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

DIVISION OF
CORPORATION FINANCE

July 21, 2011

Via E-mail
Graham Hetherington
Chief Financial Officer
Shire PLC
5 Riverwalk
Citywest Business Campus
Dublin 24, Republic of Ireland

Re: Shire PLC
Form 10-K for the Fiscal Year Ended December 31, 2010
Filed February 23, 2011
File No. 000-29630

Dear Mr. Hetherington:

We have limited our review of your filing to those issues we have addressed in our comments. In our comments, we ask you to provide us with information so we may better understand your disclosure.

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 a comment applies to your facts and circumstances, please tell us why in your response. Please furnish us a letter on EDGAR under the form type label CORRESP that keys your responses to our comments.

After reviewing the information you provide in response to these comments, we may have additional comments and/or request that you amend your filing.

Item 1. Business

Products Under Development, page 16

1. For each late stage research and development drug, in the chart of your current research pipeline, please provide us proposed disclosure to be included in future periodic reports showing the following:

   - The month and year the drug candidate entered phase III clinical development; and
   - Any significant patents associated with the drug candidates and the related expiration dates or other applicable information regarding the exclusivity period. If the products are covered by any of the patents are already disclosed at page 22 – 24 then match the product in your pipeline table with the related patent.

Item 7: Management's Discussion and Analysis of Financial Condition and Results of Operations, page 44

R&D, page 45

2. In order to help us evaluate your disclosure about the resources that you expend in your research and development activities, please provide us the composition of research and development expenses incurred during 2010 and 2009 other than those that you separately explain (i.e. upfront payment to Acceleron, payment to amend INTUNIV in-license agreement, termination payment with Duramed and upfront payment to Santaris). In this regard, please provide us a break-out, if practicable, by development phase (i.e. preclinical versus clinical), by therapeutic class or by some other function/nature for which you report these costs internally.

Patents and market Exclusivity, page 45

3. Regarding Vyvanse product, we note that generic manufacturers will be able to submit Abbreviated New Drug Applications with the FDA at February 23, 2011 at the earliest. Although your patent related to Vyvanse is effective until June 2023 and the FDA affirmed its decision to grant new chemical entity exclusivity through February 2012, please provide us proposed disclosure to be included in future periodic reports of the expected effect on your future financial position and results of operations of the generic manufacturer's ability to submit these applications at February 23, 2011.

Liquidity and Capital Resources

Revolving Credit Facilities Agreement, page 59

4. We note new financial covenants and ratios requirements to the new revolving credit facilities agreement. Please provide us proposed disclosure to be included in future periodic reports that discusses the effect and expected effects on the company's financial position and liquidity of these covenants and ratios.

5. Considering a significant amount of revenues and pre-tax income are generated from your foreign subsidiaries, please provide proposed disclosure to be included in future periodic reports of the amount of cash and investments currently held by your foreign subsidiaries that you expect to be permanently reinvested and its expected effect on your liquidity and capital resources.

Item 9A Controls and Procedures

Disclosure Controls and Procedures, page 73

6. Your conclusion that disclosure controls and procedures "…are effective for gathering, analyzing, and disclosing…" is more limited than what is called for under Rule 13a-15(e) of the Exchange Act. The rule requires, among other matters, that the disclosure controls and procedures be designed so that information disclosed is "recorded, processed,

summarized and reported, within the time periods specified in the Commission's rules and forms." Please confirm, if true, that your disclosure controls and procedures met all of the requirements of this section and that you will conform your disclosure in future filings.

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 Christine Allen, Staff Accountant, at (202) 551-3652 or Melissa N. Rocha, Accounting Branch Chief, at (202) 551-3854 if you have questions regarding the comments. In this regard, do not hesitate to contact me at (202) 551-3679.

Sincerely,

/s/ Jim B. Rosenberg

Jim B. Rosenberg
Senior Assistant Chief Accountant