

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

SCHEDULE TO
(Rule 13e-4)

TENDER OFFER STATEMENT UNDER SECTION 14(d)(1) OR 13(e)(1)
OF THE SECURITIES EXCHANGE ACT OF 1934

KLA-TENCOR CORPORATION

(Name of Subject Company (Issuer) and Filing Person (Offeror))

Options to Purchase Shares of Common Stock, Par Value \$0.001 Per Share
(Title of Class of Securities)

482480100
(CUSIP Number of Class of Securities)
(Underlying Common Stock)

Brian Martin
Senior Vice President and Chief Legal Officer
KLA-Tencor Corporation
160 Rio Robles
San Jose, California 95134
(408) 875-3000

(Name, address and telephone number of person authorized to receive notices and communications on behalf of filing person)

Copy to:

S. James DiBernardo, Esq.
Jill Mather Bartow, Esq.
Morgan, Lewis, & Bockius LLP
Two Palo Alto Square
Palo Alto, California 94306
(650) 843-4000

CALCULATION OF FILING FEE

Transaction valuation*	Amount of filing fee**
\$2,821.27	\$0.09

- * The "transaction valuation" set forth above is based on the Black-Scholes option valuation model, and assumes that all outstanding options eligible for tender covering an aggregate of 301,800 shares of common stock of KLA-Tencor Corporation will be amended pursuant to this offer, which may not occur.
- ** The amount of the filing fee, calculated in accordance with Rule 0-11 under the Securities Exchange Act of 1934, as amended, as modified by Fee Advisory No. 5 for fiscal year 2007, equals \$30.70 per \$1,000,000 of transaction valuation. The transaction valuation set forth above was calculated for the sole purpose of determining the filing fee, and should not be used or relied upon for any other purpose.
- Check box if any part of the fee is offset as provided by Rule 0-11(a)(2) and identify the filing with which the offsetting fee was previously paid. Identify the previous filing by registration statement number, or the Form or Schedule and the date of its filing.

Amount Previously Paid: Not applicable.
Form or Registration No.: Not applicable.
Filing party: Not applicable.
Date filed: Not applicable.

- Check the box if the filing relates solely to preliminary communications made before the commencement of a tender offer.

Check the appropriate boxes below to designate any transactions to which the statement relates:

- third party tender offer subject to Rule 14d-1.
 issuer tender offer subject to Rule 13e-4.
 going-private transaction subject to Rule 13e-3.
 amendment to Schedule 13D under Rule 13d-2.

Check the following box if the filing is a final amendment reporting the results of the tender offer.

ITEM 1. SUMMARY TERM SHEET.

The information set forth under “Summary Term Sheet” in the Offer to Amend or Replace Eligible Options, dated May 16, 2007 (the “Offer to Amend or Replace”), attached hereto as Exhibit (a)(1), is incorporated herein by reference.

ITEM 2. SUBJECT COMPANY INFORMATION.

(a) The name of the issuer is KLA-Tencor Corporation, a Delaware corporation (the “Company”); the address of its principal executive offices is 160 Rio Robles, San Jose, California 95134; and its telephone number is (408) 875-3000. The information set forth in the Offer to Amend or Replace under Section 11 (“Information Concerning KLA-Tencor”) is incorporated herein by reference.

(b) This Tender Offer Statement on Schedule TO relates to an offer by the Company to amend or replace outstanding “Eligible Options” (as defined in the Offer to Amend or Replace attached hereto as Exhibit (a)(1)) held by current employees subject to taxation in the United States so that those options will not be subject to adverse tax consequences under Internal Revenue Code Section 409A. Each eligible participant may elect to amend his or her Eligible Options to increase the exercise price per share of the Company’s common stock, par value \$0.001 per share, purchasable thereunder and become eligible to receive a special Cash Bonus (as defined in the Offer to Amend or Replace) from the Company, all upon the terms and subject to the conditions set forth in the Offer to Amend or Replace and the related Letter of Transmittal attached hereto as Exhibit (a)(4) (the “Letter of Transmittal”) and the Stock Option Amendment and Special Bonus Agreement (the “Amendment Agreement”) and, together with the Offer to Amend or Replace and the Letter of Transmittal, as they may each be amended or supplemented from time to time, the “Offer”). Certain tendered Eligible Options may, in lieu of such amendment, be canceled and replaced with new options that will be exactly the same as the canceled options but will avoid adverse tax consequences under Section 409A. The Offer is currently set to expire at 11:59 p.m. Pacific Time on June 14, 2007 but may be extended (the “Expiration Date”). As of May 15, 2007, Eligible Options to purchase 301,800 shares of the Company’s common stock were outstanding.

The information set forth in the Offer to Amend or Replace on the introductory pages and under “Summary Term Sheet,” Section 1 (“Eligible Optionees; Eligible Options; Amendment of Eligible Options and Cash Bonus; New Options; Expiration Date; Additional Considerations”), Section 3 (“Status of Eligible Options Not Amended or Replaced”), Section 6 (“Acceptance of Eligible Options for Amendment or Replacement and Commitment to Pay Cash Bonus With Respect to Amended Options”) and Section 9 (“Source and Amount of Consideration; Terms of Amended Options or New Options”) is incorporated herein by reference.

(c) The information set forth in the Offer to Amend or Replace under Section 8 (“Price Range of Common Stock Underlying the Options”) is incorporated herein by reference.

ITEM 3. IDENTITY AND BACKGROUND OF FILING PERSON.

(a) The Company is the filing person. The information set forth under Item 2(a) above is incorporated herein by reference. The information set forth in Schedule I to the Offer to Amend or Replace (“Information Concerning the Directors and Executive Officers of KLA-Tencor Corporation”) is incorporated herein by reference.

ITEM 4. TERMS OF THE TRANSACTION.

(a) The information set forth in the Offer to Amend or Replace on the introductory pages and under “Summary Term Sheet,” Section 1 (“Eligible Optionees; Eligible Options; Amendment of Eligible Options and Cash Bonus; New Options; Expiration Date; Additional Considerations”), Section 3 (“Status of Eligible Options Not Amended or Replaced”), Section 4 (“Procedures for Tendering Eligible Options”), Section 5 (“Withdrawal Rights”), Section 6 (“Acceptance of Eligible Options for Amendment or Replacement and Commitment to Pay Cash Bonus With Respect to Amended Options”), Section 7 (“Conditions of the Offer”), Section 9 (“Source and Amount of Consideration; Terms of Amended Options or New Options”), Section 10 (“Amended Options and New Options Will Not Differ from Eligible Options”), Section 13 (“Status of Options Accepted by Us in the Offer; Accounting Consequences of the Offer”), Section 14 (“Legal Matters; Regulatory Approvals”), Section 15 (“Material U.S. Federal Income Tax Consequences”), Section 16 (“Extension of the Offer; Termination; Amendment”) and Section 19 (“Forward-Looking Statements; Miscellaneous”), is incorporated herein by reference.

(b) The information set forth in the Offer to Amend or Replace under Section 12 (“Interests of Directors and Officers; Transactions and Arrangements Concerning the Options; and Material Agreements with Directors and Officers”) is incorporated herein by reference.

ITEM 5. PAST CONTACTS, TRANSACTIONS, NEGOTIATIONS AND ARRANGEMENTS.

(a) The information set forth in the Offer to Amend or Replace under Section 12 (“Interests of Directors and Officers; Transactions and Arrangements Concerning the Options; and Material Agreements with Directors and Officers”) is incorporated herein by reference. The KLA-Tencor Corporation 2004 Equity Incentive Plan, pursuant to which the Eligible Options have been granted is attached hereto as Exhibit (d)(1), and contains information regarding the subject securities.

ITEM 6. PURPOSES OF THE TRANSACTION AND PLANS OR PROPOSALS.

(a) The information set forth in the Offer to Amend or Replace under Section 2 (“Purpose of the Offer”) is incorporated herein by reference.

(b) The information set forth in the Offer to Amend or Replace under Section 6 (“Acceptance of Eligible Options for Amendment or Replacement and Commitment to Pay Cash Bonus With Respect to Amended Options”) and Section 13 (“Status of Options Accepted by Us in the Offer; Accounting Consequences of the Offer”) is incorporated herein by reference.

ITEM 7. SOURCE AND AMOUNT OF FUNDS OR OTHER CONSIDERATION.

(a) The information set forth in the Offer to Amend or Replace under Section 9 (“Source and Amount of Consideration; Terms of Amended Options or New Options”) and Section 17 (“Fees and Expenses”) is incorporated herein by reference.

(b) The information set forth in the Offer to Amend or Replace under Section 7 (“Conditions of the Offer”) is incorporated herein by reference.

(c) Not applicable.

ITEM 8. INTEREST IN SECURITIES OF THE SUBJECT COMPANY.

(a) The information set forth in the Offer to Amend or Replace under Section 12 (“Interests of Directors and Officers; Transactions and Arrangements Concerning the Options; and Material Agreements with Directors and Officers”) is incorporated herein by reference.

(b) The information set forth in the Offer to Amend or Replace under Section 12 (“Interests of Directors and Officers; Transactions and Arrangements Concerning the Options; and Material Agreements with Directors and Officers”) is incorporated herein by reference.

ITEM 9. PERSONS/ASSETS, RETAINED, EMPLOYED, COMPENSATED OR USED.

(a) Not applicable.

ITEM 10. FINANCIAL STATEMENTS.

(a) The information set forth in the Offer to Amend or Replace under Section 11 (“Information Concerning KLA-Tencor”) and Section 18 (“Additional Information”) is incorporated herein by reference. Item 8 (“Financial Statements and Supplementary Data”) of the Company’s Annual Report on Form 10-K for its fiscal year ended June 30, 2006 is incorporated herein by reference. Item 1 (“Financial Statements (Unaudited)”) of the Company’s Quarterly Reports on Form 10-Q for its fiscal quarters ended September 30, 2006, December 31, 2006 and March 31, 2007 are incorporated herein by reference.

(b) Not applicable.

(c) Summary Information. The information set forth in the Offer to Amend or Replace under Section 11 (“Information Concerning KLA-Tencor”) is incorporated herein by reference.

ITEM 11. ADDITIONAL INFORMATION.

(a) The information set forth in the Offer to Amend or Replace under Section 12 (“Interests of Directors and Officers; Transactions and Arrangements Concerning the Options; and Material Agreements with Directors and Officers”) and Section 14 (“Legal Matters; Regulatory Approvals”) is incorporated herein by reference.

(b) Not applicable.

ITEM 12. EXHIBITS.

(a)(1) Offer to Amend or Replace, dated May 16, 2007.

(a)(2) Email Announcement of Offer to Amend or Replace, dated May 16, 2007.

(a)(3) Frequently Asked Questions.

(a)(4) Form of Letter of Transmittal and Cover Letter thereto.

(a)(5) Form of Stock Option Amendment and Special Bonus Agreement.

(a)(6) Withdrawal Form.

(a)(7) Forms of Acknowledgement of Receipt of Letter of Transmittal/Withdrawal Form.

(a)(8) Form of Email Reminder of Expiration Date.

(a)(9) Email to Individuals Choosing Not to Tender Eligible Options.

(a)(10) Form of Notice of Expiration of Offer, Amendment of Eligible Option and Commitment to Pay Cash Bonus.

(a)(11) KLA-Tencor Corporation Annual Report on Form 10-K for the year ended June 30, 2006, filed with the Securities and Exchange Commission (the “SEC”) on January 29, 2007, is incorporated herein by reference.

(a)(12) KLA-Tencor Corporation Quarterly Report on Form 10-Q for its fiscal quarter ended September 30, 2006, filed with the SEC on January 29, 2007, is incorporated herein by reference.

(a)(13) KLA-Tencor Corporation Quarterly Report on Form 10-Q for its fiscal quarter ended December 31, 2006, filed with the SEC on February 9, 2007, is incorporated herein by reference.

(a)(14) KLA-Tencor Corporation Quarterly Report on Form 10-Q for its fiscal quarter ended March 31, 2007, filed with the SEC on May 7, 2007, is incorporated herein by reference.

(b) Not applicable.

(d)(1) KLA-Tencor Corporation 2004 Equity Incentive Plan is incorporated herein by reference from Exhibit 10.1 to Form S-8, filed with the SEC on December 23, 2004.

(d)(2) KLA-Tencor Corporation 2004 Equity Incentive Plan Form of Stock Option Agreement.

(g) Not applicable.

(h) Not applicable.

ITEM 13. INFORMATION REQUIRED BY SCHEDULE 13E-3.

(a) Not applicable.

SIGNATURE

After due inquiry and to the best of my knowledge and belief, I certify that the information set forth in this Schedule TO is true, complete and correct.

KLA-TENCOR CORPORATION

By: /s/ Brian Martin
Brian Martin
Senior Vice President and Chief Legal Officer

Date: May 16, 2007

INDEX OF EXHIBITS

<u>EXHIBIT NUMBER</u>	<u>DESCRIPTION</u>
(a)(1)	Offer to Amend or Replace, dated May 16, 2007.
(a)(2)	Email Announcement of Offer to Amend or Replace, dated May 16, 2007.
(a)(3)	Frequently Asked Questions.
(a)(4)	Form of Letter of Transmittal and Cover Letter thereto.
(a)(5)	Form of Stock Option Amendment and Special Bonus Agreement.
(a)(6)	Withdrawal Form.
(a)(7)	Forms of Acknowledgement of Receipt Letter of Transmittal/Withdrawal Form.
(a)(8)	Form of Email Reminder of Expiration Date.
(a)(9)	Email to Individuals Choosing Not to Tender Eligible Options.
(a)(10)	Form of Notice of Expiration of Offer, Amendment of Eligible Option and Commitment to Pay Cash Bonus.
(a)(11)	KLA-Tencor Corporation Annual Report on Form 10-K for the year ended June 30, 2006, filed with the SEC on January 29, 2007, is incorporated herein by reference.
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(a)(14)	KLA- Tencor Corporation Quarterly Report on Form 10-Q for its fiscal quarter ended March 31, 2007, filed with the SEC on May 7, 2007, is incorporated herein by reference.
(b)	Not applicable.
(d)(1)	KLA-Tencor Corporation 2004 Equity Incentive Plan is incorporated herein by reference from Exhibit 10.1 to Form S-8, filed with the SEC on December 23, 2004.
(d)(2)	KLA-Tencor Corporation 2004 Equity Incentive Plan Form of Stock Option Agreement.
(g)	Not applicable.
(h)	Not applicable.

KLA-TENCOR CORPORATION
OFFER TO AMEND OR REPLACE ELIGIBLE OPTIONS

MAY 16, 2007

THE OFFER AND WITHDRAWAL RIGHTS EXPIRE
AT 11:59 P.M., PACIFIC TIME, ON JUNE 14, 2007,
UNLESS THE OFFER IS EXTENDED

KLA-Tencor Corporation (“KLA-Tencor”, the “Company”, “us” or “we”) is making this offer to certain individuals to amend or replace certain outstanding stock options to purchase the Company’s common stock previously granted to them under the 2004 Equity Incentive Plan (the “2004 Plan”).

