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Registration No. 333-165899

Prospectus Supplement
(to Prospectus dated April 22, 2010)

$44,000,000 of Shares
Common Stock

We have entered into an amendment to our existing sales agreement with Cantor Fitzgerald & Co. relating to shares of our common stock offered by this prospectus supplement and the accompanying prospectus. In accordance with the terms of the sales agreement, as amended, we may offer and sell shares of our common stock, $0.001 par value per share, having an aggregate offering price of up to $44.0 million from time to time through Cantor Fitzgerald & Co. acting as agent.

Our common stock is listed on the NASDAQ Global Market under the symbol "CLDX." The last reported sale price of our common stock on the NASDAQ Global Market on September 18, 2012 was $6.43 per share.

Sales of our common stock, if any, under this prospectus supplement and the accompanying prospectus may be made in sales deemed to be "at-the-market" equity offerings as defined in Rule 415 promulgated under the Securities Act of 1933, as amended, including sales made directly on or through the NASDAQ Global Market, the existing trading market for our common stock, sales made to or through a market maker other than on an exchange or otherwise, in negotiated transactions at market prices prevailing at the time of sale or at prices related to such prevailing market prices, and/or any other method permitted by law. Cantor Fitzgerald & Co. will act as sales agent on a commercially reasonable basis consistent with its normal trading and sales practices. There is no arrangement for funds to be received in any escrow, trust or similar arrangement.

Cantor Fitzgerald & Co. will be entitled to compensation at a fixed commission rate of 3.0% of the gross sales price per share sold. In connection with the sale of the common stock on our behalf, Cantor Fitzgerald & Co. may be deemed to be an "underwriter" within the meaning of the Securities Act of 1933, as amended, and the compensation of Cantor Fitzgerald & Co. may be deemed to be underwriting commissions or discounts.

Before buying shares of our common stock, you should carefully consider the risk factors described in "Risk Factors" beginning on page S-8 of this prospectus supplement, beginning on page 9 of the accompanying prospectus, and those contained in our incorporated documents, to read about factors you should consider before buying our securities.

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

The date of this prospectus supplement is September 24, 2012.

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You should rely only on the information we have provided or incorporated by reference in this prospectus supplement or in the accompanying prospectus. We have not authorized anyone to provide you with information different from that contained or incorporated by reference in this prospectus supplement or in the accompanying prospectus. This prospectus supplement is an offer to sell only the securities offered hereby, but only under circumstances and in jurisdictions where it is lawful to do so. You should assume that the information contained in this prospectus supplement and in the accompanying prospectus is accurate only as of their respective dates and that any information we have incorporated by reference is accurate only as of the date of the document incorporated by reference, regardless of the time of delivery of this prospectus supplement or the accompanying prospectus or any sale of securities.

ABOUT THIS PROSPECTUS

This document is in two parts. The first part is this prospectus supplement, which describes the terms of the offering and also adds to and updates information contained in the accompanying prospectus. The second part is the accompanying prospectus, which provides more general information. 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, on the other hand, you should rely on the information in this prospectus supplement. It is also important for you to read and consider all information contained in this prospectus supplement and the accompanying prospectus, including the documents we have referred you to in the section entitled "Where You Can Find More Information" below in this prospectus supplement. The information incorporated by reference is considered part of this prospectus supplement, and information we file later with the Securities and Exchange Commission, or SEC, may automatically update and supersede this information.

We further note that the representations, warranties and covenants made by us in any agreement that is filed as an exhibit to any document that is incorporated by reference herein were made solely for the benefit of the parties to such agreement, including, in some cases, for the purpose of allocating risk among the parties to such agreements, and should not be deemed to be a representation, warranty or covenant to you. Moreover, such representations, warranties or covenants were accurate only as of the date when made. Accordingly, such representations, warranties and covenants should not be relied on as accurately representing the current state of our affairs.

You should rely only on the information contained in this prospectus supplement or the accompanying prospectus, or incorporated by reference herein. We have not authorized, and the placement agent has not authorized, anyone to provide you with information that is different. The information contained in this prospectus supplement or the accompanying prospectus or incorporated by reference herein or therein is accurate only as of the respective dates thereof, regardless of the time of delivery of this prospectus supplement and the accompanying prospectus or of any sale of our common stock. It is important for you to read and consider all information contained in this prospectus supplement and the accompanying prospectus, including the documents incorporated by reference herein and therein, in making your investment decision. You should also read and consider the information in the documents to which we have referred you in the sections entitled "Where You Can Find More Information" and "Incorporation of Documents by Reference" in this prospectus supplement and in the accompanying prospectus.

We are offering to sell, and seeking offers to buy, shares of common stock only in jurisdictions where offers and sales are permitted. The distribution of this prospectus supplement and the accompanying prospectus and the offering of the common stock in certain jurisdictions may be restricted by law. Persons outside the United States who come into possession of this prospectus supplement and the accompanying prospectus must inform themselves about, and observe any restrictions relating to, the offering of the common stock and the distribution of this prospectus supplement and the accompanying prospectus outside the United States. This prospectus supplement and the accompanying prospectus do not constitute, and may not be used in connection with, an offer to sell, or a solicitation of an offer to buy, any securities offered by this prospectus supplement and the accompanying prospectus by any person in any jurisdiction in which it is unlawful for such person to make such an offer or solicitation.

The address of our principal executive office is Celldex Therapeutics, Inc., 119 Fourth Avenue, Needham, Massachusetts 02494, and our telephone number is (781) 433-0771. Our corporate website address is www.celldextherapeutics.com. The information contained on our website is not a part of, and should not be construed as being incorporated by reference into, this prospectus supplement.

Unless the context otherwise requires, "Celldex," the "Company," "we," "us," "our" and similar names refer to Celldex Therapeutics, Inc.

CAUTIONARY NOTE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus supplement, the accompanying prospectus, and the documents we have filed with the SEC that are incorporated herein by reference contain "forward-looking statements" within the meaning of the Private Securities Litigation Reform Act of 1995.

Words such as "may," "should," "anticipate," "estimate," "expect," "projects," "intends," "plans," "believes" and words and terms of similar substance used in connection with any discussion of future operating or financial performance, identify forward-looking statements. Forward-looking statements represent management's present judgment regarding future events and are subject to a number of risks and uncertainties that could cause actual results to differ materially from those described in the forward-looking statements. These risks include, but are not limited to, risks and uncertainties regarding our preclinical studies, our ability to conduct clinical trials of our product candidates and the results of such trials, as well as risks and uncertainties relating to future capital needs, economic conditions, dependence on our collaborators, litigation, government regulation and third-party reimbursement, markets, products, competition, intellectual property, services and prices, key employees and other factors. Please also see the discussion of risks and uncertainties under "Risk Factors" below, contained in the accompanying prospectus and otherwise incorporated by reference herein.

In light of these assumptions, risks and uncertainties, the results and events discussed in the forward-looking statements contained in this prospectus supplement, the accompanying prospectus or in any document incorporated herein by reference might not occur. Investors are cautioned not to place undue reliance on the forward-looking statements, which speak only as of the respective dates of this prospectus supplement, the accompanying prospectus or the date of the document incorporated by reference in this prospectus or the accompanying prospectus. We expressly disclaim any obligation to update or alter any forward-looking statements, whether as a result of new information, future events or otherwise, except as required by federal securities laws.

PROSPECTUS SUPPLEMENT SUMMARY

The following summary is qualified in its entirety by, and should be read together with, the more detailed information and financial statements and related notes thereto appearing elsewhere or incorporated by reference in this prospectus supplement and the accompanying prospectus. Before you decide to invest in our common stock, you should read the entire prospectus supplement and the accompanying prospectus carefully, including the risk factors and the financial statements and related notes included or incorporated by reference in this prospectus supplement and the accompanying prospectus.

Company Overview

We are a biopharmaceutical company focused on the development and commercialization of several immunotherapy technologies for the treatment of cancer and other difficult-to-treat diseases. Our lead drug candidates include rindopepimut (CDX-110), an immunotherapeutic vaccine in a pivotal Phase 3 study for the treatment of front-line glioblastoma and a Phase 2 study for the treatment of recurrent glioblastoma, CDX-011, an antibody-drug conjugate in a randomized Phase 2b study for the treatment of advanced breast cancer and CDX-1127, a therapeutic human antibody in a Phase 1 study for cancer indications. We have additional clinical and preclinical programs, including CDX-1401, an APC Targeting Technology™ program, CDX-301, an immune cell mobilizing agent and dendritic cell growth factor and CDX-1135, a molecule that inhibits a part of the immune system called the complement system.

Generally our strategy is to develop and demonstrate proof-of-concept for our drug candidates before leveraging their value through partnerships or, in appropriate situations, continuing late stage development through commercialization ourselves. Demonstrating proof-of-concept for a drug candidate generally involves bringing it through Phase 1 clinical trials and one or more Phase 2 clinical trials so that we are able to demonstrate, based on human trials, good safety data for the drug candidate and some data indicating its effectiveness. We thus leverage the value of our technology portfolio through corporate, governmental and non-governmental partnerships. This approach allows us to maximize the overall value of our technology and product portfolio while best ensuring the expeditious development of each individual product. Our current collaborations include the commercialization of an oral human rotavirus vaccine. We are exploring potential development and commercialization collaborations for certain drug candidates such as CDX-011 and CDX-1127. Furthermore, while we plan to retain the rights to develop and commercialize rindopepimut in North America, we are exploring potential partnership opportunities to commercialize rindopepimut outside of North America. Our drug candidates address market opportunities for which we believe current therapies are inadequate or non-existent.

Our products are derived from a broad set of complementary technologies which have the ability to utilize the human immune system and enable the creation of therapeutic agents. We are using these technologies to develop targeted immunotherapeutics comprised of antibodies, adjuvants and monotherapies and antibody-drug conjugates that prevent or treat cancer and other diseases that modify undesirable activity by the body's own proteins or cells. A number of our immunotherapeutic and antibody-drug conjugate drug candidates are in various stages of clinical trials. We expect that a large percentage of our research and development expenses will be incurred in support of our current and future clinical trial programs.

Rindopepimut (CDX-110)

Rindopepimut is an experimental therapeutic cancer vaccine that targets the tumor specific molecule epidermal growth factor receptor variant III, or EGFRvIII. EGFRvIII is a mutated form of the epidermal growth factor receptor, or EGFR, that is only expressed in cancer cells and not in normal tissue and can directly contribute to cancer cell growth. EGFRvIII has been shown by

polymerase chain reaction analysis to be expressed in approximately 31% of glioblastoma, or GB, tumors the most common and aggressive form of brain cancer. The rindopepimut vaccine is composed of the EGFRvIII peptide linked to a carrier protein called Keyhole Limpet Hemocyanin, or KLH, and administered together with the adjuvant GM-CSF. The Food and Drug Administration, or FDA, and the European Medicines Agency, or EMA, have both granted orphan drug designation for rindopepimut for the treatment of EGFRvIII expressing GB, and the FDA has also granted Fast Track designation.

Based on the results of the three prior Phase 2 trials, we have entered into a pivotal (registration) program for rindopepimut in patients with surgically resected EGFRvIII-positive GB. In December 2011, we initiated ACT IV, a pivotal, randomized, double-blind, controlled Phase 3 study of rindopepimut, expected to enroll up to 440 patients at over 150 centers worldwide to recruit approximately 374 patients with gross total resection to be included in the primary analysis. Our targeted patient accrual is 24 months and another 18 to 24 months of follow-up. In early 2013, we anticipate initiating a parallel, randomized, double-blind, controlled Phase 2 study in western Europe to optimize accrual of the pivotal (registration) study and to further support potential future commercial efforts in this region, assuming rindopepimut is approved by the EMA. We anticipate these two studies to cost over $60 million during their duration.

In addition, researchers at Stanford University are conducting a pilot trial of rindopepimut in pediatric patients with pontine glioma in an investigator sponsored trial. Patient screening is ongoing for this trial.

Glembatumumab Vedotin (CDX-011)

CDX-011 is an antibody-drug conjugate for the treatment of patients with glycoprotein NMB, or GPNMB, expressing advanced, refractory breast cancer. CDX-011 targets the protein GPNMB, which is over expressed in a variety of cancers, including breast cancer and melanoma. The FDA has granted Fast Track designation to CDX-011 for the treatment of advanced, refractory/resistant GPNMB-expressing breast cancer.

In December 2011, we completed enrollment of EMERGE, a randomized, multi-center Phase 2b study of CDX-011 in 120 patients with heavily pre-treated, advanced, GPNMB-positive breast cancer. Patients were randomized (2:1) to receive either CDX-011 or single-agent "Investigator's Choice" chemotherapy. Patients randomized to receive Investigator's Choice single-agent chemotherapy are allowed to cross over to CDX-011 following disease progression. Activity endpoints include response rate and progression-free survival.

In May 2012, we announced preliminary results from the EMERGE study which suggested that CDX-011 induces significant response rates compared to currently available therapies in patient subsets with advanced, refractory breast cancers with high GPNMB expression (expression in greater than 25% of tumor cells) and in patients with triple negative breast cancer. In the high GPNMB expressing patient population, treatment with CDX-011 resulted in a 32% overall response rate (includes confirmed and unconfirmed responses); whereas treatment with Investigator's Choice single-agent chemotherapy resulted in a 13% overall response rate. In patients with triple negative breast cancer across all levels of GPNMB expression where treatment options are extremely limited, CDX-011 resulted in an overall response rate of 21%; whereas treatment with Investigator's Choice single-agent chemotherapy resulted in an overall response rate of 0%. In patients with triple negative breast cancer who also highly express GPNMB, CDX-011 resulted in an overall response rate of 36%; whereas treatment with Investigator's Choice single-agent chemotherapy resulted in an overall response rate of 0%. In patients with high GPNMB in the CDX-011 arm, a trend of improvement in progression-free survival was observed. In patients with both triple negative breast cancer and high GPNMB expression,

a statistically significant progression-free survival benefit was observed. Mature data from the EMERGE study is expected to be presented in the fourth quarter of 2012.

CDX-1127

CDX-1127 is a human monoclonal antibody that targets CD27, a potentially important target for immunotherapy of various cancers. We have entered into licens agreements with the University of Southampton, UK for intellectual property related to uses of anti-CD27 antibodies and with Medarex (now a subsidiary of the Bristol-Myers Squibb Company) for access to the UltiMab technology to develop and commercialize human antibodies to CD27. CD27 acts downstream from CD40 and may provide a novel way to regulate the immune responses. CD27 is a co-stimulatory molecule on T cells and is over-expressed in certain lymphomas and leukemias. CDX-1127 is an agonist antibody designed to have two potential therapeutic mechanisms. CDX-1127 has been shown to activate immune cells that can target and eliminate cancerous cells in tumor-bearing mice and to directly kill or inhibit the growth of CD27-expressing lymphomas and leukemias in vitro and in viv Both mechanisms have been seen even at low doses in preclinical models.

In November 2011, we initiated an open label, dose-escalating Phase 1 study of CDX-1127 in patients with selected malignant solid tumors or hematologic cancers at multiple clinical sites in the United States. The Phase 1 study is designed to test five escalating doses of CDX-1127 to determine a Phase 2 dose for further development based on safety, tolerability, potential activity and immunogenicity. The study will accrue approximately 30 patients in each of the two arms, either selected refractory or relapsed solid tumors or lymphomas or leukemias known to express CD27. Patients will have received all appropriate prior therapies for their specific disease. The trial design incorporates both single dosing and multiple dosing regimens at each dose level. We expect to complete enrollment in the solid tumo arm by the end of 2012 and in the lymphoma and leukemia arm in the first half of 2013.

Other Clinical and Pre-Clinical Programs

We have several other programs in clinical and pre-clinical development. The status of the other programs that we currently believe are material to our business i summarized in the table below:

Product Candidate	Indication/Field	Stage of Clinical Development
CDX-1401	Multiple solid tumors	Phase 1
CDX-301	Cancer, autoimmune disease and transplant	Phase 1
CDX-1135	Renal disease	Preclinical

Rotarix

In 1997, we licensed our oral rotavirus strain to GlaxoSmithKline plc, or Glaxo, and Glaxo assumed responsibility for all subsequent clinical trials and all other development activities. Glaxo gained approval for its rotavirus vaccine, Rotarix®, in Mexico in 2004, which represented the first in a series of worldwide approvals and commercial launches for the product leading up to the approval in Europe in 2006 and in the U.S. in 2008. We licensed-in our rotavirus strain in 1995 and owe a license fee of 30% to Cincinnati Children's Hospital Medical Center, or CCH, on net royalties received from Glaxo. We are obligated to maintain a license with CCH with respect to the Glaxo agreement. The term of the Glaxo agreement is through the expiration of the last of the relevant patents covered by the agreement, although Glaxo may terminate the agreement upon 90 days prior written notice. The last relevant patent is scheduled to expire in December 2012. No additional milestones are due from Glaxo under this agreement.

In 2005, we entered into an agreement whereby an affiliate of Paul Royalty Fund II, L.P., or PRF, purchased an interest in the milestone payments and net royalties that we receive on the development and worldwide sales of Rotarix®. We have received a total of $60 million in milestone payments under the PRF agreement. No additional milestone payments are due from PRF under the agreement. We would retain approximately 65% of the royalties on worldwide sales of Rotarix if PRF receives 2.45 times the aggregate cash payments of $60 million it made to us prior to December 2012. We do not expect this to occur.

Corporate Information

We are a Delaware corporation organized in 1983. On March 7, 2008, a wholly-owned subsidiary of Celldex (formerly named AVANT Immunotherapeutics, Inc merged with and into what was then Celldex Therapeutics, Inc., a privately-held company. Through that merger we acquired the CDX-110 program. On October 1, 2009, a wholly-owned subsidiary of Celldex merged with and into CuraGen Corporation. As a result of that merger, we acquired the CDX-011 program. On December 31, 2009, CuraGen Corporate was merged with and into Celldex and the separate existence of CuraGen ceased.

Our principal executive offices are located at 119 Fourth Avenue, Needham, Massachusetts 02494 and our telephone number is (781) 433-0771. Our corporate website is www.celldextherapeutics.com. The information on our website is not incorporated by reference into this prospectus.

THE OFFERING

Common stock we are offering pursuant to the prospectus supplement	Shares having an aggregate offering price of up to $44.0 million.
Common stock to be outstanding after this offering	65,596,495 shares
Manner of offering	"At-the-market" offering that may be made from time to time through our agent, Cantor Fitzgerald & Co. See "Plan of Distribution" beginning on page S-26.
Use of proceeds	We expect to use the net proceeds from this offering to fund clinical trials of our product candidates and for working capital and other general corporate purposes. See "Use of Proceeds" on page S-24 of this prospectus supplement.
Risk factors	This investment involves a high degree of risk. You should read the description of risks set forth under "Risk Factors" beginning on page S-8 of this prospectus supplement or otherwise incorporated by reference in this prospectus supplement for a discussion of factor to consider before deciding to purchase our common stock.
NASDAQ Global Market common stock symbol	CLDX

The number of shares of common stock to be outstanding after this offering in the table above is based on 58,753,571 shares of common stock outstanding as of June 30, 2012 and assumes the sale of shares having an aggregate offering price of $44.0 million at an assumed sale price of $6.43, which was the last reported sale price of our common stock on the NASDAQ Global Market on September 18, 2012. This number excludes, all as of June 30, 2012:

- 4,304,897 shares issuable upon the exercise of outstanding stock options with a weighted-average exercise price of $5.96 per share;
- 4,449,646 shares available for future issuance under our equity compensation plans; and
- 1,975,000 shares of common stock sold since June 30, 2012 which raised $10.6 million in net proceeds.

