for Surfaxin[®] (lucinactant) for the prevention of Respiratory Distress Syndrome in premature infants; our research and development programs and planning for and timing of any clinical trials; the possibility, timing and outcome of submitting regulatory filings for our products under development; plans regarding strategic alliances and collaboration arrangements with pharmaceutical companies and others to develop, manufacture and market our drug products; research and development of particular drug products, technologies and aerosolization drug devices; the development of financial, clinical, manufacturing and marketing plans related to the potential approval and commercialization of our drug products, and the period of time for which our existing resources will enable us to fund our operations.

We intend that all forward-looking statements be subject to the safe-harbor provisions of the Private Securities Litigation Reform Act of 1995. These forward-looking statements are only predictions and reflect our views as of the date they are made with respect to future events and financial performance. Forward-looking statements are subject to many risks and uncertainties that could cause our actual results to differ materially from any future results expressed or implied by the forward-looking statements. Examples of the risks and uncertainties include, but are not limited to:

- the risk that we may not be able to timely respond to the Approvable Letter that we recently received for Surfaxin and that any response that we do file will not satisfy the FDA;
- the risk that the FDA or other regulatory authorities may not accept, or may withhold or delay consideration of, any applications that we may file, including our New Drug Application (NDA) for Surfaxin, or may not approve our applications or may limit approval of our products to particular indications or impose unanticipated label limitations;
- risks relating to the rigorous regulatory approval processes, including pre-NDA activities, required for approval of any drug or medical device products that we may develop, independently, with development partners or pursuant to collaboration arrangements;
- the risk that changes in the national or international political and regulatory environment may make it more difficult to gain FDA or other regulatory approval of our drug product candidates;
- risks relating to our research and development activities, which involve time-consuming and expensive pre-clinical studies, multi-phase clinical trials and other studies and other efforts, and which may be subject to potentially significant delays or regulatory holds, or fail;
- the risk that we, our contract manufacturers or any of our materials suppliers encounter problems manufacturing our products or drug substances on a timely basis or in an amount sufficient to meet demand;
- risks relating to the transfer of our manufacturing technology to third-party contract manufacturers;
- risks relating to the ability of our development partners and third-party suppliers of materials, drug substances and aerosolization systems and related components to timely provide us with adequate supplies and expertise to support development and manufacture of drug product and aerosolization systems for initiation and completion of our clinical studies, and, if approved, commercialization of our drug and combination drug-device products;
- the risk that we may not successfully and profitably market our products;
- the risk that, even if approved, we may be unable, for reasons related to market conditions, the competitive landscape or otherwise, to successfully launch and market our products;

- risks relating to our ability to develop a successful sales and marketing organization to market Surfaxin, if approved, and our other product candidates, in a timely manner, if at all, and that we or our marketing and advertising consultants will not succeed in developing market awareness of our products;
- the risk that we or our development partners, collaborators or marketing partners will not be able to attract or maintain qualified personnel;
- the risk that our product candidates will not gain market acceptance by physicians, patients, healthcare payers and others in the medical community;
- the risk that we may not be able to raise additional capital or enter into additional collaboration agreements (including strategic alliances for development or commercialization of SRT);
- the risk that recurring losses, negative cash flows and the inability to raise additional capital could threaten our ability to continue as a going concern;
- risks relating to reimbursement and health care reform;
- risks that financial market conditions may change, additional financings could result in equity dilution, or we will be unable to maintain The Nasdaq Global Market listing requirements, causing the price of our shares of common stock to decline;
- the risk that we may be unable to maintain and protect the patents and licenses related to our SRT; other companies may develop competing therapies and/or technologies or health care reform may adversely affect us;
- the risk that we may become involved in securities, product liability and other litigation;
- other risks and uncertainties detailed in “Risk Factors” and in the documents incorporated by reference in this prospectus.

Pharmaceutical and biotechnology companies have suffered significant setbacks in advanced clinical trials, even after obtaining promising earlier trial results. Data obtained from such clinical trials are susceptible to varying interpretations, which could delay, limit or prevent regulatory approval. After gaining approval of a drug product, pharmaceutical companies face considerable challenges in marketing and distributing their products, and may never become profitable.

Except to the extent required by applicable laws, rules and regulations, we do not undertake any obligation or duty to update any forward-looking statements or to publicly announce revisions to any of the forward-looking statements, whether as a result of new information, future events or otherwise.

USE OF PROCEEDS

Except as described in any prospectus supplement or post-effective amendment, we will retain broad discretion over the use of the net proceeds from the sale of our securities offered hereby and the net proceeds from the sales of securities offered by this prospectus will be used to meet working capital requirements for: (i) development of our SRT pipeline programs, including Surfaxin, life cycle development of Surfaxin for other respiratory conditions prevalent in the NICU and PICU, and Aerosurf for neonatal and pediatric conditions; (ii) efforts intended to gain regulatory approval to market and sell, and preparing for the potential commercial launch in the United States of, Surfaxin for the prevention of RDS in premature infants; (iii) continued investment in our quality systems and manufacturing capabilities to meet the anticipated pre-clinical, clinical and potential future commercial requirements of Surfaxin, Aerosurf and our other SRT products; and (iv) seeking collaboration agreements and strategic partnerships in the international and domestic markets for the development and potential commercialization of our neonatal and pediatric pipeline for Surfaxin and AerosurfTM and for the development and potential commercialization of our SRT for respiratory conditions and disorders affecting adult patients. We expect, from time to time, to evaluate the acquisition of businesses, products and technologies for which a portion of the net proceeds may be used.

The amounts and timing of the expenditures may vary significantly depending on numerous factors, such as the progress of our research and development efforts, technological advances and the competitive environment for Surfaxin and its intended uses. Pending application of the net proceeds, we expect to invest the proceeds in short-term, interest-bearing instruments or other investment-grade securities.

RATIO OF EARNINGS TO FIXED CHARGES

Our earnings were insufficient to cover fixed charges in each of the years in the five-year period ended December 31, 2007 and in the three-month period ended March 31, 2008. Our fixed charges do not include any dividend requirements with respect to preferred stock because, as of the date of this prospectus and for the five preceding fiscal years, we have had no preferred stock outstanding.

We compute the ratio of earnings to fixed charges by dividing (i) earnings (loss), which consists of net income from continuing operations before income taxes plus fixed charges and amortization of capitalized interest less interest capitalized during the period and adjusted for undistributed earnings in equity investments, by (ii) fixed charges, which consist of interest expense, capitalized interest and the interest portion of rental expense under operating leases estimated to be representative of the interest factor.

| | Fiscal year Ended December 31, | | | | | Three Months Ended March 31, 2008 |
|---|--------------------------------|-------------|-------------|-------------|-------------|--|
| | 2003 | 2004 | 2005 | 2006 | 2007 | |
| | (in thousands) | | | | | |
| Ratio of earnings to fixed charges ⁽¹⁾ | | | | | | |
| Coverage deficiency | \$ (24,280) | \$ (46,203) | \$ (58,904) | \$ (46,333) | \$ (40,005) | (9,714) |

⁽¹⁾ Adjusted earnings, as described above, were insufficient to cover fixed charges in each period. We have not included a ratio of earnings to combined fixed charges and preferred stock dividends because we do not have any preferred stock outstanding.

