

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

October 19, 2021

Rick Gaenzle Chief Executive Officer Perception Capital Corp. II 315 Lake Street East, Suite 301 Wayzata, MN 55391

Re: Perception Capital Corp. II
Amendment No. 3 to Registration Statement on Form S-1
Filed September 30, 2021
File No. 333-255107

Dear Mr. Gaenzle:

We have reviewed your amended 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 amending your registration statement and providing the requested information. 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 registration statement and the information you provide in response to these comments, we may have additional comments.

Amendment No. 3 to Registration Statement on Form S-1

Exhibit 23.1 Consent of Independent Registered Public Accounting Firm, page 1

1. The consent indicates that the disclosures in Notes 7 and 8 to the financial statements are as of September 29, 2021 while the report of the independent registered public accounting firm indicates the disclosures in these Notes are as of September 30, 2021. Please revise these dates so they are consistent.

Rick Gaenzle Perception Capital Corp. II October 19, 2021 Page 2

You may contact Aamira Chaudhry at 202-551-3389 or Linda Cvrkel at 202-551-3813 if you have questions regarding comments on the financial statements and related matters. Please contact Taylor Beech at 202-551-4515 or Dietrich King at 202-551-8071 with any other questions.

Sincerely,

Division of Corporation Finance Office of Trade & Services

cc: Gregg A. Noel, Esq.