A stock option will be subject to this offer only to the extent that option meets each of the following conditions:

- (i) The option was granted under the 2004 Plan.
- (ii) The option was retroactively priced in that the exercise price per share currently in effect for that option is based on the fair market value per share of the Company’s common stock on a date earlier than the date on which the option was actually granted.
- (iii) The option was unvested as of December 31, 2004.
- (iv) The option is held by an individual who is, on the expiration of this offer, a current employee of the Company or an affiliated company (such as a subsidiary or joint venture entity) and subject to income taxation in the United States with respect to that option (an “Eligible Optionee”).
- (iv) The option is outstanding on the expiration date of this offer.

An option that satisfies each of the foregoing conditions is designated an Eligible Option for purposes of this offer. If only a portion of the option meets the foregoing conditions, then only that portion will be an Eligible Option, and the balance of that option will not be eligible for amendment or replacement pursuant to this offer.

Unless remedial action is taken to adjust the exercise price of an Eligible Option, that option may be subject to adverse tax consequences under Section 409A of the Internal Revenue Code. Accordingly, the Company is making this offer so that each Eligible Optionee holding one or more Eligible Options will have the opportunity to amend or replace those options to the extent necessary to avoid such adverse taxation. The amendment will adjust the exercise price per share currently in effect for the Eligible Option to the lower of (i) the fair market value per share of the Company’s common stock on the actual grant date of that option or (ii) the closing price per share of such common stock on the date on which the option is amended. The new exercise price per share will be designated the “Adjusted Exercise Price” and will become effective on the first business day following the expiration of the offer (the “Amendment Date”). The option as so amended for the Adjusted Exercise Price will be designated an “Amended Option.” However, if the Adjusted Exercise Price as so determined would be the same or lower than the exercise price per share currently in effect for the Eligible Option, then that option will, on the Amendment Date, be canceled and immediately replaced with a new option that is exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant date. That replacement option will be designated a “New Option.” Such cancellation and re-grant is necessary to evidence the remedial action required under Section 409A with respect to an Eligible Option whose current exercise price is not increased.

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If only a portion of an outstanding option is an Eligible Option (i.e., the portion of such option that was unvested as of December 31, 2004), then only that portion may be amended or replaced pursuant to this offer. The balance of such option will not be subject to this offer and will not constitute an Eligible Option for purposes of this offer. That portion (i.e., the portion that was vested as of December 31, 2004) will retain its current exercise price and will not be subject to adverse tax consequences under Section 409A of the Internal Revenue Code.

Each Eligible Optionee whose Eligible Option is amended to increase the exercise price pursuant to this offer will become entitled to a special cash bonus (the "Cash Bonus") with respect to that option. The amount of the Cash Bonus payable with respect to each Eligible Option that is amended to increase the exercise price to the Adjusted Exercise Price will be determined by multiplying (i) the amount by which the Adjusted Exercise Price exceeds the exercise price per share currently in effect for that Eligible Option by (ii) the number of shares of the Company's common stock purchasable under that option at the Adjusted Exercise Price. The Cash Bonus will be paid on the Company's first regularly scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008. Such a delayed payment is required by applicable Internal Revenue Service ("IRS") regulations. The payment when made will be subject to the Company's collection of all applicable withholding taxes and other amounts required to be withheld by the Company. Such Cash Bonus will be paid whether or not you continue in the Company's employ through the payment date.

If you are not in the employ of the Company or any affiliated entity on the expiration date of the offer, then none of your tendered Eligible Options will be amended or replaced, and you will not become entitled to any Cash Bonus with respect to those options. The tendered options will be returned to you and will remain exercisable in accordance with the terms in effect for them at the time of tender, including the current exercise price per share. You will receive a separate communication from the Company regarding your tax situation and any financial assistance the Company may provide with respect to the Section 409A tax penalties you may subsequently incur in connection with the exercise of those options.

The offer set forth in this document and the related Letter of Transmittal and Stock Option Amendment and Special Bonus Agreement (collectively, as they may each be amended or supplemented from time to time, constitute the "Offer") will expire on the expiration date, currently set for June 14, 2007, unless extended (the "Expiration Date").

If you are an Eligible Optionee, then you will receive promptly after the commencement of the Offer a personalized Letter of Transmittal providing the following information with respect to each Eligible Option you hold:

- the grant date indicated for that option on the applicable option agreement or grant notice,
- the current exercise price per share in effect for that option,
- the number of shares of the Company's common stock purchasable under that option,
- the actual grant date of that option, and
- the fair market value per share of the Company's common stock on the actual grant date.

As of May 15, 2007, options to purchase approximately 20,570,244 shares of our common stock were issued and outstanding under the 2004 Plan, including Eligible Options to purchase up to approximately 301,800 shares of our common stock.

We are making this Offer upon the terms and subject to the conditions set forth in this Offer, including the conditions described in Section 7. Participation in the Offer is voluntary, and you are not required to tender any of your Eligible Options for amendment or replacement. The Offer is not conditioned upon the tender of a minimum number of Eligible Options for amendment or replacement.

Although our Board of Directors has approved this Offer, neither we nor our Board of Directors will make any recommendation as to whether you should tender your Eligible Options for amendment or replacement. You must make your own decision whether to tender your Eligible Options after taking into account your

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own personal circumstances and preferences. You should be aware that adverse tax consequences under Section 409A may apply to your Eligible Options if they are not amended or replaced pursuant to this Offer, and you will be solely responsible for any taxes, interest or penalties you may incur under Section 409A. For that reason, we recommend that you consult with your personal tax advisor to determine the consequences of tendering or not tendering your Eligible Options pursuant to the Offer.

Shares of our common stock are quoted on the Nasdaq Global Select Market under the symbol “KLAC.” On May 15, 2007, the last reported sale price of our common stock on the Nasdaq Global Select Market was \$55.14 per share. The Adjusted Exercise Price to be in effect for each Eligible Option amended pursuant to the Offer will represent the lower of (i) the fair market value of the Company’s common stock on the actual date on which that option was granted and (ii) the closing price of the Company’s common stock on the Amendment Date. If the Adjusted Exercise Price would otherwise be the same or lower than the exercise price per share currently in effect for a tendered Eligible Option, then that option will be replaced with a New Option. Neither the exercise price currently in effect for each Eligible Option nor the Adjusted Exercise Price for each such option is meant to reflect our view of what the trading price of our common stock will be in the short, medium or long-term.

You should direct questions about the Offer or requests for assistance or for additional copies of this document, the related Tender Offer Statement on Schedule TO or the Letter of Transmittal and accompanying Stock Option Amendment and Special Bonus Agreement to Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

We have not authorized anyone to give you any information or to make any representation in connection with this Offer other than the information and representations contained in this document, the related Tender Offer Statement on Schedule TO or in the related Letter of Transmittal and Stock Option Amendment and Special Bonus Agreement. If anyone makes any representation or gives you any information that is different from the representations and information contained in this Offer, the related Tender Offer Statement on Schedule TO or in the related Letter of Transmittal and Stock Option Amendment and Special Bonus Agreement, you must not rely upon that representation or information as having been authorized by us. We have not authorized any person to make any recommendation on our behalf as to whether you should tender or refrain from tendering your Eligible Options pursuant to the Offer.

The Offer has not been approved or disapproved by the United States Securities and Exchange Commission (the “SEC”) or any state or foreign securities commission, nor has the SEC or any state or foreign securities commission passed upon the accuracy or adequacy of the information contained in this Offer. Any representation to the contrary is a criminal offense. We recommend that you consult with your tax advisor to determine the tax consequences of electing or not electing to participate in the Offer.

IMPORTANT INFORMATION

If you wish to tender one or more of your Eligible Options for amendment or replacement, you must properly complete and sign the Letter of Transmittal in accordance with the applicable instructions for that form, and mail, courier or hand deliver the document and any other required documents to us at KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy. You may also submit the documents to us by facsimile at (408) 875-6677.

As soon as administratively practicable following the Amendment Date, we will return to you a final and complete Stock Option Amendment and Special Bonus Agreement in which the Adjusted Exercise Price for each of your Amended Options and the related Cash Bonus will be set forth in Schedule I to that agreement. You will also receive at that time a stock option agreement for any New Option granted to you in replacement of a tendered Eligible Option with a current exercise price per share that is the same or higher than the closing price per share of our common stock on the Amendment Date. The stock option agreement will be the same as the option agreement in effect for the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but will have a new grant date.

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The key dates to remember in connection with the Offer are as follows:

The commencement date of the Offer is May 16, 2007.

The Offer will expire at 11:59 pm Pacific Time on June 14, 2007 (unless we extend it).

The Eligible Options will be amended or replaced on June 15, 2007 (unless we extend the Offer). Please be aware that your option account at your broker may not accurately reflect the amendment or replacement for one to two business days following the Amendment Date.

The Cash Bonus for the Amended Options will become payable on the Company's first regularly scheduled payroll date after January 1, 2008, which is schedule to be January 10, 2008. Such a delayed payment is required by applicable IRS regulations.

We are not making the Offer to, nor will we accept any tender of Eligible Options on behalf of, option holders in any jurisdiction in which the Offer or the acceptance of any option tender would not be in compliance with the laws of such jurisdiction. However, we may, at our discretion, take any actions necessary for us to legally make the Offer to option holders in any such jurisdiction.

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SUMMARY TERM SHEET

The following are answers to some of the questions that you may have about the Offer. We urge you to read carefully the remainder of this document and the accompanying Letter of Transmittal and Stock Option Amendment and Special Bonus Agreement (which when taken together, as they may each be amended or supplemented from time to time, constitute the “Offer”) because the information in this summary and in the introductory pages preceding this summary is not complete and may not contain all of the information that is important to you. Additional important information is contained in the remainder of this document and the Letter of Transmittal and accompanying Stock Option Amendment and Special Bonus Agreement. We have included page references to the relevant sections of the document where you can find a more complete description of the topics in this summary term sheet.

1. WHAT OPTIONS ARE ELIGIBLE FOR AMENDMENT OR REPLACEMENT PURSUANT TO THE OFFER?

Section 409A to the Internal Revenue Code (the “Code”) provides that an option granted with a below-market exercise price, to the extent it was not vested as of December 31, 2004, will be subject to adverse income taxation (as described below), unless that option is brought into compliance with Section 409A before exercise. KLA-Tencor has decided to offer eligible persons holding such options the opportunity to amend or replace each such option to avoid adverse taxation under Section 409A.

An outstanding option to purchase shares of the Company’s common stock will be eligible for amendment or replacement pursuant to the Offer if that option meets each of the following conditions:

- (i) The option was granted under the Company’s 2004 Equity Incentive Plan (the “2004 Plan”).
- (ii) The option was retroactively priced in that the exercise price per share currently in effect for that option is based on the fair market value per share of the Company’s common stock on a date earlier than the date on which the option was actually granted.
- (iii) The option was unvested as of December 31, 2004.
- (iv) The option is held by an individual who is, on the expiration of this offer, an Eligible Optionee.
- (iv) The option is outstanding on the expiration date of this offer.

An option that meets each of the foregoing conditions will constitute an “Eligible Option” for purposes of the Offer. If only a portion of the option meets those conditions, then only that portion will be an Eligible Option, and the balance of that option will not be eligible for amendment or replacement pursuant to this offer. (Page 13)

2. WHAT OTHER DEFINED TERMS ARE IMPORTANT TO UNDERSTAND THE OFFER?

For purposes of this Offer, you also should be familiar with the following additional definitions.

“Adjusted Exercise Price” is the new exercise price per share that will be in effect for any tendered Eligible Option that is amended pursuant to the Offer and will be equal to the lower of (i) the fair market value per share of the Company’s common stock on the actual date on which that option was granted and (ii) the closing price per share of such common stock on the date on which the option is amended. However, if the Adjusted Exercise Price as so determined would be the same or lower than the exercise price per share currently in effect for the Eligible Option, then that option will, on the Amendment Date, be canceled and immediately replaced with a new option that is exactly the same as the canceled option, including the same exercise price per share and with no loss of vesting or change to the expiration date of the option term, but with a new grant date.

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Accordingly, the exercise price for a tendered Eligible Option that we amend or replace pursuant to the Offer will fall within one of the three following categories:

- (i) *Full Increase*: increased to the fair market value per share of the Company's common stock on the actual grant of that option,
- (ii) *Partial Increase*: increased to the lower closing price per share of such common stock on the date such option is amended, or
- (iii) *No Increase*: retained as the exercise price per share for any New Option issued in replacement of that option.

"Amended Option" will mean an Eligible Option that has been amended pursuant to the Offer to increase the exercise price per share for the KLA-Tencor common stock purchasable under that option to the Adjusted Exercise Price determined for such option.

"Amendment Agreement" will mean the Stock Option Amendment and Special Bonus Agreement that will document the Adjusted Exercise Price for each of your Amended Options and set forth the terms of the Cash Bonus payable with respect to those Amended Options.

"Amendment Date" will mean the date on which each Eligible Option is amended to increase the exercise price of that option to the Adjusted Exercise Price and will be June 15, 2007 or, if the Offer is extended, the first business day following the extended expiration date of the Offer.

"Cash Bonus" is the special cash bonus to which each Eligible Optionee will become entitled if the current exercise price of one or more of his or her Eligible Options is increased pursuant to the Offer.

"Eligible Optionee" is each person who is, on the expiration date of the Offer, a current employee of the Company or any affiliated entity (such as a subsidiary or joint venture entity) and subject to income taxation in the United States with respect to his or her tendered Eligible Options.

"Fair Market Value" per share of the Company's common stock on any relevant date will be deemed to be equal to the closing price per share of such stock on that date on the Nasdaq Global Select Market.

"Letter of Transmittal" is the form that the Eligible Optionee must use to notify the Company as to the particular Eligible Options he or she has elected to tender for amendment or replacement pursuant to the terms of the Offer.

"New Option" will mean the option granted on the Amendment Date in replacement of a tendered Eligible Option with a current exercise price per share at or above the closing price per share of our common stock on the Amendment Date. The New Option will be exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but will have a new grant date. The New Option will be evidenced by a new option agreement that replaces the option agreement in effect for the canceled option.

3. WHY IS KLA-TENCOR MAKING THE OFFER?

We are making this Offer to amend or replace the Eligible Options because of potential adverse tax consequences that may apply to those options. As a result of a thorough investigation of the Company's past option grant practices, the Company has determined that each Eligible Option was retroactively priced in that the exercise price per share currently in effect for that option was based on the fair market value per share of the Company's common stock on a date earlier than the date on which that option was actually granted. Section 409A of the Internal Revenue Code provides that an option granted with a below-market exercise price, to the extent unvested as of December 31, 2004, will be subject to adverse income taxation unless that option is brought into compliance with

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Section 409A. KLA-Tencor has decided to provide Eligible Optionees with the opportunity to bring the Eligible Options into compliance either by amending the exercise price per share to the Adjusted Exercise Price determined for each such option or by replacing that option with a New Option. By taking such remedial action, Eligible Optionees can avoid the adverse tax consequences summarized in Section 2 of the Offer. (Page 18)

The individualized Letter of Transmittal that will be sent to you promptly after the commencement of the Offer will set forth the actual grant date for each Eligible Option you hold, the fair market value per share of our common stock on that date and the number of shares of common stock subject to each Eligible Option.