DESCRIPTION OF DEBT SECURITIES

The following description, together with the additional information we include in any applicable prospectus supplements, summarizes the material terms and provisions of the debt securities that we may offer under this prospectus. While the terms we have summarized below will apply generally to any future debt securities we may offer under this prospectus, we will describe the particular terms of any debt securities that we may offer in more detail in the applicable prospectus supplement. The terms of any debt securities we offer under a prospectus supplement may differ from the terms we describe below. However, no prospectus supplement shall fundamentally change the terms that are set forth in this prospectus or offer a security that is not registered and described in this prospectus at the time of its effectiveness. As of March 31, 2008, we have \$15.0 million in outstanding indebtedness including accrued interest.

We will issue the senior debt securities under the senior indenture that we will enter into with the trustee named in the senior indenture. We will issue the subordinated debt securities under the subordinated indenture that we will enter into with the trustee named in the subordinated indenture. We have filed forms of these documents as exhibits to the registration statement which includes this prospectus. We use the term "indentures" in this prospectus to refer to both the senior indenture and the subordinated indenture.

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

The following summaries of material provisions of the senior debt securities, the subordinated debt securities and the indentures are subject to, and qualified in their entirety by reference to, all the provisions of the indenture applicable to a particular series of debt securities. Except as we may otherwise indicate, the terms of the senior indenture and the subordinated indenture are identical.

General

Debt securities may be issued in separate series without limitation as to aggregate principal amount. We may specify a maximum aggregate principal amount for the debt securities of any series.

We are not limited as to the amount of debt securities we may issue under the indentures. The prospectus supplement will set forth:

- whether the debt securities will be senior or subordinated;
- the offering price;
- the title;
- any limit on the aggregate principal amount;
- the person who shall be entitled to receive interest, if other than the record holder on the record date;
- the date the principal will be payable;
- the interest rate, if any, the date interest will accrue, the interest payment dates and the regular record dates;
- the place where payments may be made;
- any mandatory or optional redemption provisions;
- if applicable, the method for determining how the principal, premium, if any, or interest will be calculated by reference to an index or formula;
- if other than U.S. currency, the currency or currency units in which principal, premium, if any, or interest will be payable and whether we or the holder may elect payment to be made in a different currency;
- the portion of the principal amount that will be payable upon acceleration of stated maturity, if other than the entire principal amount;
- if the principal amount payable at stated maturity will not be determinable as of any date prior to stated maturity, the amount which will be deemed to be the principal amount;
- any defeasance provisions if different from those described below under “Satisfaction and Discharge; Defeasance;”
- any conversion or exchange provisions;
- any obligation to redeem or purchase the debt securities pursuant to a sinking fund;
- whether the debt securities will be issuable in the form of a global security;
- any subordination provisions, if different from those described below under “Subordinated Debt Securities;”
- any deletions of, or changes or additions to, the events of default or covenants; and
- any other specific terms of such debt securities.

Unless otherwise specified in the prospectus supplement:

- the debt securities will be registered debt securities; and
- registered debt securities denominated in U.S. dollars will be issued in denominations of \$1,000 or an integral multiple of \$1,000.

Debt securities may be sold at a substantial discount below their stated principal amount, bearing no interest or interest at a rate which at the time of issuance is below market rates.

Exchange and Transfer

Debt securities may be transferred or exchanged at the office of the security registrar or at the office of any transfer agent designated by us.

We will not impose a service charge for any transfer or exchange, but we may require holders to pay any tax or other governmental charges associated with any transfer or exchange.

In the event of any potential redemption of debt securities of any series, we will not be required to:

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

We may initially appoint the trustee as the security registrar. Any transfer agent, in addition to the security registrar, initially designated by us will be named in the prospectus supplement. We may designate additional transfer agents or change transfer agents or change the office of the transfer agent. However, we will be required to maintain a transfer agent in each place of payment for the debt securities of each series.

Global Securities

The debt securities of any series may be represented, in whole or in part, by one or more global securities. Each global security will:

- be registered in the name of a depositary that we will identify in a prospectus supplement;
- be deposited with the depositary or nominee or custodian; and
- bear any required legends.

No global security may be exchanged in whole or in part for debt securities registered in the name of any person other than the depositary or any nominee unless:

- the depositary has notified us that it is unwilling or unable to continue as depositary or has ceased to be qualified to act as depositary;
- an event of default is continuing; or
- any other circumstances described in a prospectus supplement.

As long as the depositary, or its nominee, is the registered owner of a global security, the depositary or nominee will be considered the sole owner and holder of the debt securities represented by the global security for all purposes under the indenture. Except in the above limited circumstances, owners of beneficial interests in a global security:

- will not be entitled to have the debt securities registered in their names,
- will not be entitled to physical delivery of certificated debt securities, and
- will not be considered to be holders of those debt securities under the indentures.

Payments on a global security will be made to the depositary or its nominee as the holder of the global security. Some jurisdictions have laws that require that certain purchasers of securities take physical delivery of such securities in definitive form. These laws may impair the ability to transfer beneficial interests in a global security.

Institutions that have accounts with the depositary or its nominee are referred to as “participants.” Ownership of beneficial interests in a global security will be limited to participants and to persons that may hold beneficial interests through participants. The depositary will credit, on its book-entry registration and transfer system, the respective principal amounts of debt securities represented by the global security to the accounts of its participants.

Ownership of beneficial interests in a global security will be shown on and effected through records maintained by the depositary, with respect to participants’ interests, or any participant, with respect to interests of persons held by participants on their behalf.

Payments, transfers and exchanges relating to beneficial interests in a global security will be subject to policies and procedures of the depositary.

The depositary policies and procedures may change from time to time. Neither we nor the trustee will have any responsibility or liability for the depositary’s or any participant’s records with respect to beneficial interests in a global security.

Payment and Paying Agent

The provisions of this paragraph will apply to debt securities unless otherwise indicated in the prospectus supplement. Payment of interest on a debt security on any interest payment date will be made to the person in whose name the debt security is registered at the close of business on the regular record date. Payment on debt securities of a particular series will be payable at the office of a paying agent or paying agents designated by us. However, at our option, we may pay interest by mailing a check to the record holder. The corporate trust office will be designated as our sole paying agent.