RISK FACTORS

An investment in our securities involves a high degree of risk. You should carefully consider the risks described under "Risk Factors" in the accompanying prospectus, our Annual Report on Form 10-K for the year ended December 31, 2011 and our Quarterly Reports on Form 10-Q for the fiscal quarters ended March 31, 2012 and June 30, 2012, respectively, as updated by any other document that we subsequently file with the Securities and Exchange Commission and that is incorporated by reference into this prospectus supplement, as well as the risks described below and all of the other information contained in this prospectus supplement and the accompanying prospectus, and incorporated by reference into this prospectus supplement and the accompanying prospectus, including our financial statements and related notes, before investing in our securities. If any of the possible events described in those sections or below actually occur, our business, business prospects, cash flow, results of operations or financial condition could be harmed. In this case, the trading price of our common stock could decline, and you might lose all or part of your investment in our common stock.

The following is a discussion of the risk factors that we believe are material to us at this time. These risks and uncertainties are not the only ones facing us and there may be additional matters that we are unaware of or that we currently consider immaterial. All of these could adversely affect our business, results of operations, financial condition and cash flows.

Risks Related to this Offering

We currently have no product revenue and will need to raise capital to operate our business in addition to funds we receive in this offering.

To date, we have generated no product revenue. Until, and unless, we complete clinical trials and further development, and receive approval from the FDA and other regulatory authorities for our product candidates, we cannot sell our drugs and will not have product revenue. Therefore, for the foreseeable future, we will have to fund all of our operations and development expenditures from cash on hand, equity or debt financings, licensing fees and grants. While the funds we receive in this offering will help fund our operations, additional financing will also be required. If we do not succeed in raising additional funds on acceptable terms, we might not be able to complete planned preclinical and clinical trials or obtain approval of any product candidates from the FDA and other regulatory authorities. In addition, we could be forced to discontinue product development, reduce or forego sales and marketing efforts, forego attractive business opportunities or curtail operations. Any additional sources of financing could involve the issuance of our equity securities, which would have a dilutive effect on our stockholders. No assurance can be given that additional financing will be available to us when needed on acceptable terms, or at all.

Management will have broad discretion as to the use of the proceeds from this offering, and we may not use the proceeds effectively.

Because we have not designated the amount of net proceeds from this offering to be used for any particular purpose, our management will have broad discretion as to the application of the net proceeds from this offering and could use them for purposes other than those contemplated at the time of the offering. Our management may use the net proceeds for corporate purposes that may not improve our financial condition or market value.

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

Because the price per share of our common stock being offered may be higher than the book value per share of our common stock, you may suffer substantial dilution in the net tangible book value of the common stock you purchase in this offering. See the section entitled "Dilution" below for a

more detailed discussion of the dilution you will incur if you purchase common stock in this offering. In addition, we have a significant number of options and restricted stock outstanding. If the holders of these securities exercise or convert them or become vested in them, as applicable, you may incur further dilution.

Sales of a significant number of shares of our common stock in the public markets, or the perception that such sales could occur, could depress the market price of our common stock.

Sales of a substantial number of shares of our common stock or other equity-related securities in the public markets could depress the market price of our common stock and impair our ability to raise capital through the sale of additional equity securities, including sales hereunder through Cantor. We cannot predict the effect that future sales of our common stock or other equity-related securities would have on the market price of our common stock.

Risks Related to our Capital Stock

Our history of losses and uncertainty of future profitability make our common stock a highly speculative investment.

We have had no commercial revenue to date from sales of our human therapeutic or vaccine products and cannot predict when we will have commercial revenue from such sales. We had an accumulated deficit of $232 million as of June 30, 2012. We expect to spend substantial funds to continue the research and development testing of our products that we have in the preclinical and clinical testing stages of development that have not been partnered.

In anticipation of FDA approval of these products, we will need to make substantial investments to establish sales, marketing, quality control, and regulatory compliance capabilities. These investments will increase if and when any of these products receive FDA approval. We cannot predict how quickly our lead products will progress through the regulatory approval process. As a result, we may continue to lose money for several years.

We cannot be certain that we will achieve or sustain profitability in the future. Failure to achieve profitability could diminish our ability to sustain operations, pay dividends on our common stock, obtain additional required funds and make required payments on our present or future indebtedness.

Our share price has been and could remain volatile.

The market price of our common stock has historically experienced and may continue to experience significant volatility. During 2012, our common stock traded as low as $2.65 and as high as $6.62. Our progress in developing and commercializing our products, the impact of government regulations on our products and industry, the potential sale of a large volume of our common stock by stockholders, our quarterly operating results, changes in general conditions in the economy or the financial markets and other developments affecting us or our competitors could cause the market price of our common stock to fluctuate substantially with significant market losses. If our stockholders sell a substantial number of shares of common stock, especially if those sales are made during a short period of time, those sales could adversely affect the market price of our common stock and could impair our ability to raise capital. In addition, in recent years, the stock market has experienced significant price and volume fluctuations. This volatility has affected the market prices of securities issued by many companies for reasons unrelated to their operating performance and may adversely affect the price of our common stock. In addition, we could be subject to a securities class action litigation as a result of volatility in the price of our stock, which could result in substantial costs and diversion of management's attention and resources and could harm our stock price, business, prospects, results of operations and financial condition.

The restrictive covenants contained in our credit agreement may limit our activities.

On December 30, 2010, we entered into a Loan and Security Agreement (the "Loan Agreement") with MidCap Financial, LLC (MidCap) pursuant to which we borrowed $10 million (the "Term Loan") from MidCap. In March 2011, we amended the Loan Agreement and borrowed an additional $5 million from General Electric Capital Corporation (GECC) (collectively with MidCap, the "Lenders") to increase the amount owed under the Term Loan to $15 million. Our obligations under the Term Loan are secured by a first priority lien upon and security interest in substantially all of our existing and after-acquired assets, excluding our intellectual property assets (the "Collateral"). Under the Term Loan, we are subject to specified affirmative covenants customary for loans of this type, including but not limited to the obligations to maintain good standing, provide various notices to the Lenders, deliver financial statements to the Lenders, maintain adequate insurance, promptly discharge all taxes, protect our intellectual property and protect the Collateral. We are also subject to certain negative covenants customary for loans of this type, including but not limited to prohibitions against certain mergers and consolidations, certain management and ownership changes constituting a "change of control," and the imposition of additional liens on Collateral or other of our assets, as well as prohibitions against additional indebtedness, certain dispositions of property, changes in our business, name or location, payment of dividends, prepayment of certain other indebtedness, certain investments or acquisitions, and certain transactions with affiliates, in each case subject to certain customary exceptions, including exceptions that allow us to enter into non-exclusive and/or exclusive licenses and similar agreements providing for the use of our intellectual property in collaboration with third parties provided certain conditions are met.

Failure to comply with the restrictive covenants in our Term Loan could accelerate the repayment of any debt outstanding under the Term Loan. Additionally, as a result of these restrictive covenants, we may be at a disadvantage compared to our competitors that have greater operating and financing flexibility than we do.

Our ability to use our net operating loss carryforwards will be subject to limitation and, under certain circumstances, may be eliminated.

Utilization of our net operating loss, or NOL, and research and development credit carryforwards may be subject to substantial annual limitation due to ownership change limitations that have occurred previously or that could occur in the future provided by Section 382 of the Internal Revenue Code of 1986, or Section 382, as well as similar state provisions. In general, an ownership change, as defined by Section 382, results from transactions increasing the ownership of certain shareholders or public groups in the stock of a corporation by more than 50 percentage points over a three-year period.

In October 2007, June 2009 and in December 2009, we experienced a change in ownership as defined by Section 382 of the Internal Revenue Code. Historically, we have raised capital through the issuance of capital stock on several occasions which, combined with shareholders' subsequent disposition of those shares, has resulted in three changes of control, as defined by Section 382. As a result of the ownership change in October 2007, utilization of its Federal NOLs is subject to an annual limitation. Any unused annual limitation may be carried over to later years, and the amount of the limitation may, under certain circumstances, be subject to adjustment if the fair value of the our net assets are determined to be below or in excess of the tax basis of such assets at the time of the ownership change, and such unrealized loss or gain is recognized during the five-year period after the ownership change. Subsequent ownership changes, as defined in Section 382, could further limit the amount of net operating loss carryforwards and research and development credits that can be utilized annually to offset future taxable income.

We have not undertaken a study to assess whether an ownership change or multiple ownership changes has occurred for (i) AVANT or CuraGen prior to our acquisitions, (ii) the Company on the

state level, (iii) the Company since June 2012, or (iv) research and development credits. If there has been an ownership change at any time since its formation, utilization of NOL or tax credit carryforwards would be subject to an annual limitation under Section 382.

Risks Related to our Business

We expect to incur future losses and we may never become profitable.

We have incurred operating losses of $43.4 million, $6.5 million and $36.9 million during 2011, 2010 and 2009, respectively, and expect to incur an operating loss in 2012. We believe that operating losses will continue beyond 2012 because we are planning to incur significant costs associated with the clinical development and manufacturing commercial supply of rindopepimut to prepare for the potential launch of rindopepimut. In addition, we are planning to incur significant costs in the clinical development of CDX-011, CDX-1127, CDX-1401, CDX-301 and CDX-1135. Our net losses have had and will continue to have an adverse effect on, among other things, our stockholders' equity, total assets and working capital. We expect that losses will fluctuate from quarter to quarter and year to year, and that such fluctuations may be substantial. We cannot predict when we will become profitable, if at all.

Our long term success depends heavily on our ability to fund and complete research and development activities for, and to commercialize, our lead drug candidate, rindopepimut, which we are developing internally.

While in the past we have typically focused on developing and demonstrating proof-of-concept for our product candidates by bringing such candidates through Phase 1 and one or more Phase 2 clincial trials, and then leveraging their value through partnerships, we have decided to fund and complete the research and development activities for rindopepimut ourselves. We plan to commercialize rindopepimut ourselves in North America and to find a partner to commercialize rindopepimut outside of North America. Therefore, we must allocate a significant portion of our time, personnel and financial resources to the development of rindopepimut. We initiated ACT IV, our pivotal Phase 3 clinical trial of rindopepimut, in December 2011. While we are targeting two years for patient accrual, it could take up to three years to enroll all the patients, and another 18 to 24 months of follow-up. We plan to initiate a parallel Phase 2 study in western Europe. We anticipate these two studies to cost over $60 million during their duration. Our management team lacks significant experience in completing Phase 3 clinical trials and bringing a drug through commercialization. If we face delays, difficulties or unanticipated costs in completing the development of rindopepimut, we will need substantial additional financing. Further, even if we complete the development of rindopepimut and gain marketing approvals from the FDA and comparable foreign regulatory authorities in a timely manner, we cannot be sure that rindopepimut will be commercially successful in the pharmaceutical market. If the results of clinical trials of rindopepimut, the anticipated or actual timing of marketing approvals for rindopepimut, or the market acceptance of rindopepimut, if approved, do not meet the expectations of investors or public market analysts, the market price of our common stock would likely decline.

We will need additional capital to fund our operations, including the development, manufacture and potential commercialization of our drug candidates. If we do not have or cannot raise additional capital when needed, we will be unable to develop and ultimately commercialize our drug candidates successfully.

We expect to incur significant costs as we develop our drug candidates. In particular, the continuing development and commercialization of rindopepimut requires additional capital beyond our current resources. As of June 30, 2012, we had cash, cash equivalents and marketable securities of $78.7 million.

We may take further steps to raise additional capital to fund our long-term liquidity needs. Our capital raising activities may include, but may not be limited to, one or more of the following:

- licensing of drug candidates with existing or new collaborative partners;
- possible business combinations;
- issuance of debt; or
- issuance of common stock or other securities via private placements or public offerings.

While we may continue to seek capital through a number of means, there can be no assurance that additional financing will be available on acceptable terms, if at all, and our negotiating position in capital-raising efforts may worsen as existing resources are used. There is also no assurance that we will be able to enter into further collaborative relationships. Additional equity financing may be dilutive to our stockholders; debt financing, if available, may involve significant cash payment obligations and covenants that restrict our ability to operate as a business; and licensing or strategic collaborations may result in royalties or other terms which reduce our economic potential from products under development. If we are unable to raise the funds necessary to meet our long-term liquidity needs, we may have to delay or discontinue the development of one or more programs, discontinue or delay on-going or anticipated clinical trials, license out programs earlier than expected, raise funds at significant discount or on other unfavorable terms, if at all, or sell all or part of our business.

Since June 30, 2012, we sold 1,975,000 shares of our common stock for aggregate net proceeds of approximately $10.6 million pursuant to our prior equity line with Cantor Fitzgerald & Co., which provided for the sale of up to 5,000,000 shares of our common stock from time to time into the open market at prevailing prices. As of September 18, 2012, there were no additional shares of common stock available for sale under the prior equity line.

We may be unable to manage one Phase 3 clinical trial or multiple late stage clinical trials for a variety of product candidates simultaneously.

As our current clinical trials progress, we may need to manage multiple late stage clinical trials simultaneously in order to continue developing all of our current products. Our management team does not have significant experience in completing late stage clinical trials and the management of late stage clinical trials is more complex and time consuming than early stage trials. Typically, early stage trials involve several hundred patients in no more than 10-30 clinical sites. Late stage (Phase 3) trials may involve up to several thousand patients in up to several hundred clinical sites and may require facilities in several countries. Therefore, the project management required to supervise and control such an extensive program is substantially larger than early stage programs. As the need for these resources is not known until some months before the trials begin, it is necessary to recruit large numbers of experienced and talented individuals very quickly. If the labor market does not allow this team to be recruited quickly, the sponsor is faced with a decision to delay the program or to initiate it with inadequate management resources. This may result in recruitment of inappropriate patients, inadequate monitoring of clinical investigators and inappropriate handling of data or data analysis. Consequently it is possible that conclusions of efficacy or safety may not be acceptable to permit filing of a BLA or NDA for any one of the above reasons or a combination of several.

We rely on third parties to plan, conduct and monitor our clinical tests, and their failure to perform as required would interfere with our product development.

We rely on third parties to conduct a significant portion of our clinical development activities. These activities include clinical patient recruitment and observation, clinical trial monitoring, clinical data management and analysis, safety monitoring and project management. We conduct project management and medical and safety monitoring in-house for some of our programs and rely on third

parties for the remainder of our clinical development activities. If any of these third parties fails to perform as we expect or if their work fails to meet regulatory standards, our testing could be delayed, cancelled or rendered ineffective.

The significant third parties who we currently rely on for clinical development activities include Novella Clinical Inc. for our ACT IV study. If Novella is unable to perform in a quality and timely manner, and at a feasible cost, ACT IV will face delays.

We may enter into collaboration agreements for the licensing, development and ultimate commercialization of some of our drug candidates including, where appropriate, for our lead drug candidates. In such cases, we will depend greatly on our third party collaborators to license, develop and commercialize such drug candidates, and they may not meet our expectations.

We are exploring potential co-development and commercialization partnerships for certain products, including rindopepimut for commercialization outside of North America, CDX-011 and CDX-1127. The process of identifying collaborators and negotiating collaboration agreements for the licensing, development and ultimate commercialization of some of our drug candidates may cause delays and increased costs. We may not be able to enter into collaboration agreements on terms favorable to us. Furthermore some of those agreements may give substantial responsibility over our drug candidates to the collaborator. Some collaborators may be unable or unwilling to devote sufficient resources to develop our drug candidates as their agreements require. They often face business risks similar to ours, and this could interfere with their efforts. Also, collaborators may choose to devote their resources to products that compete with ours. If a collaborator does not successfully develop any one of our products, we will need to find another collaborator to do so. The success of our search for a new collaborator will depend on our legal right to do so at the time and whether the product remains commercially viable.

If we enter into collaboration agreements for one or more of our lead drug candidates, the success of such drug candidates will depend in great part upon our and our collaborators' success in promoting them as superior to other treatment alternatives. We believe that our drug candidates can be proven to offer disease prevention and treatment with notable advantages over drugs in terms of patient compliance and effectiveness. However, there can be no assurance that we will be able to prove these advantages or that the advantages will be sufficient to support the successful commercialization of our drug candidates.

We may face delays, difficulties or unanticipated costs in establishing sales, distribution and manufacturing capabilities for our commercially ready products.

Our current plan is to retain, rather than license to a third party, all rights to rindopepimut in North America (and to explore partnership opportunities to commercialize rindopepimut outside of North America) and our APC Targeting Technology programs. As a result, we will have full responsibility for commercialization of these products if and when they are approved for sale. We currently lack the marketing, sales and distribution capabilities that we will need to carry out this strategy. To market any of our products directly, we must develop a substantial marketing and sales force with technical expertise and a supporting distribution capability. We have little expertise in this area, and we may not succeed. We may find it necessary to enter into strategic partnerships on uncertain but potentially unfavorable terms to sell, market and distribute our products when they are approved for sale.

Some of our products are difficult to manufacture, especially in large quantities, and we have not yet developed commercial scale manufacturing processes for any of our products. We do not currently plan to develop internal manufacturing capabilities to produce any of our products at commercial scale if they are approved for sale. To the extent that we choose to market and distribute these products

ourselves, this strategy will make us dependent on other companies to produce our products in adequate quantities, in compliance with regulatory requirements, and at a competitive cost. We may not find third parties capable of meeting those manufacturing needs.

Our drug candidates are subject to extensive regulatory scrutiny.

All of our drug candidates are at various stages of development and commercialization and our activities and drug candidates are significantly regulated by a number of governmental entities, including the FDA in the United States and by comparable authorities in other countries. These entities regulate, among other things, the manufacture, testing, safety, effectiveness, labeling, documentation, advertising and sale of drugs and drug candidates. We or our partners must obtain regulatory approval for a drug candidate in all of these areas before we can commercialize the drug candidate. Product development within this regulatory framework takes a number of years and involves the expenditure of substantial resources. This process typically requires extensive preclinical and clinical testing, which may take longer or cost more than we anticipate, and may prove unsuccessful due to numerous factors. Many drug candidates that initially appear promising ultimately do not reach the market because they are found to be unsafe or ineffective when tested. Companies in the pharmaceutical, biotechnology and vaccines industries have suffered significant setbacks in advanced clinical trials, even after obtaining promising results in earlier trials. Our inability to commercialize a drug candidate would impair our ability to earn future revenues.

If our products do not pass required tests for safety and effectiveness, we will not be able to derive commercial revenue from them.

In order to succeed, we will need to derive commercial revenue from the products we have under development. The FDA has not approved our rindopepimut, CDX-011 or CDX-1127 drug candidates or any of our other products for sale to date. Our drug candidates are in various stages of preclinical and clinical testing. Preclinical tests are performed at an early stage of a product's development and provide information about a product's safety and effectiveness on laboratory animals. Preclinical tests can last years. If a product passes its preclinical tests satisfactorily, and we determine that further development is warranted, we would file an IND application for the product with the FDA, and if the FDA gives its approval we would begin Phase 1 clinical tests. Phase 1 testing generally lasts between 6 and 24 months. If Phase 1 test results are satisfactory and the FDA gives its approval, we can begin Phase 2 clinical tests. Phase 2 testing generally lasts between 6 and 36 months. If Phase 2 test results are satisfactory and the FDA gives its approval, we can begin Phase 3 pivotal studies. Phase 3 studies generally last between 12 and 48 months. Once clinical testing is completed and a new drug application is filed with the FDA, it may take more than a year to receive FDA approval.

