



DIVISION OF  
CORPORATION FINANCE

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

October 15, 2010

Mr. Kenneth T. Coviello  
Chief Executive and Financial Officer  
Vycor Medical, Inc.  
80 Orville Drive, Suite 100  
Bohemia, NY 11716

**Re: Vycor Medical, Inc.**  
**Form 10-K for the Fiscal Year Ended December 31, 2009**  
**Filed March 31, 2010**  
**Form 10-Q for the Fiscal Quarters Ended March 31, 2010 and June 30 2010**  
**Filed May 12, 2010 and August 16, 2010**  
**File No. 333-149782**

Dear Mr. Coviello:

We have reviewed your filing and have the following comments. We have limited our review to only your financial statements and related disclosures and do not intend to expand our review to other portions of your documents. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to this letter within ten business days by amending your filing, 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 or do not believe an amendment is appropriate, please tell us why in your response.

After reviewing any amendment to your filing and the information you provide in response to these comments, we may have additional comments.

Form 10-Q For the Quarters Ended March 31, 2010 and June 30, 2010

Exhibits 31.1 and 31.2

1. We note within each of your March 31 and June 30, 2010 Forms 10-Q that the certifications filed as Exhibits 31.1 and 31.2 do not include all of the introductory language of paragraph 4 required by Item 601(b)(31) of Regulation S-K. Additionally, we note throughout the certifications that you refer to the "small business issuer" rather than the "registrant." Please amend your March 31 and June 30, 2010 Forms 10-Q to

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include revised certifications that conform to the requirements of Item 601(b)(31) of Regulation S-K.

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filing to be certain that the filing includes the information the Securities Exchange Act of 1934 and all applicable Exchange Act rules require. Since the company and its management are in possession of all facts relating to a company's disclosure, they are responsible for the accuracy and adequacy of the disclosures they have made.

In responding to our comments, please provide a written statement from the company acknowledging that:

- the company is responsible for the adequacy and accuracy of the disclosure in the filing;
- staff comments or changes to disclosure in response to staff comments do not foreclose the Commission from taking any action with respect to the filing; and
- the company may not assert staff comments as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States.

You may contact Gary Newberry at (202) 551-3761, Lynn Dicker at (202) 551-3616 or me at (202) 551-3643 if you have questions regarding comments on the financial statements and related matters. In this regard, do not hesitate to contact Martin James, Senior Assistant Chief Accountant at (202) 551-3671.

Sincerely,

Kevin L. Vaughn  
Accounting Branch Chief