We may also name any other paying agents in the prospectus supplement. We may designate additional paying agents, change paying agents or change the office of any paying agent. However, we will be required to maintain a paying agent in each place of payment for the debt securities of a particular series.

All moneys paid by us to a paying agent for payment on any debt security which remain unclaimed at the end of two years after such payment was due will be repaid to us. Thereafter, the holder may look only to us for such payment.

Consolidation, Merger and Sale of Assets

We may not consolidate with or merge into any other person, in a transaction in which we are not the surviving corporation, or convey, transfer or lease our properties and assets substantially as an entirety to, any person, unless:

- the successor, if any, is a U.S. corporation, limited liability company, partnership, trust or other entity;
- the successor assumes our obligations on the debt securities and under the indenture;
- immediately after giving effect to the transaction, no default or event of default shall have occurred and be continuing; and
- certain other conditions are met.

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

Events of Default

Unless we inform you otherwise in the prospectus supplement, the indenture will define an event of default with respect to any series of debt securities as one or more of the following events:

- (1) failure to pay principal of or any premium on any debt security of that series when due and payable;
- (2) failure to pay any interest on any debt security of that series when it becomes due and payable, and continuation of that failure for a period of 90 days (unless the entire amount of such payment is deposited by us with the trustee or paying agent prior to the expiration of the 90-day period);
- (3) failure to deposit any sinking fund payment, when and as due in respect of any debt security of that series;
- (4) failure to perform or breach of any other covenant or warranty by us in the indenture (other than a covenant or warranty that has been included in the indenture solely for the benefit of a series of debt securities other than the series), which failure continues uncured for a period of 90 days after we receive the notice required in the indenture;
- (5) our bankruptcy, insolvency or reorganization; and
- (6) any other event of default with respect to debt securities of that series that is described in the applicable prospectus supplement accompanying this prospectus.

An event of default of one series of debt securities is not necessarily an event of default for any other series of debt securities.

If an event of default, other than an event of default described in clause (5) above, shall occur and be continuing, either the trustee or the holders of at least 25% in aggregate principal amount of the outstanding securities of that series may declare the principal amount of the debt securities of that series to be due and payable immediately.

If an event of default described in clause (5) above shall occur, the principal amount of all the debt securities of that series will automatically become immediately due and payable. Any payment by us on the subordinated debt securities following any such acceleration will be subject to the subordination provisions described below under "Subordinated Debt Securities."

After acceleration the holders of a majority in aggregate principal amount of the outstanding securities of that series may, under certain circumstances, rescind and annul such acceleration if all events of default, other than the non-payment of accelerated principal, or other specified amount, have been cured or waived.

Other than the duty to act with the required care during an event of default, the trustee will not be obligated to exercise any of its rights or powers at the request of the holders unless the holders shall have offered to the trustee reasonable indemnity. Generally, the holders of a majority in aggregate principal amount of the outstanding debt securities of any series will have the right to direct the time, method and place of conducting any proceeding for any remedy available to the trustee or exercising any trust or power conferred on the trustee.

A holder will not have any right to institute any proceeding under the indentures, or for the appointment of a receiver or a trustee, or for any other remedy under the indentures, unless:

- (1) the holder has previously given to the trustee written notice of a continuing event of default with respect to the debt securities of that series;
- (2) the holders of at least 25% in aggregate principal amount of the outstanding debt securities of that series have made a written request and have offered reasonable indemnity to the trustee to institute the proceeding; and
- (3) the trustee has failed to institute the proceeding and has not received direction inconsistent with the original request from the holders of a majority in aggregate principal amount of the outstanding debt securities of that series within 90 days after the original request.

Holders may, however, sue to enforce the payment of principal, premium or interest on any debt security on or after the due date or to enforce the right, if any, to convert any debt security without following the procedures listed in (1) through (3) above.

We will furnish the trustee an annual statement by our officers as to whether or not we are in default in the performance of the indenture and, if so, specifying all known defaults.

Modification and Waiver

We and the trustee may make modifications and amendments to the indentures with the consent of the holders of a majority in aggregate principal amount of the outstanding securities of each series affected by the modification or amendment.

However, neither we nor the trustee may make any modification or amendment without the consent of the holder of each outstanding security of that series affected by the modification or amendment if such modification or amendment would:

- change the stated maturity of any debt security;
- reduce the principal, premium, if any, or interest on any debt security;
- reduce the principal of an original issue discount security or any other debt security payable on acceleration of maturity;

- reduce the rate of interest on any debt security;
- change the currency in which any debt security is payable;
- impair the right to enforce any payment after the stated maturity or redemption date;
- waive any default or event of default in payment of the principal of, premium or interest on any debt security;
- waive a redemption payment or modify any of the redemption provisions of any debt security;
- adversely affect the right to convert any debt security in any material respect; or
- change the provisions in the indenture that relate to modifying or amending the indenture.

Satisfaction and Discharge; Defeasance

We may be discharged from our obligations on the debt securities of any series that have matured or will mature or be redeemed within one year if we deposit with the trustee enough cash to pay all the principal, interest and any premium due to the stated maturity date or redemption date of the debt securities.

Each indenture will contain a provision that permits us to elect:

- to be discharged from all of our obligations, subject to limited exceptions, with respect to any series of debt securities then outstanding; and/or
- to be released from our obligations under the following covenants and from the consequences of an event of default resulting from a breach of these covenants: (1) the subordination provisions under a subordinated indenture; and (2) covenants as to payment of taxes and maintenance of corporate existence.

To make either of the above elections, we must deposit in trust with the trustee enough money to pay in full the principal, interest and premium on the debt securities. This amount may be made in cash and/or U.S. government obligations. As a condition to either of the above elections, we must deliver to the trustee an opinion of counsel that the holders of the debt securities will not recognize income, gain or loss for Federal income tax purposes as a result of the action.

If any of the above events occurs, the holders of the debt securities of the series will not be entitled to the benefits of the indenture, except for the rights of holders to receive payments on debt securities or the registration of transfer and exchange of debt securities and replacement of lost, stolen or mutilated debt securities.

Notices

Notices to holders will be given by mail to the addresses of the holders in the security register.

Governing Law

The indentures and the debt securities will be governed by, and construed under, the law of the State of New York.

Regarding the Trustee

The indentures will limit the right of the trustee, should it become a creditor of us, to obtain payment of claims or secure its claims.

The trustee will be permitted to engage in certain other transactions. However, if the trustee, acquires any conflicting interest, and there is a default under the debt securities of any series for which they are trustee, the trustee must eliminate the conflict or resign.

Subordinated Debt Securities

Payment on subordinated debt securities will, to the extent provided in the indenture, be subordinated in right of payment to the prior payment in full of all of our senior indebtedness. Subordinated debt securities also are effectively subordinated to all debt and other liabilities, including trade payables and lease obligations, if any, of our subsidiaries.

