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

DIVISION OF
CORPORATION FINANCE

Mail Stop 3030

August 17, 2017

Via E-mail
E. Kevin Hrusovsky
Executive Chairman, President and Chief Executive Officer
Quanterix Corporation
113 Hartwell Avenue
Lexington, MA 02421

Re: Quanterix Corporation
Draft Registration Statement on Form S-1
Submitted July 21, 2017
CIK No. 0001503274

Dear Mr. Hrusovsky:

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.

Overview, page 1

1. We note your disclosure on page 22 and page 26. If true, expand your overview to indicate that you have focused initially on the life sciences research market and that you currently sell all your products for research use only. Clarify if you have received material revenue to date from the diagnostics and precision health screening markets. If you have no revenue from, or regulatory approvals to operate in, those markets, please state so clearly and directly.

2. We note the scope of the exclusive license and a co-exclusive license granted to bioMérieux SA discussed on page 105 and bioMérieux's current objective to identify and develop an assay menu supporting the commercial launch of a new, benchtop in-vitro diagnostic instrument using your Simoa technology for use in clinical lab applications,

food quality control testing and pharmaceutical quality control testing. Please revise to describe how the license terms and bioMérieux's objective limit your ability to enter the diagnostics and precision health markets, or any other market you may access.

3. We note your disclosure on page F-41 that you can engage a collaboration partner, subject to certain restrictions, in the field of in vitro diagnostics used in Clinical Lab Applications and that you shall pay bioMérieux a royalty based on a percentage of the royalty you will receive from that partner. Please tell us about the restrictions and the royalty payment and if disclosure of this arrangement should be briefly disclosed in your prospectus summary.

4. Briefly indicate the regulatory status of your products. Revise your disclosure under "Market Overview" on page 2 to reflect how your current regulatory approval and current sales into the research use only market changes your addressable market size in the three bullet points on page 2. Briefly disclose what regulatory approvals you will need to enter into the indicated markets, the steps you or your collaborators, such as bioMérieux, have taken to secure such approvals and what steps remain.

5. We understand from your disclosure that your system uses capture antibodies that bind specifically to known proteins. Please clarify in an appropriate location how your system enables researchers to discover novel protein biomarkers.

6. Given your disclosure that your system is used for protein detection, please clarify in an appropriate location in your prospectus how researchers "can now better understand how proteins are individually and/or collectively contributing to important biological processes and the health and well-being of individuals" and also how your detection system enables the understanding of "individual characteristics and functioning of proteins."

7. Since you have chosen to highlight your revenue growth, please balance this disclosure with your net losses for the periods presented and your accumulated deficit. Also, given your disclosure on page 70, indicate that you sold fewer instruments in 2016 than in 2015 and that your instrument sales were flat for the March 31 quarter over quarter periods.

8. The first full paragraph on page 2 indicates your product can directly detect nucleic acids. The third bullet point on page 84 and disclosures on pages 90 and 92 indicate your product does not yet have that testing capability. Please reconcile.

Protein analysis, page 5

9. Balance your disclosure by indicating how many of the 10,500 secreted proteins your system currently addresses.

Implications of being an emerging growth company, page 7

10. Supplementally provide us with copies of all written communications, as defined in Rule 405 under the Securities Act, that you, or anyone authorized to do so on your behalf, present to potential investors in reliance on Section 5(d) of the Securities Act, whether or not they retain copies of the communications.

We depend on strategic collaborations and licensing arrangements…, page 20

11. We note your disclosure that given the exclusive nature of a portion of the license rights granted to bioMérieux SA your ability to collaborate with others in certain areas will be limited. Expand your risk factor, and other disclosure as appropriate, to clarify how the exclusive license will affect your ability to collaborate with others and indicate the "certain areas" that will be affected by that license.

Some of our owned and in-licensed intellectual property . . ., page 32

12. We note that "some" of the intellectual property rights you own and have been licensed "may" be subject to federal regulations. Please revise to clarify the specific intellectual property rights to which you refer, such as the "core Simoa technology" noted on page 33. Please also revise to clarify why you do not know whether those rights are subject to the federal regulations to which you refer.

Special note regarding forward-looking statements, page 48

13. Tell us whether you commissioned any of the third-party data you cite for use in connection with your registration statement.

