

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

July 3, 2019

Stephen Randall
Chief Financial Officer
Titan Medical Inc.
170 University Avenue
Suite 1000
Toronto, Ontario, Canada
M5H 3B3

Re: Titan Medical Inc.
Draft Registration Statement on Form F-3
Submitted June 4, 2019
CIK No. 0000840551

Dear Mr. Randall:

We have reviewed your draft registration statement 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 this letter by providing the requested information and either submitting an amended draft registration statement or publicly filing your registration statement on EDGAR. 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 the information you provide in response to these comments and your amended draft registration statement or filed registration statement, we may have additional comments.

Draft Registration Statement on Form F-3 submitted June 4, 2019

Fee Table, page 2

1. Refer to the second sentence of note (1) to the fee table. Other than securities covered by the operation of Rule 416 of the Securities Act of 1933, you must specifically register the type and amount of each security you intend to register. Please confirm that your fee table will include a good faith estimate of the maximum number of shares issuable pursuant to the warrants. In addition, please revise to remove part (ii) of the footnote as you may not register an indeterminate number of unspecified types of securities.

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Prospectus Cover Page, page 3

2. We note your disclosure that your Prospectus Supplement will set forth whether the shares or warrants are being offered for cash. Refer to Form F-3 General Instructions 1.B.1 and 1.B.5 and provide us your analysis as to how your securities could be offered other than for cash or revise your disclosure as appropriate.

Documents Incorporated by Reference, page 9

3. It appears that certain of your filing date and Material Change Report exhibit references may not reflect the correct filing dates and/or exhibits where the Material Change Reports are filed. Please review your references carefully and revise as necessary.

There can be no assurance as to the liquidity of the trading market..., page 10

4. Revise your risk factor, as appropriate, to indicate whether you intend to list the units that may be offered.

Limitations on Ownership of Securities, page 16

5. Briefly indicate any limitations on the holding or voting of your shares imposed by the Investment Canada Act (Canada) that are applicable to U.S. investors.

Use of Proceeds, page 21

6. Given your lack of revenues and ongoing product development costs, please revise here to discuss specifically your short and long term cash needs and related matters, such as FDA submission status and related additional milestones in connection therewith, or tell us where this is addressed in the disclosure that is incorporated by reference.

General

- 7. Please confirm your understanding that your Form F-3 eligibility will be determined at the time of the public filing of your registration statement.
- 8. At the date of your initial public filing of your registration statement, please ensure that you meet the requirements of Generation Instruction 1.B.1 of Form F-3 or revise your filing to include the disclosures required by Instruction 7 to General Instruction 1.B.5 of Form F-3, as appropriate.

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You may contact Tara Harkins at (202) 551-3639 or Kevin Kuhar, Accounting Branch Chief, at (202) 551-3662 if you have questions regarding comments on the financial statements and related matters. Please contact Tim Buchmiller at (202) 551-3635 or Amanda Ravitz, Assistant Director, at (202) 551-3412 with any other questions.

Sincerely,

Division of Corporation Finance Office of Electronics and Machinery