



DIVISION OF  
CORPORATION FINANCE

UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, D.C. 20549-4631

Mail Stop 4631

December 4, 2015

Via E-Mail

Dr. Philip L. Rose  
Chief Executive Officer  
XG Sciences, Inc.  
3101 Grand Oak Drive  
Lansing, MI 48911

**Re: XG Sciences, Inc.  
Amendment 1 to Draft Registration Statement on Form S-1  
Submitted November 24, 2015  
CIK No. 1435375**

Dear Dr. Rose:

We reviewed the amendment and have the following comments.

Holders of Equity, page 22

1. Disclosure that you revised in response to comment 13 of our November 12, 2015 letter does not speak to whether you intend to convert the Series A and Series B preferred once your common stock is quoted on the OTCBB although we note that you have clarified that point in your more fulsome discussion of the terms of the Series A and B preferred on pages 89 and 91. Since disclosure on page 5 indicates that you hope that your common stock will be eligible for trading on the OTCBB after the effective date of the registration statement, please revise this discussion as well to clarify that OTCBB quotation will not trigger conversion of your Series A and B preferred.

Going Concern, page 30

2. In the second paragraph, you appear to have removed disclosure regarding the length of time you believe that you could continue operations using cash on hand. Please revise to restore this disclosure. We also note that you do not have sufficient cash or commitments for financing to sustain operations for the next 12 months, but you also state that you believe cash on hand and proceeds from anticipated private placement financings will sustain your operations for the next 12 months.

Please explain how you have financings that are “anticipated” but not “committed,” and disclose the amount of financing that is required to sustain your operations for 12 months and the amount that you anticipate raising in these financings.

3. We are unable to locate disclosure noted in your response to comment 16 in our November 12, 2015 letter that proceeds from the offering, if fully subscribed, will fund your operations for a period of two or more years. Please revise.
4. In the sixth paragraph, please disclose the conversion price under the notes for holders to receive shares of the Series A convertible preferred stock.
5. In the last paragraph of this section, please explain why the number of shares of common stock underlying the warrants that are included in the units is not the same as the number of units or the number of shares of Series B convertible preferred stock included in the units.

Selling Securityholders, page 83

6. It is unclear to which beneficial owner footnote (20) relates. Please revise.

Signatures, page II-8

7. Please identify the signature of your controller or principal accounting officer in your next amendment. See Instructions 1 and 2 to “Signatures” on Form S-1, and revise.

Closing

You may contact Tracie Towner Mariner, Staff Accountant, at (202) 551-3744, or Terence S. O’Brien, Accounting Branch Chief, at (202) 551-3355, if you have questions about comments on the financial statements and related matters. You may contact Edward M. Kelly, Special Counsel, at (202) 551-3728 or me at (202) 551-3765 if you have any other questions.

Very truly yours,

/s/ Pamela A. Long

Pamela A. Long  
Assistant Director  
Office of Manufacturing and Construction

Dr. Philip L. Rose  
XG Sciences, Inc.  
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Via E-mail

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