Upon any distribution of our assets upon any dissolution, winding up, liquidation or reorganization, the payment of the principal of and interest on subordinated debt securities will be subordinated in right of payment to the prior payment in full in cash or other payment satisfactory to the holders of senior indebtedness of all senior indebtedness. In the event of any acceleration of the subordinated debt securities because of an event of default, the holders of any senior indebtedness would be entitled to payment in full in cash or other payment satisfactory to such holders of all senior indebtedness obligations before the holders of subordinated debt securities are entitled to receive any payment or distribution. The indentures will require us or the trustee to promptly notify holders of designated senior indebtedness if payment of subordinated debt securities is accelerated because of an event of default.

We may not make any payment on subordinated debt securities, including upon redemption at the option of the holder of any subordinated debt securities or at our option, if:

- a default in the payment of the principal, premium, if any, interest, rent or other obligations in respect of designated senior indebtedness occurs and is continuing beyond any applicable period of grace, which is called a “payment default”; or
- a default other than a payment default on any designated senior indebtedness occurs and is continuing that permits holders of designated senior indebtedness to accelerate its maturity, and the trustee receives notice of such default, which is called a “payment blockage notice from us or any other person permitted to give such notice under the indenture, which is called a “non-payment default”.

We may resume payments and distributions on subordinated debt securities:

- in the case of a payment default, upon the date on which such default is cured or waived or ceases to exist; and
- in the case of a non-payment default, the earlier of the date on which such nonpayment default is cured or waived or ceases to exist and 179 days after the date on which the payment blockage notice is received by the trustee, if the maturity of the designated senior indebtedness has not been accelerated.

No new period of payment blockage may be commenced pursuant to a payment blockage notice unless 365 days have elapsed since the initial effectiveness of the immediately prior payment blockage notice and all scheduled payments of principal, premium and interest, including any liquidated damages, on the notes that have come due have been paid in full in cash. No non-payment default that existed or was continuing on the date of delivery of any payment blockage notice shall be the basis for any later payment blockage notice unless the non-payment default is based upon facts or events arising after the date of delivery of such payment blockage notice.

If the trustee or any holder of the notes receives any payment or distribution of our assets in contravention of the subordination provisions on subordinated debt securities before all senior indebtedness is paid in full in cash, property or securities, including by way of set-off, or other payment satisfactory to holders of senior indebtedness, then such payment or distribution will be held in trust for the benefit of holders of senior indebtedness or their representatives to the extent necessary to make payment in full in cash or payment satisfactory to the holders of senior indebtedness of all unpaid senior indebtedness.

In the event of our bankruptcy, dissolution or reorganization, holders of senior indebtedness may receive more, ratably, and holders of subordinated debt securities may receive less, ratably, than our other creditors (including our trade creditors). This subordination will not prevent the occurrence of any event of default under the indenture.

As of March 31, 2008, \$15.0 million in senior indebtedness was outstanding. Unless we inform you otherwise in the prospectus supplement, we will not be prohibited from incurring debt, including senior indebtedness, under any indenture relating to subordinated debt securities. We may from time to time incur additional debt, including senior indebtedness.

We are obligated to pay reasonable compensation to the trustee and to indemnify the trustee against certain losses, liabilities or expenses incurred by the trustee in connection with its duties relating to subordinated debt securities. The trustee’s claims for these payments will generally be senior to those of noteholders in respect of all funds collected or held by the trustee.

Certain Definitions

“indebtedness” means:

- (1) all indebtedness, obligations and other liabilities for borrowed money, including overdrafts, foreign exchange contracts, currency exchange agreements, interest rate protection agreements, and any loans or advances from banks, or evidenced by bonds, debentures, notes or similar instruments, other than any account payable or other accrued current liability or obligation incurred in the ordinary course of business in connection with the obtaining of materials or services;
- (2) all reimbursement obligations and other liabilities with respect to letters of credit, bank guarantees or bankers’ acceptances;
- (3) all obligations and liabilities in respect of leases required in conformity with generally accepted accounting principles to be accounted for as capitalized lease obligations on our balance sheet;
- (4) all obligations and liabilities, contingent or otherwise, as lessee under leases for facility equipment (and related assets leased together with such equipment) and under any lease or related document (including a purchase agreement, conditional sale or other title retention or synthetic lease agreement) in connection with the lease of real property or improvement thereon (or any personal property included as part of any such lease) which provides that such Person is contractually obligated to purchase or cause a third party to purchase the leased property or pay an agreed upon residual value of the leased property, including the obligations under such lease or related document to purchase or cause a third party to purchase such leased property (whether or not such lease transaction is characterized as an operating lease or a capitalized lease in accordance with GAAP) or pay an agreed upon residual value of the leased property to the lessor;
- (5) all obligations with respect to an interest rate or other swap, cap or collar agreement or other similar instrument or agreement or foreign currency hedge, exchange, purchase agreement or other similar instrument or agreement;
- (6) all direct or indirect guaranties or similar agreements in respect of, and our obligations or liabilities to purchase, acquire or otherwise assure a creditor against loss in respect of, indebtedness, obligations or liabilities of others of the type described in (1) through (5) above;
- (7) any indebtedness or other obligations described in (1) through (6) above secured by any mortgage, pledge, lien or other encumbrance existing on property which is owned or held by us; and
- (8) any and all refinancings, replacements, deferrals, renewals, extensions and refundings of, or amendments, modifications or supplements to, any indebtedness, obligation or liability of the kind described in clauses (1) through (7) above.

“senior indebtedness” means the principal, premium, if any, interest, including any interest accruing after bankruptcy, and rent or termination payment on or other amounts due on our current or future indebtedness, whether created, incurred, assumed, guaranteed or in effect guaranteed by us, including any deferrals, renewals, extensions, refundings, amendments, modifications or supplements to the above. However, senior indebtedness does not include:

- indebtedness that expressly provides that it shall not be senior in right of payment to subordinated debt securities or expressly provides that it is on the same basis or junior to subordinated debt securities;
- our indebtedness to any of our majority-owned subsidiaries; and
- subordinated debt securities.

DESCRIPTION OF PREFERRED STOCK

We currently have authorized 5,000,000 shares of preferred stock, par value \$.001 per share. As of June 3, 2008, we do not have any shares of preferred stock outstanding. Under our Restated Certificate of Incorporation, our Board of Directors is authorized to issue shares of our preferred stock from time to time, in one or more classes or series, without stockholder approval. Prior to the issuance of shares of each series, the Board of Directors is required by the General Corporation Law of the State of Delaware and our Restated Certificate of Incorporation to adopt resolutions and file a Certificate of Designation with the Secretary of State of the State of Delaware, fixing for each such series the designations, powers, preferences, rights, qualifications, limitations and restrictions of the shares of such series. Any exercise of our Board of Directors of its rights to do so may affect the rights and entitlements of the holders of our common stock as set forth below.