In all cases we must show that a pharmaceutical product is both safe and effective before the FDA, or drug approval agencies of other countries where we intend to sell the product, will approve it for sale. Our research and testing programs must comply with drug approval requirements both in the United States and in other countries, since we are developing our lead products with the intention to, or could later decide to, commercialize them both in the U.S. and abroad. A product may fail for safety or effectiveness at any stage of the testing process. A major risk we face is the possibility that none of our products under development will come through the testing process to final approval for sale, with the result that we cannot derive any commercial revenue from them after investing significant amounts of capital in multiple stages of preclinical and clinical testing.

Product testing is critical to the success of our products but subject to delay or cancellation if we have difficulty enrolling patients.

As our portfolio of potential products moves from preclinical testing to clinical testing, and then through progressively larger and more complex clinical trials, we will need to enroll an increasing number of patients with the appropriate characteristics. At times we have experienced difficulty enrolling patients and we may experience more difficulty as the scale of our clinical testing program increases. The factors that affect our ability to enroll patients are largely uncontrollable and include principally the following:

- the nature of the clinical test;
- the size of the patient population;
- patients' willingness to receive a placebo or less effective treatment on the control arm of a clinical study;
- the distance between patients and clinical test sites; and
- the eligibility criteria for the trial.

If we cannot enroll patients as needed, our costs may increase or it could force us to delay or terminate testing for a product.

We may have delays in completing our clinical trials and we may not complete them at all.

We have not completed the clinical trials necessary to obtain FDA approval to market rindopepimut, CDX-011 or any of our other products in development. We initiated a Phase 3 study of rindopepimut in December 2011 but we have not initiated Phase 3 studies for CDX-011 or any of our other products in development. Our management lacks significant experience in completing Phase 3 trials and bringing a drug through commercialization. Our rindopepimut Phase 3 trial, CDX-011 Phase 2b studies and planned clinical trials for other products in development may be delayed or terminated as a result of many factors, including the following:

- difficulty in enrolling patients in our clinical trials;
- patients failing to complete clinical trials due to dissatisfaction with the treatment, side effects or other reasons;
- failure by regulators to authorize us to commence a clinical trial;
- suspension or termination by regulators of clinical research for many reasons, including concerns about patient safety or failure of our contract manufacturers to comply with cGMP requirements;
- delays or failure of the FDA to remove the partial clinical hold on our CDX-011 studies;
- treatment candidates demonstrating a lack of efficacy during clinical trials;
- inability to continue to fund clinical trials or to find a partner to fund the clinical trials;
- competition with ongoing clinical trials and scheduling conflicts with participating clinicians; and
- delays in completing data collection and analysis for clinical trials.

Any delay or failure to complete clinical trials and obtain FDA approval for our drug candidates could have a material adverse effect on our cost to develop and commercialize, and our ability to generate revenue from, a particular drug candidate.

Any delay in obtaining regulatory approval would have an adverse impact on our ability to earn future revenues.

It is possible that none of the drug candidates that we develop will obtain the regulatory approvals necessary for us to begin commercializing them. The time required to obtain FDA and other approvals is unpredictable but often can take years following the commencement of clinical trials, depending upon the nature of the drug candidate. Any analysis we perform of data from clinical activities is subject to confirmation and interpretation by regulatory authorities, which could delay, limit or prevent regulatory approval. Any delay or failure in obtaining required approvals could have a material adverse effect on our ability to generate revenues from the particular drug candidate including, but not limited to, loss of patent term during the approval period. Furthermore, if we, or our partners, do not reach the market with our products before our competitors offer products for the same or similar uses, or if we, or our partners, are not effective in marketing our products, our revenues from product sales, if any, will be reduced.

We face intense competition in our development activities. We face competition from many companies in the United States and abroad, including a number of large pharmaceutical companies, firms specialized in the development and production of vaccines, adjuvants and vaccine and immunotherapeutic delivery systems and major universities and research institutions. The competitors for which we are aware have initiated a Phase 3 study or have obtained marketing approval for a potentially competitive drug include Alexion, Agenus, Baxter, BMS, Dendreon, Eli Lilly, GlaxoSmithKline, ImmunoGen, Merck, Pfizer, Roche, Sanofi-Aventis, Seattle Genetics, and Takeda. Most of our competitors have substantially greater resources, more extensive experience in conducting preclinical studies and clinical testing and obtaining regulatory approvals for their products, greater operating experience, greater research and development and marketing capabilities and greater production capabilities than those of ours. These companies might succeed in obtaining regulatory approval for competitive products more rapidly than we can for our products, especially if we experience any delay in obtaining required regulatory approvals.

Failure to comply with applicable regulatory requirements would adversely impact our operations.

Even after receiving regulatory approval, our products would be subject to extensive regulatory requirements, and our failure to comply with applicable regulatory requirements will adversely impact our operations. In the United States, the FDA requires that the manufacturing facility that produces a product meet specified standards, undergo an inspection and obtain an establishment license prior to commercial marketing. Subsequent discovery of previously unknown problems with a product or its manufacturing process may result in restrictions on the product or the manufacturer, including withdrawal of the product from the market. Failure to comply with the applicable regulatory requirements can result in fines, suspensions of regulatory approvals, product recalls, operating restrictions and criminal prosecution.

We depend greatly on the intellectual capabilities and experience of our key executives and scientists and the loss of any of them could affect our ability to develop our products.

The loss of Anthony S. Marucci, our President and Chief Executive Officer, or other key members of our staff, including Avery W. Catlin, our Chief Financial Officer, Dr. Thomas Davis, our Chief Medical Officer, Dr. Tibor Keler, our Chief Scientific Officer or Dr. Ronald Pepin, our Chief Business Officer, could harm us. We entered into employment agreements with Messrs. Marucci, Catlin, Davis, Keler and Pepin although an employment agreement as a practical matter does not guarantee retention of an employee. We also depend on our scientific and clinical collaborators and advisors, all of whom have outside commitments that may limit their availability to us. In addition, we believe that our future success will depend in large part upon our ability to attract and retain highly skilled scientific, managerial and marketing personnel, particularly as we expand our activities in clinical trials, the

regulatory approval process and sales and manufacturing. We routinely enter into consulting agreements with our scientific and clinical collaborators and advisors, key opinion leaders and heads of academic departments in the ordinary course of our business. We also enter into contractual agreements with physicians and institutions who recruit patients into our clinical trials on our behalf in the ordinary course of our business. Notwithstanding these arrangements, we face significant competition for this type of personnel from other companies, research and academic institutions, government entities and other organizations. We cannot predict our success in hiring or retaining the personnel we require for continued growth.

We rely on contract manufacturers over whom we have limited control. Should the cost, delivery and quality of clinical and commercial grade materials supplied by contract manufacturers vary to our disadvantage, our business operations could suffer significant harm.

We have limited experience in large scale manufacturing at our Fall River facility. We rely on sourcing from third-party manufacturers for suitable quantities of some of our clinical and commercial grade materials and certain filling and packaging essential to preclinical and clinical studies currently underway and to planned clinical trials in addition to those currently being conducted by third parties or us. The inability to have suitable quality and quantities of these essential materials produced in a timely manner would result in significant delays in the clinical development and commercialization of products, which could adversely affect our business, financial condition and results of operations.

For example, one lot of our CDX-011 product candidate being used in our on-going Phase 2b study was aseptically filled in 2009 by Formatech, a third party contract manufacturer. The CDX-011 lot from Formatech has passed all of the sterility testing performed during drug release and in subsequent stability studies. At the end of January 2012, we were notified by the FDA that because significant Good Manufacturing Practice (GMP) violations were uncovered during inspection of Formatech, our Phase 2b study for CDX-011 was being placed on partial clinical hold. The FDA uncovered these findings during their inspections of the Formatech facility between August to October 2010 and July to August 2011. These inspections began approximately one year after the CDX-011 drug product was filled at Formatech. Specifically, the FDA requested that no new patients be treated with CDX-011. However, patients already undergoing treatment with CDX-011 could continue treatment using vials of CDX-011 from the lot filled by Formatech, after such patients were informed of the potential risk and reconsented to continued participation in the study. The FDA has also agreed that patients in the Investigator's Choice, or IC, arm of the study who may become eligible to receive CDX-011 at the time of progression, may receive an older lot of CDX-011 until such time that the material is exhausted or expired. As such, this partial clinical hold is not expected to significantly impact the conduct or analysis of the Phase 2b study for purposes of determining next steps in our future development of CDX-011.

In addition, the FDA has agreed in concept that we could reprocess the remaining available vials of CDX-011 manufactured at Formatech at another cGMP contract manufacturer. The FDA's final decision regarding the acceptability of this reprocessing will be made upon review of data concerning the stability and sterility of the reprocessed vials of CDX-011. If we are unsuccessful at reprocessing the available drug product or if FDA does not approve the use of these reprocessed vials, we will need to manufacture new drug product for subsequent clinical studies for CDX-011, which may cause a delay in the initiation of a subsequent trial with CDX-011.

We also rely on collaborators and contract manufacturers to manufacture proposed products in both clinical and commercial quantities in the future. Our leading vaccine candidates require specialized manufacturing capabilities and processes.

We may face difficulty in securing commitments from U.S. and foreign contract manufacturers as these manufacturers could be unwilling or unable to accommodate our needs. Relying on foreign

manufacturers involves peculiar and increased risks, including the risk relating to the difficulty foreign manufacturers may face in complying with GMP requirements as a result of language barriers, lack of familiarity with GMP or the FDA regulatory process or other causes, economic or political instability in or affecting the home countries of our foreign manufacturers, shipping delays, potential changes in foreign regulatory laws governing the sales of our product supplies, fluctuations in foreign currency exchange rates and the imposition or application of trade restrictions.

There can be no assurances that we will be able to enter into long-term arrangements with third party manufacturers on acceptable terms, or at all. Further, contract manufacturers must also be able to meet our timetable and requirements, and must operate in compliance with GMP; failure to do so could result in, among other things, the disruption of product supplies. As noted above, non-U.S. contract manufacturers may face special challenges in complying with GMP requirements, and although we are not currently dependent on non-U.S. collaborators or contract manufacturers, we may choose or be required to rely on non-U.S. sources in the future as we seek to develop stable supplies of increasing quantities of materials for ongoing clinical trials of larger scale. Our dependence upon third parties for the manufacture of our products may adversely affect our profit margins and our ability to develop and deliver products on a timely and competitive basis.

The significant third parties who we currently rely on for sourcing of suitable quantities of some of our clinical and commercial grade materials include Biosyn, Bayer and Sanofi for our rindopepimut drug candidate. If we or our third-party manufacturers are unable to produce drug material in suitable quantities of appropriate quality, in a timely manner, and at a feasible cost, our clinical tests will face delays.

Certain factors could negatively affect the demand for and sales of Rotarix®, which would have a material adverse affect on our revenues.

We have licensed a rotavirus strain to Glaxo for the purposes of Glaxo developing and commercializing their Rotarix® vaccine worldwide. The term of the Glaxo agreement is through the expiration of the last of the relevant patents covered by the agreement, although Glaxo may terminate the agreement upon 90 days prior written notice. The last relevant patent is scheduled to expire in December 2012. Glaxo gained approval for Rotarix® in Mexico in July 2004, in the European Union in February 2006 and in the United States in April 2008. In May 2005, we entered into an agreement whereby an affiliate of PRF purchased a 70% interest in the net royalties we receive on worldwide sales of Rotarix®. In addition, we retain upside participation in the worldwide net royalties from Rotarix® once, and if, PRF receives an agreed upon return on capital invested (2.45 times PRF's aggregate cash payments to us of $60 million). We do not expect this to occur. The PRF agreement terminates in December 2012, unless otherwise extended. The following are potential factors, among others, that may negatively affect the demand for Rotarix®:

- competitors in the pharmaceuticals, biotechnology and vaccines market have greater financial and management resources, and significantly more experience in bringing products to market, and may develop, manufacture and market products that are more effective or less expensive than Rotarix®;
- Rotarix® could be replaced by a novel product and may become obsolete;
- Glaxo may be unable to prevent third parties from infringing upon their proprietary rights related to Rotarix®;
- users may not accept such a recently approved product without years of proven history; and
- we are dependent on Glaxo for the manufacturing, testing, acquisition of regulatory approvals, marketing, distribution and commercialization of Rotarix®.

Any of these factors could have a material adverse effect on the sales of Rotarix® and our revenues. However, any decline in revenue would not impact our net income because any royalty revenue we receive from sales of Rotarix® is offset by a corresponding royalty expense that we pay to PRF.

Other factors could affect the demand for and sales of Rotarix and any other products that we may commercialize in the future.

In general, other factors that could affect the demand for and sales and profitability of our products include, but are not limited to:

- the timing of regulatory approval, if any, of competitive products;
- our, Glaxo's, or any other of our partners' pricing decisions, as applicable, including a decision to increase or decrease the price of a product, and the pricing decisions of our competitors;
- government and third-party payer reimbursement and coverage decisions that affect the utilization of our products and competing products;
- negative safety or efficacy data from new clinical studies conducted either in the U.S. or internationally by any party could cause the sales of our products to decrease or a product to be recalled;
- the degree of patent protection afforded our products by patents granted to or licensed by us and by the outcome of litigation involving our or any of our licensor's patents;
- the outcome of litigation involving patents of other companies concerning our products or processes related to production and formulation of those products or uses of those products;
- the increasing use and development of alternate therapies;
- the rate of market penetration by competing products; and
- the termination of, or change in, existing arrangements with our partners.

Any of these factors could have a material adverse effect on Glaxo's sales of Rotarix and on the sales of any other products that we may commercialize in the future.

We face the risk of product liability claims, which could exceed our insurance coverage, and produce recalls, each of which could deplete our cash resources.

As a participant in the pharmaceutical, biotechnology and vaccines industries, we are exposed to the risk of product liability claims alleging that use of our drug candidates caused an injury or harm. These claims can arise at any point in the development, testing, manufacture, marketing or sale of our drug candidates and may be made directly by patients involved in clinical trials of our products, by consumers or healthcare providers or by individuals, organizations or companies selling our products. Product liability claims can be expensive to defend, even if the drug or drug candidate did not actually cause the alleged injury or harm.

Insurance covering product liability claims becomes increasingly expensive as a drug candidate moves through the development pipeline to commercialization. Under our license agreements, we are required to maintain clinical trial liability insurance coverage up to $14 million. However, there can be no assurance that such insurance coverage is or will continue to be adequate or available to us at a cost acceptable to us or at all. We may choose or find it necessary under our collaborative agreements to increase our insurance coverage in the future. We may not be able to secure greater or broader product liability insurance coverage on acceptable terms or at reasonable costs when needed. Any liability for damages resulting from a product liability claim could exceed the amount of our coverage, require us to pay a substantial monetary award from our own cash resources and have a material

adverse effect on our business, financial condition and results of operations. Moreover, a product recall, if required, could generate substantial negative publicity about our products and business and inhibit or prevent commercialization of other products and drug candidates.

In addition, some of our licensing and other agreements with third parties require or might require us to maintain product liability insurance. If we cannot maintain acceptable amounts of coverage on commercially reasonable terms in accordance with the terms set forth in these agreements, the corresponding agreements would be subject to termination, which could have a material adverse impact on our operations.

Our reliance on third parties requires us to share our trade secrets, which increases the possibility that a competitor will discover them.

Because we rely on third parties to develop our products, we must share trade secrets with them. We seek to protect our proprietary technology in part by entering into confidentiality agreements and, if applicable, material transfer agreements, collaborative research agreements, consulting agreements or other similar agreements with our collaborators, advisors, employees and consultants prior to beginning research or disclosing proprietary information. These agreements typically restrict the ability of our collaborators, advisors, employees and consultants to publish data potentially relating to our trade secrets. Our academic collaborators typically have rights to publish data, provided that we are notified in advance and may delay publication for a specified time in order to secure our intellectual property rights arising from the collaboration. In other cases, publication rights are controlled exclusively by us, although in some cases we may share these rights with other parties. We also conduct joint research and development programs which may require us to share trade secrets under the terms of research and development partnership or similar agreements. Despite our efforts to protect our trade secrets, our competitors may discover our trade secrets, either through breach of these agreements, independent development or publication of information including our trade secrets in cases where we do not have proprietary or otherwise protected rights at the time of publication. A competitor's discovery of our trade secrets would impair our competitive position.

We may not be able to successfully integrate newly-acquired technology with our existing technology or to modify our technologies to create new vaccines.

As part of our acquisition of technology assets from entities such as Amgen, we have acquired access to Flt3L, which may improve the immunogenicity of our vaccines. If we are able to integrate these licensed assets with our vaccine technologies, we believe these assets will give our vaccines a competitive advantage. However, if we are unable to successfully integrate licensed assets, or other technologies which we have acquired or may acquire in the future, with our existing technologies and potential products currently under development, we may be unable to realize any benefit from our acquisition of these assets, or other technologies which we have acquired or may acquire in the future and may face the loss of our investment of financial resources and time in the integration process.

We believe that our vaccine technology portfolio may offer opportunities to develop vaccines that treat a variety of oncology, inflammatory and infectious diseases by stimulating a patient's immune system against those disease organisms. If our vaccine technology portfolio cannot be used to create effective vaccines against a variety of disease organisms, we may lose all or portions of our investment in development efforts for new vaccine candidates.

We license technology from other companies to develop products, and those companies could influence research and development or restrict our use of it.

Companies that license technologies to us that we use in our research and development programs may require us to achieve milestones or devote minimum amounts of resources to develop products

using those technologies. They may also require us to make significant royalty and milestone payments, including a percentage of any sublicensing income, as well as payments to reimburse them for patent costs. The number and variety of our research and development programs require us to establish priorities and to allocate available resources among competing programs. From time to time we may choose to slow down or cease our efforts on particular products. If in doing so we fail to fully perform our obligations under a license, the licensor can terminate the licenses or permit our competitors to use the technology. Moreover, we may lose our right to market and sell any products based on the licensed technology.

We have many competitors in our field and they may develop technologies that make ours obsolete.

Biotechnology, pharmaceuticals and therapeutics are rapidly evolving fields in which scientific and technological developments are expected to continue at a rapid pace. We have many competitors in the U.S. and abroad. The competitors for which we are aware have initiated a Phase 3 study or have obtained marketing approval for a potentially competitive drug include Alexion, Agenus, Baxter, BMS, Dendreon, Eli Lilly, GlaxoSmithKline, ImmunoGen, Merck, Pfizer, Roche, Sanofi-Aventis, Seattle Genetics, and Takeda. Our success depends upon our ability to develop and maintain a competitive position in the product categories and technologies on which we focus. Many of our competitors have greater capabilities, experience and financial resources than we do. Competition is intense and is expected to increase as new products enter the market and new technologies become available. Our competitors may:

- develop technologies and products that are more effective than ours, making ours obsolete or otherwise noncompetitive;
- obtain regulatory approval for products more rapidly or effectively than us; and
- obtain patent protection or other intellectual property rights that would block our ability to develop competitive products.

We rely on patents, patent applications and other intellectual property protections to protect our technology and trade secrets; which are expensive and may not provide sufficient protection.

