140 Scott Drive

Menlo Park, California 94025

Tel: (650) 328-4600 Fax: (650) 463-2600

www.lw.com

[LATHAM & WATKINS LLP LETTERHEAD]

FIRM / AFFILIATE OFFICES

Barcelona New Jersey
Brussels New York
Chicago Northern Virginia
Frankfurt Orange County

Hamburg Paris
Hong Kong San Diego
London San Francisco
Los Angeles Shanghai
Madrid Silicon Valley
Milan Singapore
Moscow Tokyo

Munich Washington, D.C.

February 7, 2007

VIA EDGAR AND FACSIMILE—(202) 772-9218

Securities and Exchange Commission Mail Stop 6010 100 F Street, N.E. Washington, D.C. 20549

Attention: Jay Mumford

Perry Hindin, Special Counsel

Kristin Lochhead Brian Cascio

Re: Accuray Incorporated

Registration Statement on Form S-1 (Registration No. 333-138622)

Ladies and Gentlemen:

On behalf of Accuray Incorporated ("Accuray" or the "Company"), we confirm receipt of the letter dated February 7, 2007 from the staff (the "Staff") of the Securities and Exchange Commission (the "Commission") with respect to the above-referenced filing. We are responding to the Staff's comments as set forth below. The Staff's comments are set forth below in bold, followed by the Company's response. Accuray has filed Amendment No. 6 ("Amendment No. 6") to the above-referenced registration statement in connection with this response letter. All page numbers in the responses below refer to Amendment No. 6.

Exhibit 5.1

1. We note your response to our prior comment 3. As of the date of the opinion you have not filed the underwriting agreement. Please obtain an updated opinion.

In response to the Staff's comment, Accuray has filed an updated opinion as Exhibit 5.1 to Amendment No. 6.

2. We note your responses to our prior comments 4 and 5. We are evaluating your responses and may have further comment.

We acknowledge the Staff's comment.

Exhibit 5.2

3. Please obtain an opinion of counsel that specifically identifies the shares being registered by the selling stockholders in this opinion.

In response to the Staff's comment, Accuray has filed an opinion of counsel identifying the shares being registered by the selling stockholders as Exhibit 5.2 to Amendment No. 6.

4. Please file as an exhibit to your registration statement the merger agreement referred to in the opinion.

In response to the Staff's comment, Accuray has filed the merger agreement as Exhibit 2.1 to Amendment No. 6.

5. Please obtain an opinion of counsel that identifies the bylaws and the underwriting agreement with greater specificity. For example, identify these documents by their exhibit numbers listed in the registration statement.

The opinion has been revised in response to the Staff's comment.

6. We note the limitation in clause (v) located at the bottom of page 1 and the top of page 2 and the reference to documents "submitted to [your counsel] for [its review]. With respect to the first four documents identified on page 1, please obtain a revised and updated opinion of counsel that clarifies that such documents are those documents that have been filed as exhibits to your registration statement.

The opinion has been revised in response to the Staff's comment.

- 7. It is inappropriate for your opinion to assume conclusions of law which are necessary requirements of the ultimate legality opinion. Please obtain an opinion of counsel that eliminates the following assumptions contained in the current legal opinion:
 - the incumbency, authority, legal right and power and legal capacity under all applicable laws and regulations of, the officers and other
 persons and entities' signing each of [the documents listed in the opinion] as or on behalf of the parties;
 - the due execution of all documents submitted to [your counsel] in unexecuted form; and
 - the assumption contained in the first full paragraph on page 2 of the opinion relating to the merger transactions.

The opinion has been revised in response to the Staff's comment.

8. The limitations contained in the last two sentences of the paragraph at the top of page 2 are inappropriate. Please obtain a revised opinion of counsel that removes this language.

The opinion has been revised in response to the Staff's comment.

9. We note that the opinion is limited to Delaware General Corporation Law. Please have your counsel confirm to us in writing that the law covered by the opinion includes not only the Delaware General Corporation Law, but also the applicable provisions of the Delaware Constitution and reported judicial decisions interpreting these laws.

In response to the Staff's comment, we understand that counsel has provided separately a confirmation of such matters to the Staff.

If the Staff has any questions or would like to discuss any of the foregoing, please do not hesitate to contact the undersigned at (650) 463-2645.

Very truly yours,

/s/ LAURA I. BUSHNELL

Laura I. Bushnell, Esq. of Latham & Watkins LLP

cc: Euan S. Thomson, Ph.D., Accuray Incorporated
Robert E. McNamara, Accuray Incorporated
Michael W. Hall, Esq., Latham & Watkins LLP
Jean-Marc Corredor, Esq., Latham & Watkins LLP
Connie Chen, Esq., Latham & Watkins LLP
Mark L. Reinstra, Esq., Wilson Sonsini Goodrich & Rosati
Gavin McCraley, Esq., Wilson Sonsini Goodrich & Rosati