4. ARE KLA-TENCOR EXECUTIVE OFFICERS AND NON-EMPLOYEE BOARD MEMBERS ELIGIBLE TO PARTICIPATE IN THE OFFER?

Our executive officers and non-employee members of our Board of Directors are not eligible to participate in the Offer.

However, Richard Wallace, our Chief Executive Officer holds certain stock options that would have been Eligible Options but for the fact that the exercise prices for those options were amended on terms similar to the terms of this Offer on December 28, 2006. Internal Revenue Service (“IRS”) regulations required those particular options to be so amended before January 1, 2007 because they were granted to an individual who was an executive officer at the time of grant, and the remedial period for those options ended on December 31, 2006. Mr. Wallace will also be entitled to a cash bonus in January 2008 that compensates him for the higher exercise prices in effect under those amended options. Two other former executive officers, Neil Richardson and Dennis Fortino also had the exercise prices for certain of their options similarly increased, and they will accordingly receive cash bonuses in January 2008 to cover that increase. John Kispert, our President and Chief Operating Officer, had the exercise prices for certain of his options similarly increased; however, Mr. Kispert will not receive a cash bonus to compensate for the higher prices in effect for those amended options. (Page 30)

5. ARE OPTIONEES RESIDENT OUTSIDE THE UNITED STATES ELIGIBLE TO PARTICIPATE IN THE OFFER?

Yes. If you are a current employee of the Company or an affiliated entity holding an Eligible Option and subject to taxation in the United States with respect to that option, then you are eligible to participate in the Offer even if you are not currently residing in the United States. (Page 15)

6. WHAT ARE THE COMPONENTS OF THE OFFER?

If an Eligible Option is amended pursuant to the Offer, then the exercise price of that option will be increased to the lower of (i) the fair market value per share on the date on which that option was actually granted and (ii) the closing price per share of the Company’s common stock on the Amendment Date. The adjusted exercise price will avoid the potential taxation of that option under Section 409A. The new exercise price in effect for each tendered Eligible Option will be designated the “Adjusted Exercise Price.” In addition, each Eligible Optionee whose Eligible Options are so amended will become entitled to a special cash bonus from the Company (the “Cash Bonus”). The amount of the Cash Bonus payable with respect to each Amended Option will be determined by multiplying (i) the amount by which the Adjusted Exercise Price exceeds the exercise price per share currently in effect for that Eligible Option by (ii) the number of shares of the Company’s common stock purchasable under that option at the Adjusted Exercise Price. The Cash Bonus will be paid on the Company’s first regularly scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008. Such a delayed payment is required by applicable IRS regulations. The payment when made will be subject to the Company’s collection of all applicable withholding taxes and other payments required to be withheld by the Company. Such Cash Bonus will be paid whether or not you continue in the Company’s employ through the payment date. (Page 15)

However, if the Adjusted Exercise Price determined for any tendered Eligible Option would be the same or lower than the exercise price per share currently in effect for that option, then that option will, on the Amendment Date, be canceled and immediately replaced with a New Option that is exactly the same as the canceled option, including the

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same exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant date. Such cancellation and re-grant is necessary to evidence the remedial action required under Section 409A with respect to an Eligible Option whose current exercise price is not increased. (Page 16)

7. WHAT HAPPENS IF I AM NOT A CURRENT EMPLOYEE ON THE EXPIRATION DATE?

If you are not in the employ of the Company or any affiliated entity on the Expiration Date, then none of your tendered Eligible Options will be amended or replaced, and you will not be entitled to any Cash Bonus with respect to those options. The tendered options will be returned to you and will remain exercisable in accordance with the terms in effect for them at the time of tender, including the current exercise price per share. You will receive a separate communication from the Company regarding your tax situation and any financial assistance the Company may provide with respect to the Section 409A tax penalties you may subsequently incur in connection with the exercise of those options. (Page 17)

8. WHAT HAPPENS IF MY EMPLOYMENT TERMINATES ON OR AFTER THE EXPIRATION DATE BUT BEFORE THE AMENDMENT DATE?

If your employment with KLA-Tencor or any affiliated entity terminates on or after the Expiration Date but prior to the Amendment Date, none of your tendered Eligible Options will be amended or replaced pursuant to the Offer, and you will not be entitled to any Cash Bonus with respect to those options. The tendered options will be returned to you and will remain exercisable in accordance with the terms in effect for them at the time of the tender, including the current exercise price per share. If you take no other action to bring those options into compliance with Section 409A, you may be subject to adverse taxation in the manner discussed below. You will be solely responsible for any taxes, penalties or interest you may incur under Section 409A.

9. WHAT ARE THE TAX CONSEQUENCES OF AN OPTION SUBJECT TO SECTION 409A?

Section 409A and the U.S. Treasury regulations issued thereunder provide that a stock option granted with an exercise price per share below the fair market value of the underlying shares on the grant date will, *to the extent that option was not vested as of December 31, 2004*, be subject to the adverse tax consequences. Unless certain remedial action is taken before the earlier of (i) December 31, 2007 or (ii) the date the optionee exercise his or her Eligible Options, Section 409A will subject the optionee to the following adverse tax consequences, beginning with the 2008 calendar year.

Taxation in Calendar Year 2008. To the extent the optionee holds unexercised Eligible Options for shares of the Company's common stock that vested prior to the 2008 calendar year or that vest during such year, the optionee will recognize taxable income for the 2008 calendar year in an amount equal to the fair market value of those shares on the applicable tax measurement date less the exercise price payable for those shares. The optionee will have to report that income in his or her tax return filed for the 2008 calendar year, even though the Eligible Option is not exercised for those shares during that year. The IRS has not yet provided guidance as to the applicable tax measurement date for determining an optionee's taxable income, but it is possible that such date will be the earlier of (i) the date the optionee exercises the Eligible Option during the 2008 calendar year or (ii) December 31, 2008.

Tax Penalty. In addition to normal income taxes payable on the spread in effect under each of the optionee's Eligible Options on the applicable tax measurement date for the 2008 calendar year, the optionee would also be subject to an additional tax penalty equal to 20% of that spread.

Note: California has adopted Section 409A, and for optionees subject to California income taxation, the total penalty tax is 40%. Other states have also adopted Section 409A with penalty taxes at rates different from the 20% rate under Section 409A.

Interest Penalty Measured From Year of Vesting To the extent the Eligible Option vested as to one or more shares during the 2005 calendar year, the optionee will incur an interest penalty payable with his or her tax

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return for the 2008 calendar year. The interest penalty will be based on the income taxes the optionee would have incurred for the 2005 calendar year had he or she been taxed on the spread which existed on those vested shares on December 31, 2005 (the amount by which the December 31, 2005 fair market value of the shares which vested under the Eligible Option during the 2005 calendar year exceeded the exercise price payable for those shares). For purposes of such calculation, the optionee's tax rate will be deemed to be 35%, and that tax rate will be applied to the December 31, 2005 option spread on the shares which vested under the Eligible Option during the 2005 calendar year. The tax amount resulting from such calculation is not actually payable for the 2005 calendar year, but will trigger an interest penalty under Section 409A for the period beginning April 15, 2006 and continuing until the date the optionee pays the accrued interest with his or her taxes for the 2008 calendar year. To the extent the Eligible Option vested as to one or more shares during the 2006 calendar year, the optionee would perform the same calculation based on the December 31, 2006 fair market value of the shares which vested during that year, and the interest penalty would accrue over the period beginning April 15, 2007 and continuing until the optionee pays the accrued interest with his or her taxes for the 2008 calendar year. The same calculation would also be applicable for any shares which vested under the Eligible Option during the 2007 calendar year based on the option spread which existed on those particular shares on December 31, 2007, and the interest penalty would accrue from April 15, 2008 until the optionee pays the accrued interest with his or her 2008 calendar year taxes. Finally, there would also be an additional interest penalty with respect to the shares which vested under the Eligible Option during the 2005 and 2006 calendar years but remain unexercised in the 2008 calendar year, to the extent their year-end fair market value in each calendar year subsequent to the calendar year of vesting is higher than their year-end fair market value in the immediately preceding calendar year. The interest penalty would accrue until paid with the optionee's 2008 calendar year taxes.

Vesting in Subsequent Calendar Years. To the extent an Eligible Option first vests in a calendar year after the 2008 calendar year, the optionee will be subject to income taxation and penalty taxes on the spread which exists between the fair market value of the shares which vest during that year and the exercise price payable for those shares. Such spread will be calculated on the applicable tax measurement date for such year.

Continued Taxation of Vested Shares. The optionee will be subject to additional income taxation and penalty taxes on any subsequent increases to the fair market value of his or her vested option shares which occur in calendar years after the calendar year in which those shares are first taxed under Section 409A. Such taxation will continue until the optionee exercises the options or those options terminate.

Note: The IRS has not yet provided any guidance as to how the additional taxable income is to be measured over the period the options remain outstanding after the 2007 calendar year.

10. WHAT ARE THE TAX CONSEQUENCES IF I TENDER MY OPTIONS FOR AMENDMENT OR REPLACEMENT PURSUANT TO THE OFFER?

If you tender your Eligible Options, you will not recognize any taxable income for U.S. federal income tax purposes at the time of the tender or at the time your Eligible Options are amended to adjust the exercise price or replaced with a New Option.

By amending the exercise prices of your Eligible Options to the applicable Adjusted Exercise Prices or replacing those options with New Options, you will also avoid the adverse taxation of those options under Section 409A. Accordingly, you will **not** be subject to taxation under Section 409A on your vested Eligible Options in the 2008 calendar year, and as your Amended Options or New Options vest in one or more subsequent calendar years, you will **not** recognize taxable income with respect to the option shares that vest in those years, and you will **not** be subject to any 20% penalty tax or any interest penalty under Section 409A. You will only be taxed with respect to your Amended Options or New Options when you exercise those options. However, you will recognize taxable income when you receive the Cash Bonus paid with respect to your Amended Options. (Page 33)

All Eligible Optionees should consult with their own personal tax advisor as to the tax consequences of accepting the Offer.

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11. HOW WILL MY CASH BONUS BE TAXED?

You will be taxed upon your receipt of the Cash Bonus. The payment will constitute wages for tax withholding purposes. Accordingly, the Company must withhold all applicable U.S. federal, state and local income and employment withholding taxes required to be withheld with respect to such payment. You will receive only the portion of the payment remaining after all those taxes and payments have been withheld. (Page 33)

If your Eligible Options are not amended pursuant to the Offer, you will not receive any Cash Bonus with respect to those options. No Cash Bonus will be paid with respect to a New Option because the exercise price for that option will be the same as the exercise price in effect for the tendered Eligible Option it replaces. (Page 16)

12. WHAT ARE THE TAX CONSEQUENCES IF I DO NOT TENDER MY OPTIONS FOR AMENDMENT OR REPLACEMENT PURSUANT TO THE OFFER?

If you choose not to tender your Eligible Options and take no other action to bring those options into compliance with Section 409A, then you will be subject to the adverse taxation under Section 409A in the manner discussed above. You will be solely responsible for any taxes, penalties or interest you may incur under Section 409A. An example illustrating the applicable tax consequences may be found on Page 19 of this document.

13. WHAT SECURITIES ARE SUBJECT TO THE OFFER?

The Offer covers only Eligible Options. Promptly after the commencement of the Offer, we will send you a personalized Letter of Transmittal that summarizes the Eligible Options that you currently hold, including information relating to the number of shares subject to each Eligible Option, the current exercise price per share in effect for that option, the actual grant date for each Eligible Option and the fair market value per share of the Company's common stock on that date. (Page 13)

14. AM I REQUIRED TO PARTICIPATE IN THE OFFER?

No. Participation in the Offer is voluntary. You may choose either to tender your Eligible Options for amendment or replacement pursuant to the Offer or to retain those options and seek another alternative to bring those options into compliance with Section 409A. If you decide to accept the Offer, you must submit a properly completed Letter of Transmittal for your tendered Eligible Options. (Page 21)

If you choose not to tender your Eligible Options and take no other action to bring those options into compliance with Section 409A, then you will be subject to the adverse taxation under Section 409A. You will be solely responsible for any taxes, penalties or interest payable under Section 409A. (Page 21)

15. DO I HAVE TO ACCEPT THE OFFER WITH RESPECT TO ALL OF MY ELIGIBLE OPTIONS OR MAY I DECIDE TO ACCEPT THE OFFER WITH RESPECT TO ONLY A PORTION OF THE ELIGIBLE OPTIONS?

If you wish to tender a particular Eligible Option for amendment or replacement pursuant to the offer, you must tender all of that option for amendment or replacement. If you hold more than one Eligible Option, then you may elect to tender one or more of those options and retain the balance. Please remember that not all of a particular outstanding option grant may be an Eligible Option. Only the portion of that grant that was not vested as of December 31, 2004 may constitute an Eligible Option. (Page 22)

16. WILL THE TERMS AND CONDITIONS OF MY AMENDED OPTIONS OR NEW OPTIONS BE THE SAME AS THOSE CURRENTLY IN EFFECT FOR MY ELIGIBLE OPTIONS?

Except for the adjustment to the exercise price per share, each Eligible Option that is amended pursuant to this Offer will continue to remain subject to the same terms and conditions as in effect for such option immediately before the amendment. Accordingly, each Amended Option will vest in accordance with the same vesting schedule measured from the same vesting commencement date and will have the same exercise period, option term and other conditions currently in effect for that option. (Page 29)

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Each New Option granted pursuant to this Offer will be exactly the same as the tendered Eligible Option it replaces, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant date. (Page 29)

17. WHEN WILL MY ELIGIBLE OPTIONS BE AMENDED OR REPLACED?

The exercise price for each Eligible Option tendered pursuant to this Offer will be amended to the applicable Adjusted Exercise Price on June 15, 2007, or if the Offer is extended, the first business day following the extended expiration date. The date the exercise price for an Eligible Option is increased to the applicable Adjusted Exercise Price will constitute the Amendment Date, and each Eligible Option that is so amended will be designated an Amended Option. However, tendered Eligible Options with current exercise prices at or above the fair market value per share of our common stock on June 15, 2007 or, if the Offer is extended, the first business day following the extended expiration date will be canceled at that time and immediately replaced with a new option that is exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant. That replacement option will be designated a New Option.

As soon as administratively practicable after the Amendment Date, we will deliver to you a final and complete Amendment Agreement that will reflect the adjustment to the exercise price of each of your Amended Options and the Company's unconditional obligation to pay you on its first regularly scheduled payroll date after January 1, 2008 the Cash Bonus calculated for each Amended Option. You will also receive at that time a new stock option agreement for any New Option granted in replacement of a tendered Eligible Option with a current exercise price per share that is the same or higher than the closing price per share of our common stock on the Amendment Date. (Page 22)

18. WHAT HAPPENS IF THE FAIR MARKET VALUE OF THE KLA-TENCOR COMMON STOCK ON THE AMENDMENT DATE IS LESS THAN THE FAIR MARKET VALUE PER SHARE OF SUCH COMMON STOCK ON THE ACTUAL GRANT DATE OF THE ELIGIBLE OPTION?