Use of proceeds, page 50

14. Please revise to clarify the new life sciences applications, chemistry and instrumentation for your technology platform you intend to develop with the proceeds of this offering. Disclose here and in other locations in your prospectus, as appropriate, if you intend to develop applications outside of protein detection, and the status, to date, of your efforts.

15. Disclose with more specificity which in vitro diagnostic markets you intend to address and clarify in an appropriate location in your prospectus what FDA approval you may seek for your existing or new products to be utilized for diagnostic purposes, as indicated in the third bullet point on page 15. Also revise to clarify the status of product development efforts in "areas outside of research" and whether you will require funds to complete development in addition to those received through this offering.

Dilution, page 54

16. Expand the disclosure on page 55 to clarify how the numbers and percentages in the table would change assuming the exercise of all outstanding options and warrants.

Overview, page 58

17. We note the discussion here that you have sold 135 instruments to date and that on pages 68 and 70 you attribute increased consumable sales to the number of instruments sold. The number of installed instruments appears to be a key non-financial performance indicator that would be material to investors. Please revise the filing to quantify the total number of installed instruments at each period end. Refer to Section I.B of SEC Release 33-8350.

Stock-based compensation, page 63

18. Please expand your disclosure on page 65 of the factors considered to determine the best estimate of the fair value of your common stock to state, if true, that your projected future cash flows were discounted at an appropriate rate.

19. Please describe to us in greater detail the nature of the comparable public peer companies you selected and the basis for your conclusion to select those companies. Discuss how you considered factors such as industry, stage of life cycle, size and financial leverage when selecting the comparable companies. Refer to ASC paragraphs 718-10-55-36 and 37 and Question 6 in SAB Topic 14D.1.

Results of operations, page 68

20. Revise your revenue disclosure to quantify the changes in your revenue during the periods presented that are attributable to changes in prices and changes in volume. Include quantification of the comparable amount of instruments sold in each period presented. Refer to Item 303(a)(3)(iii) of Regulation S-K.

21. Revise to clarify all material reasons for the changes in your line items and quantify each material reason driving the changes as appropriate. For example, on page 70, you refer to a "lower number of instruments sold" during 2016, but it is unclear why a lower number were sold and what was the extent of the decrease.

Preferred stock financings, page 71

22. Please provide an expanded discussion of the significant terms of the preferred stock issued during the periods presented. Refer to Item 303(a)(1) and Instruction 3 to Item 303(a) of Regulation S-K.

Diagnostics, page 80

23. We note your disclosure that significant interest from third parties has resulted in collaborations with leading diagnostic companies such as bioMérieux SA. If any of the other collaborations have been material, please identify those collaborations. If the other collaborations have not been material to date, please revise your disclosure as appropriate.

Simoa analytic process, page 88

24. Revise to indicate the significance of "paramagnetic" beads. Also indicate what the stars and arrow in your first graphic indicate and better describe the enzyme substrate you have presented.

Assays and consumables, page 102

25. Please clarify if the 80 assays you mention include "homebrew assays." Also clarify whether you have or retain any intellectual property rights to "homebrew assays."

License agreement with bioMérieux SA, page 105

26. From the disclosure on page F-40, it appears that neither the developmental nor regulatory criteria were met under the original agreement or subsequent amendments. It also appears from your disclosure here that bioMérieux SA has not yet commercially launched a product based on your Simoa technology. Please disclose the reasons the development and regulatory criteria were not satisfied under the prior agreements.

Competition, page 108

27. We note your reference to Singulex as a competitor. Please tell us if you are referring to the MilliporeSigma SMCxPRO product and revise your disclosure as appropriate. Also expand your first risk factor on page 25 as appropriate.

Intellectual property, page 108

28. You disclose that your patent strategy is multilayered, providing coverage of aspects of your core technology. We also note your disclosure regarding the first and second layers of your strategy. Please clarify if the capture antibodies are proprietary or sourced from third parties. Also clarify what you consider as your "core technology" and what you mean by the "fundamental methods for detecting single molecules independent of specific embodiments" and "specific embodiments of the core technology." Further explain the effect of your patents on these aspects of your technology.