Our success depends in part on our ability to obtain and maintain patent protection for technologies that we use. Biotechnology patents involve complex legal, scientific and factual questions and are highly uncertain. To date, there is no consistent policy regarding the breadth of claims allowed in biotechnology patents, particularly in regard to patents for technologies for human uses like those we use in our business. We cannot predict whether the patents we seek will issue. If they do issue, a competitor may challenge them and limit their scope. Moreover, our patents may not afford effective protection against competitors with similar technology. A successful challenge to any one of our patents could result in a third party's ability to use the technology covered by the patent. We also face the risk that others will infringe, avoid or circumvent our patents. Technology that we license from others is subject to similar risks and this could harm our ability to use that technology. If we, or a company that licenses technology to us, were not the first creator of an invention that we use, our use of the underlying product or technology will face restrictions, including elimination.

If we must defend against suits brought against us or prosecute suits against others involving intellectual property rights, we will incur substantial costs. In addition to any potential liability for significant monetary damages, a decision against us may require us to obtain licenses to patents or other intellectual property rights of others on potentially unfavorable terms. If those licenses from third parties are necessary but we cannot acquire them, we would attempt to design around the relevant technology, which would cause higher development costs and delays, and may ultimately prove impracticable.

Our business requires us to use hazardous materials, which increases our exposure to dangerous and costly accidents.

Our research and development activities involve the use of hazardous chemicals, biological materials and radioactive compounds. Although we believe that our safety procedures for handling and disposing of hazardous materials comply with the standards prescribed by applicable laws and regulations, we cannot completely eliminate the risk of accidental contamination or injury from these materials. In the event of an accident, an injured party will likely sue us for any resulting damages with potentially significant liability. The ongoing cost of complying with environmental laws and regulations is significant and may increase in the future.

Health care reform and restrictions on reimbursement may limit our returns on potential products.

Because our strategy ultimately depends on the commercial success of our products, we assume, among other things, that end users of our products will be able to pay for them. In the United States and other countries, in most cases, the volume of sales of products like those we are developing depends on the availability of reimbursement from third-party payors, including national health care agencies, private health insurance plans and health maintenance organizations. Third-party payors increasingly challenge the prices charged for medical products and services. Accordingly, if we succeed in bringing products to market, and reimbursement is not available or is insufficient, we could be prevented from successfully commercializing our potential products.

The health care industry in the United States and in Europe is undergoing fundamental changes as a result of political, economic and regulatory influences. Reforms proposed from time to time include mandated basic health care benefits, controls on health care spending, the establishment of governmental controls over the cost of therapies, creation of large medical services and products purchasing groups and fundamental changes to the health care delivery system. We anticipate ongoing review and assessment of health care delivery systems and methods of payment in the United States and other countries. We cannot predict whether any particular reform initiatives will result or, if adopted, what their impact on us will be. However, we expect that adoption of any reform proposed will impair our ability to market products at acceptable prices and that uncertainty concerning future government regulation of consumer healthcare purchasing and insurance may result in difficulties for drug development companies, like Celldex, in raising capital.

Changes in laws affecting the health care industry could adversely affect our business.

In the U.S., there have been numerous proposals considered at the federal and state levels for comprehensive reforms of health care and its cost, and it is likely that federal and state legislatures and health agencies will continue to focus on health care reform in the future. Congress has considered legislation to reform the U.S. health care system by expanding health insurance coverage, reducing health care costs and making other changes. While health care reform may increase the number of patients who have insurance coverage for our products, it may also include cost containment measures that adversely affect reimbursement for our products. Congress has also considered legislation to change the Medicare reimbursement system for outpatient drugs, increase the amount of rebates that manufacturers pay for coverage of their drugs by Medicaid programs and facilitate the importation of lower-cost prescription drugs that are marketed outside the U.S. Some states are also considering legislation that would control the prices of drugs, and state Medicaid programs are increasingly requesting manufacturers to pay supplemental rebates and requiring prior authorization by the state program for use of any drug for which supplemental rebates are not being paid. Managed care organizations continue to seek price discounts and, in some cases, to impose restrictions on the coverage of particular drugs. Government efforts to reduce Medicaid expenses may lead to increased use of managed care organizations by Medicaid programs. This may result in managed care

organizations influencing prescription decisions for a larger segment of the population and a corresponding constraint on prices and reimbursement for our products.

We and our collaborators and partners operate in a highly regulated industry. As a result, governmental actions may adversely affect our business, operations or financial condition, including:

- new laws, regulations or judicial decisions, or new interpretations of existing laws, regulations or decisions, related to health care availability, method of delivery and payment for health care products and services;
- changes in the FDA and foreign regulatory approval processes that may delay or prevent the approval of new products and result in lost market opportunity;
- changes in FDA and foreign regulations that may require additional safety monitoring, labeling changes, restrictions on product distribution or use, or other measures after the introduction of our products to market, which could increase our costs of doing business, adversely affect the future permitted uses of approved products, or otherwise adversely affect the market for our products;
- new laws, regulations and judicial decisions affecting pricing or marketing practices; and
- changes in the tax laws relating to our operations.

The enactment in the U.S. of health care reform, possible legislation which could ease the entry of competing follow-on biologics in the marketplace, new legislation or implementation of existing statutory provisions on importation of lower-cost competing drugs from other jurisdictions, and legislation on comparative effectiveness research are examples of previously enacted and possible future changes in laws that could adversely affect our business. In addition, the Food and Drug Administration Amendments Act of 2007 included new authorization for the FDA to require post-market safety monitoring, along with an expanded clinical trials registry and clinical trials results database, and expanded authority for the FDA to impose civil monetary penalties on companies that fail to meet certain commitments.

If physicians, patients and third-party payors do not accept any future drugs that we may develop, we may be unable to generate significant revenue, if any.

Even if our drug candidates as well as any drug candidates that we may develop or acquire in the future obtain regulatory approval, they may not gain market acceptance among physicians, patients and health care payors. Physicians may elect not to recommend these drugs for a variety of reasons including:

- timing of market introduction of competitive drugs;
- lower demonstrated clinical safety and efficacy compared to other drugs;
- lack of cost-effectiveness;
- lack of availability of reimbursement from third-party payors;
- convenience and ease of administration;
- prevalence and severity of adverse side effects;
- other potential advantages of alternative treatment methods; and
- ineffective marketing and distribution support.

If any drugs that we develop fail to achieve market acceptance, we would not be able to generate sufficient revenue from product sales to maintain or grow our business.

USE OF PROCEEDS

We intend to use the net proceeds from the sale of the shares of our common stock offered pursuant to this prospectus supplement to fund clinical trials of our product candidates and for working capital and other general corporate purposes. At this time, we have not determined the approximate amount of net proceeds that will be allocated to each of the uses of proceeds stated above. In addition, we may use the net proceeds from this offering for a variety of other corporate uses, including in-licenses or acquisitions of complementary products, technologies or companies, although we currently have no commitments or agreements for any such transactions. Our management will retain broad discretion as to the allocation of the net proceeds from this offering. Pending application of the net proceeds as described above, we intend to invest the net proceeds generally in short-term, investment grade, interest bearing securities.

DILUTION

Our net tangible book value on June 30, 2012 was approximately $61.2 million, or $1.04 per share. "Net tangible book value" is total assets minus the sum of liabilities and intangible assets. "Net tangible book value per share" is net tangible book value divided by the total number of shares outstanding.

After giving effect to the sale of shares of our common stock in the aggregate amount of $44.0 million in this offering at an assumed offering price of $6.43 per share, which was the last reported sale of our common stock on the NASDAQ Global Market on September 18, 2012, and after deducting estimated offering commissions and expenses payable by us, our net tangible book value as of June 30, 2012 would have been approximately $103.7 million, or $1.58 per share of common stock. This represents an immediate increase in net tangible book value of $0.54 per share to our existing stockholders and an immediate dilution in net tangible book value of $4.85 per share to investors participating in this offering. The following table illustrates this dilution per share to investors participating in this offering:

Assumed offering price per share		$ 6.43
Net tangible book value per share as of June 30, 2012	$ 1.04	
Increase in net tangible book value per share attributable to new investors	$ 0.54	
Pro forma net tangible book value per share after giving effect to the offering	$ 1.58	
Dilution per share to new investors		$ 4.85

The table above assumes, for illustrative purposes, that an aggregate of 6,842,924 shares of our common stock are sold at a price of $6.43 per share, the last reported sale price of our common stock on the NASDAQ Global Market on September 18, 2012, for aggregate gross proceeds of $44.0 million. The shares sold in this offering, if any, will be sold from time to time at various prices. An increase of $0.50 per share in the price at which the shares are sold from the assumed offering price of $6.93 per share shown in the table above, assuming all of our common stock in the aggregate amount of $44.0 million is sold at that price, would increase our as adjusted net tangible book value per share after the offering to $1.59 per share and would decrease the dilution in net tangible book value per share to new investors to $4.84 per share, after deducting commissions and estimated aggregate offering expenses payable by us. A decrease of $0.50 per share in the price at which the shares are sold from the assumed offering price of $5.93 per share shown in the table above, assuming all of our common stock in the aggregate amount of $44.0 million is sold at that price, would decrease our as adjusted net tangible book value per share after the offering to $1.57 per share and would increase the dilution in net tangible book value per share to new investors to $4.86 per share, after deducting commissions and estimated aggregate offering expenses payable by us. This information is supplied for illustrative purposes only.

The above discussion and table are based on 58,753,571 shares of our common stock issued and outstanding as of June 30, 2012, which does not include the following, all as of June 30, 2012:

- 4,304,897 shares issuable upon the exercise of outstanding stock options with a weighted-average exercise price of $5.96 per share;
- 4,449,646 shares available for future issuance under our equity compensation plans; and
- 1,975,000 shares of common stock sold since June 30, 2012 which raised $10.6 million in net proceeds.

To the extent that any of these outstanding options or warrants are exercised, there will be further dilution to new investors.

PLAN OF DISTRIBUTION

We have entered into an amendment to our existing controlled equity offering sales agreement with Cantor Fitzgerald & Co., or Cantor, that provides for the issuance and sale by us of common shares having an aggregate offering price of up to $44.0 million from time to time through Cantor acting as agent. Our existing sales agreement has been filed as an exhibit to our Current Report on Form 8-K filed with the Commission on January 6, 2011 and incorporated by reference in this prospectus supplement. The amendment to the sales agreement will be filed as an exhibit to a report filed under the Exchange Act and incorporated by reference in this prospectus supplement. The sales, if any, of shares made under the sales agreement will be made on the NASDAQ Global Market by means of ordinary brokers' transactions at market prices, in block transactions or as otherwise agreed by Cantor and us. We may instruct Cantor not to sell common stock if the sales cannot be effected at or above the price designated by us from time to time. We or Cantor may suspend the offering of common stock upon notice and subject to other conditions. As an agent, Cantor will not engage in any transactions that stabilize the price of our common stock.

We will pay Cantor commissions for its services in acting as agent in the sale of common stock. Cantor will be entitled to compensation at a fixed commission rate of 3.0% of the gross sales price per share sold. Assuming the sale of shares of common stock having an aggregate offering price of $44.0 million at an assumed offering price of $6.43 per share, which was the last reported sale price of our common stock on the NASDAQ Global Market on September 18, 2012, we estimate that the total expenses for the offering, excluding compensation payable to Cantor under the terms of the sales agreement, will be approximately $245,000, which includes certain expense reimbursements payable to Cantor.

Settlement for sales of common stock will occur on the third business day following the date on which any sales are made, or on some other date that is agreed upon by us and Cantor in connection with a particular transaction, in return for payment of the net proceeds to us. There is no arrangement for funds to be received in an escrow, trust or similar arrangement.

Cantor will act as sales agent on a commercially reasonable efforts basis. In connection with the sale of the common stock on our behalf, Cantor may, and will with respect to sales effected in an "at the market offering," be deemed to be an "underwriter" within the meaning of the Securities Act and the compensation of Cantor may be deemed to be underwriting commissions or discounts. We have agreed to provide indemnification and contribution to Cantor against certain civil liabilities, including liabilities under the Securities Act. We have also agreed to reimburse Cantor for certain other specified expenses.

The offering pursuant to the sales agreement will terminate upon the earlier of (i) the sale of all common shares subject to the agreement, or (ii) termination of the sales agreement as permitted therein.

Cantor and its affiliates may in the future provide various investment banking, commercial banking and other financial services for us and our affiliates, for which services they may in the future receive customary fees. To the extent required by Regulation M, Cantor will not engage in any market making activities involving our common stock while the offering is ongoing under this prospectus supplement.

A prospectus supplement and the accompanying prospectus in electronic format may be made available on a web site maintained by Cantor and Cantor may distribute the prospectus supplement and the accompanying prospectus electronically.

LEGAL MATTERS

The validity of the securities being offered hereby will be passed upon by Lowenstein Sandler PC, Roseland, New Jersey. Cantor is being represented in connection with this offering by Reed Smith LLP, New York, New York.

EXPERTS

The financial statements and management's assessment of the effectiveness of internal control over financial reporting (which is included in Management's Report on Internal Control over Financial Reporting) incorporated in this prospectus supplement by reference to the Annual Report on Form 10-K for the year ended December 31, 2011 have been so incorporated in reliance on the report(s) of PricewaterhouseCoopers LLP, an independent registered public accounting firm, given on the authority of said firm as experts in auditing and accounting.

WHERE YOU CAN FIND MORE INFORMATION

We are subject to the reporting requirements of the Securities Exchange Act of 1934, as amended, and file annual, quarterly and current reports, proxy statements and other information with the SEC. You may read and copy these reports, proxy statements and other information at the SEC's public reference facilities at 100 F Street, N.E., Room 1580, Washington, D.C. 20549. You can request copies of these documents by writing to the SEC and paying a fee for the copying cost. Please call the SEC at 1-800-SEC-0330 for more information about the operation of the public reference facilities. SEC filings are also available at the SEC's web site at *http://www.sec.gov.*

This prospectus supplement and the accompany prospectus are only part of a registration statement on Form S-3 (File No. 333-165899) that we have filed with the SEC under the Securities Act, and therefore omit 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, and you should refer to the applicable exhibit or schedule for a complete description of any statement referring to any contract or other document. You may inspect a copy of the registration statement, including the exhibits and schedules, without charge, at the public reference room or obtain a copy from the SEC upon payment of the fees prescribed by the SEC.

INCORPORATION OF DOCUMENTS BY REFERENCE

The SEC allows us to "incorporate by reference" 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 an important part of this prospectus supplement and accompanying prospectus. To the extent that any statement that we make in this prospectus supplement is inconsistent with the statements made in the accompanying prospectus or the information incorporated by reference, the statements made in the accompanying prospectus are deemed modified or superseded by the statements made in this prospectus supplement, while information that we file later with the SEC will automatically update and supersede this information. We incorporate by reference into this prospectus supplement the documents listed below and any future filings we will make with the SEC under Sections 13(a), 13(c), 14 or 15(d) of the Exchange Act after the date of this prospectus supplement but prior to the termination of the offering of the shares covered by this prospectus supplement and accompanying prospectus (other than current reports furnished pursuant to Items 2.02 and 7.01 of Form 8-K). The documents we are incorporating by reference are:

- Our Annual Report on Form 10-K for the fiscal year ended December 31, 2011, filed with the SEC on March 8, 2012 (including the portions of our Proxy Statement on Schedule 14A, filed with the SEC on April 24, 2012, incorporated by reference therein);

- Our Quarterly Reports on Form 10-Q for the fiscal quarters ended March 31, 2012 and June 30, 2012, filed on May 4, 2012 and August 9, 2012, respectively;

- Our Current Reports on Form 8-K filed with the SEC on February 23, 2012, February 24, 2012, March 7, 2012, April 3, 2012, June 14, 2012 and September 24, 2012 (in each case, not including any information furnished under Items 2.02 or 7.01 of Form 8-K, including the related exhibits, which information is not incorporated by reference herein); and

- The description of our common stock contained in our Registration Statement on Form 8-A, filed on November 8, 2004, as amended by Form 8-A/A filed on October 22, 2007 and March 7, 2008.

We will furnish without charge to you, on written or oral request, a copy of any or all of the documents incorporated by reference, including exhibits to these documents. You should direct any requests for documents to Celldex Therapeutics, Inc., Attention: Corporate Secretary, 119 Fourth Avenue, Needham, Massachusetts 02494, (781) 433-0771.

You should rely only on information contained in, or incorporated by reference into, this prospectus supplement and the accompanying prospectus. We have not authorized anyone to provide you with information different from that contained or incorporated by reference in this prospectus supplement and accompanying prospectus. We are not making offers to sell the common stock in any jurisdiction in which such an offer or solicitation is not authorized or in which the person making such offer or solicitation is not qualified to do so or to anyone to whom it is unlawful to make such offer or solicitation.

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PROSPECTUS

CELLDEX THERAPEUTICS, INC.

$150,000,000

Common Stock
Preferred Stock
Warrants
Depositary Shares
Units

Celldex Therapeutics, Inc. may offer, issue and sell from time to time, together or separately, in one or more offerings, any combination of (i) our common stock, (ii) our preferred stock, which we may issue in one or more series, (iii) warrants, (iv) depositary shares and (v) units, up to a maximum aggregate offering price of $150,000,000.

We may offer and sell these securities in amounts, at prices and on terms determined at the time of the offering. We will provide the specific terms of these securities in supplements to this prospectus. You should read this prospectus and the accompanying prospectus supplement, as well as the documents incorporated or deemed incorporated by reference in this prospectus, carefully before you make your investment decision. Our common stock is traded on the NASDAQ Global Select Market System under the symbol "CLDX." On March 31, 2010, the last reported sale price of our common stock on the NASDAQ Global Select Market System was $6.14 per share. You are urged to obtain current market quotations of the common stock. Each prospectus supplement will indicate if the securities offered thereby will be listed on any securities exchange.

This prospectus may not be used to sell securities unless accompanied by a prospectus supplement.

We may offer to sell these securities on a continuous or delayed basis, through agents, dealers or underwriters, or directly to purchasers. The prospectus supplement for each offering of securities will describe in detail the plan of distribution for that offering. If our agents or any dealers or underwriters are involved in the sale of the securities, the applicable prospectus supplement will set forth the names of the agents, dealers or underwriters and any applicable commissions or discounts. Our net proceeds from the sale of securities will also be set forth in the applicable prospectus supplement. For general information about the distribution of securities offered, please see "Plan of Distribution" in this prospectus.

Investing in our securities involves risks. You should carefully review the information contained in this prospectus under the heading "Risk Factors" beginning on page 9 of this prospectus.

NEITHER THE SECURITIES AND EXCHANGE COMMISSION NOR ANY STATE SECURITIES COMMISSION OR REGULATORY BODY 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 April 22, 2010.

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We have not authorized any person to give any information or make any statement that differs from what is in this prospectus. If any person does make a statement that differs from what is in this prospectus, you should not rely on it. This prospectus is not an offer to sell, nor is it a solicitation of an offer to buy, these securities in any state in which the offer or sale is not permitted. The information in this prospectus is complete and accurate as of its date, but the information may change after that date. You should not assume that the information in this prospectus is accurate as of any date after its date.

PROSPECTUS SUMMARY

This prospectus is a part of a registration statement that we filed with the Securities and Exchange Commission, or the SEC, utilizing a "shelf" registration process. Under this shelf registration process, we may, from time to time, sell any combination of the securities described in this prospectus in one or more offerings.

The registration statement containing this prospectus, including the exhibits to the registration statement, provides additional information about us and the securities offered under this prospectus. You should read the registration statement and the accompanying exhibits for further information. The registration statement, including the exhibits and the documents incorporated or deemed incorporated herein by reference, can be read and are available to the public over the Internet at the SEC's website at *http://www.sec.gov* as described under the heading "Where You Can Find More Information."