Our Board of Directors could authorize the issuance of shares of preferred stock with terms and conditions which could have the effect of discouraging a takeover or other transaction which holders of some, or a majority, of such shares might believe to be in their best interests or in which holders of some, or a majority, of such shares might receive a premium for their shares over the then-market price of such shares.

General

Subject to limitations prescribed by the General Corporation Law of the State of Delaware, our Restated Certificate of Incorporation and our Amended and Restated By-Laws ("By-Laws"), our Board of Directors is authorized to fix the number of shares constituting each series of preferred stock and the designations, powers, preferences, rights, qualifications, limitations and restrictions of the shares of such series, including such provisions as may be desired concerning voting, redemption, dividends, dissolution or the distribution of assets, conversion or exchange, and such other subjects or matters as may be fixed by resolution of the Board of Directors. Each series of preferred stock that we offer under this prospectus will, when issued, be fully paid and nonassessable and will not have, or be subject to, any preemptive or similar rights.

The applicable prospectus supplement(s) will describe the following terms of the series of preferred stock in respect of which this prospectus is being delivered:

- the title and stated value of the preferred stock;
- the number of shares of the preferred stock offered, the liquidation preference per share and the purchase price of the preferred stock;
- the dividend rate(s), period(s) and/or payment date(s) or the method(s) of calculation for dividends;
- whether dividends shall be cumulative or non-cumulative and, if cumulative, the date from which dividends on the preferred stock shall accumulate;
- the procedures for any auction and remarketing, if any, for the preferred stock;
- the provisions for a sinking fund, if any, for the preferred stock;
- the provisions for redemption, if applicable, of the preferred stock;
- any listing of the preferred stock on any securities exchange or market;
- the terms and conditions, if applicable, upon which the preferred stock will be convertible into common stock or another series of our preferred stock, including the conversion price (or its manner of calculation) and conversion period;
- the terms and conditions, if applicable, upon which preferred stock will be exchangeable into our debt securities, including the exchange price, or its manner of calculation, and exchange period;
- voting rights, if any, of the preferred stock; a discussion of any material and/or special United States federal income tax considerations applicable to the preferred stock;
- whether interests in the preferred stock will be represented by depositary shares;
- the relative ranking and preferences of the preferred stock as to dividend rights and rights upon liquidation, dissolution or winding up of our affairs;
- any limitations on issuance of any series of preferred stock ranking senior to or on a parity with the preferred stock as to dividend rights and rights upon liquidation, dissolution or winding up of our affairs; and
- any other specific terms, preferences, rights, limitations or restrictions on the preferred stock.

Unless otherwise specified in the prospectus supplement, the preferred stock will, with respect to dividend rights and rights upon liquidation, dissolution or winding up of Discovery rank:

- senior to all classes or series of our common stock, and to all equity securities issued by us the terms of which specifically provide that such equity securities rank junior to the preferred stock with respect to dividend rights or rights upon the liquidation, dissolution or winding up of us;
- on a parity with all equity securities issued by us that do not rank senior or junior to the preferred stock with respect to dividend rights or rights upon the liquidation, dissolution or winding up of us; and
- junior to all equity securities issued by us the terms of which do not specifically provide that such equity securities rank on a parity with or junior to the preferred stock with respect to dividend rights or rights upon the liquidation, dissolution or winding up of us (including any entity with which we may be merged or consolidated or to which all or substantially all of our assets may be transferred or which transfers all or substantially all of our assets).

As used for these purposes, the term “equity securities” does not include convertible debt securities.

Transfer Agent and Registrar

The transfer agent and registrar for any series of preferred stock will be set forth in the applicable prospectus supplement.

DESCRIPTION OF COMMON STOCK

This description of our common stock is a summary. You should keep in mind, however, that it is our Restated Certificate of Incorporation and our By-Laws, and not this summary, which define any rights you may acquire as a stockholder. There may be other provisions in such documents which are also important to you. You should read such documents for a full description of the terms of our capital stock, along with the applicable provisions of Delaware law.

We currently have authorized 180,000,000 shares of common stock, par value \$0.001 per share. As of June 3, 2008, there were 96,693,377 shares of common stock outstanding, which does not include:

- 13,880,283 shares of common stock issuable upon exercise of options outstanding as of June 3, 2008, at a weighted average exercise price of \$4.23 per share;
- 7,164,196 shares of common stock issuable upon exercise of warrants outstanding as of June 3, 2008, at a weighted average exercise price of \$4.71;
- 5,170,024 shares of common stock reserved for potential future issuance pursuant to the 2006 CEFF.
- an indeterminate number of shares of common stock issuable under our shelf registration statement on Form S-3 (No. 333-128929) dated October 11, 2005;
- 55,913 shares of common stock issuable upon the vesting of restricted stock awards outstanding as of June 3, 2008;
- 4,695,625 shares of common stock available for future grant under our 2007 Long-Term Incentive Plan; and
- 169,756 shares of common stock reserved for potential future issuance pursuant to a 401(k) Plan, as of June 3, 2008.

Subject to any preferential rights of any preferred stock created by our Board of Directors, as a holder of our common stock you are entitled to such dividends as our Board of Directors may declare from time to time out of funds that we can legally use to pay dividends. The holders of common stock possess exclusive voting rights, except to the extent our Board of Directors specifies voting power for any preferred stock that, in the future, may be issued.

As a holder of our common stock, you are entitled to one vote for each share of common stock and do not have any right to cumulate votes in the election of directors. Upon our liquidation, dissolution or winding-up, you will be entitled to receive on a proportionate basis any assets remaining after provision for payment of creditors and after payment of any liquidation preferences to holders of preferred stock. Holders of our common stock have no preemptive rights and no conversion rights or other subscription rights. There are no redemption or sinking fund provisions applicable to our common stock. All the outstanding shares of common stock are, and the shares offered by this prospectus, when issued and paid for, will be, validly issued, fully paid and nonassessable. Our common stock is quoted on The Nasdaq Global Market under the symbol "DSCO."

Stockholder Rights Plan

The summary description of the Rights set out herein does not purport to be complete, and is qualified in its entirety by reference to the terms and provisions of our Shareholder Rights Agreement, dated as of February 6, 2004.