Government regulation, page 111

29. Please revise to clarify how you concluded that the labeling and promotion of your products complies with the guidance you cite, as disclosed in the last sentence of the second paragraph, given the disclosure in this document regarding your current lack of regulatory approvals and the capabilities of your Simoa product. We note, for example, disclosure that your platform "advances precision health for . . . diagnostics" and disclosures on pages 93-99 regarding key focus areas.

Executive officers, page 115

30. Disclose the principal occupation of Mr. Hrusovsky from May 2013 until he became your chief executive officer. For each of your executive officers, disclose the principal business of the employers named as part of their business experience.

Certain relationships . . ., page 131

31. If Tufts University is a related party to you due to Tuft's equity ownership, as disclosed on page F-34, please clarify why Tufts is not included in the table on page 137.

Principal stockholders, page 136

32. Disclose all natural persons who exercise the sole or share voting and dispositive powers with respect to the shares held in the name Trinitas Innovation-Q Investment Co., Ltd and bioMerieux, S.A.

Underwriting, page 154

33. We note your reference to past relationships with "certain" of the underwriters. Please clarify to which underwriters you are referring and the nature and terms of such relationships.

Consolidated statements of cash flows, page F-6

34. Please revise the filing to present the warrant liabilities converted into preferred stock as supplemental cash flow information.

Product revenue, page F-9

35. Please tell us why consideration in a multiple element arrangement is allocated to an implied one year service type warranty and why such revenue is recognized over one year as part of service revenue. Describe how you have concluded that this warranty is "implied" and how it relates to the periods covered under the extended warranty contracts that you offer. Discuss whether you have a regular pattern of providing these services

and what services are generally provided. Refer to ASC 605-20-25, 605-25-25 or paragraphs 66 and 67 of 985-605-25 as appropriate.

36. Tell us your accounting policy for and the nature of any sales returns, discounts and allowances and specify any differences in polices between direct sales and sales to distributors. Refer to SAB Topic 13A as appropriate.

Unaudited pro forma information, page F-12

37. Please tell us whether you believe it is probable that the preferred stock will automatically convert into common stock. We note the terms of automatic conversion in Note 7 on page F-28. Refer to Article 11 of Regulation S-X.

Fair value of financial instruments, page F-14

38. You disclose on page F-16 that the changes in the fair value of the preferred stock warrant liability are recorded in other expense (income). In Notes 9 and 10 on pages F-36 and F-37, you disclose certain warrants were issued to non-employees for goods or services. Please address the following:

- Tell us the fair value of warrants issued for goods or services that were outstanding at the beginning and ending balance sheet dates for each period presented, and the related change in fair value for such warrants recognized in income for each period presented.
- Tell us how you considered paragraphs 4 and 5 of ASC 505-50-25, SAB Topics 14A and 14F and the definition of non-operating income or expense under Rule 5-03 of Regulation S-X in classifying the changes in fair value of non-employee share based payment arrangements outside of operating income and not in the same manner as if you had paid cash for the services.

Stock-based compensation, page F-20

39. Please disclose your policy for the initial and subsequent measurement of equity based instruments issued to non-employees for goods and services. In particular, include the policy for warrants to be issued contingent on future events such as those on page F-37.

Recent accounting pronouncements, page F-22

40. Please revise the filing to disclose the potential effects of the adoption of ASU 2016-18. Refer to SAB Topic 11M.

Redemption rights, page F-29

41. Please state the redemption amount for each preferred share issuance and the combined aggregate amount of redemption requirements for all issues for the five years following the date of the latest balance sheet. Refer to Rule 5-02.27 of Regulation S-X.

Development and supply agreement, page F-36

42. We see that upon the Development Agreement amendment, you separately issued 1.3 million and 700,000 Development warrants. Please revise the filing and tell us how you accounted for the issuance of the 1.3 million Development warrants. Tell us the separate fair values of both warrants on the issuance dates, describe how you accounted for the warrants between issuance and settlement and describe how you reported the issuance and settlement within your financial statements. Cite the accounting literature upon which you relied, including ASC 505-50.

You may contact Gary Newberry at (202) 551-3761 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 Geoff Kruczek, Special Counsel, at (202) 551-3641 with any other questions.

Sincerely,

/s/ Geoff Kruczek for

Amanda Ravitz
Assistant Director
Office of Electronics and Machinery

cc: Megan N. Gates, Esq.
Mintz, Levin, Cohn, Ferris,
Glovsky and Popeo, P.C.