

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

April 13, 2018

Carl O'Connell Chief Executive Officer Xtant Medical Holdings, Inc. 664 Cruiser Lane Belgrade, MT 59714

> Re: Xtant Medical Holdings, Inc. Registration Statement on Form S-1 Response dated April 9, 2018 File No. 333-222918

Dear Mr. O'Connell:

We have reviewed your April 9, 2018 response to our comment letter and have the following comment.

Please respond to this letter by amending your registration statement and providing the requested information. If you do not believe our comment applies 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 registration statement and the information you provide in response to this comment, we may have additional comments. Unless we note otherwise, our references to prior comments are to comments in our February 27, 2018 letter.

Registration Statement on Form S-1 filed February 7, 2018

Material U.S. Federal Income Tax Consequences, page 30

1. We note that you have elected to use a short-form tax opinion in response to our prior comment one. Please revise your prospectus to state clearly that the disclosure in this section is the opinion of counsel and to clearly identify and articulate the opinion being rendered. For guidance, refer to Sections III.B.2 of Staff Legal Bulletin No. 19 (October 2011).

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You may contact Jeffrey Gabor at 202-551-2544 or Irene Paik at 202-551-6553 with any questions.

Division of Corporation Finance Office of Healthcare & Insurance

cc: Wesley Robinson, Esq.