



DIVISION OF
CORPORATION FINANCE

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

April 11, 2012

Via E-mail

Peter A. Thompson
Chief Executive Officer
Response Biomedical Corporation
1781-75th Avenue W.
Vancouver, British Columbia
Canada V6P 6P2

**Re: Response Biomedical Corporation
Form 20-F for the Fiscal Year Ended December 31, 2010
Amended November 9, 2011
File No. 0-50571
Response Letter Dated April 2, 2012**

Dear Dr. Thompson:

We have reviewed your response letter and have the following comments.

Please respond to this letter within ten business days by providing the requested information, or by advising us when you will provide the requested response. If you do not believe our comments apply to your facts and circumstances, please tell us why in your response.

After reviewing the information you provide in response to these comments, we may have additional comments.

General

1. On page 8 of your Form 10-K for the fiscal year ended December 31, 2011, filed March 29, 2012, you state that in March 2010 you entered into a distribution agreement with 3M, pursuant to which you have a right to sell products to certain countries, including Iran. Please tell us whether you have sold, or intend to sell, any products, directly or indirectly, into Iran pursuant to the referenced agreement, that are not covered by your risk factor discussion on page 20 or in your response letter dated April 2, 2012. If you have sold, or intend to sell, such products into Iran pursuant to the agreement with 3M, specify the products and tell us the dollar amount of sales for each year since that agreement.
2. On page 20 of the fiscal 2011 Form 10-K you discuss potential violations of U.S. export control and economic sanctions laws in connection with the shipment of some of your products to Iran. You state the maximum civil monetary penalty for each violation. In future filings that include disclosure regarding these potential violations, please indicate the number of potential violations.

Peter A. Thompson
Response Biomedical Corporation
April 11, 2012
Page 2

Please contact Pradip Bhaumik, Special Counsel, at (202) 551-3333 or me at (202) 551-3470 if you have any questions about the comments or our review.

Sincerely,

/s/ Cecilia Blye

Cecilia Blye, Chief
Office of Global Security Risk

cc: John Reynolds
Assistant Director
Division of Corporation Finance