If the fair market value per share of the Company's common stock on the Amendment Date is less than the fair market value of such common stock on the actual grant date for the Eligible Option, then the Adjusted Exercise Price for that option will be set at the fair market value per share of the Company's common stock on the Amendment Date. However, if that Adjusted Exercise Price would be the same or lower than the exercise price per share currently in effect for the Eligible Option, then that option will, on the Amendment Date, be canceled and immediately replaced with a New Option with the same exercise price as the canceled option. (Page 13)

19. WHEN CAN I EXERCISE MY AMENDED OPTIONS OR NEW OPTIONS?

You may exercise an Amended Option for vested option shares at any time following its amendment to the Adjusted Exercise Price and before its termination. You may exercise a New Option for vested option shares at any time after grant and before termination. Neither an Amended Option nor a New Option may be exercised for more than the number of vested shares for which it is at the time exercisable. (Page 29)

20. CAN I EXERCISE MY ELIGIBLE OPTIONS AFTER I TENDER MY ELIGIBLE OPTION BUT BEFORE AMENDMENT OR REPLACEMENT?

You cannot exercise your Eligible Options before the Amendment Date without voiding your participation in the Offer. You may exercise your Eligible Options before the Amendment Date, provided such exercise complies with the existing terms of your Eligible Options, the Company's insider trading policy and any interim blackout periods during which cashless exercises and sales to cover are prohibited. However, if you exercise your Eligible Options before the Amendment Date, any election you have made to tender your exercised option for amendment or replacement pursuant to the Offer will be null and void. Consequently, you may personally incur adverse tax consequences under Section 409A with respect to any Eligible Options you exercise before the Amendment Date. You will be solely responsible for any taxes, penalties or interest payable under Section 409A.

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21. WILL MY AMENDED OPTIONS OR NEW OPTIONS BE INCENTIVE STOCK OPTIONS OR NON-STATUTORY OPTIONS?

Because your Eligible Options were granted with exercise prices below the fair market value of the option shares on the actual dates on which those options were granted, the options are non-statutory options under the U.S. federal income tax laws, and they will remain non-statutory options after the amendment to the applicable Adjusted Exercise Prices. Therefore, when you subsequently exercise your Amended Options, you will recognize immediate taxable income equal to the excess of (i) the fair market value of the purchased shares at the time of exercise over (ii) the Adjusted Exercise Price paid for those shares, and the Company must collect the applicable withholding taxes with respect to such income. All New Options will also be taxable as non-statutory options. (Page 33)

22. WHEN MAY I EXERCISE THE PORTION OF MY OPTIONS THAT WAS VESTED AS OF DECEMBER 31, 2004?

You may exercise the portion of each of your options that was vested as of December 31, 2004 at any time before the termination or expiration of that option. Such portion is not subject to the Offer and will not be subject to adverse taxation under Section 409A.

23. WHAT ARE THE CONDITIONS TO THE OFFER?

The Offer is subject to a number of conditions, including the conditions described in Section 7. The Offer is not conditioned upon the tender of a minimum number of Eligible Options for amendment or replacement. (Page 24)

24. WHEN DOES THE OFFER EXPIRE? CAN THE OFFER BE EXTENDED, AND IF SO, HOW WILL I BE NOTIFIED IF IT IS EXTENDED?

The Offer will expire on June 14, 2007, at 11:59 p.m. Pacific Time, unless we extend the Offer.

Although we do not currently intend to do so, we may, in our discretion, extend the Offer at any time. If the Offer is extended, we will send you an email or other communication informing you of the extension no later than 9:00 a.m. Eastern Time on the next business day following the previously scheduled expiration of the Offer period. (Page 17; Page 34)

25. HOW AND WHEN DO I TENDER MY ELIGIBLE OPTIONS?

In order to tender one or more of your Eligible Options for amendment or replacement pursuant to the Offer, you must properly complete, duly execute and date your Letter of Transmittal and deliver it to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy, either by mail, courier, hand delivery or facsimile ((408) 875-6677). We must receive your completed Letter or Transmittal before 11:59 p.m. Pacific Time on June 14, 2007. If we extend the Offer beyond that time, you must deliver your completed and executed Letter of Transmittal before the extended expiration date of the Offer. (Page 21)

We will not accept delivery of any Letter of Transmittal after expiration of the Offer. If we do not receive a properly completed and duly executed Letter of Transmittal from you before the expiration of the Offer, we will not accept your Eligible Options for amendment or replacement. Those options will not be amended or replaced pursuant to this Offer, and no Cash Bonus will be paid with respect to those options.

We reserve the right to reject any or all tenders of Eligible Options that we determine are not in appropriate form or that we determine are unlawful to accept. Otherwise, we intend to accept all properly and timely tendered Eligible Options that are not validly withdrawn. Subject to our rights to extend, terminate or amend the Offer, we currently expect that we will accept all properly tendered Eligible Options upon the expiration of the Offer, and we will amend or replace those options on the next business day thereafter. (Page 22)

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26. DURING WHAT PERIOD OF TIME MAY I WITHDRAW MY PREVIOUSLY TENDERED OPTIONS?

You may withdraw your tendered Eligible Options at any time before 11:59 p.m. Pacific Time on June 14, 2007 (or any extended expiration date of the Offer). To withdraw your tendered options, you must send to us at 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy or by facsimile at (408) 875-6677, a properly completed and executed Withdrawal Form, with the required information while you still have the right to withdraw those options. Once you have withdrawn your Eligible Options, you may re-tender those options pursuant to the Offer only if you again comply with the tender procedures as described in this document and the Letter of Transmittal prior to the expiration of the Offer. (Page 23)

27. WHAT DOES KLA-TENCOR THINK OF THE OFFER?

Although our Board of Directors has approved the Offer, neither we nor our Board of Directors make any recommendation as to whether you should tender or refrain from tendering your Eligible Options for amendment or replacement. You must make your own decision whether to tender your Eligible Options, after taking into account your own personal circumstances and preferences. (Page 21) The Company recommends that you consult with your personal tax advisor when deciding whether or not you should tender your Eligible Options.

Our executive officers and non-employee members of our Board of Directors are not eligible to participate to the Offer.

28. WHAT ARE SOME OF THE KEY DATES TO REMEMBER?

The commencement date of the Offer is May 16, 2007.

The Offer will expire at 11:59 pm Pacific Time on June 14, 2007 (unless we extend it).

The Eligible Options will be amended or replaced on June 15, 2007 (unless we extend the Offer). Please be aware that your option account at your broker may not accurately reflect the amendment or replacement for one to two business days following the Amendment Date.

The Cash Bonus for the Amended Options will be paid on the Company's first regularly scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008.

29. TO WHOM CAN I TALK IF I HAVE QUESTIONS ABOUT THE OFFER?

For additional information or assistance, you should contact Tracy Laboy at (408) 875-7131.

CERTAIN RISKS OF PARTICIPATING IN THE OFFER

Participating in the Offer involves risks discussed in this Offer and described below. In addition, information concerning risk factors included in our Annual Report on Form 10-K for the year ended June 30, 2006 is incorporated by reference herein and may be inspected at, and copies may be obtained from, the places and in the manner described in Section 18 "Additional Information." You should carefully consider these risks and are encouraged to consult your investment, tax and legal advisor before deciding to participate in the Offer.

Tax-Related Risks.

State and Local Taxes. The discussion in Section 2 and Section 15 of the Offer describes the material U.S. federal income tax consequences if you participate in the Offer or if you elect not to participate. State and local laws may provide different tax treatment. In addition, certain states, including California, have adopted provisions similar to Section 409A. If you are subject to income taxation in those states, you may incur additional taxes, interest and penalties under such provisions if you do not bring your Eligible Options into compliance.

Eligible Optionees should consult with their own personal tax advisors as to the tax consequences of their participation in the Offer.

Procedural Risks.

You are responsible for making sure that your Letter of Transmittal or any subsequent Withdrawal Form is received by us before the Expiration Date. We intend to confirm the receipt of your Letter of Transmittal or any subsequent Withdrawal Form within two business days after receipt. If you have not received a confirmation in the timeframe prescribed, it is your responsibility to confirm that we have received your complete submissions by contacting Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com. If we do not have a record of receipt of your submissions, we may request that you show us evidence of those submissions or submit additional copies thereof. We recommend that you keep a copy of your submissions and proof of mailing or other transmittal in case we ask you for evidence of timely submission.

THE OFFER

1. ELIGIBLE OPTIONEES; ELIGIBLE OPTIONS; AMENDMENT OF ELIGIBLE OPTIONS AND CASH BONUS; NEW OPTIONS; EXPIRATION DATE; ADDITIONAL CONSIDERATIONS.

Section 409A (“[Section 409A](#)”) to the Internal Revenue Code (the “[Code](#)”) provides that an option granted with a below-market exercise price, to the extent it was not vested as of December 31, 2004, will be subject to adverse income taxation (as described below), unless that option is brought into compliance with Section 409A before exercise. KLA-Tencor Corporation (“[KLA-Tencor](#)”, the “[Company](#)”, “[we](#)” or “[us](#)”) has decided to offer Eligible Optionees holding Eligible Options the opportunity to amend or replace each such option and thereby avoid taxation of that option under Section 409A.

Eligible Options

An outstanding option to purchase shares of the Company’s common stock will be eligible for amendment or replacement pursuant to the Offer if that option meets each of the following conditions:

- (i) The option was granted under the Company’s 2004 Equity Incentive Plan (the “[2004 Plan](#)”).
- (ii) The option was retroactively priced in that the exercise price per share currently in effect for that option is based on the fair market value per share of the Company’s common stock on a date earlier than the date on which the option was actually granted.
- (iii) The option was unvested as of December 31, 2004.
- (iv) The option is held by an individual who is, on the expiration of this offer, an Eligible Optionee.
- (iv) The option is outstanding on the expiration date of this offer.

An option that meets each of the foregoing conditions will constitute an “Eligible Option” for purposes of the Offer. If only a portion of the option meets those conditions, then only that portion will be an Eligible Option, and the balance of that option will not be eligible for amendment pursuant to this Offer.

The individualized Letter of Transmittal that will be sent to you promptly after the commencement of the Offer will set forth the actual grant date for each Eligible Option you hold, the fair market value per share of our common stock on that date and the number of shares of common stock subject to each Eligible Option.

Additional Definitions

You should also be familiar with the following additional definitions that are important to the understanding of the terms of the Offer.

“[Adjusted Exercise Price](#)” is the new exercise price per share that will be in effect for any tendered Eligible Option that is amended pursuant to the Offer and will be equal to the lower of (i) the fair market value per share of the Company’s common stock on the actual date on which that option was granted and (ii) the closing price per share of such common stock on the date on which the option is amended. However, if the Adjusted Exercise Price as so determined would be the same or lower than the exercise price per share currently in effect for the Eligible Option, then that option will, on the Amendment Date, be canceled and immediately replaced with a new option that is exactly the same as the canceled option, including the same exercise price per share and with no loss of vesting or change to the expiration date of the option term, but with a new grant date.

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Accordingly, the exercise price for a tendered Eligible Option that we amend or replace pursuant to the Offer will fall within one of the three following categories:

- (i) *Full Increase*: increased to the fair market value per share of the Company's common stock on the actual grant of that option,
- (ii) *Partial Increase*: increased to the lower closing price per share of such common stock on the date such option is amended, or
- (iii) *No Increase*: retained as the exercise price per share for any New Option issued in replacement of that option.

For example, if the current exercise price of a tendered Eligible Option is \$45.00 per share and the fair market value per share of the Company's common stock on the actual grant date of that option was \$52.00 per share, then the Adjusted Exercise Price for that option would be fully increased to \$52.00. However, if the fair market value per share of the Company's common stock is \$50.00 on the Amendment Date, then the Adjusted Exercise Price would be set at \$50.00. If the fair market value per share on the Amendment Date is \$42.00, then that Eligible Option would be canceled on the Amendment Date and the New Option would be immediately granted with the same terms as the canceled option, including the current \$45.00 exercise price, but with the Amendment Date as the new grant date.

"Amended Option" will mean an Eligible Option that has been amended pursuant to the Offer to increase the exercise price per share for the KLA-Tencor common stock purchasable under that option to the Adjusted Exercise Price determined for such option.

"Amendment Agreement" will mean the Stock Option Amendment and Special Bonus Agreement that will evidence the Adjusted Exercise Price for each of your Amended Options and set forth the terms of the Cash Bonus payable with respect to those Amended Options. A form of the Amendment Agreement is filed as an exhibit to the Offer and will accompany the Letter of Transmittal sent to you.

"Amendment Date" will mean the date on which the Eligible Options is amended to increase the exercise price of that option to the Adjusted Exercise Price and will be June 15, 2007 or, if the Offer is extended, the first business day following the extended expiration date of the Offer.

"Cash Bonus" is the special cash bonus to which each Eligible Optionee will become entitled if the current exercise price of one or more of his or her Eligible Options is increased pursuant to the Offer.

"Fair Market Value" per share of the Company's common stock on any relevant date will be deemed to be equal to the closing price per share of such stock on that date on the Nasdaq Global Select Market.

"Letter of Transmittal" is the form that the Eligible Optionee must use to notify the Company as to the particular Eligible Options he or she has elected to tender for amendment or replacement pursuant to the terms of the Offer.

"New Option" will mean the option granted on the Amendment Date in replacement of a tendered Eligible Option with a current exercise price per share at or above the closing price per share of our common stock on the Amendment Date. The New Option will be exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but will have a new grant date. The New Option will be evidenced by a new option agreement that replaces the option documentation in effect for the canceled option.

Upon the terms and subject to the conditions of the Offer, we will amend or replace all Eligible Options tendered by Eligible Optionees in accordance with Section 4 that are not otherwise validly withdrawn in accordance with Section 5 before the Expiration Date. For each Amended Option, the exercise price per share will be increased to

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the applicable Adjusted Exercise Price, and that option will thereby avoid taxation under Section 409A. If the tendered Eligible Option is canceled and replaced with a New Option, the New Option will not be not subject to taxation under Section 409A.

Eligible Optionees

Individuals to whom Eligible Options have been granted by the Company will be Eligible Optionees for purposes of the Offer if they are, on the expiration date of the Offer, a current employee of the Company or any affiliated entity (such as a subsidiary or joint venture) and subject to income taxation in the United States with respect to those options.

Our executive officers and non-employee members of our Board of Directors are not eligible to participate in the Offer.

Amendment of Eligible Options and Cash Bonus

Upon the terms and subject to the conditions of the Offer, we will amend or replace each Eligible Option that is properly tendered by an Eligible Optionee in accordance with Section 4, and not validly withdrawn in accordance with Section 5, before the Expiration Date (as defined below). The exercise price of each Eligible Option that is amended pursuant to the Offer will be increased to the Adjusted Exercise Price determined for that option. To the extent a retroactively-priced option was vested as of December 31, 2004, that portion of the option would not be subject to taxation under Section 409A and will not be an Eligible Option for purposes of the Offer. Accordingly, the Adjusted Exercise Price would not be in effect for the portion of a retroactively-priced option that was vested as of December 31, 2004. The Adjusted Exercise Price will apply only to the portion of a retroactively-priced option that was not vested as of December 31, 2004.

