January 5, 2022

Michael Clifton Chief Financial Officer Supernova Partners Acquisition Co II, Ltd. 4301 50th Street NW Suite 300 PMB 1044 Washington, D.C. 20016

Re: Supernova Partners

Acquisition Co II, Ltd.

Amendment No. 1 to

Registration Statement on Form S-4

Filed December 20,

2021

File No. 333-260692

Dear Mr. Clifton:

 $\label{eq:weak-decomposition} \mbox{We have reviewed your amended registration statement and have the following}$

 $\overline{\text{comments}}.$ In some of our comments, we may ask you to provide us with information so we

may better understand your disclosure.

 $\label{eq:please respond} \mbox{ Please respond to this letter by amending your registration statement and providing the}$

requested information. If you do not believe our comments apply to your facts and $% \left(1\right) =\left(1\right) +\left(1\right) +$

circumstances or do not believe an amendment is appropriate, please tell us why in your $% \left(1\right) =\left(1\right) \left(1\right)$

response.

 $\qquad \qquad \text{After reviewing any amendment to your registration statement and the information you} \\$

provide in response to these comments, we may have additional comments. Unless we note

otherwise, our references to prior comments are to comments in our

November 30, 2021 letter.

Amendment No. 1 to Registration Statement on Form S-4

Risks Related to Rigetti's Financial Condition and Status as an Early Stage Company, page 59

1. Supplement your risk factor disclosure by acknowledging that Rigetti has in the past failed to meet its publicly

announced timetables for technological advancement. For example,

disclose that in 2018,

Rigetti publicly announced plans to produce a quantum computer

with 128 qubits within

one year of such statement.

2. Your disclosure here that the highest number of qubits Rigetti has deployed in a quantum computer is 40 qubits

appears to conflict with other references in the prospectus and with public statements from

Rigetti's management. For example, the disclosure on page 156

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and assertions in recent filings made under Rule 425 suggest that Rigetti currently has an

80 qubit system. Please reconcile these statements in your next filing. Critical Accounting Policies and Estimates, page 274

3. We note your response to prior comment 35 that the majority of your development ${\sf SS}$

contracts are fixed fee arrangements. As such, please provide disclosure that addresses the $\,$

potential negative impact to your profitability if you do not complete these fixed fee $\,$

arrangements within budget and on time. In addition, please consider

whether this
 possibility should be addressed in a risk factor disclosure.
Restatement to Previously Reported Financial Statement, page F-8

4. We note that the company filed an Item $8.01\ \text{Form }8\text{-K}$ on March 10, $2021\ \text{that included}$

an audited balance sheet dated March 4, 2021. We further note that the company has

restated such balance sheet here on an unaudited basis. Please explain why

the restated balance sheet was not subject to an audit. General $% \left(1\right) =\left(1\right) +\left(1\right) +\left($

5. Revise throughout to reflect the $$45\ \text{million}$ additional PIPE commitment. Discuss how

the parties negotiated these additional commitments at a premium to the previously $% \left(\frac{1}{2}\right) =\frac{1}{2}\left(\frac{1}{2}\right) +\frac{1}{2}\left(\frac{1$

announced PIPE.

You may contact Ryan Rohn, Senior Staff Accountant, at (202) 551-3739 or Stephen $\,$

Krikorian, Accounting Branch Chief, at (202) 551-3488 if you have questions regarding

comments on the financial statements and related matters. Please contact Priscilla Dao, Staff

Attorney, at (202) 551-5997 or Joshua Shainess, Legal Branch Chief, at (202) 551-7951 with any other questions.

Sincerely,

FirstName LastNameMichael Clifton

Division of Corporation

Finance

Comapany NameSupernova Partners Acquisition Co II, Ltd.

Office of Technology

January 5, 2022 Page 2 cc: Om K. Pandya FirstName LastName