

This free writing prospectus relates only to the initial public offering of common stock of Cerulean Pharma Inc. (the "Company") and should be read together with the preliminary prospectus dated March 31, 2014 relating to this offering (the "Preliminary Prospectus"), included in Amendment No. 2 to the Registration Statement on Form S-1 (Registration No. 333-194442) (the "Registration Statement") relating to these securities, which can be accessed through the following link: http://www.sec.gov/Archives/edgar/data/1401914/000119312514122758/d657877ds1a.htm .

The following information supplements and updates the information contained in the Preliminary Prospectus.

Initial public offering price:\$7.00 per shareCommon stock offered:8,500,000 sharesCommon stock to be outstanding after this19,014,563 shares

offering:

Over-allotment option: The underwriters have an option for a period of 30 days to purchase up to 1,275,000 additional shares of our

common stock to cover over-allotments.

Net Proceeds:We estimate that the net proceeds from this offering, after deducting underwriting discounts and commissions and estimated offering expenses payable by us, will be approximately \$53.5 million, or

approximately \$61.8 million if the underwriters exercise their overallotment option to purchase additional

shares from us in full.

Potential purchases by existing stockholders:

Certain of our existing principal stockholders and their affiliated entities have indicated an interest in purchasing an aggregate of up to approximately \$33.0 million of shares of common stock in this offering at the initial public offering price, or approximately 4,700,000 of the 8,500,000 shares in this offering, as set forth below. However, because indications of interest are not binding agreements or commitments to purchase, the underwriters could determine to sell more, fewer or no shares to any of these potential purchasers and any of these potential purchasers could determine to purchase more, fewer or no shares in this offering.

Indication Percentage of of Common Interest to Shares that Beneficially Purchase may be Purchased in Shares in Owned After **Beneficial Owner** Offering Offering Offering **Entities affiliated with Polaris Partners** 1,690,071 \$11,830,500 **Entities affiliated with Venrock** 1,085,228 16.7% \$ 7,596,600 **Entities affiliated with Lux Capital** 765,000 109,285 5.1% **Entities affiliated with Lilly Ventures** \$ 5,900,400 842 914 13.0% **Entities affiliated with Crown Ventures** \$ 6.656,700 950,957 12.5%

The calculations of the percentages in the table above are based on 19,014,563 shares of common stock outstanding after this offering, assuming no exercise by the underwriters of their option to purchase additional shares of our common stock to cover over-allotments.

Pro forma as adjusted balance sheet data:

Based on the initial public offering price of \$7.00 per share and the sale of 8,500,000 shares in this offering, and after deducting underwriting discounts and commissions and estimated offering expenses payable by us in connection with this offering, as of December 31, 2013, on a pro forma as adjusted basis, cash and cash equivalents would have been approximately \$68.3 million, total assets would have been approximately \$68.9 million and total stockholders' equity would have been approximately \$59.3 million.

Capitalization:

Based on the initial public offering price of \$7.00 per share and the sale of 8,500,000 shares in this offering, on a pro forma as adjusted basis, cash and cash equivalents would have been approximately \$68.3 million, additional paid-in capital would have been approximately \$157.7 million, total stockholders' equity would have been approximately \$59.3 million, and total capitalization would have been approximately

\$65.5 million.

Dilution:

The pro forma as adjusted capitalization information above reflects (i) the issuance of 1,319,302 shares of common stock upon the conversion of all outstanding principal and accrued interest on our 2013 convertible notes upon the closing of this offering at the initial public offering price per share of \$7.00, and assuming that the offering closes on April 15, 2014 and (ii) the issuance of 1,582,931 shares of common stock upon the conversion of all outstanding principal and accrued interest on our 2014 convertible notes upon the closing of this offering, at 77.5% of the initial public offering price, or \$5.43 per share, and assuming that the offering closes on April 15, 2014.

Our pro forma net tangible deficit as of December 31, 2013 was \$(3.6) million, or \$(0.40) per share of common stock. Pro forma net tangible book value per share represents the amount of our total tangible assets less our total liabilities, divided by the pro forma number of shares of our common stock outstanding on December 31, 2013, after giving effect to (i) the automatic conversion of all of our outstanding shares of preferred stock into shares of our common stock upon the closing of this offering, (ii) the issuance of 1,293,986 shares of common stock upon the conversion of all outstanding principal and accrued interest as of December 31, 2013 on our 2013 convertible notes upon the closing of this offering, at the initial public offering price per share of \$7.00, and (iii) the reclassification of our preferred stock warrant liability to additional paid in capital, a component of stockholders' (deficit) equity.

After giving effect to our issuance and sale of 8,500,000 shares of common stock in this offering at the initial public offering price of \$7.00 per share, and after deducting the underwriting discounts and commissions and estimated offering expenses payable by us, the issuance of 1,582,931 shares of common stock upon the conversion of all outstanding principal and interest on our 2014 convertible notes, which convert at 77.5% of the initial public offering price, or \$5.43 per share, and assuming that the offering closes on April 15, 2014, and the issuance of 25,317 shares of common stock upon the conversion of accrued interest on our 2013 convertible notes for the period beginning January 1, 2014 to April 15, 2014, our pro forma as adjusted net tangible book value as of December 31, 2013 would have been \$59.2 million, or \$3.12 per share. This represents an immediate increase in pro forma net tangible book value to existing stockholders of \$3.52 per share and immediate dilution of \$3.88 in pro forma net tangible book value per share to new investors purchasing common stock in this offering. Dilution per share to new investors is determined by subtracting pro forma net tangible book value per share paid by new investors.

If the underwriters exercise their option to purchase additional shares from us in full, the number of shares held by new investors will increase to 5,060,719, or 25% of the total number of shares of common stock outstanding after this offering, and the percentage of shares held by existing stockholders will decrease to 75% of the total shares outstanding.

Risk Factor – "Our principal stockholders and management own a significant percentage of our stock and will be able to exercise significant influence over matters subject to stockholder approval.": Following the closing of this offering, our executive officers, directors and principal stockholders, together with their respective affiliates, will beneficially own approximately 51% of our common stock, not including any shares purchased by these stockholders in this offering, or 75% of our common stock, assuming these stockholders purchase the approximately \$33 million of shares of common stock they have indicated an interest in purchasing in this offering. Accordingly, these stockholders will be able to exert a significant degree of influence over our management and affairs and over matters requiring stockholder approval, including the election of our board of directors and approval of significant corporate transactions. This concentration of ownership could have the effect of delaying or preventing a change in control of our company or otherwise discouraging a potential acquirer from attempting to obtain control of us, which in turn could have a material and adverse effect on the fair market value of our common stock.

The issuer has filed a registration statement (including a prospectus) with the U.S. Securities and Exchange Commission (the "SEC") for the offering to which this communication relates. Before you invest, you should read the prospectus in that registration statement and other documents the issuer has filed with the SEC for more complete information about the issuer and this offering. You may get these documents for free by visiting EDGAR on the SEC Web site at http://www.sec.gov. Alternatively, the issuer, any underwriter or any dealer participating in the offering will arrange to send you the prospectus if you request it by contacting Leerink Partners LLC, Attention: Syndicate Department, One Federal Street, 37th Floor, Boston, MA 02110, or by email at syndicate@leerink.com, or by phone at (800) 808-7525, ext. 4814.