Each Amended Option will continue to vest in accordance with the same vesting schedule measured from the same vesting commencement date currently in effect for that option. No change to the vesting schedule will occur by reason of the amendment. In addition, except for the Adjusted Exercise Price, the other terms and provisions of each Amended Option will be identical to the terms and provisions in effect for each such Eligible Option immediately before the amendment to the exercise price.

Each Eligible Optionee whose Eligible Options are amended pursuant to the Offer will become entitled to a special Cash Bonus from the Company. The amount of the Cash Bonus payable with respect to each Amended Option will be determined by multiplying (i) the amount by which the Adjusted Exercise Price exceeds the exercise price per share currently in effect for that Eligible Option by (ii) the number of shares of the Company's common stock purchasable under that option at the Adjusted Exercise Price. The Cash Bonus will be paid on the Company's first regularly scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008. Such a delayed payment is required by applicable Internal Revenue Service ("IRS") regulations. The payment when made will be subject to the Company's collection of all taxes and payments required to be withheld by the Company. Such Cash Bonus will be paid whether or not the Eligible Optionee continues in the Company's employ through the payment date.

EXAMPLE: Assume that (1) you were granted an option to purchase 2,000 shares that had a recorded grant date of October 17, 2001 and an exercise price per share of \$35.21, (2) that option vests in four successive equal annual installments over the four-year period measured from October 17, 2001, so there were 500 shares unvested as of December 30, 2004, and (3) it was determined that the actual grant date of that option was October 25, 2001 when the fair market value per share was \$45.25. Further assume that (1) you were also granted an option to purchase 3,000 shares that had a recorded grant date of July 2, 2002 and an exercise price per share of \$40.20, (2) that option vests in four successive equal annual installments over the four-year period measured from July 2, 2002, so there were 1,500 shares unvested as of December 30, 2004, and (3) it was determined that the actual grant date of that option was July 15, 2002 when the fair market value per share was \$46.30. Further assume that the fair market value of the Company's common stock on the Amendment Date is \$52.00 per share.

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The portions of your October 17, 2001 and July 2, 2002 grants that were unvested as of December 31, 2004 constitute Eligible Options for purposes of this Offer. No other portions of those options may be tendered pursuant to this Offer. If you tender the portions constituting your Eligible Options, then those Eligible Options will be amended to increase the exercise prices to \$45.25 per share for the 500 shares eligible under the October 17, 2001 grant and to \$46.30 per share for the 1,500 shares eligible under the July 2, 2002 grant. No other changes will be made to your October 17, 2001 and July 2, 2002 options. In addition, you will be eligible to receive a Cash Bonus in an amount of \$14,170.00 determined as follows:

- multiplying (i) the 500 shares eligible under the October 17, 2001 option by (ii) \$10.04 (the amount by which the \$45.25 Adjusted Exercise Price for that option exceeds the \$35.21 per share exercise price previously in effect for that option), yielding \$5,020.00;
- multiplying (i) the 1,500 shares eligible under the July 2, 2002 option by (ii) \$6.10 (the amount by which the \$46.30 Adjusted Exercise Price for that option exceeds the \$40.20 per share exercise price previously in effect for that option, yielding \$9,150.00; and
- adding the two amounts resulting from the above calculations, yielding \$14,170.00.

Your Cash Bonus will be paid on the Company's first regularly scheduled payroll date after January 1, 2008, subject to the Company's collection of all applicable withholding taxes.

Cancellation of Eligible Options and Grant of New Options.

If the Adjusted Exercise Price determined for any tendered Eligible Option would be the same or lower than the exercise price per share currently in effect for that option, then that option will, on the Amendment Date, be canceled and immediately replaced with a New Option that is exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant date. Such cancellation and re-grant is necessary to evidence the remedial action required under Section 409A with respect to an Eligible Option whose current exercise price is not increased. No Cash Bonus will be paid with respect to a New Option because there will be no change to the exercise price.

EXAMPLE: Assume that (1) you were granted an option to purchase 1,000 shares that had an indicated grant date of February 7, 2002 and an exercise price per share of \$54.41, (2) that option vests in four successive equal annual installments over the four-year period measured from February 7, 2002, so there were 500 shares unvested as of December 30, 2004, and (3) it was determined that the actual grant date of that option was February 14, 2002 when the fair market value per share was \$61.29. Further assume that (1) you were also granted an option to purchase 2,000 shares that had an indicated grant date of May 3, 2002 and an exercise price per share of \$52.78, (2) that option vests in four successive equal annual installments over the four-year period measured from May 3, 2002, so there were 1,000 shares unvested as of December 30, 2004, and (3) it was determined that the actual grant date of that option was May 13, 2002 when the fair market value per share was \$57.47. Further assume that the fair market value of KLA-Tencor's common stock on the Amendment Date is \$52.00 per share.

The portions of your February 7, 2002 and May 3, 2002 grants that were unvested as of December 31, 2004 constitute Eligible Options for purposes of this Offer. No other portions of those options may be tendered pursuant to this Offer. If you tender the portions constituting your Eligible Options then your tendered Eligible Options will be canceled on the Amendment Date, and you will be immediately issued two New Options: one New Option with an exercise price of \$54.41 per share for the 500 shares eligible under the February 7, 2002 grant; and a second New Option with an exercise price of \$52.78 per share for the 1,000 shares eligible under the May 3, 2002 grant. Except for the new grant date, each of the New Options will be the same as the canceled Eligible Option it replaces, with no loss of vesting or change to the expiration date of the option term. Because the exercise prices under the New Options will be the same as under the canceled options, no Cash Bonus will be payable to you with respect to your New Options.

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Former Employees

If you are not in the employ of the Company or any affiliated entity on the Expiration Date or on the Amendment Date, then none of your tendered Eligible Options will be amended or replaced, and you will not be entitled to any Cash Bonus with respect to those options. The tendered options will be returned to you and will remain exercisable in accordance with the terms in effect for them at the time of tender, including the current exercise price per share. You will receive a separate communication from the Company regarding your tax situation and any financial assistance the Company may provide with respect to the Section 409A tax penalties you may subsequently incur in connection with the exercise of those options.

Expiration Date

The term “Expiration Date” means 11:59 p.m. Pacific Time on June 14, 2007, unless we decide to extend the period of time during which the Offer will remain open, in which event the term “Expiration Date” will refer to the latest time and date at which the Offer, as so extended, expires. See Section 16 for a description of our rights to extend, delay, terminate and amend the Offer, and Section 7 for a description of conditions to the Offer.

Additional Considerations

In deciding whether to tender one or more Eligible Options pursuant to the Offer, you should know that the Company continually evaluates and explores strategic opportunities as they arise, including business combination transactions, strategic partnerships, capital infusions, and the purchase or sale of assets. At any given time, we may be engaged in discussions or negotiations with respect to various corporate transactions. We also grant options, restricted stock units and other equity awards in the ordinary course of business to our current and new employees, including our executive officers. Our employees, including our executive officers, from time to time acquire or dispose of our securities. Subject to the foregoing, and except as otherwise disclosed in the Offer or in our filings with the Securities and Exchange Commission (“SEC”), we presently have no plans or proposals that relate to or would result in:

- (a) any extraordinary corporate transaction, such as a material merger, reorganization or liquidation, involving us or any of our subsidiaries;
- (b) any purchase, sale or transfer of a material amount of our assets or the assets of any of our subsidiaries;
- (c) any material change in our present dividend policy or our indebtedness or capitalization;
- (d) any change in our present Board of Directors or executive management team, including any plans to change the number or term of our directors or to fill any existing board vacancies or to change the material terms of any executive officer’s employment;
- (e) any other material change in our corporate structure or business;
- (f) our common stock not being authorized for quotation in an automated quotation system operated by a national securities association;
- (g) our common stock becoming eligible for termination of registration pursuant to Section 12(g)(4) of the Securities Exchange Act of 1934, as amended (the 1934 Act);
- (h) the suspension of our obligation to file reports pursuant to Section 15(d) of the 1934 Act;
- (i) the acquisition by any person of any of our securities or the disposition of any of our securities, other than in the ordinary course or pursuant to existing options or other rights; or

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(j) any change in our articles of incorporation or bylaws, or any actions that may impede the acquisition of control of us by any person.

2. PURPOSE OF THE OFFER.

We are making this Offer to amend or replace the Eligible Options because of potential adverse tax consequences that may apply. As a result of a thorough investigation of the Company's past option grant practices, we have determined that each Eligible Option was retroactively priced in that the exercise price per share currently in effect for that option was based on the fair market value per share of our common stock on a date earlier than the date on which that option was actually granted.

Section 409A of the Code provides that an option granted with a below-market exercise price, to the extent unvested as of December 31, 2004, will be subject to adverse income taxation unless that option is brought into compliance with Section 409A. The Company has decided to provide Eligible Optionees with the opportunity to bring their Eligible Options into compliance either by amending the exercise price per share to the Adjusted Exercise Price determined for each such option or by replacing that option with a New Option.

Unless certain remedial action is taken before the earlier of (i) December 31, 2007 or (ii) the date the optionee exercise his or her Eligible Options, the optionee will be subject to the following adverse tax consequences under Section 409A, beginning with the 2008 calendar year.

Taxation in Calendar Year 2008. To the extent the optionee holds unexercised Eligible Options for shares of the Company's common stock that vested prior to the 2008 calendar year or vest during that year, the optionee will recognize taxable income for the 2008 calendar year in an amount equal to the fair market value of those shares on the applicable tax measurement date less the exercise price payable for those shares. The optionee will have to report that income in his or her tax return filed for the 2008 calendar year, even though the Eligible Option has not been exercised for those shares during that year. The IRS has not yet provided guidance as to the applicable tax measurement date for determining an optionee's taxable income, but it is possible that such date will be the earlier of (i) the date the optionee exercises the Eligible Option during the 2008 calendar year or (ii) December 31, 2008.

Tax Penalty. In addition to normal income taxes payable on the spread in effect under each of the optionee's Eligible Options on the applicable tax measurement date for the 2008 calendar year, the optionee would also be subject to an additional tax penalty equal to 20% of that spread.

Note: California has adopted Section 409A, and for optionees subject to California income taxation, the total penalty tax is 40%. Other states have also adopted Section 409A with penalty taxes at rates different from the 20% rate under Section 409A.

Interest Penalty Measured From Year of Vesting To the extent the Eligible Option vested as to one or more shares during the 2005 calendar year, the optionee will incur an interest penalty payable with his or her tax return for the 2008 calendar year. The interest penalty will be based on the income taxes the optionee would have incurred for the 2005 calendar year had he or she been taxed on the spread which existed on those vested shares on December 31, 2005 (the amount by which the December 31, 2005 fair market value of the shares which vested under the Eligible Option during the 2005 calendar year exceeded the exercise price payable for those shares). For purposes of such calculation, the optionee's tax rate will be deemed to be 35%, and that tax rate will be applied to the December 31, 2005 option spread on the shares which vested under the Eligible Option during the 2005 calendar year. The tax amount resulting from such calculation is not actually payable for the 2005 calendar year, but will trigger an interest penalty under Section 409A for the period beginning April 15, 2006 and continuing until the date the optionee pays the accrued interest with his or her taxes for the 2008 calendar year. To the extent Eligible Option vested as to one or more shares during the 2006 calendar year, the optionee would perform the same calculation based on the December 31, 2006 fair market value of the shares which vested during that year, and the interest penalty would accrue over the period beginning April 15, 2007 and continuing until the optionee pays the accrued interest with his or her taxes for the 2008 calendar year. The same calculation would also be applicable for any shares which vested under the Eligible Option during the 2007 calendar year based on the option spread which existed on those particular shares on December 31, 2007, and the interest penalty would accrue from April 15, 2008

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until the optionee pays the accrued interest with his or her 2008 calendar year taxes. Finally, there would also be an additional interest penalty with respect to the shares which vested under the Eligible Option during the 2005 and 2006 calendar years but remain unexercised in the 2008 calendar year, to the extent their year-end fair market value in each calendar year subsequent to the calendar year of vesting is higher than their year-end fair market value in the immediately preceding calendar year. The interest penalty would accrue until paid with the optionee's 2008 calendar year taxes.

Vesting in Subsequent Calendar Years. To the extent an Eligible Option first vests in a calendar year after the 2008 calendar year, the optionee will be subject to income taxation and penalty taxes on the spread which exists between the fair market value of the shares which vest during that year and the exercise price payable for those shares. Such spread will be calculated on the applicable tax measurement date for such year.

Continued Taxation of Vested Shares. The optionee will be subject to additional income taxation and penalty taxes on any subsequent increases to the fair market value of his or her vested option shares which occur in calendar years after the calendar year in which those shares are first taxed under Section 409A. Such taxation will continue until the optionee exercises the options.

Note: The IRS has not yet provided any guidance as to how the additional taxable income is to be measured over the period the options remain outstanding after the 2007 calendar year.

The following is an example of the adverse U.S. federal income taxes that may occur under Section 409A if remedial action is not taken to bring the below-market options into compliance with Section 409A:

EXAMPLE. Assume that (1) an optionee was granted an option to purchase 2,000 shares that had a recorded grant date of July 2, 2002 with an exercise price per share of \$40.20, (2) that option vests in five successive equal annual installments over the five-year period measured from July 2, 2002, and (3) it was determined that the actual grant date of that option was July 15, 2002 when the fair market value per share was \$46.30. Unless remedial action under Section 409A is taken before December 31, 2007 (or before any earlier exercise of the option for the shares vesting after December 31, 2004), the 1,200 option shares that vested during the 2005, 2006 and 2007 calendar years would be taxed as follows under Section 409A:

Taxation in Calendar Year 2008: On the applicable tax measurement date in the 2008 calendar year, the optionee would recognize taxable income equal to the amount by which the fair market value of the 1,200 shares exceeded the exercise price payable for those shares. If we assume that the option is exercised for those 1,200 shares on September 5, 2008, when the fair market value is \$55.00 per share, and that such date is the applicable tax measurement date for Section 409A purposes, then the optionee will recognize \$17,760.00 of taxable wages (1,200 x (\$55.00—\$40.20)) in 2008. In addition, the optionee would incur a 20% penalty tax in the amount of \$3,552.00. There would also be an interest penalty assessed with respect to the 400 shares which vested in 2005. That interest penalty would be based on the taxes that would have been due on April 15, 2006 had the optionee been taxed at the rate of 35% on the spread which existed on those 400 shares on December 31, 2005 (the amount by which the market price of those 400 shares on December 31, 2005 exceeded the aggregate \$16,080.00 exercise price payable for those shares). The interest penalty on those particular shares would accrue until the optionee pays that interest penalty with his or her 2008 calendar year taxes. In addition, there would be an interest penalty assessed with respect to the 400 shares which vested in 2006. That interest penalty would be based on the taxes that would have been due on April 15, 2007 had the optionee been taxed at the rate of 35% on the spread which existed on those 400 shares on December 31, 2006 (the amount by which the market price of those 400 shares on December 31, 2006 exceeded the aggregate \$16,080.00 exercise price payable for those shares). There would also be an interest penalty assessed with respect to the 400 shares which vested in 2007. That interest penalty would be based on the taxes that would have been due on April 15, 2008 had the optionee been taxed at the rate of 35% on the spread which existed on those 400 shares on December 31, 2007 (the amount by which the market price of those 400 shares on December 31, 2007 exceeded the aggregate \$16,080.00 exercise price payable for those shares). The interest penalty on those particular shares would also accrue until the optionee pays that interest penalty with his or her

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2008 calendar year taxes. Finally, there would be an additional interest penalty with respect to the shares which vested during the 2005 and 2006 calendar years, to the extent their year-end fair market value in each calendar year subsequent to the calendar year of vesting is greater than their year-end fair market value in the immediately preceding year. That interest penalty would accrue until the date it is paid with the optionee's 2008 calendar year taxes. There will also be the possibility of adverse taxation under the tax laws of the state in which the optionee resides.

