



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

DIVISION OF
CORPORATION FINANCE

Mail Stop 3030

September 26, 2017

Via E-mail

Karen L. Parkhill
Chief Financial Officer
Medtronic plc
20 On Hatch, Lower Hatch Street
Dublin 2, Ireland

Re: Medtronic plc
Form 10-K for the Fiscal Year Ended April 28, 2017
Filed June 27, 2017
File No. 001-36820

Dear Ms. Parkhill:

We have reviewed your filing and have the following comments. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure.

Please respond to these comments within ten business days by providing the requested information or advise us as soon as possible when you will respond. If you do not believe our comments apply to your facts and circumstances, please tell us why in your response.

After reviewing your response to these comments, we may have additional comments.

Form 10-K for the Fiscal Year Ended April 28, 2017

General

1. You state on page 23 of the Form 10-K that your subsidiaries have had business dealings in countries including Sudan and Syria, such as the sale of medical devices and surgical tools and the provision of related services to distributors and other purchasing bodies in those countries. Sudan and Syria are designated by the Department of State as state sponsors of terrorism, and are subject to U.S. economic sanctions and export controls. Please describe to us the nature and extent of your past, current, and anticipated contacts with Sudan and Syria since Medtronic Inc.'s letter to the staff dated February 14, 2014, whether through subsidiaries, affiliates, distributors, partners, resellers, customers or other direct or indirect arrangements. You should describe any services, products,

information or technology you have provided to Sudan or Syria directly or indirectly, and any agreements, commercial arrangements, or other contacts you have had with the governments of those countries or entities they control.

2. Please discuss the materiality of the contacts with Sudan and Syria you describe in response to the comment above, and whether those contacts constitute a material investment risk for your security holders. You should address materiality in quantitative terms, including the approximate dollar amounts of any associated revenues, assets, and liabilities for the last three fiscal years and the subsequent interim period. Also, address materiality in terms of qualitative factors that a reasonable investor would deem important in making an investment decision, including the potential impact of corporate activities upon a company's reputation and share value. Various state and municipal governments, universities, and other investors have proposed or adopted divestment or similar initiatives regarding investment in companies that do business with U.S.-designated state sponsors of terrorism. You should address the potential impact of the investor sentiment evidenced by such actions directed toward companies that have operations associated with Sudan and Syria.

Income Taxes, page 55

3. Revise this section in future filings to explain in greater depth the impact of tax credits and earnings from non-U.S. lower taxed jurisdictions on your effective tax rate. Discuss the primary taxing jurisdictions where your foreign earnings are derived, the location of tax credits and tax holidays, and the relevant statutory rates in those jurisdictions. Discuss the expiration of, and any uncertainties relating to, the income tax rates or benefits you currently receive in those jurisdictions. Refer to Item 303(a)(3) of Regulation S-K.

Note 3, Assets and Liabilities Held for Sale, page 77

4. We note that you have agreed to sell your Patient Care, Deep Vein Thrombosis and Nutritional Insufficiency businesses and you have determined that the divestitures of these businesses do not meet the criteria for discontinued operations. Please tell us the pretax profit or loss for each of these businesses for all periods presented and explain to us how you considered the disclosure requirements of ASC 360-10-50-3A.

We remind you that the company and its management are responsible for the accuracy and adequacy of their disclosures, notwithstanding any review, comments, action or absence of action by the staff.

Karen L. Parkhill
Medtronic plc
September 26, 2017
Page 3

You may contact Eric Atallah at (202) 551-3663 or me at (202) 551-3662 if you have questions regarding comments on the financial statements and related matters. Please contact Caleb French at (202) 551-6947 or Amanda Ravitz, Assistant Director, at (202) 551-3412 with any other questions.

Sincerely,

/s/ Kevin J. Kuhar

Kevin J. Kuhar
Accounting Branch Chief
Office of Electronics and Machinery