On February 6, 2004, our Board of Directors adopted a shareholder rights agreement (the Rights Agreement). Pursuant to the Rights Agreement our Board of Directors (i) declared that each stockholder of record as of the close of business on February 6, 2004, would be issued a dividend of one preferred stock purchase right (a "Right") for each share of our common stock held by such stockholder and (ii) determined that each share of common stock issued by us after such date through the Final Expiration Date (as defined below) shall be issued with a tandem Right. Each Right represents the right to purchase one ten-thousandth of a share of our Series A Junior Participating Cumulative Preferred Stock ("Series A Preferred") at an exercise price equal to \$50 per Right (as the same may be adjusted, the "Exercise Price"). The Rights shall be evidenced by certificates for our common stock until the earlier to occur of:

- 10 days following a public announcement that a person or group of affiliated or associated persons (with certain exceptions, an "Acquiring Person") have acquired beneficial ownership of 15% or more of the outstanding shares of our common stock; and
- 10 business days (or such later date as may be determined by action of the Board of Directors before such time as any person or group of affiliated persons becomes an Acquiring Person) following the commencement of, or announcement of an intention to make, a tender offer or exchange offer the consummation of which would result in the beneficial ownership by a person or group of 15% or more of the outstanding shares of Common Stock (the earlier of such dates being called the "Distribution Date").

The Rights are not exercisable until the Distribution Date. Until a Right is exercised, the holder thereof, as such, will have no rights as a Discovery stockholder, including, without limitation, the right to vote or to receive dividends.

The Rights will expire upon the close of business on February 6, 2014 (the "Final Expiration Date"), unless the Rights are earlier redeemed or exchanged by us, in each case as described below.

The shares of Series A Preferred purchasable upon exercise of the Rights will be entitled, when, as and if declared, to a minimum preferential quarterly dividend payment of 10,000 times the per share amount of dividends declared on our common stock. If no common stock dividend is declared in a quarter, a preferred stock quarterly dividend of \$1.00 per share will be required. Upon our liquidation, holders of Series A Preferred will be entitled to a preferential distribution payment of at least 10,000 times the payment made per share of common stock. Each share of Series A Preferred will entitle the holder to 10,000 votes, voting together with our common stock. Upon any merger, consolidation or other transaction in which shares of our common stock are converted or exchanged, the holders of Series A Preferred will be entitled to receive 10,000 times the amount of consideration received per share of our common stock in respect of such transaction. The Rights are protected by customary anti-dilution provisions.

Because of the nature of the Series A Preferred dividend and liquidation rights, the fair market value of the one ten-thousandth of a share of Series A Preferred purchasable upon exercise of each Right should approximate the fair market value of one share of our common stock. If any person or group of affiliated or associated persons becomes an Acquiring Person, each holder of a Right, (other than Rights beneficially owned by the Acquiring Person, which become void), will have the right to receive upon exercise and payment of the then current Exercise Price, that number of shares of our common stock having a market value of two times the Exercise Price.

If, after a person or group has become an Acquiring Person, we are acquired in a merger or other business combination transaction, or 50% or more of our consolidated assets or earning power are sold, proper provision will be made so that each holder of a Right (other than Rights beneficially owned by an Acquiring Person, which become void) will thereafter have the right to receive, upon exercise at the then current Exercise Price, that number of shares of common stock of the person with whom we engaged in the foregoing transaction (or its parent), which at the time of such transaction will have a market value of two times the Exercise Price. In lieu of exercise, our Board of Directors may exchange the Rights (other than Rights owned by an Acquiring Person, which become void), in whole or in part, for such securities or other property or rights as the Board may determine, including any class or series of our common stock or preferred stock.

At any time before the time an Acquiring Person becomes such, our Board of Directors may redeem the Rights in whole, but not in part, at a price of \$.001 per Right, subject to adjustment.

We may amend the Rights to the extent and on the conditions set out in the Rights Agreement.

Anti-Takeover Provisions

As a corporation organized under the laws of the State of Delaware, we are subject to Section 203 of the General Corporation Law of the State of Delaware, which restricts our ability to enter into business combinations with an interested stockholder or a stockholder owning 15% or more of our outstanding voting stock, or that stockholder's affiliates or associates, for a period of three years. These restrictions do not apply if:

- before becoming an interested stockholder, our Board of Directors approves either the business combination or the transaction in which the stockholder becomes an interested stockholder;
- upon consummation of the transaction in which the stockholder becomes an interested stockholder, the interested stockholder owns at least 85% of our voting stock outstanding at the time the transaction commenced, subject to exceptions; or
- on or after the date a stockholder becomes an interested stockholder, the business combination is both approved by our Board of Directors and authorized at an annual or special meeting of our stockholders by the affirmative vote of at least two-thirds of the outstanding voting stock not owned by the interested stockholder.

Number of Directors; Removal

Our By-Laws provide that our Board of Directors shall consist of at least three directors and may consist of such larger number as may be determined, from time-to-time, by the Board of Directors. Our By-laws provide that directors may be removed with or without cause by the affirmative vote of holders of a majority of the total voting power of all outstanding securities.

This provision and the Board of Directors' right to issue shares of our preferred stock from time to time, in one or more classes or series without stockholder approval are intended to enhance the likelihood of continuity and stability in the composition of the policies formulated by our Board of Directors. These provisions are also intended to discourage some tactics that may be used in proxy fights.

Transfer Agent and Registrar

The Transfer Agent and Registrar for our common stock is Continental Stock Transfer & Trust Company.

DESCRIPTION OF WARRANTS

Outstanding Warrants

As of June 3, 2008, there are 7,164,196 shares of common stock issuable upon exercise of warrants outstanding, at a weighted average exercise price of \$4.71.

We may issue, in one or more series, debt warrants to purchase debt securities, as well as equity warrants to purchase preferred stock or common stock. The warrants may be issued independently or together with any securities and may be attached to or separate from the securities. If the warrants are issued pursuant to warrant agreements, we will so specify in the prospectus supplement relating to the warrants being offered pursuant to the prospectus supplement. While the following the terms described below will apply generally to any warrants we may offer, we will describe the particular terms of any series of warrants in the applicable prospectus supplement. The terms of any warrants offered under a prospectus supplement for a particular series of warrants may specify different or additional terms than those specified below.

Debt Warrants

The applicable prospectus supplement will describe the terms of debt warrants offered, the warrant agreement relating to the debt warrants and the debt warrant certificates representing the debt warrants, including the following:

- the title of the debt warrants;
- the aggregate number of the debt warrants;
- the price or prices at which the debt warrants will be issued;
- the designation, aggregate principal amount and terms of the debt securities purchasable upon exercise of the debt warrants, and the procedures and conditions relating to the exercise of the debt warrants;
- the designation and terms of any related debt securities with which the debt warrants are issued, and the number of the debt warrants issued with each debt security;
- the principal amount of debt securities purchasable upon exercise of each debt warrant;
- the date on which the right to exercise the debt warrants will commence, and the date on which this right will expire;
- the maximum or minimum number of debt warrants which may be exercised at any time;
- a discussion of any material federal income tax considerations; and
- any other terms of the debt warrants and terms, procedures and limitations relating to the exercise of debt warrants.