Continued Taxation: If the option is not exercised in the 2008 calendar year, the optionee will still recognize taxable income in that year. It is likely that the amount of taxable income and the 20% penalty tax will be based on the option spread which exists on the 1,200 shares as of December 31, 2008; however, there is at present no actual IRS guidance on the appropriate tax measurement date. In addition, the optionee would continue to be subject to income taxation and the 20% penalty tax in each subsequent calendar year the option remains outstanding after the 2008 calendar year, and the amount of such taxation would be based on any subsequent appreciation in the value of the shares since the last tax measurement date for those shares under Section 409A.

If you elect not to tender your Eligible Options for amendment or replacement pursuant to the Offer, then you will be solely responsible for any taxes, penalties or interest payable under Section 409A and comparable state tax laws. If you exercise an Eligible Option in the 2007 calendar year for all the covered shares without first bringing that option into compliance with Section 409A, then the 20% penalty tax under Section 409A with respect to that exercised option will be based on the amount by which the fair market value of the purchased shares at the time of exercise exceeds the current exercise price, and the interest penalties will be based on the spread (the excess of the fair market value per share over the exercise price) which existed at the close of the 2005 and 2006 calendar years on the option shares initially vesting in those years and any additional increase to the 2005 option spread which existed at the end of the 2006 calendar year.

Section 409A applies only to below-market options that were not vested as of December 31, 2004. The portion of any below-market option granted before October 4, 2004 that was vested as of December 31, 2004 is not subject to Section 409A.

Pursuant to the U.S. Treasury regulations provided under Section 409A, if you exercised the portion of your stock options that vested in the 2005 calendar year before the end of that year, you would have avoided any adverse tax consequences under Section 409A with respect to that portion. To avoid any adverse tax consequences under Section 409A with respect to the portion of your stock options that vested after December 31, 2004 (but were not exercised in 2005), you must take remedial action to bring that portion of your options (the "409A Portion") into compliance with the requirements of Section 409A. Basically, two courses of remedial action are available as described below. The Company is now offering you the opportunity to bring the 409A Portion of your stock options into compliance with Section 409A only through the amendment alternative described in paragraph (ii) below.

(i) You could designate a specific schedule for the exercise of the 409A Portion of each of your stock options. Accordingly, you would have to designate the particular calendar year or years (beginning with the 2008 calendar year) in which that portion is to be exercised and the number of shares to be exercised in each such year. As part of your designated exercise schedule, you could provide for an earlier exercise of the vested shares subject to the 409A Portion of your options upon the earlier of your termination of employment with the Company or a change in control or ownership of the Company. However, this alternative will not be available if you exercised any Section 409A Portion of your options during the 2006 calendar year.

(ii) The 409A Portion of each of your stock options could be amended to increase the exercise price to the Adjusted Exercise Price determined for that portion. Such an amendment to the exercise price would bring the 409A Portion of each option into compliance with Section 409A, and you could exercise that 409A-compliant portion as you choose, subject only to the existing exercise provisions and option term in effect for each such option. A New Option granted in replacement of the 409A Portion of an option with a current exercise price at or above the fair market value of the underlying shares on the new grant date will also avoid taxation under Section 409A.

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Accordingly, pursuant to the Offer, you may tender each of your Eligible Options to the Company for amendment or replacement. The exercise price per share for each Amended Option will be increased to the Adjusted Exercise Price determined for that option, and that Amended Option would not be subject to the adverse tax consequences under Section 409A described above. Each New Option granted in replacement of a tendered Eligible Option with a current exercise price at or above the fair market value of the Company's common stock on the Amendment Date will also avoid taxation under Section 409A.

Neither we nor our Board of Directors will make any recommendation as to whether or not you should tender your Eligible Options for amendment or replacement, nor have we authorized any person to make any such recommendation. You must make your own decision whether to tender your Eligible Options, after taking into account your own personal circumstances and preferences. You should be aware that adverse tax consequences under Section 409A may apply to your Eligible Options if they are not amended or replaced pursuant to the Offer, and you will be solely responsible for any taxes, interest or penalties you may incur under Section 409A. You are urged to evaluate carefully all of the information in the Offer, and we recommend that you consult your own tax advisor.

3. STATUS OF ELIGIBLE OPTIONS NOT AMENDED OR REPLACED.

If you choose not to tender your Eligible Options for amendment or replacement, those options will continue to remain outstanding in accordance with their existing terms, including the below-market exercise price component that violates Section 409A. Accordingly, if you take no other action to bring those options into compliance with Section 409A, you may be subject to the adverse U.S. federal tax consequences described in Section 2 above. You will be solely responsible for any taxes, penalties or interest you may incur under Section 409A.

4. PROCEDURES FOR TENDERING ELIGIBLE OPTIONS.

Proper Tender of Options

KLA-Tencor will send you a Letter of Transmittal to use for purposes of indicating the Eligible Options you elect to tender. The Letter of Transmittal will contain a personal summary of the Eligible Options that you currently hold, including information relating to the grant date indicated for that option on the applicable option agreement, the current exercise price per share in effect for that option, the number of shares of the Company's common stock purchasable under that option, the actual grant date of that option and the fair market value per share of the Company's common stock on the actual grant date.

To validly tender your Eligible Options, you must, in accordance with the terms of your Letter of Transmittal, properly complete, sign, date and deliver that Letter of Transmittal to us by mail, courier or hand delivery at 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy or by facsimile at (408) 875-6677 before the Expiration Date. If we extend the Offer beyond that time, we must receive your completed and signed Letter of Transmittal before the extended Expiration Date of the Offer.

We will not accept delivery of any Letter of Transmittal after expiration of the Offer. If we do not receive your properly completed and signed Letter of Transmittal prior to the expiration of the Offer, your Eligible Options will not be amended or replaced pursuant to the Offer, and you will not be eligible for any Cash Bonus.

The method of delivery of all documents, including the Letter of Transmittal and any other required documents, is at the election and risk of the tendering Eligible Optionee. However, we will only accept paper delivery, whether by mail, courier, hand delivery or by facsimile, and therefore delivery by email will not be accepted. If delivery is by mail, we recommend that you use certified mail with return receipt requested. If you wish to submit your Letter of Transmittal by facsimile, please use the following facsimile number: (408) 875-6677. In all cases, you should allow sufficient time to ensure timely delivery.

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You cannot tender only a portion of an Eligible Option, and we will not accept such a partial tender for amendment or replacement. If you hold more than one Eligible Option, you may elect to tender one or more of those options and retain the remaining options. Please remember that not all of a particular option grant may be an Eligible Option. Only the portion of that grant that was not vested as of December 31, 2004 may constitute an Eligible Option.

If your Letter of Transmittal includes any option that is not an Eligible Option or includes only a portion of your outstanding Eligible Option, we will not accept the tendered option or portion for amendment or replacement, but we do intend to accept for amendment or replacement each properly tendered Eligible Option set forth in the Letter of Transmittal.

Determination of Validity; Rejection of Option Shares; Waiver of Defects; No Obligation to Give Notice of Defects We will determine, in our discretion, all questions as to the form of documents and the validity, form, eligibility (including time of receipt), and acceptance of any option tender, and we will decide, in our sole discretion, all questions as to (i) the portion of each outstanding option that comprises an Eligible Option for purposes of this Offer; (ii) the Adjusted Exercise Price to be in effect under each Amended Option, (iii) the number of shares of our common stock purchasable under the Amended Option at the Adjusted Exercise Price, (iv) the amount of the Cash Bonus payable with respect to each Amended Option and (v) the cancellation of tendered Eligible Options with exercise prices at or above the fair market value of our common stock on the Amendment Date and the replacement of those canceled options with New Options. Our determination as to those matters will be final and binding on all parties. We reserve the right to reject any or all option tenders that we determine do not comply with the conditions of the Offer, that we determine are not in appropriate form or that we determine are unlawful to accept. Otherwise, we intend to accept for amendment or replacement each properly and timely tendered Eligible Option that is not validly withdrawn. We also reserve the right to waive any of the conditions of the Offer or any defect or irregularity in any tender with respect to any particular Eligible Option or any particular Eligible Optionee. No tender of an Eligible Option will be deemed to have been properly made until all defects or irregularities have been cured by the tendering Eligible Optionee or waived by us. Neither we nor any other person is obligated to give notice of any defects or irregularities in tenders, nor will anyone incur any liability for failure to give any such notice.

Our Acceptance Constitutes an Agreement. Your tender of an Eligible Option pursuant to the procedures described above constitutes your acceptance of the terms and conditions of the Offer. Subject to our rights to extend, terminate or amend the Offer, we currently expect that we will, promptly upon the expiration of the Offer, accept for amendment all properly tendered Eligible Options that have not been validly withdrawn, and on the next business day we will increase the exercise price per share to the Adjusted Exercise Price determined for that option. However, if the Adjusted Exercise Price determined for any tendered Eligible Option would be the same or lower than the exercise price per share currently in effect for that option, then that option will, on the Amendment Date, be canceled and immediately replaced with a New Option that is exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant date.

Our acceptance of your tendered Eligible Options for amendment or replacement pursuant to the Offer will constitute a binding agreement between us and you upon the terms and subject to the conditions of the Offer. Accordingly, as soon as administratively practicable after the Amendment Date, we will deliver to you a final and complete Amendment Agreement, a form of which is filed as an exhibit to the Offer and will accompany the Letter of Transmittal we send you. Schedule I to that final agreement will indicate the Adjusted Exercise Price in effect for each of your Amended Options and the Company's unconditional obligation to pay you on the Company's first regularly scheduled payroll date after January 1, 2008 the Cash Bonus calculated for each Amended Option. You will also receive at that time a new stock option agreement for any New Option granted in replacement of a tendered Eligible Option with a current exercise price per share at or above the fair market value per share of our common stock on the Amendment Date.

5. WITHDRAWAL RIGHTS.

You may only withdraw your tendered Eligible Options in accordance with the provisions of this Section 5.

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(i) You may withdraw your tendered Eligible Options at any time before 11:59 p.m., Pacific Time, on the Expiration Date of the Offer. In addition, unless we accept and amend or replace your Eligible Options before 12:00 midnight, Pacific Time, on July 13, 2007 (the 40th business day after the May 16, 2007 commencement date of the Offer), you may withdraw your tendered options at any time thereafter.

(ii) To validly withdraw your tendered Eligible Options, you must deliver to us a properly completed and signed Withdrawal Form to 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy while you still have a right to withdraw the tendered options. You may also submit your Withdrawal Form by facsimile. If you do so, you must use the following facsimile number: (408) 875-6677. We will not accept delivery of a notice of withdrawal by email. To obtain a copy of the Withdrawal Form, please contact Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

YOU MAY NOT WITHDRAW ONLY A PORTION OF A TENDERED ELIGIBLE OPTION. IF YOU CHOOSE TO WITHDRAW A TENDERED ELIGIBLE OPTION, YOU MUST WITHDRAW THE ENTIRE OPTION.

The Withdrawal Form must be signed by the Eligible Optionee who tendered the Eligible Option to be withdrawn.

You may not rescind any withdrawal, and any Eligible Option you withdraw will no longer be deemed tendered for amendment or replacement pursuant to the Offer, unless you properly re-tender that option before the Expiration Date by following the election and tender procedures described in Section 4. The new tender must be properly completed, signed and dated after both the date of your original Letter of Transmittal and the date of any subsequent Withdrawal Form.

Neither the Company nor any other person is obligated to give notice of any defects or irregularities in any Withdrawal Form submitted to us for purposes of withdrawing tendered Eligible Options from the Offer, nor will anyone incur any liability for failure to give any such notice. We will determine, in our sole discretion, all questions as to the form and validity, including time of receipt, of notices of withdrawal. Our determination of those matters will be final and binding.

6. ACCEPTANCE OF ELIGIBLE OPTIONS FOR AMENDMENT OR REPLACEMENT AND COMMITMENT TO PAY CASH BONUS WITH RESPECT TO AMENDED OPTIONS.

Upon the terms and subject to the conditions of the Offer, we will, upon the Expiration Date, accept for amendment or replacement all Eligible Options that have been properly tendered and not validly withdrawn before the Expiration Date. For each Amended Option, we will increase the exercise price per share to the applicable Adjusted Exercise Price on the next business day, currently scheduled to be June 15, 2007. For each tendered Eligible Option that is canceled pursuant to the Offer, we will grant a New Option in replacement on June 15, 2007. If we extend the Expiration Date, then the accepted Eligible Option will be amended or replaced on the next business day following the extended Expiration Date.

We will provide written or electronic notice of our acceptance to each Eligible Optionee whose tendered Eligible Options we have accepted for amendment or replacement. Such notice may be by email, press release or other means. In addition, we will, as soon as administratively practicable after the Amendment Date, deliver electronically a final and complete Amendment Agreement to each Eligible Optionee whose Eligible Options have been amended pursuant to the Offer. Schedule I to that agreement will reflect the increases to the exercise prices of the Amended Options and the Company's unconditional obligation to pay such Eligible Optionee the applicable Cash Bonus for each of his or her Amended Options on the Company's first regularly scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008. Such Cash Bonus will be paid whether or not an Eligible Optionee continues in the Company's employ through the payment date. For each New Option to which a tendering Eligible Optionee becomes entitled, we will deliver a new stock option agreement to that person as soon as administratively practicable after the grant date.

However, if you are not in the employ of the Company or any affiliated entity on the Expiration Date or on the Amendment Date, then none of your tendered Eligible Options will be amended or replaced, and you will not be

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entitled to any Cash Bonus with respect to those options. The tendered options will be returned to you and will remain exercisable in accordance with the terms in effect for them at the time of tender, including the current exercise price per share. You will receive a separate communication from the Company regarding your tax situation and any financial assistance the Company may provide with respect to the Section 409A tax penalties you may subsequently incur in connection with the exercise of those options.