Each time we sell securities pursuant to this prospectus, we will provide a prospectus supplement containing specific information about the terms of a particular offering by us. That prospectus supplement may include a discussion of any risk factors or other special considerations that apply to those securities. The prospectus supplement may add, update or change information in this prospectus. If the information in the prospectus is inconsistent with a prospectus supplement, you should rely on the information in that prospectus supplement. You should read both this prospectus and, if applicable, any prospectus supplement. See "Where You Can Find More Information" for more information.

We have not authorized any dealer, salesman or other person to give any information or to make any representation other than those contained or incorporated by reference in this prospectus or any prospectus supplement. You must not rely upon any information or representation not contained or incorporated by reference in this prospectus or any prospectus supplement. This prospectus and any prospectus supplement do not constitute an offer to sell or the solicitation of an offer to buy any securities other than the registered securities to which they relate, nor do this prospectus and any prospectus supplement constitute an offer to sell or the solicitation of an offer to buy securities in any jurisdiction to any person to whom it is unlawful to make such offer or solicitation in such jurisdiction. You should not assume that the information contained in this prospectus or any prospectus supplement is accurate on any date subsequent to the date set forth on the front of such document or that any information we have incorporated by reference is correct on any date subsequent to the date of the document incorporated by reference, even though this prospectus and any prospectus supplement is delivered or securities are sold on a later date.

Unless this prospectus indicates otherwise or the context otherwise requires, the terms "we," "our," "us," "Celldex" or the "Company" as used in this prospectus refer to Celldex Therapeutics, Inc. and its subsidiaries, except that such terms refer to only Celldex Therapeutics, Inc. and not its subsidiaries in the sections entitled "Description of Common Stock," "Description of Preferred Stock," "Description of Warrants," "Description of Depositary Shares," and "Description of Units."

Company Overview

We are an integrated biopharmaceutical company that applies our comprehensive Precision Targeted Immunotherapy Platform to generate a pipeline of candidates to treat cancer and other difficult-to-treat diseases. Our immunotherapy platform includes a complementary portfolio of monoclonal antibodies, antibody-targeted vaccines, antibody-drug conjugates and immunomodulators to create novel disease-specific drug candidates.

Our strategy is to develop and demonstrate proof-of-concept for our product candidates before leveraging their value through partnerships or, in appropriate situations, continuing late stage development through commercialization ourselves. Demonstrating proof-of-concept for a product candidate generally involves bringing it through Phase 1 clinical trials and one or more Phase 2 clinical

trials so that we are able to demonstrate, based on human trials, good safety data for the product candidate and some data indicating its effectiveness. We thus leverage the value of our technology portfolio through corporate, governmental and non-governmental partnerships. This approach allows us to maximize the overall value of our technology and product portfolio while best ensuring the expeditious development of each individual product.

On March 7, 2008, a wholly-owned subsidiary of Celldex (formerly named AVANT Immunotherapeutics, Inc.) merged into Celldex Research Corporation (formerly named Celldex Therapeutics, Inc.), which was then a privately-held company. Through that merger, Celldex acquired a therapeutic cancer vaccine candidate, known as CDX-110, which is currently in Phase 2 development for the treatment of glioblastoma multiforme.

On October 1, 2009, a wholly-owned subsidiary of Celldex (which we refer to as the Merger Sub), merged with and into CuraGen Corporation ("CuraGen"), which we refer to as the CuraGen Merger, in accordance with the Agreement and Plan of Merger, dated May 28, 2009, among CuraGen, Merger Sub and Celldex, which we refer to as the Merger Agreement. As a result of the Merger, CuraGen became a wholly-owned subsidiary of Celldex. Through the CuraGen Merger, Celldex acquired over $70 million in cash, cash equivalents and marketable securities and an antibody drug candidate, known as CDX-011, which is currently in Phase 2 development for treatment of metastatic melanoma and breast cancer.

On December 31, 2009, CuraGen merged into Celldex and, as a result of the merger, Celldex succeeded to all of CuraGen's assets and liabilities and the separate existence of CuraGen ceased.

Current Programs and Partnerships

Our goal is to become a leading developer of innovative products that we call Precision Targeted Immunotherapeutics which are designed to address major unmet health care needs. Most of our products are derived from a broad set of complementary technologies (collectively known as our Precision Targeted Immunotherapy Platform). This platform includes monoclonal antibodies, antibody-targeted vaccines, antibody-drug conjugates and immunomodulators to create novel disease-specific drugs. We are using our Precision Targeted Immunotherapy Platform to develop targeted immunotherapies that prevent or treat specific forms of cancer, autoimmune disorders and disease caused by infectious organisms. We expect that a large percentage of our research and development expenses will be incurred in support of our current and future clinical trial programs.

The following table includes the programs that we currently believe are material to our business:

Product (generic)	Indication/Field	Partner	Status
CLINICAL			
CDX-110 (rindopepimut)	Glioblastoma multiforme	Pfizer (PF-4948568)	Phase 2b
CDX-011 (glembatumumab vedotin)	Metastatic melanoma and breast cancer	—	Phase 2
CDX-1307	Colorectal, bladder, pancreas, ovarian and breast tumors	—	Phase 1
CDX-1401	Multiple solid tumors	—	Phase 1/2
CDX-1135	Renal disease	—	Phase 1/2
PRECLINICAL			
CDX-301	Cancer, autoimmune disease and transplant	—	Preclinical
CDX-1127	Immuno-modulation, multiple tumors	—	Preclinical
CDX-014	Renal and ovarian cancer	—	Preclinical
CDX-1189	Renal disease	—	Preclinical
MARKETED PRODUCTS			
Rotarix®	Rotavirus infection	GlaxoSmithKline	Marketed

Clinical Development Programs

CDX-110

Our lead clinical development program, CDX-110, is a peptide-based immunotherapy that targets the tumor specific molecule called EGFRvIII, a functional variant of the naturally expressed epidermal growth factor receptor ("EGFR"), a protein which has been well validated as a target for cancer therapy. Unlike EGFR, EGFRvIII is not present in normal tissues, and has been shown to be a transforming oncogene that can directly contribute to the cancer cell growth. EGFRvIII is commonly present in glioblastoma multiforme, or GBM, the most common and aggressive form of brain cancer, and has also been observed in various other cancers such as breast, ovarian, prostate, colorectal, and head & neck cancer.

In April 2008, we and Pfizer Inc. ("Pfizer") entered into a License and Development Agreement (the "Pfizer Agreement") under which Pfizer was granted an exclusive worldwide license to CDX-110. The Pfizer Agreement also gives Pfizer exclusive rights to the use of EGFRvIII vaccines in other potential indications. Pfizer funds all development costs for these programs.

CDX-011

CDX-011 (formerly CR011-vcMMAE) is an antibody-drug conjugate (ADC) that consists of a fully-human monoclonal antibody, CR011, linked to a potent cell-killing drug, monomethyl-auristatin E (MMAE). The CR011 antibody specifically targets glycoprotein NMB or (GPNMB) that is expressed in a variety of human cancers including breast cancer and melanoma. The ADC technology, comprised of MMAE and a stable linker system for attaching it to CR011, was licensed from Seattle Genetics, Inc. The ADC is designed to be stable in the bloodstream. Following intravenous administration, CDX-011 targets and binds to GPNMB and upon internalization into the targeted cell, CDX-011 is designed to release MMAE from CR011 to produce a cell-killing effect.

CDX-1307

Our lead APC Targeting Technology™ product candidate, CDX-1307, is in development for the treatment of epithelial tumors such as colorectal, pancreatic, bladder, ovarian and breast cancers. CDX-1307 targets the beta chain of human chorionic gonadotropin, known as hCG-Beta, which is an antigen often found in epithelial tumors. The presence of hCG-Beta in these cancers correlates with a poor clinical outcome, suggesting that this molecule may contribute to tumor growth. Normal adult tissues have minimal expression of hCG-Beta; therefore, targeted immune responses are not expected to generate significant side effects.

CDX-1401

CDX-1401 is a fusion protein consisting of a fully human monoclonal antibody with specificity for the dendritic cell receptor, DEC-205, linked to the NY-ESO-1 tumor antigen. In humans, NY-ESO-1 has been detected in 20 - 30% of cancers, thus representing a broad opportunity. This product is intended to selectively deliver the NY-ESO-1 antigen to APCs for generating robust immune responses against cancer cells expressing NY-ESO-1. Unlike CDX-1307, which targets the mannose receptor expressing dendritic cells, CDX-1401 is the first APC product targeting DEC-205 expressing dendritic cells. We are developing CDX-1401 for the treatment of malignant melanoma and a variety of solid tumors which express the proprietary cancer antigen NY-ESO-1, which we licensed from the Ludwig Institute for Cancer Research in 2006. We believe that preclinical studies have shown that CDX-1401 is effective for activation of human T-cell responses against NY-ESO-1.

CDX-1135

CDX-1135 is a molecule that inhibits a part of the immune system called the complement system. The complement system is a series of proteins that are important initiators of the body's acute inflammatory response against disease, infection and injury. Excessive complement activation also plays a role in some persistent inflammatory conditions. CDX-1135 is a soluble form of naturally occurring Complement Receptor 1 that inhibits the activation of the complement cascade in animal models and in human clinical trials. We believe that regulating the complement system could have therapeutic and prophylactic applications in several acute and chronic conditions, including organ transplantation, multiple sclerosis, rheumatoid arthritis, age-related macular degeneration ("AMD"), atypical Hemolytic Uremic Syndrome ("aHUS"), Paroxysmal Nocturnal Hemaglobinuria ("PNH"), Dense Deposit Disease ("DDD") in kidneys, and myasthenia gravis. We are currently defining the most appropriate clinical development path for CDX-1135 and are focusing on rare disease conditions of unregulated complement activation.

Preclinical Development Programs

CDX-301

CDX-301 is a FMS-like tyrosine kinase 3 ligand (Flt3L) that we licensed from Amgen in March 2009. CDX-301 is a growth factor for stem cells and immune cells called dendritic cells. Based on previous experience with this molecule, we believe that CDX-301 has considerable opportunity in various transplant settings as a stem cell mobilizing agent. In addition, CDX-301 is an immune modulating molecule that increases the numbers and activity of specific types of immune cells. We believe CDX-301 has significant opportunity for synergistic development in combination with proprietary molecules in our portfolio.

CDX-1127

We have entered into a License Agreement with the University of Southampton, UK, to develop human antibodies to CD27, a potentially important target for immunotherapy of various cancers. In

preclinical models, antibodies to CD27 alone have been shown to mediate anti-tumor effects, and may be particularly effective in combination with other immunotherapies. CD27 is a critical molecule in the activation pathway of lymphocytes. It is downstream from CD40, and may provide a novel way to regulate the immune responses. Engaging CD27 with the appropriate monoclonal antibody has proven highly effective at promoting anti-cancer immunity in mouse models. We are evaluating new human monoclonal antibodies in preclinical models.

CDX-014

CDX-014 (formerly CR014-vcMMAE) is a fully-human monoclonal ADC that targets TIM-1, an immunomudulatory protein that appears to down regulate immune response to tumors. The antibody, CDX-014, is linked to a potent chemotherapeutic, monomethyl auristatin E (MMAE), using Seattle Genetics' proprietary technology. The ADC is designed to be stable in the bloodstream, but to release MMAE upon internalization into TIM-1-expressing tumor cells, resulting in a targeted cell-killing effect. CDX-014 has shown potent activity in preclinical models of ovarian and renal cancer.

CDX-1189

We are developing therapeutic human antibodies to a signaling molecule known as CD89 or Fca receptor type I (FcaRI). CD89 is expressed by some white blood cells and leukemic cell lines, and has been shown to be important in controlling inflammation and tumor growth in animal models. We have proprietary, fully human antibodies to CD89 in preclinical development. Depending upon the specific antibody used, anti-CD89 antibodies can either be activating and thus stimulate immune responses, or down-regulating and act as an anti-inflammatory agent.

Marketed Products

Rotavirus Vaccine

Rotavirus is a major cause of diarrhea and vomiting in infants and children. In 1997, we licensed our oral rotavirus strain to GlaxoSmithKline, or Glaxo, and Glaxo assumed responsibility for all subsequent clinical trials and all other development activities. Glaxo gained approval for its rotavirus vaccine, Rotarix®, in Mexico in July 2004, which represented the first in a series of worldwide approvals and commercial launches for the product leading up to the approval in Europe in 2006 and in the U.S. in 2008.

Corporate Information

We are a Delaware corporation organized in 1983. The principal executive offices of Celldex are located at 119 Fourth Avenue, Needham, Massachusetts 02494 and its telephone number is (781) 433-0771. Our corporate website is *www.celldextherapeutics.com*. The information on our website is not incorporated by reference into this prospectus.

SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus, including the documents that we incorporate by reference, contains 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. Any statements about our expectations, beliefs, plans, objectives, assumptions or future events or performance are not historical facts and may be forward-looking. These statements are often, but not always, made through the use of words or phrases such as "anticipate," "estimate," "plans," "projects," "continuing," "ongoing," "expects," "management believes," "we believe," "we intend" and similar words or phrases. Accordingly, these statements involve estimates, assumptions and uncertainties, which could cause actual results to differ materially from those expressed in them. Any forward-looking statements are qualified in their entirety by reference to the

risk factors discussed in this prospectus or discussed in documents incorporated by reference in this prospectus.

Forward-looking statements are subject to known and unknown risks and uncertainties, which change over time, and are based on management's expectations and assumptions at the time the statements are made, and are not guarantees of future results. Our actual results may differ materially from those expressed or anticipated in the forward-looking statements for many reasons including the factors described in the section entitled "Risk Factors" in this prospectus and in any risk factors described in a supplement to this prospectus or in other filings.

You are cautioned not to place undue reliance on these forward-looking statements, which speak only as of the date on which they were made. We undertake no obligation to publicly revise any forward-looking statement to reflect circumstances or events after the date of this prospectus or to reflect the occurrence of unanticipated events. You should, however, review the factors and risks we describe in the reports we file from time to time with the SEC after the date of this prospectus. We undertake no obligation to revise or update the forward-looking statements contained in this prospectus at any time. All forward-looking statements are qualified in their entirety by this cautionary statement.

RISK FACTORS

An investment in our securities involves risks. Before making an investment decision, you should carefully consider the risks described under "Risk Factors" in this prospectus as well as the applicable prospectus supplement and in our most recent Annual Report on Form 10-K, and in our updates to those Risk Factors in our Quarterly Reports on Form 10-Q following the most recent Form 10-K, and in all other information appearing in this prospectus or incorporated by reference into this prospectus and any applicable prospectus supplement. The material risks and uncertainties that management believes affect us will be described in those documents. In addition to those risk factors, there may be additional risks and uncertainties of which management is not aware or focused on or that management deems immaterial. Our business, financial condition or results of operations could be materially adversely affected by any of these risks. The trading price of our securities could decline due to any of these risks, and you may lose all or part of your investment. This prospectus is qualified in its entirety by these risk factors.

Risks Related to Our Business

Our products and product candidates are subject to extensive regulatory scrutiny.

All of our products and product candidates are at various stages of development and commercialization and our activities, products and product candidates are significantly regulated by a number of governmental entities, including the Food and Drug Administration in the United States, which we refer to as the FDA, and by comparable authorities in other countries. These entities regulate, among other things, the manufacture, testing, safety, effectiveness, labeling, documentation, advertising and sale of our products and product candidates. We or our partners must obtain regulatory approval for a product candidate in all of these areas before we can commercialize a product candidate. Product development within this regulatory framework takes a number of years and involves the expenditure of substantial resources. This process typically requires extensive preclinical and clinical testing, which may take longer or cost more than we anticipate, and may prove unsuccessful due to numerous factors. Many product candidates that initially appear promising ultimately do not reach the market because they are found to be unsafe or ineffective when tested. Companies in the pharmaceutical, biotechnology and vaccines industries have suffered significant setbacks in advanced clinical trials, even after obtaining promising results in earlier trials. Our inability to commercialize a product or product candidate would impair our ability to earn future revenues.

If our products do not pass required tests for safety and effectiveness, we will not be able to derive commercial revenue from them.

In order to succeed, we will need to derive commercial revenue from the products we have under development. The FDA has not approved our CDX-110 or CDX-011 product candidates or any of our other lead products for sale to date. Products in our vaccine programs are in various stages of preclinical and clinical testing. Preclinical tests are performed at an early stage of a product's development and provide information about a product's safety and effectiveness on laboratory animals. Preclinical tests can last years. If a product passes its preclinical tests satisfactorily, and we determine that further development is warranted, we would file an investigational new drug application for the product with the FDA, and if the FDA gives its approval we would begin Phase 1 clinical tests. Phase 1 testing generally lasts between 6 and 24 months. If Phase 1 test results are satisfactory and the FDA gives its approval, we can begin Phase 2 clinical tests. Phase 2 testing generally lasts between 6 and 36 months. If Phase 2 test results are satisfactory and the FDA gives its approval, we can begin Phase 3 pivotal studies. Phase 3 studies generally last between 12 and 48 months. Once clinical testing is completed and a new drug application is filed with the FDA, it may take more than a year to receive FDA approval.

In all cases we must show that a pharmaceutical product is both safe and effective before the FDA, or drug approval agencies of other countries where we intend to sell the product, will approve it for sale. Our research and testing programs must comply with drug approval requirements both in the United States and in other countries, since we are developing our lead products with companies, including Glaxo and Pfizer, which intend to or could later decide to commercialize them both in the U.S. and abroad. A product may fail for safety or effectiveness at any stage of the testing process. A major risk we face is the possibility that none of our products under development will come through the testing process to final approval for sale, with the result that we cannot derive any commercial revenue from them after investing significant amounts of capital in multiple stages of preclinical and clinical testing.

Product testing is critical to the success of our products but subject to delay or cancellation if we have difficulty enrolling patients.

As our portfolio of potential products moves from preclinical testing to clinical testing, and then through progressively larger and more complex clinical trials, we will need to enroll an increasing number of patients with the appropriate characteristics. At times we have experienced difficulty enrolling patients and we may experience more difficulty as the scale of our clinical testing program increases. The factors that affect our ability to enroll patients are largely uncontrollable and include principally the following:

- the nature of the clinical test;
- the size of the patient population;
- patients' willingness to receive a placebo or less effective treatment on the control arm of a clinical study;
- the distance between patients and clinical test sites; and
- the eligibility criteria for the trial.

If we cannot enroll patients as needed, our costs may increase or it could force us to delay or terminate testing for a product.

Any delay in obtaining regulatory approval would have an adverse impact on our ability to earn future revenues.

It is possible that none of the products or product candidates that we develop will obtain the regulatory approvals necessary for us to begin commercializing them. The time required to obtain FDA and other approvals is unpredictable but often can take years following the commencement of clinical trials, depending upon the nature of the product candidate. Any analysis we perform of data from clinical activities is subject to confirmation and interpretation by regulatory authorities, which could delay, limit or prevent regulatory approval. Any delay or failure in obtaining required approvals could have a material adverse effect on our ability to generate revenues from the particular product candidate. Furthermore, if we, or our partners, do not reach the market with our products before our competitors offer products for the same or similar uses, or if we, or our partners, are not effective in marketing our products, our revenues from product sales, if any, will be reduced.