Debt warrant certificates will be exchangeable for new debt warrant certificates of different denominations, and debt warrants may be exercised at the corporate trust office of the warrant agent or any other office indicated in the prospectus supplement, by delivering the properly completed and duly executed warrant certificate and paying the required amount to the warrant agent in immediately available funds. Prior to the exercise of their debt warrants, holders of debt warrants will not have any of the rights of holders of the debt securities purchasable upon exercise and will not be entitled to payment of principal of or any premium, if any, or interest on the debt securities purchasable upon exercise.

Equity Warrants

The applicable prospectus supplement will describe the following terms of equity warrants offered:

- the title of the equity warrants;
- the securities (i.e., preferred stock or common stock) for which the equity warrants are exercisable;
- the price or prices at which the equity warrants will be issued;
- if applicable, the designation and terms of the preferred stock or common stock with which the equity warrants are issued, and the number of equity warrants issued with each share of preferred stock or common stock; and
- any other terms of the equity warrants, including terms, procedures and limitations relating to the exchange and exercise of equity warrants.

Holders of equity warrants will not be entitled, by virtue of being such holders, to vote, consent, receive dividends, receive notice as stockholders with respect to any meeting of stockholders for the election of our directors or any other matter, or to exercise any rights whatsoever as our stockholders.

The exercise price payable and the number of shares of common stock or preferred stock purchasable upon the exercise of each equity warrant will be subject to adjustment in certain events, including the issuance of a stock dividend to holders of common stock or preferred stock or a stock split, reverse stock split, combination, subdivision or reclassification of common stock or preferred stock. In lieu of adjusting the number of shares of common stock or preferred stock purchasable upon exercise of each equity warrant, we may elect to adjust the number of equity warrants. No adjustments in the number of shares purchasable upon exercise of the equity warrants will be required until cumulative adjustments require an adjustment of at least 1% thereof. We may, at our option, reduce the exercise price at any time. No fractional shares will be issued upon exercise of equity warrants, but we will pay the cash value of any fractional shares otherwise issuable. Notwithstanding the foregoing, in case of any consolidation, merger, or sale or conveyance of our property as an entirety or substantially as an entirety, the holder of each outstanding equity warrant shall have the right to the kind and amount of shares of stock and other securities and property, including cash, receivable by a holder of the number of shares of common stock or preferred stock into which the equity warrant was exercisable immediately prior to the transaction.

Exercise of Warrants

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

The warrants may be exercised as set forth in the prospectus supplement relating to the warrants offered. Upon receipt of payment and the taking of other action specified in the applicable prospectus supplement, we will, as soon as practicable, forward the securities purchasable upon exercise. If less than all of the warrants represented by such warrant certificate are exercised, a new warrant certificate will be issued for the remaining warrants.

Each warrant agent will act solely as our agent under the applicable warrant agreement and will not assume any obligation or relationship of agency or trust with any holder of any warrant. A single bank or trust company may act as warrant agent for more than one issue of warrants. A warrant agent will have no duty or responsibility in case of any default by us under the applicable warrant agreement or warrant, including any duty or responsibility to initiate any proceedings at law or otherwise, or to make any demand upon us. Any holder of a warrant may, without the consent of the related warrant agent or the holder of any other warrant, enforce by appropriate legal action its right to exercise, and receive the securities purchasable upon exercise of, its warrants.

PLAN OF DISTRIBUTION

We may sell the securities being offered by us in this prospectus pursuant to underwritten public offerings, negotiated transactions, block trades or any combination of such methods. We may sell the securities to or through underwriters, dealers, agents or directly to one or more purchasers. We and our agents reserve the right to accept and to reject in whole or in part any proposed purchase of securities. A prospectus supplement or post-effective amendment, which we will file each time we effect an offering of any securities, will provide the names of any underwriters, dealers or agents, if any, involved in the sale of such securities, and any applicable fees, commissions, or discounts to which such persons shall be entitled to in connection with such offering.

We and our agents, dealers and underwriters, as applicable, may sell the securities being offered by us in this prospectus from time to time in one or more transactions at:

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

We may determine the price or other terms of the securities offered under this prospectus by use of an electronic auction. We will describe how any auction will determine the price or any other terms, how potential investors may participate in the auction and the nature of the underwriters' obligations in the applicable prospectus supplement or amendment.

We may solicit direct offers to purchase securities. We may also designate agents from time to time to solicit offers to purchase securities. Any agent that we designate, who may be deemed to be an underwriter as that term is defined in the Securities Act, may then resell such securities to the public at varying prices to be determined by such agent at the time of resale.

We may engage in at the market offerings of our common stock. An at the market offering is an offering of our common stock at other than a fixed price to or through a market maker. We shall name any underwriter that we engage for an at the market offering in a post-effective amendment to the registration statement containing this prospectus. We shall also describe any additional details of our arrangement with such underwriter, including commissions or fees paid, or discounts offered, by us and whether such underwriter is acting as principal or agent, in the related prospectus supplement.

If we use underwriters to sell securities, we will enter into an underwriting agreement with the underwriters at the time of the sale to them, which agreement shall be filed as an exhibit to the related prospectus supplement. Underwriters may also receive commissions from purchasers of the securities. Underwriters may also use dealers to sell securities. In such an event, the dealers may receive compensation in the form of discounts, concessions or commissions from the underwriters and/or commissions from the purchasers for whom they may act as agents.

Underwriters, dealers, agents and other persons may be entitled, under agreements that may be entered into with us, to indemnification by us against certain civil liabilities, including liabilities under the Securities Act or to contribution with respect to payments which they may be required to make in respect of such liabilities. Underwriters and agents may engage in transactions with, or perform services for, us in the ordinary course of business.

If so indicated in the applicable prospectus supplement, we may authorize underwriters, dealers or other persons to solicit offers by certain institutions to purchase the securities offered by us under this prospectus pursuant to contracts providing for payment and delivery on a future date or dates. The obligations of any purchaser under these contracts will be subject only to those conditions described in the applicable prospectus supplement, and the prospectus supplement will set forth the price to be paid for securities pursuant to those contracts and the commissions payable for solicitation of the contracts.

Any underwriter may engage in over-allotment, stabilizing and syndicate short covering transactions and penalty bids in accordance with Regulation M of the Exchange Act. Over-allotment involves sales in excess of the offering size, which create a short position. Stabilizing transactions involve bids to purchase the underlying security so long as the stabilizing bids do not exceed a specified maximum. Syndicate short covering transactions involve purchases of securities in the open market after the distribution has been completed in order to cover syndicate short positions. Penalty bids permit the underwriters to reclaim selling concessions from dealers when the securities originally sold by such dealers are purchased in covering transactions to cover syndicate short positions. These transactions may cause the price of the securities sold in an offering to be higher than it would otherwise be. These transactions, if commenced, may be discontinued by the underwriters at any time.