7. CONDITIONS OF THE OFFER.

We will not accept any Eligible Options tendered to us for amendment or replacement, and we may terminate or amend the Offer or postpone our acceptance of any Eligible Options tendered to us for amendment or replacement, in each case, subject to Rule 13e-4(f)(5) under the 1934 Act if, at any time on or after May 16, 2007, and before the Expiration Date, any of the following events has occurred, or has been reasonably determined by us to have occurred and, in our reasonable judgment in any such case and regardless of the circumstances giving rise thereto (including any action or omission by us), the occurrence of such event or events makes it inadvisable for us to proceed with the Offer or with our acceptance of the Eligible Options tendered to us for amendment or replacement:

(a) there shall have been threatened or instituted or be pending any action or proceeding by any government or governmental, regulatory or administrative agency, authority or tribunal or by any other person, domestic or foreign, before any court, authority, agency or tribunal that directly or indirectly challenges the making of the Offer, the amendment of the existing exercise price in effect for some or all of the tendered Eligible Options pursuant to the Offer, the payment of the applicable Cash Bonuses, the cancellation of tendered options and the grant of New Options in replacement or otherwise relates in any manner to the Offer or that, in our judgment, could materially and adversely affect our business, condition (financial or other), operating results, operations or prospects, or otherwise materially impair in any way the contemplated future conduct of our business or the business of any of our subsidiaries or materially impair the contemplated benefits of the Offer to us;

(b) there shall have been any action threatened, pending or taken, or approval withheld, or any statute, rule, regulation, judgment, order or injunction threatened, proposed, sought, promulgated, enacted, entered, amended, enforced or deemed to be applicable to the Offer or us or any of our subsidiaries or other affiliated entities, by any court or any authority, agency or tribunal that, in our reasonable judgment, would or might directly or indirectly:

- make the amendment of the tendered Eligible Options or payment of the Cash Bonuses or the cancellation of tendered options and the grant of New Options in replacement thereof illegal or otherwise restrict or prohibit consummation of the Offer or otherwise relates in any manner to the Offer;
- delay or restrict our ability, or render us unable, to accept for amendment or replacement some or all of the tendered Eligible Options;
- materially impair the benefits we hope to convey as a result of the Offer, that we believe would occur only as a result of further changes to Section 409A, the regulations thereunder or other tax laws that would affect the Offer or the Eligible Options; or
- materially and adversely affect our business, condition (financial or other), operating results, operations or prospects or otherwise materially impair in any way the contemplated future conduct of our business or the business of any of our subsidiaries;

(c) there shall have occurred:

- any general suspension of trading in, or limitation on prices for, securities on any national securities exchange or in the over-the-counter market;
- any significant change in the market price of the shares of our common stock or any change in the general political, market, economic or financial conditions in the United States or abroad

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that could, in our reasonable judgment, have a material adverse effect on our business, condition (financial or other), operating results, operations or prospects or on the trading in our common stock, or that, in our reasonable judgment, makes it inadvisable to proceed with the Offer;

- in the case of any of the foregoing existing at the time of the commencement of the Offer, a material acceleration or worsening thereof; or
- any decline in either the Dow Jones Industrial Average, the Nasdaq Global Select Market or the Standard and Poor's Index of 500 Companies by an amount in excess of 10% measured during any time period after the close of business on May 16, 2007;

(d) there shall have occurred any change in generally accepted accounting standards or the application or interpretation thereof that could or would require us for financial reporting purposes to record compensation expenses against our operating results in connection with the Offer that would be in excess of any compensation expenses that we would be required to record under generally accepted accounting standards in effect at the time we commence the Offer;

(e) a tender or exchange offer with respect to some or all of our outstanding common stock, or a merger or acquisition proposal for us, shall have been proposed, announced or made by another person or entity or shall have been publicly disclosed, or we shall have learned that:

- any person, entity or "group," within the meaning of Section 13(d)(3) of the 1934 Act, shall have acquired or proposed to acquire beneficial ownership of more than 5% of the outstanding shares of our common stock, or any new group shall have been formed that beneficially owns more than 5% of the outstanding shares of our common stock, other than any such person, entity or group that has filed a Schedule 13D or Schedule 13G with the SEC before May 16, 2007;
- any such person, entity or group that has filed a Schedule 13D or Schedule 13G with the SEC before May 16, 2007 shall have acquired or proposed to acquire beneficial ownership of an additional 2% or more of the outstanding shares of our common stock; or
- any person, entity or group shall have filed a Notification and Report Form under the Hart-Scott-Rodino Antitrust Improvements Act of 1976 or made a public announcement reflecting an intent to acquire us or any of our subsidiaries or any of the assets or securities of us or any of our subsidiaries;

(f) any change or changes shall have occurred in our business, condition (financial or other), assets, operating results, operations, prospects or stock ownership or that of our subsidiaries as a result of unforeseen, extraordinary events beyond our control that, in our reasonable judgment, is or may be material to us or our subsidiaries or other affiliated entities or otherwise makes it inadvisable for us to proceed with the Offer; or

(g) any rules, regulations or actions by any governmental authority, the Nasdaq Global Select Market, or other regulatory or administrative authority of any national securities exchange have been enacted, enforced or deemed applicable to the Company that makes it inadvisable for us to proceed with the Offer.

The conditions to the Offer are for our benefit. We may assert them in our discretion, regardless of the circumstances giving rise to them, at any time before the Expiration Date. We may waive them, in whole or in part, at any time and from time to time before the Expiration Date, in our discretion, whether or not we waive any other condition to the Offer. Our failure at any time to exercise any of these rights will not be deemed a waiver of any such rights. The waiver of any of these rights with respect to particular facts and circumstances will not be deemed a waiver with respect to any other facts and circumstances. Should we decide to waive any of the material conditions of the Offer, the Offer will remain open for the five (5) business days following the date we announce the waiver. Any determination we make concerning the events described in this Section 7 may be challenged by an Eligible Optionee only in a court of competent jurisdiction. A non-appealable determination with respect to such matter by a court of competent jurisdiction will be final and binding upon all persons.

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8. PRICE RANGE OF COMMON STOCK UNDERLYING THE OPTIONS.

There is no established trading market for the Eligible Options or any other options granted under our 2004 Plan.

Our common stock is quoted on the Nasdaq Global Select Market under the symbol "KLAC." The following table shows, for the periods indicated, the high and low sales prices per share of our common stock on the Nasdaq Global Select Market.

<u>QUARTER ENDED</u>	<u>HIGH</u>	<u>LOW</u>
March 31, 2007	\$ 54.42	\$ 46.97
December 31, 2006	\$ 52.43	\$ 43.85
September 30, 2006	\$ 46.29	\$ 39.05
June 30, 2006	\$ 50.39	\$ 39.07
March 31, 2006	\$ 54.18	\$ 48.20
December 31, 2005	\$ 54.09	\$ 45.52
September 30, 2005	\$ 51.70	\$ 43.60
June 30, 2005	\$ 46.87	\$ 38.86
March 31, 2005	\$ 50.81	\$ 42.25
December 31, 2004	\$ 48.99	\$ 40.23

On May 15, 2007 the last reported sale price of our common stock on the Nasdaq Global Select Market was \$55.14 per share.

The price of our common stock has been, and in the future may be, volatile and could decline. The trading price of our common stock has fluctuated in the past and is expected to continue to do so in the future, as a result of a number of factors, many of which are outside our control. In addition, the stock market has experienced extreme price and volume fluctuations that have affected the market prices of many companies, and that have often been unrelated or disproportionate to the operating performance of those companies.

9. SOURCE AND AMOUNT OF CONSIDERATION; TERMS OF AMENDED OPTIONS OR NEW OPTIONS.

Consideration. If we accept the tender of your Eligible Options for amendment, the exercise price per share will be increased to the Adjusted Exercise Price determined for each such option. Except for such Adjusted Exercise Price, all the terms and provisions in effect for the Eligible Option at the time of tender will continue in effect after the amendment. Accordingly, each Amended Option will continue to vest in accordance with the same vesting schedule measured from the same vesting commencement date currently in effect for each such option, and the exercise period and expiration date for each option will also remain unchanged. However, if the Adjusted Exercise Price as so determined would be the same or lower than the exercise price per share currently in effect for the Eligible Option, then that option will, on the Amendment Date, be canceled and immediately replaced with a new option that is exactly the same as the canceled option, including the current exercise price per share and no loss of vesting or change to the expiration date of the option term, but with a new grant date.

If you are not in the employ of the Company or any affiliated entity on the Expiration Date or on the Amendment Date, then none of your tendered Eligible Options will be accepted for amendment or replacement. The tendered options will be returned to you and will remain exercisable in accordance with the terms in effect for them at the time of tender, including the current exercise price per share. You will receive a separate communication from the Company regarding your tax situation and any financial assistance the Company may provide with respect to the Section 409A tax penalties you may subsequently incur in connection with the exercise of those options.

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Should you participate in this Offer, then with respect to each of your Eligible Options that is amended to increase the exercise price per share to the Adjusted Exercise Price determined for that option, you will be eligible to receive the special Cash Bonus. The Cash Bonus will be paid from the Company's general assets on the Company's first regularly scheduled payroll date after January 1, 2008, and you will be a general creditor of the Company with respect to the Cash Bonus. No Cash Bonuses will be paid with respect to New Options granted in replacement of tendered Eligible Options, because the exercise price will be the same as in effect for the canceled option it replaces.

If all Eligible Options tendered pursuant to the Offer are amended, then the resulting Amended Options and New Options will cover approximately 301,800 shares of our common stock in the aggregate, which represents approximately 0.2% of the total number of shares of our common stock outstanding as of March 31, 2007. The Cash Bonuses payable pursuant to this Offer will be in the total maximum dollar amount of approximately \$376,000.00, assuming the exercise price of each tendered Eligible Option is increased to the fair market value per share on the actual grant date of that option.

Terms of Amended Options or New Options. The amendment or replacement of the tendered Eligible Options pursuant to the Offer will not create any contractual or other right of the tendering Eligible Optionees to receive any future grants of stock options, restricted stock units or other stock-based compensation. This Offer does not change the "at-will" nature of an Eligible Optionee's employment with us, and an Eligible Optionee's employment may be terminated by us or by the optionee at any time, for any reason, with or without cause. The employment of Eligible Optionees outside the United States may be terminated subject to the requirements of local law and the terms of any employment agreement.

The Eligible Options have all been granted pursuant to the 2004 Plan. Each Amended Option will continue to remain outstanding under the 2004 Plan, and each New Option will be granted under the 2004 Plan.

The following is a description of the principal features of the 2004 Plan under which the Eligible Options are outstanding. The description of the 2004 Plan is subject to, and qualified in its entirety by reference to, all the provisions of the 2004 Plan and the form of stock option agreement in effect for the Eligible Options granted under the 2004 Plan. The 2004 Plan has been filed as an Exhibit to our Form S-8 registration statement filed with the SEC on December 23, 2004. Please contact us at 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy, (telephone: (408) 875-7131), to receive a copy of the 2004 Plan and the form of stock option agreement in effect for the Eligible Options granted under the 2004 Plan. We will promptly furnish you copies of those documents at our expense. Both the Amendment Agreement to be used to evidence the increase to the exercise price of each Eligible Option amended pursuant to the Offer and the stock option agreement to be used to evidence each New Option granted in replacement of an Eligible Option canceled pursuant to the Offer have been filed with the SEC as exhibits to the Schedule TO.

Plan Description. The following is a description of the principal provisions of the 2004 Plan that apply to option grants made under the 2004 Plan, including the Eligible Options.

General. The Compensation Committee of our Board of Directors has the authority to administer the 2004 Plan.

Share Reserve. As of March 31, 2007 options to purchase 4,335,302 shares of common stock were outstanding under the 2004 Equity Incentive Plan (the "2004 Plan") and an additional 1,203,729 shares remained available for future grant. The shares of common stock issuable under the 2004 Plan may be drawn from shares of our authorized but unissued common stock or from shares of our common stock that we reacquire, or a combination thereof.

Eligibility. Officers, employees, non-employee members of the Board of Directors and independent consultants in our service or in the service of our parent and subsidiary companies are eligible to receive option grants under the 2004 Plan.

Option Terms. Each granted option has an exercise price per share determined by the plan administrator, but that price may not be less than the fair market value of the option shares on the grant date. No granted option may have a term in excess of ten (10) years. The shares subject to each option will generally vest in one or more installments over a specified period of service measured from the grant date.

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Upon cessation of service, the optionee will have a limited period of time in which to exercise his or her outstanding options to the extent exercisable for vested shares. In general, that limited period will expire three (3) months for options outstanding under the 2004 Plan following the optionee's cessation of service, unless such cessation of service occurs by reason of the optionee's death or permanent disability. In that event, the limited exercise period will expire twelve (12) months after such cessation of service. In no event, however, may any option be exercised after the expiration of the ten (10)-year or shorter maximum term in effect for that option.

Vesting Acceleration. In the event we should undergo a change in control, outstanding options under the 2004 Plan will become vested and exercisable on an accelerated basis unless the acquiring or successor corporation elects to assume the options or substitute substantially equivalent options for the successor corporation's stock. To the extent that the options outstanding under the 2004 Plan are not assumed or exercised before the change in control, they will terminate as of the effective date of that change in control.

A change in control will be deemed to occur in the event we are acquired by merger, consolidation or asset sale or in event securities representing more than fifty percent (50%) of the total combined voting power of our outstanding voting stock is acquired by any person or group of related persons.

Stockholder Rights and Option Transferability. No optionee will have any stockholder rights with respect to the option shares until such optionee has exercised the option and paid the exercise price for the purchased shares. Options are not assignable or transferable other than by will or the laws of inheritance following optionee's death, and during the optionee's lifetime, the option may only be exercised by the optionee; provided, however, that non-statutory options are assignable or transferable to the extent permitted by our Board of Directors.

Changes in Capitalization. In the event of any increase or decrease in the number of issued shares of our common stock resulting from a stock dividend, stock split, reverse stock split, recapitalization, combination, reclassification or any other similar event resulting in an increase or decrease in the number of issued shares of our common stock, appropriate adjustments will be made to (i) the maximum number of securities issuable under the 2004 Plan and (ii) the number of securities and the exercise price per share in effect under each outstanding option.

Amendment. Our Board of Directors may amend or modify any outstanding options under the 2004 Plan, but any amendment or modification that would adversely affect the rights of the option holder will require the consent of that person.

Taxation of Non-Statutory Stock Options.

An optionee will not recognize taxable income for U.S. federal income tax purposes upon the grant of a non-statutory option. In general, an optionee will recognize ordinary income, in the year in which the option is exercised, equal to the excess of the fair market value of the purchased shares on the exercise date over the exercise price paid for the shares, and the optionee will be required to satisfy the tax withholding requirements applicable to such income.

We will be entitled to an income tax deduction equal to the amount of ordinary income recognized by the optionee with respect to the exercised non-statutory option. The deduction will in general be allowed for our taxable year in which such ordinary income is recognized by the optionee.

Accounting Treatment.

In accordance with the Financial Accounting Standards Board's Statement of Financial Accounting Standards No. 123R (revised 2004) ("FAS 123R"), effective with our July 1, 2006 fiscal year, the stock options that we grant to our employees under the 2004 Plan must be valued, under an appropriate valuation formula, at their fair value as of the grant date, and that fair value must then be charged as a direct compensation expense against our reported earnings

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over the designated vesting period of the award. Similar option expensing will be required for any unvested options that were outstanding on the July 1, 2006 effective date of FAS 123R, with the grant date fair value of those unvested options to be expensed against our earnings over the remaining vesting period.

Please see Section 13 for a discussion of the accounting treatment of the Offer.