We face intense competition in our development activities. We face competition from many companies in the United States and abroad, including a number of large pharmaceutical companies, firms specialized in the development and production of vaccines, adjuvants and vaccine and immunotherapeutic delivery systems and major universities and research institutions. These competitors include Alexion, Anadys, Antigenics, Baxter, BioSante, Crucell, Dendreon, Eli Lilly, Emergent, Genitope, GlaxoSmithKline, Idera, Intercell, Immunogen, Maxygen, Merck, NeoPharm, Northwest

Biotherapeutics, Novavax, Pfizer, Roche, Sanofi-Aventis, Seattle Genetics, and Vical. Most of our competitors have substantially greater resources, more extensive experience in conducting preclinical studies and clinical testing and obtaining regulatory approvals for their products, greater operating experience, greater research and development and marketing capabilities and greater production capabilities than those of ours. These companies might succeed in obtaining regulatory approval for competitive products more rapidly than we can for our products, especially if we experience any delay in obtaining required regulatory approvals.

Failure to comply with applicable regulatory requirements would adversely impact our operations.

Even after receiving regulatory approval, our products would be subject to extensive regulatory requirements, and our failure to comply with applicable regulatory requirements will adversely impact our operations. In the United States, the FDA requires that the manufacturing facility that produces a product meet specified standards, undergo an inspection and obtain an establishment license prior to commercial marketing. Subsequent discovery of previously unknown problems with a product or its manufacturing process may result in restrictions on the product or the manufacturer, including withdrawal of the product from the market. Failure to comply with the applicable regulatory requirements can result in fines, suspensions of regulatory approvals, product recalls, operating restrictions and criminal prosecution.

We depend greatly on the intellectual capabilities and experience of our key executives and scientists and the loss of any of them could affect our ability to develop our products.

The loss of Anthony S. Marucci, our President and Chief Executive Officer, or other key members of our staff, including Avery W. Catlin, our Chief Financial Officer, Dr. Thomas Davis, our Chief Medical Officer, or Dr. Tibor Keler, our Chief Scientific Officer, could harm us. We entered into employment agreements with Messrs. Marucci, Catlin, Davis and Keler. We also depend on our scientific and clinical collaborators and advisors, all of whom have outside commitments that may limit their availability to us. In addition, we believe that our future success will depend in large part upon our ability to attract and retain highly skilled scientific, managerial and marketing personnel, particularly as we expand our activities in clinical trials, the regulatory approval process and sales and manufacturing. We routinely enter into consulting agreements with our scientific and clinical collaborators and advisors, opinion leaders and heads of academic departments in the ordinary course of our business. We also enter into contractual agreements with physicians and institutions who recruit patients into our clinical trials on our behalf in the ordinary course of our business. Notwithstanding these arrangements, we face significant competition for this type of personnel from other companies, research and academic institutions, government entities and other organizations. We cannot predict our success in hiring or retaining the personnel we require for continued growth.

We rely on contract manufacturers. Should the cost, delivery and quality of clinical and commercial grade materials supplied by contract manufacturers vary to our disadvantage, our business operations could suffer significant harm.

Although we have small-lot manufacturing capability at our Fall River facility, we rely on sourcing from third-party manufacturers for suitable quantities of some of our clinical and commercial grade materials essential to preclinical and clinical studies currently underway and to planned clinical trials in addition to those currently being conducted by third parties or us. The inability to have suitable quality and quantities of these essential materials produced in a timely manner would result in significant delays in the clinical development and commercialization of products, which could adversely affect our business, financial condition and results of operations. We also rely on collaborators and contract manufacturers to manufacture proposed products in both clinical and commercial quantities in the future. Our leading vaccine candidates require specialized manufacturing capabilities and processes.

We may face difficulty in securing commitments from U.S. and foreign contract manufacturers as these manufacturers could be unwilling or unable to accommodate our needs. Relying on foreign manufacturers involves peculiar and increased risks, including the risk relating to the difficulty foreign manufacturers may face in complying with the FDA's Good Manufacturing Practices ("GMP") as a result of language barriers, lack of familiarity with GMP or the FDA regulatory process or other causes, economic or political instability in or affecting the home countries of our foreign manufacturers, shipping delays, potential changes in foreign regulatory laws governing the sales of our product supplies, fluctuations in foreign currency exchange rates and the imposition or application of trade restrictions.

There can be no assurances that we will be able to enter into long-term arrangements with third party manufacturers on acceptable terms, or at all. Further, contract manufacturers must also be able to meet our timetable and requirements, and must operate in compliance with GMP; failure to do so could result in, among other things, the disruption of product supplies. As noted above, non-U.S. contract manufacturers may face special challenges in complying with the FDA's GMP requirements, and although we are not currently dependent on non-U.S. collaborators or contract manufacturers, we may choose or be required to rely on non-U.S. sources in the future as we seek to develop stable supplies of increasing quantities of materials for ongoing clinical trials of larger scale. Our dependence upon third parties for the manufacture of our products may adversely affect our profit margins and our ability to develop and deliver products on a timely and competitive basis.

The significant third-parties who we currently rely on for sourcing of suitable quantities of some of our clinical and commercial grade materials include:

- Pfizer, Bayer, and Genzyme for the CDX-110 drug product;
- Dalton for Hiltonol which is an integral part of several of our drug products;
- 3M for Resiquimod which is an integral part of several of our drug products; and
- Piramal for the CDX-011 drug product.

If we or our third-party manufacturers are unable to produce drug material in suitable quantities of appropriate quality, in a timely manner, and at a feasible cost, our clinical tests will face delays.

We rely on third parties to plan, conduct and monitor our clinical tests, and their failure to perform as required would interfere with our product development.

We rely on third parties to conduct a significant portion of our clinical development activities. These activities include clinical patient recruitment and observation, clinical trial monitoring, clinical data management and analysis, safety monitoring and project management. We conduct project management and medical and safety monitoring in-house for some of our programs and rely on third parties for the remainder of our clinical development activities. Our significant third-party clinical development providers include Pfizer for the development of our CDX-110 drug product.

If any of these third parties fails to perform as we expect or if their work fails to meet regulatory standards, our testing could be delayed, cancelled or rendered ineffective.

We depend greatly on third party collaborators to license, develop and commercialize some of our products, and they may not meet our expectations.

We have agreements with companies, including Glaxo, Pfizer and VTI for the licensing, development and ultimate commercialization of some of our products. Some of those agreements give substantial responsibility over the products to the collaborator. Some collaborators may be unable or unwilling to devote sufficient resources to develop our products as their agreements require. They often face business risks similar to ours, and this could interfere with their efforts. Also, collaborators may

choose to devote their resources to products that compete with ours. If a collaborator does not successfully develop any one of our products, we will need to find another collaborator to do so. The success of our search for a new collaborator will depend on our legal right to do so at the time and whether the product remains commercially viable.

The success of our products depends in great part upon our and our collaborators' success in promoting them as superior to other treatment alternatives. We believe that our products can be proven to offer disease prevention and treatment with notable advantages over drugs in terms of patient compliance and effectiveness. However, there can be no assurance that we will be able to prove these advantages or that the advantages will be sufficient to support the successful commercialization of our products.

We may face delays, difficulties or unanticipated costs in establishing sales, distribution and manufacturing capabilities for our commercially ready products.

To date, we have chosen to retain, rather than license, all rights to some of our lead products, such as CDX-011 and our APC Targeting Technology programs. If we proceed with this strategy, we will have full responsibility for commercialization of these products if and when they are approved for sale. We currently lack the marketing, sales and distribution capabilities that we will need to carry out this strategy. To market any of our products directly, we must develop a substantial marketing and sales force with technical expertise and a supporting distribution capability. We have little expertise in this area, and we may not succeed. We may find it necessary to enter into strategic partnerships on uncertain but potentially unfavorable terms to sell, market and distribute our products when they are approved for sale.

Some of our products are difficult to manufacture, especially in large quantities, and we have not yet developed commercial scale manufacturing processes for any of our products. We do not currently plan to develop internal manufacturing capabilities to produce any of our products at commercial scale if they are approved for sale. To the extent that we choose to market and distribute these products ourselves, this strategy will make us dependent on other companies to produce our products in adequate quantities, in compliance with regulatory requirements, and at a competitive cost. We may not find third parties capable of meeting those manufacturing needs.

Certain factors could negatively affect the demand for and sales and profitability of Rotarix®, which would have a material adverse affect on our revenues.

Both the demand and ultimately the profitability of Rotarix® are components to our success. We have licensed a rotavirus strain to Glaxo for the purposes of Glaxo developing and commercializing their Rotarix® vaccine worldwide. Glaxo gained approval for Rotarix® in Mexico in July 2004, in the European Union in February 2006 and in the United States in April 2008. In May 2005, we entered into an agreement whereby an affiliate of Paul Royalty Fund, or PRF, purchased an interest in the net royalties we will receive on worldwide sales of Rotarix®. In addition, we retain upside participation in the worldwide net royalties from Rotarix® once, and if, PRF receives an agreed upon return on capital invested (2.45 times PRF's aggregate cash payments to us of $60 million). The following are potential factors, among others, that may negatively affect the demand for Rotarix®:

- Competitors in the pharmaceuticals, biotechnology and vaccines market have greater financial and management resources, and significantly more experience in bringing products to market, and may develop, manufacture and market products that are more effective or less expensive than Rotarix®;

- Rotarix® could be replaced by a novel product and may become obsolete;

- Glaxo may be unable to prevent third parties from infringing upon their proprietary rights related to Rotarix®;
- Users may not accept such a recently approved product without years of proven history; and
- We are dependent on Glaxo for the manufacturing, testing, acquisition of regulatory approvals, marketing, distribution and commercialization of Rotarix®.

Any of these factors could have a material adverse effect on the sales of Rotarix® and our results of operations.

Other factors could affect the demand for and sales and profitability of Rotarix® and any other of our current or future products.

In general, other factors that could affect the demand for and sales and profitability of our products include, but are not limited to:

- The timing of regulatory approval, if any, of competitive products;
- Our, Glaxo's, Pfizer's or any other of our partners' pricing decisions, as applicable, including a decision to increase or decrease the price of a product, and the pricing decisions of our competitors;
- Government and third-party payer reimbursement and coverage decisions that affect the utilization of our products and competing products;
- Negative safety or efficacy data from new clinical studies conducted either in the U.S. or internationally by any party could cause the sales of our products to decrease or a product to be recalled;
- The degree of patent protection afforded our products by patents granted to or licensed by us and by the outcome of litigation involving our or any of our licensor's patents;
- The outcome of litigation involving patents of other companies concerning our products or processes related to production and formulation of those products or uses of those products;
- The increasing use and development of alternate therapies;
- The rate of market penetration by competing products; and
- The termination of, or change in, existing arrangements with our partners.

Any of these factors could have a material adverse effect on Glaxo's sales of Rotarix® and on any other of our current or future products and results of operations.

We may be unable to manage multiple late stage clinical trials for a variety of product candidates simultaneously.

As our current clinical trials progress, we may need to manage multiple late stage clinical trials simultaneously in order to continue developing all of our current products. The management of late stage clinical trials is more complex and time consuming than early stage trials. Typically early stage trials involve several hundred patients in no more than 10-30 clinical sites. Late stage (Phase 3) trials may involve up to several thousand patients in up to several hundred clinical sites and may require facilities in several countries. Therefore, the project management required to supervise and control such an extensive program is substantially larger than early stage programs. As the need for these resources is not known until some months before the trials begin it is necessary to recruit large numbers of experienced and talented individuals very quickly. If the labor market does not allow this team to be recruited quickly the sponsor is faced with a decision to delay the program or to initiate it

with inadequate management resources. This may result in recruitment of inappropriate patients, inadequate monitoring of clinical investigators and inappropriate handling of data or data analysis. Consequently it is possible that conclusions of efficacy or safety may not be acceptable to permit filing of a Biologic License Application ("BLA") or New Drug Application ("NDA") for any one of the above reasons or a combination of several.

We face the risk of product liability claims, which could exceed our insurance coverage, and produce recalls, each of which could deplete our cash resources.

As a participant in the pharmaceutical, biotechnology and vaccines industries, we are exposed to the risk of product liability claims alleging that use of our products or product candidates caused an injury or harm. These claims can arise at any point in the development, testing, manufacture, marketing or sale of our products or product candidates and may be made directly by patients involved in clinical trials of our products, by consumers or healthcare providers or by individuals, organizations or companies selling our products. Product liability claims can be expensive to defend, even if the product or product candidate did not actually cause the alleged injury or harm.

Insurance covering product liability claims becomes increasingly expensive as a product candidate moves through the development pipeline to commercialization. Under our license agreements, we are required to maintain clinical trial liability insurance coverage up to $14 million. However, there can be no assurance that such insurance coverage is or will continue to be adequate or available to us at a cost acceptable to us or at all. We may choose or find it necessary under our collaborative agreements to increase our insurance coverage in the future. We may not be able to secure greater or broader product liability insurance coverage on acceptable terms or at reasonable costs when needed. Any liability for damages resulting from a product liability claim could exceed the amount of our coverage, require us to pay a substantial monetary award from our own cash resources and have a material adverse effect on our business, financial condition and results of operations. Moreover, a product recall, if required, could generate substantial negative publicity about our products and business and inhibit or prevent commercialization of other products and product candidates.

In addition, some of our licensing and other agreements with third parties require or might require us to maintain product liability insurance. If we cannot maintain acceptable amounts of coverage on commercially reasonable terms in accordance with the terms set forth in these agreements, the corresponding agreements would be subject to termination, which could have a material adverse impact on our operations.

Our reliance on third parties requires us to share our trade secrets, which increases the possibility that a competitor will discover them.

Because we rely on third parties to develop our products, we must share trade secrets with them. We seek to protect our proprietary technology in part by entering into confidentiality agreements and, if applicable, material transfer agreements, collaborative research agreements, consulting agreements or other similar agreements with our collaborators, advisors, employees and consultants prior to beginning research or disclosing proprietary information. These agreements will typically restrict the ability of our collaborators, advisors, employees and consultants to publish data potentially relating to our trade secrets. Our academic collaborators typically have rights to publish data, provided that we are notified in advance and may delay publication for a specified time in order to secure our intellectual property rights arising from the collaboration. In other cases, publication rights are typically controlled exclusively by us, although in some cases we may share these rights with other parties. We also conduct joint research and development programs which may require us to share trade secrets under the terms of research and development partnership or similar agreements. Despite our efforts to protect our trade secrets, our competitors may discover our trade secrets, either through breach of these agreements, independent development or publication of information including our trade secrets in cases

where we do not have proprietary or otherwise protected rights at the time of publication. A competitor's discovery of our trade secrets would impair our competitive position.

We may not be able to successfully integrate newly-acquired technology with our existing technology or to modify our technologies to create new vaccines.

As part of our acquisition of technology assets from entities such as 3M Company and Amgen, we have acquired access to Resiquimod™ (a TLR 7/8 agonist) and Flt3L, which may improve the immunogenicity of our vaccines. If we are able to integrate these licensed assets with our vaccine technologies, we believe these assets will give our vaccines a competitive advantage. However, if we are unable to successfully integrate licensed assets, or other technologies which we have acquired or may acquire in the future, with our existing technologies and potential products currently under development, we may be unable to realize any benefit from our acquisition of these assets, or other technologies which we have acquired or may acquire in the future and may face the loss of our investment of financial resources and time in the integration process.

We believe that our vaccine technology portfolio may offer opportunities to develop vaccines that treat a variety of oncology, inflammatory and infectious diseases by stimulating a patient's immune system against those disease organisms. If our vaccine technology portfolio cannot be used to create effective vaccines against a variety of disease organisms, we may lose all or portions of our investment in development efforts for new vaccine candidates.

We license technology from other companies to develop products, and those companies could influence research and development or restrict our use of it.

Companies that license technologies to us that we use in our research and development programs may require us to achieve milestones or devote minimum amounts of resources to develop products using those technologies. They may also require us to make significant royalty and milestone payments, including a percentage of any sublicensing income, as well as payments to reimburse them for patent costs. The number and variety of our research and development programs require us to establish priorities and to allocate available resources among competing programs. From time to time we may choose to slow down or cease our efforts on particular products. If in doing so we fail to fully perform our obligations under a license, the licensor can terminate the licenses or permit our competitors to use the technology. Moreover, we may lose our right to market and sell any products based on the licensed technology.

We have many competitors in our field and they may develop technologies that make ours obsolete.

Biotechnology, pharmaceuticals and therapeutics are rapidly evolving fields in which scientific and technological developments are expected to continue at a rapid pace. We have many competitors in the U.S. and abroad. These competitors include Alexion, Anadys, Antigenics, Baxter, BioSante, Crucell, Dendreon, Eli Lilly, Emergent, Genitope, GlaxoSmithKline, Idera, Intercell, Immunogen, Maxygen, Merck, NeoPharm, Northwest Biotherapeutics, Novavax, Pfizer, Roche, Sanofi-Aventis, Seattle Genetics, and Vical. Our success depends upon our ability to develop and maintain a competitive position in the product categories and technologies on which we focus. Many of our competitors have greater capabilities, experience and financial resources than we do. Competition is intense and is expected to increase as new products enter the market and new technologies become available. Our competitors may:

- develop technologies and products that are more effective than ours, making ours obsolete or otherwise noncompetitive;
- obtain regulatory approval for products more rapidly or effectively than us; and

- obtain patent protection or other intellectual property rights that would block our ability to develop competitive products.

We rely on patents, patent applications and other intellectual property protections to protect our technology and trade secrets; which are expensive and may not provide sufficient protection.

Our success depends in part on our ability to obtain and maintain patent protection for technologies that we use. Biotechnology patents involve complex legal, scientific and factual questions and are highly uncertain. To date, there is no consistent policy regarding the breadth of claims allowed in biotechnology patents, particularly in regard to patents for technologies for human uses like those we use in our business. We cannot predict whether the patents we seek will issue. If they do issue, a competitor may challenge them and limit their scope. Moreover, our patents may not afford effective protection against competitors with similar technology. A successful challenge to any one of our patents could result in a third party's ability to use the technology covered by the patent. We also face the risk that others will infringe, avoid or circumvent our patents. Technology that we license from others is subject to similar risks and this could harm our ability to use that technology. If we, or a company that licenses technology to us, were not the first creator of an invention that we use, our use of the underlying product or technology will face restrictions, including elimination.

If we must defend against suits brought against us or prosecute suits against others involving intellectual property rights, we will incur substantial costs. In addition to any potential liability for significant monetary damages, a decision against us may require us to obtain licenses to patents or other intellectual property rights of others on potentially unfavorable terms. If those licenses from third parties are necessary but we cannot acquire them, we would attempt to design around the relevant technology, which would cause higher development costs and delays, and may ultimately prove impracticable

Our business requires us to use hazardous materials, which increases our exposure to dangerous and costly accidents.

Our research and development activities involve the use of hazardous chemicals, biological materials and radioactive compounds. Although we believe that our safety procedures for handling and disposing of hazardous materials comply with the standards prescribed by applicable laws and regulations, we cannot completely eliminate the risk of accidental contamination or injury from these materials. In the event of an accident, an injured party will likely sue us for any resulting damages with potentially significant liability. The ongoing cost of complying with environmental laws and regulations is significant and may increase in the future.

Health care reform and restrictions on reimbursement may limit our returns on potential products.