Our common stock is quoted on Nasdaq Global Market under the symbol "DSCO." The other securities are not listed on any securities exchange or other stock market and, unless we state otherwise in the applicable prospectus supplement, we do not intend to apply for listing of the other securities on any securities exchange or other stock market. Any underwriters to whom we sell securities for public offering and sale may make a market in the securities that they purchase, but the underwriters will not be obligated to do so and may discontinue any market making at any time without notice. Accordingly, we give you no assurance as to the development or liquidity of any trading market for the securities.

The anticipated date of delivery of the securities offered hereby will be set forth in the applicable prospectus supplement relating to each offering.

In order to comply with certain state securities laws, if applicable, the securities may be sold in such jurisdictions only through registered or licensed brokers or dealers. In certain states, the securities may not be sold unless the securities have been registered or qualified for sale in such state or an exemption from regulation or qualification is available and is complied with. Sales of securities must also be made by us in compliance with all other applicable state securities laws and regulations.

We shall pay all expenses of the registration of the securities.

EXPERTS

The consolidated financial statements of Discovery incorporated by reference in Discovery Laboratories, Inc. Annual Report (Form 10-K) for the year ended December 31, 2007, and the effectiveness of Discovery's internal control over financial reporting as of December 31, 2007 have been audited by Ernst & Young LLP, independent registered public accounting firm, as set forth in their reports thereon, incorporated by reference therein, and incorporated herein by reference. Such consolidated financial statements are incorporated herein by reference in reliance upon such reports given on the authority of such firm as experts in accounting and auditing.

LEGAL MATTERS

If and when offered, the validity of the securities being registered hereunder will be passed upon for us by Dickstein Shapiro LLP.

WHERE YOU CAN FIND MORE INFORMATION

We file annual, quarterly and periodic reports, proxy statements and other information with the SEC. You may read and copy any materials that we file with the SEC at the SEC's Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the Public Reference Room by calling the SEC at 1-800-SEC-0330. Many of our SEC filings are also available to the public from the SEC's Website at "<http://www.sec.gov>." We make available free of charge our annual, quarterly and current reports, proxy statements and other information upon request. To request such materials, please send an e-mail to ir@DiscoveryLabs.com or contact John G. Cooper, our Executive Vice President, Chief Financial Officer, at the following address or telephone number: Discovery Laboratories, Inc., 2600 Kelly Road, Suite 100, Warrington, Pennsylvania 18976, Attention: John G. Cooper; (215) 488-9300. Exhibits to the documents will not be sent, unless those exhibits have specifically been incorporated by reference in this prospectus.

We maintain a Website at "http://www.DiscoveryLabs.com". Our Website and the information contained therein or connected thereto are not incorporated into this Registration Statement.

We have filed with the SEC a registration statement on Form S-3 under the Securities Act relating to the securities we are offering by this prospectus. This prospectus does not contain all of the information set forth in the registration statement and the exhibits and schedules to the registration statement. Please refer to the registration statement and its exhibits and schedules for further information with respect to us and our securities. Statements contained in this prospectus as to the contents of any contract or other document are not necessarily complete and, in each instance, we refer you to the copy of that contract or document filed as an exhibit to the registration statement. You may read and obtain a copy of the registration statement and its exhibits and schedules from the SEC, as described in the preceding paragraph.

INFORMATION INCORPORATED BY REFERENCE

The SEC allows us to "incorporate by reference" the information we file with them, which means that we can disclose important information to you by referring you to those documents. The information incorporated by reference is considered to be part of this prospectus, and information that we file later with the SEC will automatically update and supersede this information. We incorporate by reference the documents filed with SEC listed below:

1. Our Annual Report on Form 10-K for the fiscal year ended December 31, 2007, filed on March 14, 2008;
2. Our Quarterly Report on Form 10-Q for the quarter ended March 31, 2008, filed on May 9, 2008;
3. Our Current Reports on Form 8-K filed with the SEC on January 3, 2008 and February 15, 2008 (excluding the matters in Item 2.02 and Exhibit 99.1 therein, which are not incorporated by reference herein), April 3, 2008, April 11, 2008, May 2, 2008, May 8, 2008(excluding the matters in Item 2.02 and Exhibit 99.1 therein, which are not incorporated by reference herein), May 19, 2008, May 28, 2008, May 29, 2008, and June 2, 2008;
4. The description of our common stock contained in our Registration Statement on Form 8-A filed with the SEC on July 13, 1995; and
5. All documents we have filed with the SEC pursuant to Sections 13(a), 13(c), 14 or 15(d) of the Exchange Act after the date of this registration statement and before the effectiveness of the registration statement, as well as after the date of this prospectus and before the termination of this offering, shall be deemed to be incorporated by reference into this prospectus and to be a part of this prospectus from the date of the filing of the documents.

All reports and other documents subsequently filed by us with the SEC pursuant to Sections 13(a), 13(c), 14, or 15(d) of the Securities Exchange Act of 1934 after the date of this prospectus and before the termination of the offering shall be deemed to be incorporated by reference in this prospectus and to be a part of this prospectus from the date of filing of such reports and documents. This prospectus also incorporates by reference any documents that we file with the SEC after the date of the initial registration statement and before the effectiveness of the registration statement. Any statement contained in any document incorporated or deemed to be incorporated by reference herein shall be deemed to be modified or superseded for purposes of this prospectus to the extent that a statement contained in this prospectus or in any other subsequently filed document which also is or is deemed to be incorporated by reference in this prospectus modifies or supersedes such statement. Any statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this prospectus.

You may request a copy of these filings, at no cost, by sending an e-mail to ir@DiscoveryLabs.com and requesting any one or more of such filings or by contacting John G. Cooper, our Executive Vice President, Chief Financial Officer, at the following address or telephone number: Discovery Laboratories, Inc., 2600 Kelly Road, Suite 100, Warrington, Pennsylvania 18976-3622, Attention: John G. Cooper; (215) 488-9300. Exhibits to the documents will not be sent, unless those exhibits have specifically been incorporated by reference in this prospectus.

\$150,000,000



Discovery Laboratories, Inc.

Debt Securities, Preferred Stock and Common Stock,
Debt Warrants and Equity Warrants

No dealer, salesperson or other person is authorized to provide you with information or to represent anything not contained in this prospectus. You must not rely on any unauthorized information or representations. We are offering to sell, and seeking offers to buy, only the securities of Discovery Laboratories, Inc. covered by this prospectus, and only under circumstances and in jurisdictions where it is lawful to do so. The information contained in this prospectus is current only as of its date, regardless of the time of delivery of this prospectus or of any sale of the shares.

June 18, 2008

27,500,000 Shares of Common Stock

Warrants to Purchase 13,750,000 Shares of Common Stock



PROSPECTUS SUPPLEMENT

LAZARD CAPITAL MARKETS

February 18, 2010