Because our strategy ultimately depends on the commercial success of our products, we assume, among other things, that end users of our products will be able to pay for them. In the United States and other countries, in most cases, the volume of sales of products like those we are developing depends on the availability of reimbursement from third-party payors, including national health care agencies, private health insurance plans and health maintenance organizations. Third-party payors increasingly challenge the prices charged for medical products and services. Accordingly, if we succeed in bringing products to market, and reimbursement is not available or is insufficient, we could be prevented from successfully commercializing our potential products.

The health care industry in the United States and in Europe is undergoing fundamental changes as a result of political, economic and regulatory influences. Reforms proposed from time to time include mandated basic health care benefits, controls on health care spending, the establishment of governmental controls over the cost of therapies, creation of large medical services and products

purchasing groups and fundamental changes to the health care delivery system. We anticipate ongoing review and assessment of health care delivery systems and methods of payment in the United States and other countries. We cannot predict whether any particular reform initiatives will result or, if adopted, what their impact on us will be. However, we expect that adoption of any reform proposed will impair our ability to market products at acceptable prices.

Changes in laws affecting the health care industry could adversely affect our business.

In the U.S., there have been numerous proposals considered at the federal and state levels for comprehensive reforms of health care and its cost, and it is likely that federal and state legislatures and health agencies will continue to focus on health care reform in the future. In March 2010, the U.S. passed legislation to reform the U.S. health care system by expanding health insurance coverage, reducing certain health care costs and making other changes. While this and continued health care reform may increase the number of patients who have insurance coverage for our products, it may also include cost containment measures that adversely affect reimbursement for our products, including:

- change the Medicare reimbursement system for outpatient drugs;
- increase the amount of rebates that manufacturers pay for coverage of their drugs by Medicaid programs; and
- facilitate the importation of lower-cost prescription drugs that are marketed outside the U.S.

Some states are also considering legislation that would control the prices of drugs, and state Medicaid programs are increasingly requesting manufacturers to pay supplemental rebates and requiring prior authorization by the state program for use of any drug for which supplemental rebates are not being paid. Managed care organizations continue to seek price discounts and, in some cases, to impose restrictions on the coverage of particular drugs. Government efforts to reduce Medicaid expenses may lead to increased use of managed care organizations by Medicaid programs. This may result in managed care organizations influencing prescription decisions for a larger segment of the population and a corresponding constraint on prices and reimbursement for our products.

We and our collaborators and partners operate in a highly regulated industry. As a result, governmental actions may adversely affect our business, operations or financial condition, including:

- new laws, regulations or judicial decisions, or new interpretations of existing laws, regulations or decisions, related to health care availability, method of delivery and payment for health care products and services;
- changes in the FDA and foreign regulatory approval processes that may delay or prevent the approval of new products and result in lost market opportunity;
- changes in FDA and foreign regulations that may require additional safety monitoring, labeling changes, restrictions on product distribution or use, or other measures after the introduction of our products to market, which could increase our costs of doing business, adversely affect the future permitted uses of approved products, or otherwise adversely affect the market for our products;
- new laws, regulations and judicial decisions affecting pricing or marketing practices; and
- changes in the tax laws relating to our operations.

The enactment in the U.S. of health care reform, possible legislation which could ease the entry of competing follow-on biologics in the marketplace, new legislation or implementation of existing statutory provisions on importation of lower-cost competing drugs from other jurisdictions, and legislation on comparative effectiveness research are examples of previously enacted and possible future changes in laws that could adversely affect our business. In addition, the Food and Drug Administration

Amendments Act of 2007 included new authorization for the FDA to require post-market safety monitoring, along with an expanded clinical trials registry and clinical trials results database, and expanded authority for the FDA to impose civil monetary penalties on companies that fail to meet certain commitments.

If physicians, patients and third-party payors do not accept any future drugs that we may develop, we may be unable to generate significant revenue, if any.

Even if our drug candidates as well as any drug candidates that we may develop or acquire in the future obtain regulatory approval, they may not gain market acceptance among physicians, patients and health care payors. Physicians may elect not to recommend these drugs for a variety of reasons including:

- timing of market introduction of competitive drugs;
- lower demonstrated clinical safety and efficacy compared to other drugs;
- lack of cost-effectiveness;
- lack of availability of reimbursement from third-party payors;
- convenience and ease of administration;
- prevalence and severity of adverse side effects;
- other potential advantages of alternative treatment methods; and
- ineffective marketing and distribution support.

If our approved drugs fail to achieve market acceptance, we would not be able to generate sufficient revenue from product sales to maintain or grow our business.

If we are not successful in integrating CuraGen's drug development programs, we may not be able to operate efficiently after the CuraGen Merger, which may have a material adverse effect on our results of operations and financial condition.

Achieving the benefits of the CuraGen Merger will depend in part on the successful integration of CuraGen's clinical and preclinical programs and personnel in a timely and efficient manner. The integration process requires coordination of different development, regulatory, and manufacturing teams, and involves the integration of systems, applications, policies, procedures, business processes and operations. This may be difficult and unpredictable because of possible cultural conflicts and different opinions on scientific and regulatory matters. If we cannot successfully integrate CuraGen's programs and personnel, we may not realize the expected benefits of the CuraGen Merger.

Integrating CuraGen's programs may divert management's attention away from our operations.

The successful integration of CuraGen's programs and personnel may place a significant burden on our management and internal resources, including time that will be spent on winding down CuraGen's facility in Connecticut and transitioning certain CuraGen employees to our facilities. The diversion of management's attention and any difficulties encountered in the transition and integration process could result in delays in our clinical trial programs and could otherwise harm our business, financial condition and operating results.

Risks Related to Our Securities

Our history of losses and uncertainty of future profitability make our securities a highly speculative investment.

We have had no commercial revenues to date from sales of our human therapeutic or vaccine products and cannot predict when we will. We have an accumulated deficit of $157.7 million as of December 31, 2009. We expect to spend substantial funds to continue the research and development testing of our products that we have in the preclinical and clinical testing stages of development that have not been partnered.

In anticipation of FDA approval of these products, we will need to make substantial investments to establish sales, marketing, quality control, and regulatory compliance capabilities. These investments will increase if and when any of these products receive FDA approval. We cannot predict how quickly our lead products will progress through the regulatory approval process. As a result, we may continue to lose money for several years.

We cannot be certain that we will achieve or sustain profitability in the future. Failure to achieve profitability could diminish our ability to sustain operations, pay dividends on our securities, obtain additional required funds and make required payments on our present or future indebtedness.

If we cannot sell securities to raise necessary funds, we may be forced to limit our research, development and testing programs.

We will need to raise more capital from investors to advance our clinical and preclinical products and to fund our operations until we receive final FDA approval and our products begin to generate revenues for us. However, based on our history of losses and the on-going uncertainty of the U.S. capital markets, we may have difficulty raising sufficient capital on terms that are acceptable to us, or at all. As of December 31, 2009, we had cash, cash equivalents and marketable securities of $82.5 million, which, at that time, we believed would support expected operations for more than 12 months.

We continue to seek partnerships with pharmaceutical and biotech companies and with other organizations to support the clinical development of our programs, in addition to funded research grants. This kind of funding is at the discretion of other organizations and companies which have limited funds and many companies compete with us for those funds. As a result, we may not receive any research grants or funds from collaborators. If we are unable to raise the necessary funds, we may have to delay or discontinue the clinical development of programs, license out programs earlier than expected, raise funds at significant discount or on other unfavorable terms, if at all, or evaluate a sale of all or part of our business.

Until we begin generating revenue, we may seek funding through the sale of equity, or securities convertible into equity, and further dilution to the then existing stockholders may result. If we raise additional capital through the incurrence of debt, our business may be affected by the amount of leverage it incurs, and its borrowings may subject it to restrictive covenants.

The market price of our common stock has been and could remain volatile.

The market price of our common stock has historically experienced and may continue to experience significant volatility. From January 2009 through December 2009, the market price of our common stock has fluctuated from a high of $14.19 per share in the second quarter of 2009, to a low of $4.16 per share in the fourth quarter of 2009. Our progress in developing and commercializing our products, the impact of government regulations on our products and industry, the potential sale of a large volume of our common stock by stockholders, our quarterly operating results, changes in general conditions in the economy or the financial markets and other developments affecting us or our

competitors could cause the market price of our common stock to fluctuate substantially with significant market losses. If our stockholders sell a substantial number of shares of common stock, especially if those sales are made during a short period of time, those sales could adversely affect the market price of our common stock. In addition, in recent years, the stock market has experienced significant price and volume fluctuations. This volatility has affected the market prices of securities issued by many companies for reasons unrelated to their operating performance and may adversely affect the price of our common stock. In addition, we could be subject to a securities class action litigation as a result of volatility in the price of our stock, which could result in substantial costs and diversion of management's attention and resources and could harm our stock price, business, prospects, results of operations and financial condition.

RATIO OF EARNINGS TO FIXED CHARGES

The following table sets forth our consolidated ratio of earnings to fixed charges for the years ended December 31, 2009, 2008, 2007, 2006 and 2005.

Ratio of Earnings to Fixed Charges

Years ended December 31,				
2009	**2008**	**2007**	**2006**	**2005**
(1)	(1)	(1)	(1)	(1)

(1) Due to our loss from continuing operations for the years ended December 31, 2009, 2008, 2007, 2006 and 2005 earnings were insufficient to cover fixed charges by $36.9 million, $48.8 million, $15.5 million, $18.8 million, and $17.4 million, respectively. For this reason, no ratios are provided.

USE OF PROCEEDS

Unless otherwise provided in the applicable prospectus supplement to this prospectus used to offer specific securities, we expect to use the net proceeds from any offering of securities by us for general corporate purposes, which may include acquisitions, capital expenditures, investments, and the repayment, redemption or refinancing of all or a portion of any indebtedness or other securities outstanding at a particular time, to fund our operations until we receive FDA approval of our products and are able to commercialize our products and to make substantial investments to establish sales, marketing, quality control, and regulatory compliance capabilities in anticipation of FDA approval of our products. Pending the application of the net proceeds, we expect to invest the proceeds in short-term, interest-bearing instruments with a maturity of three months or less at the date of purchase and consist primarily of investments in money market mutual funds with commercial banks and financial institutions or other investment-grade securities. Such investments may include depositing such net proceeds into, and maintaining cash balances with, financial institutions in excess of insured limits.

DESCRIPTIONS OF SECURITIES WE MAY OFFER

This prospectus contains summary descriptions of the common stock, preferred stock, warrants, depositary shares and units that we may offer and sell from time to time. The preferred stock may also be exchangeable for and/or convertible into shares of common stock or another series of preferred stock. When one or more of these securities are offered in the future, a prospectus supplement will explain the particular terms of the securities and the extent to which these general provisions may apply. These summary descriptions and any summary descriptions in the applicable prospectus supplement do not purport to be complete descriptions of the terms and conditions of each security and are qualified in their entirety by reference to our third restated certificate of incorporation, as amended, our by-laws and by applicable Delaware law and any other documents referenced in such summary descriptions and from which such summary descriptions are derived. If any particular terms of a security described in the applicable prospectus supplement differ from any of the terms described herein, then the terms described herein will be deemed superseded by the terms set forth in that prospectus supplement.

We may issue securities in book-entry form through one or more depositaries, such as The Depository Trust Company, Euroclear or Clearstream, named in the applicable prospectus supplement. Each sale of a security in book-entry form will settle in immediately available funds through the applicable depositary, unless otherwise stated. We will issue the securities only in registered form, without coupons, although we may issue the securities in bearer form if so specified in the applicable prospectus supplement. If any securities are to be listed or quoted on a securities exchange or quotation system, the applicable prospectus supplement will say so.

DESCRIPTION OF COMMON STOCK

As of March 31, 2010 we are authorized to issue up to 297,000,000 shares of common stock, $.001 par value per share. As of March 31, 2010, approximately 31,759,718 shares of common stock were outstanding. All outstanding shares of our common stock are fully paid and non-assessable. Our common stock is listed on the NASDAQ Global Select Market System under the symbol "CLDX".

Dividends

The Board of Directors may, out of funds legally available, at any regular or special meeting, declare dividends to the holders of shares of our common stock as and when they deem expedient, subject to the rights of holders of the preferred stock, if any.

Voting

Each share of common stock entitles the holders to one vote per share on all matters requiring a vote of the stockholders, including the election of directors. No holders of shares of common stock shall have the right to vote such shares cumulatively in any election for the board of directors.

Rights Upon Liquidation

In the event of our voluntary or involuntary liquidation, dissolution, or winding up, the holders of our common stock will be entitled to share equally in our assets available for distribution after payment in full of all debts and after the holders of preferred stock, if any, have received their liquidation preferences in full.

Miscellaneous

No holders of shares of our common stock shall have any preemptive rights to subscribe for, purchase or receive any shares of any class, whether now or hereafter authorized, or any options or warrants to purchase any such shares, or any securities convertible into or exchanged for any such shares, which may at any time be issued, sold or offered for sale by Celldex.

Anti-Takeover Provisions

Certain provisions in our third restated certificate of incorporation, as amended, and applicable Delaware corporate, as well as our shareholder rights agreement, may have the effect of discouraging a change of control of Celldex, even if such a transaction is favored by some of our stockholders and could result in stockholders receiving a substantial premium over the current market price of our shares. The primary purpose of these provisions is to encourage negotiations with our management by persons interested in acquiring control of our corporation. These provisions may also tend to perpetuate present management and make it difficult for stockholders owning less than a majority of the shares to be able to elect even a single director.

Pursuant to our shareholder rights agreement (referred to in this prospectus as the rights agreement) a dividend of one Preferred Stock Purchase Right (referred to in this prospectus as a right) for each share of common stock of Celldex was declared for each outstanding share of common stock of Celldex on November 11, 2004. Each share of common stock of Celldex issued after such date is also issued with a right. Each right entitles the registered holder to purchase from Celldex a unit consisting of one one-ten thousandth of a share of Celldex Series C-1 Junior Participating Cumulative Preferred Stock, at a cash exercise price of $35 per unit, subject to adjustment as specified in the rights agreement. We describe the rights more completely in the rights agreement itself, which is contained in Exhibit 4.1 to our Registration Statement on Form 8-A filed on November 8, 2004. The summary of the provisions of the rights agreement is qualified in its entirety by reference to that agreement.

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

DESCRIPTION OF PREFERRED STOCK

At December 31, 2009, the Company had authorized preferred stock comprised of 3,000,000 shares of Class C Preferred Stock of which 350,000 shares has been designated as Class C-1 Junior Participating Cumulative, the terms of which are to be determined by our Board of Directors. As of March 31, 2010, there was no preferred stock outstanding.

Class C Preferred Stock

This section describes the general terms and provisions of our Class C Preferred Stock. The applicable prospectus supplement will describe the specific terms of the shares of preferred stock offered through that prospectus supplement, as well as any general terms described in this section that will not apply to those shares of preferred stock.

Our board of directors has been authorized to provide for the issuance of the 2,650,000 unissued and undesignated shares of our Class C Preferred Stock In general, our third restated certificate of incorporation, as amended, authorizes our board of directors to issue new shares of our common stock or preferred stock without further stockholder action, provided that there are sufficient authorized shares.

With respect to each series of our Class C Preferred Stock, our board of directors has the authority to fix the following terms:

- the designation of the series;
- the number of shares within the series;
- whether dividends are cumulative and, if cumulative, the dates from which dividends are cumulative;
- the rate of any dividends, any conditions upon which dividends are payable, and the dates of payment of dividends;
- whether interests in the shares of preferred stock will be represented by depositary shares as more fully described below under "Description of Depositary Shares";
- whether the shares are redeemable, the redemption price and the terms of redemption;
- the amount payable to you for each share you own if we dissolve or liquidate;
- whether the shares are convertible or exchangeable, the price or rate of conversion or exchange, and the applicable terms and conditions;
- any restrictions on issuance of shares in the same series or any other series;
- voting rights applicable to the series of preferred stock; and
- any other rights, priorities, preferences, restrictions or limitations of such series.

The rights with respect to any shares of our Class C Preferred Stock will be subordinate to the rights of our general creditors. Shares of our Class C Preferred Stock that we issue in accordance with their terms will be fully paid and nonassessable, and will not be entitled to preemptive rights unless specified in the applicable prospectus supplement.

Our ability to issue preferred stock, or rights to purchase such shares, could discourage an unsolicited acquisition proposal. For example, we could impede a business combination by issuing a series of preferred stock containing class voting rights that would enable the holders of such preferred stock to block a business combination transaction. Alternatively, we could facilitate a business combination transaction by issuing a series of preferred stock having sufficient voting rights to provide

a required percentage vote of the stockholders. Additionally, under certain circumstances, our issuance of preferred stock could adversely affect the voting power of the holders of our common stock. Although our board of directors is required to make any determination to issue any preferred stock based on its judgment as to the best interests of our stockholders, our board of directors could act in a manner that would discourage an acquisition attempt or other transaction that some, or a majority, of our stockholders might believe to be in their best interests or in which stockholders might receive a premium for their stock over prevailing market prices of such stock. Our board of directors does not at present intend to seek stockholder approval prior to any issuance of currently authorized stock, unless otherwise required by law or applicable stock exchange requirements.

Terms of the Preferred Stock That We May Offer and Sell to You

We summarize below some of the provisions that will apply to the preferred stock that we may offer to you unless the applicable prospectus supplement provides otherwise. This summary may not contain all information that is important to you. You should read the prospectus supplement, which will contain additional information and which may update or change some of the information below. Prior to the issuance of a new series of preferred stock, we will further amend our third restated certificate of incorporation, as amended, designating the stock of that series and the terms of that series. We will file a copy of the certificate of designation that contains the terms of each new series of preferred stock with the SEC each time we issue a new series of preferred stock. Each certificate of designation will establish the number of shares included in a designated series and fix the designation, powers, privileges, preferences and rights of the shares of each series as well as any applicable qualifications, limitations or restrictions. You should refer to the applicable certificate of designation as well as our third restated certificate of incorporation, as amended, before deciding to buy shares of our preferred stock as described in the applicable prospectus supplement.

Our board of directors has the authority, without further action by the stockholders, to issue preferred stock in one or more series and to fix the number of shares, dividend rights, conversion rights, voting rights, redemption rights, liquidation preferences, sinking funds, and any other rights, preferences, privileges and restrictions applicable to each such series of preferred stock.

The issuance of any preferred stock could adversely affect the rights of the holders of common stock and, therefore, reduce the value of the common stock. The ability of our board of directors to issue preferred stock could discourage, delay or prevent a takeover or other corporate action.

The terms of any particular series of preferred stock will be described in the prospectus supplement relating to that particular series of preferred stock, including, where applicable:

- the designation, stated value and liquidation preference of such preferred stock;
- the number of shares within the series;
- the offering price;
- the dividend rate or rates (or method of calculation), the date or dates from which dividends shall accrue, and whether such dividends shall be cumulative or noncumulative and, if cumulative, the dates from which dividends shall commence to cumulate;
- whether interests in the shares of preferred stock will be represented by depository shares as more fully described below under "Description of Depositary Shares");
- any redemption or sinking fund provisions;
- the amount that shares of such series shall be entitled to receive in the event of our liquidation, dissolution or winding-up;

- the terms and conditions, if any, on which shares of such series shall be convertible or exchangeable for shares of our stock of any other class or classes, or other series of the same class;

- the voting rights, if any, of shares of such series; the status as to reissuance or sale of shares of such series redeemed, purchased or otherwise reacquired, or surrendered to us on conversion or exchange;

- the conditions and restrictions, if any, on the payment of dividends or on the making of other distributions on, or the purchase, redemption or other acquisition by us or any subsidiary, of the common stock or of any other class of our shares ranking junior to the shares of such series as to dividends or upon liquidation;

- the conditions and restrictions, if any, on the creation of indebtedness by us or by any subsidiary, or on the issuance of any additional stock ranking on a parity with or prior to the shares of such series as to dividends or upon liquidation; and

- any additional dividend, liquidation, redemption, sinking or retirement fund and other rights, preferences, privileges, limitations and restrictions of such preferred stock.

The description of the terms of a particular series of preferred stock in the applicable prospectus supplement will not be complete. You should refer to the applicable amendment to our third restated certificate of incorporation, as amended, for complete information regarding a series of preferred stock.

The preferred stock will, when issued against payment of the consideration payable therefor, be fully paid and nonassessable. Unless otherwise specified in the applicable prospectus supplement, each series of preferred stock will, upon issuance, rank senior to the common stock and on a parity in all respects with each other outstanding series of preferred stock. The rights of the holders of our preferred stock will be subordinate to that of our general creditors.

DESCRIPTION OF WARRANTS

We summarize below some of the provisions that will apply to the warrants unless the applicable prospectus supplement provides otherwise. This summary may not contain all information that is important to you. The complete terms of the warrants will be contained in the applicable warrant certificate and warrant agreement. These documents have been or will be included or incorporated by reference as exhibits to the registration statement of which this prospectus is a part. You should read the warrant certificate and the warrant agreement. You should also read the prospectus supplement, which will contain additional information and which may update or change some of the information below.

General

We may issue, together with other securities or separately, warrants to purchase common stock, preferred stock or other securities. We may issue the warrants under warrant agreements to be entered into between us and a bank or trust company, as warrant agent, all as set forth in the applicable prospectus supplement. The warrant agent would act solely as our agent in connection with the warrants of the series being offered and would not assume any obligation or relationship of agency or trust for or with any holders or beneficial owners of warrants.

The applicable prospectus supplement will describe the following terms, where applicable, of warrants in respect of which this prospectus is being delivered:

- the title of the warrants;

- the designation, amount and terms of the securities for which the warrants are exercisable and the procedures and conditions relating to the exercise of such warrants;
- the designation and terms of the other securities, if any, with which the warrants are to be issued and the number of warrants issued with each such security;
- the price or prices at which the warrants will be issued;
- the aggregate number of warrants;
- any provisions for adjustment of the number or amount of securities receivable upon exercise of the warrants or the exercise price of the warrants;
- the price or prices at which the securities purchasable upon exercise of the warrants may be purchased;
- if applicable, the date on and after which the warrants and the securities purchasable upon exercise of the warrants will be separately transferable;
- if applicable, a discussion of the material U.S. federal income tax considerations applicable to the warrants;
- any other terms of the warrants, including terms, procedures and limitations relating to the exchange and exercise of the warrants;
- the date on which the right to exercise the warrants shall commence and the date on which the right shall expire;
- if applicable, the maximum or minimum number of warrants which may be exercised at any time;
- the identity of the warrant agent;
- any mandatory or optional redemption provision;
- whether the warrants are to be issued in registered or bearer form;
- whether the warrants are extendible and the period or periods of such extendibility;
- information with respect to book-entry procedures, if any; and
- any other terms of the warrants.

Before exercising their warrants, holders of warrants will not have any of the rights of holders of the securities purchasable upon such exercise, including the right to receive dividends, if any, or payments upon our liquidation, dissolution or winding-up or to exercise voting rights, if any.

Exercise of Warrants

Each warrant will entitle the holder thereof to purchase such number of shares of common stock or preferred stock or other securities at the exercise price as will in each case be set forth in, or be determinable as set forth in, the applicable prospectus supplement. Warrants may be exercised at any time up to the close of business on the expiration date set forth in the applicable prospectus supplement. After the close of business on the expiration date, unexercised warrants will become void. Warrants may be exercised as set forth in the applicable prospectus supplement relating to the warrants offered thereby. Upon receipt of payment and the warrant certificate properly completed and duly executed at the corporate trust office of the warrant agent or any other office indicated in the applicable prospectus supplement, we will, as soon as practicable, forward the purchased securities. If less than all of the warrants represented by the warrant certificate are exercised, a new warrant certificate will be issued for the remaining warrants.

Enforceability of Rights of Holders of 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, that holder's warrant(s).

Modification of the Warrant Agreement

The warrant agreement will permit us and the warrant agent, without the consent of the warrant holders, to supplement or amend the agreement in the following circumstances:

- to cure any ambiguity;
- to correct or supplement any provision which may be defective or inconsistent with any other provisions; or
- to add new provisions regarding matters or questions that we and the warrant agent may deem necessary or desirable and which do not adversely affect the interests of the warrant holders.

DESCRIPTION OF DEPOSITARY SHARES

We summarize below some of the provisions that will apply to depositary shares unless the applicable prospectus supplement provides otherwise. This summary may not contain all information that is important to you. The complete terms of the depositary shares will be contained in the depositary agreement and depositary receipt applicable to any depositary shares. These documents have been or will be included or incorporated by reference as exhibits to the registration statement of which this prospectus is a part. You should read the depositary agreement and the depositary receipt. You should also read the prospectus supplement, which will contain additional information and which may update or change some of the information below.

General

We may, at our option, elect to offer fractional or multiple shares of common stock or preferred stock, rather than single shares of common stock or preferred stock (to be set forth in the prospectus supplement relating to such depositary shares). In the event we elect to do so, depositary receipts evidencing depositary shares will be issued to the public.

The shares of common stock or any class or series of preferred stock represented by depositary shares will be deposited under a deposit agreement among us, a depositary selected by us, and the holders of the depositary receipts. The depositary will be a bank or trust company having its principal office in the United States and having a combined capital and surplus of at least $50 million. Subject to the terms of the deposit agreement, each owner of a depositary share will be entitled, in proportion to the applicable fraction of a share of common stock or preferred stock represented by such depositary share, to all the rights and preferences of the shares of common stock or preferred stock represented by the depositary share, including dividend, voting, redemption and liquidation rights.

The depositary shares will be evidenced by depositary receipts issued pursuant to the deposit agreement. Depositary receipts will be distributed to those persons purchasing the fractional shares of common stock or the related class or series of preferred shares in accordance with the terms of the offering described in the related prospectus supplement.

DESCRIPTION OF UNITS

We may issue units comprised of one or more of the other securities described in this prospectus in any combination. Each unit will be issued so that the holder of the unit is also the holder of each security included in the unit. Thus, the holder of a unit will have the rights and obligations of a holder of each included security. The unit agreement under which a unit is issued may provide that the securities included in the unit may not be held or transferred separately, at any time or at any time before a specified date. The applicable prospectus supplement may describe:

- the designation and terms of the units and of the securities comprising the units, including whether and under what circumstances those securities may be held or transferred separately;
- any provisions for the issuance, payment, settlement, transfer or exchange of the units or of the securities comprising the units;
- the terms of the unit agreement governing the units;
- United States federal income tax considerations relevant to the units; and
- whether the units will be issued in fully registered global form.

This summary of certain general terms of units and any summary description of units in the applicable prospectus supplement do not purport to be complete and are qualified in their entirety by reference to all provisions of the applicable unit agreement and, if applicable, collateral arrangements and depositary arrangements relating to such units. The forms of the unit agreements and other documents relating to a particular issue of units will be filed with the SEC each time we issue units, and you should read those documents for provisions that may be important to you.

PLAN OF DISTRIBUTION

We may sell the securities covered hereby from time to time pursuant to underwritten public offerings, direct sales to the public, negotiated transactions, block trades or a combination of these methods. A distribution of the securities offered by this prospectus may also be effected through the issuance of derivative securities, including without limitation, warrants and subscriptions. We may sell the securities to or through underwriters or dealers, through agents, or directly to one or more purchasers. We may distribute securities from time to time in one or more transactions:

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

A prospectus supplement or supplements will describe the terms of the offering of the securities, including:

- the name or names of the underwriters, dealers or agents participating in the offering, if any;
- the purchase price of the securities sold by us to any underwriter or dealer and the net proceeds we expect to receive from the offering;
- any over-allotment options under which underwriters may purchase additional securities from us;
- any agency fees or underwriting discounts or commissions and other items constituting agents' or underwriters' compensation;

- any public offering price;
- any discounts or concessions allowed or reallowed or paid to dealers; and
- any securities exchange or market on which the securities may be listed.

Only underwriters named in the prospectus supplement will be underwriters of the securities offered by the prospectus supplement.

If underwriters are used in the sale, they will acquire the securities for their own account and may resell the securities from time to time in one or more transactions at a fixed public offering price or at varying prices determined at the time of sale. The obligations of the underwriters to purchase the securities will be subject to the conditions set forth in the applicable underwriting agreement. We may offer the securities to the public through underwriting syndicates represented by managing underwriters or by underwriters without a syndicate. Subject to certain conditions, the underwriters will be obligated to purchase all of the securities offered by the prospectus supplement, other than securities covered by any over-allotment option. Any public offering price and any discounts or commissions or concessions allowed or reallowed or paid to dealers may change from time to time. We may use underwriters with whom we have a material relationship. We will describe in the prospectus supplement, naming the underwriter, the nature of any such relationship.

We may sell securities directly or through agents we designate from time to time. We will name any agent involved in the offering and sale of securities and we will describe any commissions and other compensation we will pay the agent in the prospectus supplement. Unless the prospectus supplement states otherwise, our agent will act on a best-efforts basis for the period of its appointment.

We may authorize agents or underwriters to solicit offers by certain types of institutional investors to purchase securities from us at the public offering price set forth in the prospectus supplement pursuant to delayed delivery contracts providing for payment and delivery on a specified date in the future. We will describe the conditions to these contracts and the commissions we must pay for solicitation of these contracts in the prospectus supplement.

We may provide agents and underwriters with indemnification against civil liabilities related to this offering, including liabilities under the Securities Act, or contribution with respect to payments that the agents or underwriters may make with respect to these liabilities. Agents and underwriters may engage in transactions with, or perform services for, us in the ordinary course of business.

All securities we may offer, other than common stock, will be new issues of securities with no established trading market. Any agents or underwriters may make a market in these securities, but will not be obligated to do so and may discontinue any market making at any time without notice. We cannot guarantee the liquidity of the trading markets for any securities. There is currently no market for any of the offered securities, other than our common stock which is listed on the on the NASDAQ Capital Market. We have no current plans for listing of the debt securities, preferred stock, warrants or subscription rights on any securities exchange or quotation system; any such listing with respect to any particular debt securities, preferred stock, warrants or subscription rights will be described in the applicable prospectus supplement or other offering materials, as the case may be.

Any underwriter may engage in overallotment, stabilizing transactions, short covering transactions and penalty bids in accordance with Regulation M under the Exchange Act. Overallotment involves sales in excess of the offering size, which create a short position. Stabilizing transactions permit bids to purchase the underlying security so long as the stabilizing bids do not exceed a specified maximum. Short covering transactions involve purchases of the securities in the open market after the distribution is completed to cover short positions. Penalty bids permit the underwriters to reclaim a selling concession from a dealer when the securities originally sold by the dealer are purchased in a stabilizing or covering transaction to cover short positions. Those activities may cause the price of the securities to

be higher than it would otherwise be. If commenced, the underwriters may discontinue any of the activities at any time.

Any agents and underwriters who are qualified market makers on the NASDAQ Capital Market may engage in passive market making transactions in the securities on the NASDAQ Capital Market in accordance with Regulation M, during the business day prior to the pricing of the offering, before the commencement of offers or sales of the securities. Passive market makers must comply with applicable volume and price limitations and must be identified as passive market makers. In general, a passive market maker must display its bid at a price not in excess of the highest independent bid for such security; if all independent bids are lowered below the passive market maker's bid, however, the passive market maker's bid must then be lowered when certain purchase limits are exceeded. Passive market making may stabilize the market price of the securities at a level above that which might otherwise prevail in the open market and, if commenced, may be discontinued at any time.

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

INCORPORATION OF CERTAIN DOCUMENTS BY REFERENCE

The SEC allows us to "incorporate by reference" into this prospectus the information we have filed with the SEC, which means that we can disclose important information to you by referring you to those documents. Any information that we file subsequently with the SEC will automatically update this prospectus. We incorporate by reference into this prospectus the information contained in the documents listed below, which is considered to be a part of this prospectus:

- Our Annual Report on Form 10-K for the year ended December 31, 2009, filed on March 12, 2010, as amended by Amendment No. 1 to our Annual Report on Form 10-K for the year ended December 31, 2009 filed on March 31, 2010.

- Our Current Reports on Form 8-K filed with the Commission on January 8, 2010, January 25, 2010, February 16, 2010, March 4, 2010 and March 30, 2010 (in each case except to the extent furnished but not filed).

- The description of our Common Stock contained in our registration statement on Form 8-A, filed with the Commission on September 22, 1986 under Section 12 of the Securities Exchange Act of 1934, as amended, and any amendments or reports filed for the purpose of updating such description.

- The description of the rights to purchase our Series C-1 Junior Participating Cumulative Preferred Stock contained in our registration statement on Form S-4, filed with the SEC on December 21, 2007, our registration statement on Form 8-A filed with the SEC on November 8, 2004, our registration statement on Form 8-A/A filed with the SEC on October 22, 2007, our registration statement on Form 8-A/A filed with the SEC on March 7, 2008, and any amendment or report filed with the SEC for the purposes of updating such descriptions.

We also incorporate by reference all documents we file under Sections 13(a), 13(c), 14 or 15(d) of the Exchange Act (a) after the initial filing date of the registration statement of which this prospectus is a part and before the effectiveness of the registration statement and (b) after the effectiveness of the registration statement and before the filing of a post-effective amendment that indicates that the securities offered by this prospectus have been sold or that deregisters the securities covered by this prospectus then remaining unsold. The most recent information that we file with the SEC automatically updates and supersedes older information. The information contained in any such filing will be deemed to be a part of this prospectus, commencing on the date on which the document is filed.

In addition, we incorporate by reference the documents listed below made by CuraGen with the SEC under Sections 13(a), 13(c), 14 or 15(d) of the Securities Exchange Act of 1934:

- CuraGen's Annual Report on Form 10-K for the year Fiscal year ended December 31, 2008, filed on March 10, 2009 as amended by Amendment No. 1 to CuraGen's Annual Report on Form 10-K for the Fiscal Year ended December 31, 2008 filed on April 30, 2009 and Amendment No. 2 to CuraGen's Annual Report on Form 10-K for the fiscal year ended December 31, 2008 filed on June 19, 2009.

- CuraGen's Quarterly Report on Form 10-Q for the quarterly period ended September 30, 2009, filed November 6, 2009.

We will furnish without charge to each person, including any beneficial owner, to whom this prospectus is delivered, upon written or oral request, a copy of any documents incorporated by reference other than exhibits to those documents. Requests should be addressed to: 119 Fourth Avenue, Needham, Massachusetts 02494, Attention: Corporate Secretary (telephone number (781) 433-0771).

You should rely only on the information incorporated by reference or provided in this prospectus. We have not authorized anyone to provide you with different information. You should not assume that the information in this prospectus or the documents incorporated by reference is accurate as of any date other than the date on the front of this prospectus or those documents.

Celldex Therapeutics, Inc.
Attention: Investor Relations
119 Fourth Avenue
Needham, Massachusetts 02494
telephone number (781) 433-0771

LEGAL MATTERS

Unless otherwise indicated in the applicable prospectus supplement, the validity of the securities offered hereby will be passed upon for us by Lowenstein Sandler PC, Roseland, New Jersey. If the validity of the securities offered hereby in connection with offerings made pursuant to this prospectus are passed upon by counsel for the underwriters, dealers or agents, if any, such counsel will be named in the prospectus supplement relating to such offering.

EXPERTS

The financial statements of Celldex Therapeutics, Inc. as of December 31, 2009 and 2008 and for the years ended December 31, 2009 and 2008 and management's assessment of the effectiveness of internal control over financial reporting (which is included in Management's Report on Internal Control over Financial Reporting) incorporated in this prospectus by reference to the Annual Report on Form 10-K of Celldex Therapeutics, Inc. for the year ended December 31, 2009 have been so incorporated in reliance on the report of PricewaterhouseCoopers LLP, an independent registered public accounting firm, given on the authority of said firm as experts in auditing and accounting.

Ernst & Young LLP, independent registered public accounting firm, has audited our consolidated financial statements of Celldex Therapeutics, Inc. included in our Annual Report on Form 10-K for the year ended December 31, 2007, which is incorporated by reference in this prospectus and elsewhere in the registration statement. Our financial statements as of December 31, 2007 are incorporated by reference in reliance on Ernst & Young LLP's report, given on their authority as experts in accounting and auditing.

The consolidated financial statements of CuraGen Corporation, incorporated in this prospectus by reference from CuraGen Corporation's Annual Report on Form 10-K for the year ended December 31, 2008, as amended by Amendments No. 1 and 2 to CuraGen's Annual Report on Form 10-K for the year ended December 31, 2008 and the effectiveness of CuraGen Corporation's internal control over financial reporting, have been audited by Deloitte & Touche LLP, an independent registered public accounting firm, as stated in their report, which is incorporated herein by reference. Such financial statements have been so incorporated in reliance upon the report of such firm given upon their authority as experts in accounting and auditing.

WHERE YOU CAN FIND MORE INFORMATION

We have filed with the SEC a registration statement on Form S-3, including exhibits, under the Securities Act with respect to the securities being offered under this prospectus. This prospectus does not contain all of the information set forth in the registration statement. This prospectus contains descriptions of certain agreements or documents that are exhibits to the registration statement. The statements as to the contents of such exhibits, however, are brief descriptions and are not necessarily complete, and each statement is qualified in all respects by reference to such agreement or document. For further information about us, please refer to the registration statement and the documents incorporated by reference in this prospectus.

We file annual, quarterly and special reports, proxy statements and other information with the SEC. Our SEC filings are available to the public over the Internet at the SEC's website at *http://www.sec.gov*. The SEC's website contains reports, proxy statements and other information regarding issuers, such as Celldex Therapeutics, Inc., that file electronically with the SEC. You may also read and copy any document we file with the SEC at the SEC's Public Reference Room, located at 100 F Street, N.E., Washington, D.C. 20549. Please call the SEC at 1-800-SEC-0330 for further information on the operation of its Public Reference Room. We make available free of charge through our web site our Annual Report on Form 10-K, Quarterly Reports on Form 10-Q, Current Reports on Form 8-K, Proxy Statements on Schedule 14A and all amendments to those reports as soon as reasonably practicable after such material is electronically filed with or furnished to the SEC. Our website address is *http://www.celldextherapeutics.com*. Please note that our website address is provided as an inactive textual reference only. Information contained on or accessible through our website is not part of this prospectus or the prospectus supplement, and is therefore not incorporated by reference unless such information is otherwise specifically referenced elsewhere in this prospectus or the prospectus supplement.

You should rely only on the information contained or incorporated by reference in this prospectus. No one has been authorized to provide you with different information. If anyone provides you with different or inconsistent information, you should not rely on it. We are not making an offer to sell these securities in any jurisdiction where the offer or sale is not permitted. You should assume that the information appearing in this prospectus, as well as information we filed with the SEC and incorporated by reference, is accurate as of the date of those documents only. Our business, financial condition and results of operations described in those documents may have changed since those dates.

CELLDEX THERAPEUTICS, INC.
PROSPECTUS
April 22, 2010

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$44,000,000 of Shares

Common Stock

Prospectus Supplement

September 24, 2012