10. AMENDED OPTIONS AND NEW OPTIONS WILL NOT DIFFER FROM ELIGIBLE OPTIONS.

Except for the Adjusted Exercise Price, all the terms and provisions in effect for the Eligible Option at the time of tender will continue in effect if that option is amended pursuant to the Offer. Accordingly, each Amended Option will continue to vest in accordance with the vesting schedule currently in effect for that option at the time of the amendment, and the exercise period and option term for that Amended Option will also remain unchanged.

Each New Option will be exactly the same as the canceled Eligible Option it replaces, including the current exercise price for the canceled option and no loss of vesting or change to the expiration date of the option term, but it will have a new grant date.

11. INFORMATION CONCERNING KLA-TENCOR.

KLA-Tencor is the world's leading supplier of process control and yield management solutions, for the semiconductor and related microelectronics industries. Our comprehensive portfolio of products, services, analysis, software, and expertise is designed to help integrated circuit ("IC") manufacturers manage yield throughout the entire fabrication process—from research and development to final mass-production yield analysis.

We offer a broad spectrum of products and services that are used by virtually every major wafer, IC and photomask manufacturer in the world. These customers turn to us for inline wafer defect monitoring; reticle and photomask defect inspection; critical dimension metrology; wafer overlay; film and surface measurement; and overall yield and fab-wide data analysis. Our advanced products, coupled with our unique yield technology services, allow us to deliver the yield management solutions our customers need to accelerate their yield learning rates, reduce their yield excursion risks and adopt industry-leading yield management practices.

KLA-Tencor Corporation was formed in April 1997 through the merger of KLA Instruments Corporation and Tencor Instruments, two long-time leaders in the semiconductor equipment industry, each with over 20 years of experience. KLA Instruments Corporation was incorporated in Delaware in 1975; Tencor Instruments was incorporated in California in 1976. Effective April 30, 1997, Tencor Instruments merged into a wholly owned subsidiary of KLA Instruments Corporation. Immediately following this merger, KLA Instruments Corporation changed its name to KLA-Tencor Corporation.

We are incorporated in Delaware. Our principal executive offices are located at 160 Rio Robles, San Jose, California 95134, and our telephone number at that address is (408) 875-3000.

Financial Information. The following table sets forth selected consolidated financial operating data for KLA-Tencor. The selected historical statement of operations data for the fiscal years ended June 30, 2006 and 2005 and the selected historical balance sheet data as of June 30, 2006 and 2005 have been derived from the consolidated financial statements included in our Annual Report on Form 10-K for the fiscal year ended June 30, 2006 that have been audited by PricewaterhouseCoopers LLP, independent auditors, and our Quarterly Reports on Form 10-Q for the periods ended September 30, 2006, December 31, 2006 and March 31, 2007.

The information presented below should be read together with the complete financial statements and notes related thereto as well as the section of these reports entitled Management's Discussion and Analysis of Financial Condition and Results of Operations. We have presented the following data in thousands, except per share data.

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	YEAR ENDED JUNE 30,		THREE MONTHS ENDED	
	2006	2005	2007	2006
	(unaudited)			
	(in thousands, except per share data)			
CONSOLIDATED STATEMENT OF OPERATIONS DATA:				
Gross Revenue	\$ 2,070,627	\$ 2,081,878	\$ 716,208	\$ 519,648
Gross Profit	\$ 1,128,536	\$ 1,210,878	\$ 409,457	\$ 293,073
Earnings (loss) from operations	\$ 309,791	\$ 545,120	\$ 182,655	\$ 84,927
Net income (loss)	\$ 380,452	\$ 445,049	\$ 154,785	\$ 96,684
Net income per share (basic)	\$ 1.92	\$ 2.27	\$ 0.78	\$ 0.48
Net income per share (diluted)	\$ 1.86	\$ 2.21	\$ 0.76	\$ 0.47
Weighted average shares (basic)	198,625	196,346	197,930	199,876
Weighted average shares (diluted)				
CONSOLIDATED BALANCE SHEET DATA (AT PERIOD END):				
Cash and cash equivalents	\$ 1,129,191	\$ 663,163	\$ 604,416	\$ 961,995
Current assets	\$ 3,543,243	\$ 3,201,891	\$ 2,947,155	\$ 3,529,989
Non-current assets	\$ 1,032,668	\$ 838,712	\$ 1,393,638	\$ 884,973
Current liabilities	\$ 1,002,481	\$ 936,689	\$ 1,029,536	\$ 943,613
Non-current liabilities	\$ —	\$ —	\$ —	\$ —
Total shareholders' equity	\$ 3,567,991	\$ 3,096,670	\$ 3,311,257	\$ 3,462,289
Book value per common share	\$ 17.96	\$ 15.77	\$ 16.73	\$ 17.32

See Section 18 for instructions on how you can obtain copies of our SEC reports that contain the audited financial statements we have summarized above.

12. INTERESTS OF DIRECTORS AND OFFICERS; TRANSACTIONS AND ARRANGEMENTS CONCERNING THE OPTIONS; AND MATERIAL AGREEMENTS WITH DIRECTORS AND OFFICERS.

A list of the current members of our Board of Directors and executive officers is attached as Schedule I to this document. As of March 31, 2007 our current executive officers and directors as a group beneficially owned outstanding options under our various equity compensation plans to purchase a total of 1,270,462 shares of our common stock and restricted stock units under those plans covering an additional 508,303 shares of our common stock in the aggregate. That number represented approximately 6.5% of the shares of our common stock subject to all options and restricted stock units outstanding under our various equity compensation plans as of that date.

Our executive officer and non-employee members of our Board of Directors are not eligible to participate in the Offer.

However, Richard Wallace, our Chief Executive Officer holds certain stock options that would have been Eligible Options but for the fact that the exercise prices for those options were amended on December 28, 2006 on terms similar to the terms of this Offer. IRS regulations required those particular options to be so amended before January 1, 2007 because they were granted to an individual who was an executive officer at the time of grant and the remedial period for those options ended on December 31, 2006. Mr. Wallace will also be entitled to a cash bonus in January 2008 that compensates him for the increase to the exercise prices in effect under those amended options. The following chart sets forth the options that were so amended:

Grant Date	Number of Affected Option Shares	Prior Exercise Price	Increased Exercise Price	Total Increase in Exercise Price
11/10/02	3,209	\$ 26.25	\$ 32.88	\$ 21,575.67
04/04/01	4,667	\$ 32.75	\$ 50.82	\$ 84,332.69
10/02/01	16,500	\$ 29.31	\$ 45.25	\$ 263,010.00

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Two other former KLA-Tencor executive officers, Neil Richardson and Dennis Fortino, also had the exercise prices for certain of their outstanding options similarly increased. For Mr. Richardson, the increase was in an aggregate dollar amount of \$195,812.50 and covered 11,000 option shares in total. For Mr. Fortino, the increase was in an aggregate dollar amount of \$104,013.75 and covered 6,375 option shares in total.

John Kispert, our President and Chief Operating Officer, had the exercise prices for certain of his options similarly increased; however, Mr. Kispert will not be receiving a cash bonus to compensate him for the higher prices in effect for those amended options.

Schedule II attached to this document sets forth a table indicating the beneficial ownership of our common stock by our executive officers and non-employee members of our Board of Directors as of March 31, 2007.

During the 60-day period ended May 15, 2007:

- we granted options under all of our various equity compensation plans to purchase 63,369 shares of our common stock, of which options to purchase 11,875 shares were granted to our directors and executive officers;
- in connection with our tender offer to amend or replace eligible options, which expired on March 27, 2007, on March 28, 2007 we amended outstanding options to purchase 4,966,058 shares of our common stock to increase the exercise price of such options to the lower of (i) the exercise price on the actual grant date of the option and (ii) \$53.35, the closing price per share of our common stock on March 28, 2008; in addition, we canceled tendered options to purchase 51,494 shares of our common stock because the adjusted exercise price would have been the same or lower than the exercise price in effect for those options prior to the amendment. In replacement of each such canceled option, we immediately granted a new option that is exactly the same, including the same exercise price per share, but with a new grant date of March 28, 2007;
- individuals exercised options to acquire 2,819,769 shares of our common stock with exercise prices per share ranging from \$8.76 to \$56.31, of which 21,250 shares were acquired by our directors and executive officers;
- options to purchase an aggregate of 866,950 shares of common stock under all of our various equity compensation plans were canceled, of which options for 25,969 shares were held by our directors and executive officers; and
- our directors and executive officers sold an aggregate of 21,250 shares of our common stock.

The following non-employee Board members and executive officers were parties to the foregoing transactions involving KLA-Tencor common stock conducted during the 60-day period ended May 15, 2007:

- On May 9, 2007, each of the following non-employee members of our Board of Directors was issued a restricted stock unit award covering 439 shares of our common stock: Messrs. Kennedy and Dickson.

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- On May 8, 2007, Mr. Martin was issued a restricted stock unit award covering 28,000 shares of our common stock.
- On May 8, 2007, Mr. Titingier sold 10,000 shares of our common stock at an average price of \$56.25 acquired on the exercise of a stock option.
- On May 1, 2007, Mr. Bingham sold 11,250 shares of our common stock at an average price of \$55.57 per share acquired upon the exercise of a stock option.
- On May 1, 2007, each of the following non-employee members of our Board of Directors received an option grant for 1,250 shares of our common stock with an exercise price of \$55.88 per share, except that Mr. Barnholt received an option grant for 1,875 shares: Messrs. Bingham, Bond, Wang, Kaufman and Calderoni and Ms. Urbanek.
- On March 29, 2007, each of the following non-employee members of our Board of Directors was issued a restricted stock unit award covering 935 shares of our common stock, except that Mr. Barnholt received a restricted stock unit award covering 1,403 shares of our common stock: Messrs. Bingham, Bond, Wang, Kaufman and Calderoni and Ms. Urbanek.
- On March 29, 2007, Mr. Bingham received an option grant for 2,500 shares of our common stock with an exercise price of \$53.47.

There are no other persons controlling KLA-Tencor.

Except as otherwise described above and other than stock option grants, restricted stock unit awards and other stock-based awards in the ordinary course to employees who are not executive officers, there have been no transactions in any outstanding options to purchase our common stock or in our common stock that were effected during the 60-day period ended May 15, 2007 by KLA-Tencor or by any current executive officer, director, affiliate or subsidiary of KLA-Tencor.

13. STATUS OF OPTIONS ACCEPTED BY US IN THE OFFER; ACCOUNTING CONSEQUENCES OF THE OFFER.

The terms and provisions of each Amended Option will not differ from the terms and provisions in effect for that option at the time of tender, except that the Amended Option will have an exercise price equal to the Adjusted Exercise Price determined for that option. Accordingly, each Amended Option will continue to remain an outstanding option under the particular Plan under which it was originally granted. Each New Option will be exactly the same as the canceled Eligible Option it replaces, including the current exercise price for the canceled option and no loss of vesting or change to the expiration date of the option term, but will have a new grant date.

Pursuant to the accounting standards in effect under SFAS 123R, we will recognize additional compensation expense for financial reporting purposes with respect to the amendment of the Eligible Options to increase the current exercise prices in effect for those options to the applicable Adjusted Exercise Prices based on the incremental fair value of those options as so modified. Both the change in exercise price and the offsetting Cash Bonus are included in the determination of the incremental fair value of those options. We will not recognize any additional compensation expense for financial reporting purposes with respect to the cancellation of tendered Eligible Options and the grant of New Options in replacement thereof because there is no incremental fair value since there was no change in the grant price or any other assumptions affecting the fair value.

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14. LEGAL MATTERS; REGULATORY APPROVALS.

We are not aware of any license or regulatory permit that appears to be material to our business that might be adversely affected by our increasing the exercise prices of the Eligible Options to the applicable Adjusted Exercise Prices, paying the applicable Cash Bonuses or canceling tendered options and granting New Options in replacement, or of any approval or other action by any government or governmental, administrative or regulatory authority or agency, domestic or foreign, that would be required for such amendment to those options, the payment of the Cash Bonuses or the cancellation of tendered options and grant of New Options as contemplated herein. Should any such approval or other action be required, we presently contemplate that we will seek such approval or take such other action. We are unable to predict whether we may be required to delay the acceptance of the tendered Eligible Options for amendment or replacement or the payment of the applicable Cash Bonuses pending the outcome of any such matter. We cannot assure you that any such approval or other action, if needed, would be obtained or would be obtained without substantial conditions or that the failure to obtain any such approval or other action might not result in adverse consequences to our business. Our obligation to amend or replace Eligible Options is subject to certain conditions, including the conditions described in Section 7.

15. MATERIAL U.S. FEDERAL INCOME TAX CONSEQUENCES.

The following is a general summary of the material U.S. federal income tax consequences applicable to the amendment of the Eligible Options and the payment of the Cash Bonuses or the cancellation of tendered options and the grant of New Options in replacement. Foreign, state and local tax consequences are not addressed.

Acceptance of Offer. If you tender your Eligible Options, you will not recognize any taxable income for U.S. federal income tax purposes at the time of your tender.

Amendment of Option. The amendment of your Eligible Option to increase the exercise price per share to the Adjusted Exercise Price determined for that option is not a taxable event for U.S. federal income tax purposes.

Cancellation and Grant of New Options. The cancellation of a tendered Eligible Option and the grant of a New Option in replacement will not be a taxable event for U.S. federal income tax purposes.

Exercise of Amended Option or New Option. Your Amended Option or New Option will be taxable as a non-statutory stock option for U.S. federal income tax purposes. Accordingly, upon each exercise of such option, you will recognize immediate taxable income equal to the excess of (i) the fair market value of the purchased shares at the time of exercise over (ii) the exercise price paid for those shares, and the Company must collect the applicable withholding taxes with respect to such income.

Sale of Acquired Shares. The subsequent sale of the shares acquired upon the exercise of your Amended Option or New Option will give rise to a capital gain to the extent the amount realized upon that sale exceeds the sum of the (i) exercise price paid for the shares plus (ii) the taxable income recognized in connection with the exercise of the option for those shares. A capital loss will result to the extent the amount realized upon such sale is less than such sum. The gain or loss will be long-term if the shares are not sold until more than one (1) year after the date the Amended Option or New Option is exercised for those shares.

Cash Bonus. You will be immediately taxed upon receipt of the Cash Bonus. The payment will constitute wages for tax withholding purposes. Accordingly, the Company must withhold all applicable federal, state and local income and employment withholding taxes, and you will receive only the portion of the payment remaining after those taxes have been withheld.

WE RECOMMEND THAT YOU CONSULT YOUR OWN TAX ADVISOR WITH RESPECT TO THE U.S. FEDERAL, STATE AND LOCAL TAX CONSEQUENCES OF PARTICIPATING IN THE OFFER.

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16. EXTENSION OF THE OFFER; TERMINATION; AMENDMENT.

We expressly reserve the right, in our discretion, at any time and from time to time, and regardless of whether or not any event set forth in Section 7 has occurred or is deemed by us to have occurred, to extend the period of time during which the Offer is open and thereby delay the acceptance of any Eligible Options for amendment or replacement by giving notice of such extension to the tendering Eligible Optionees and making a public announcement thereof.

We also expressly reserve the right, in our judgment, at any time before the Expiration Date, to terminate or amend the Offer and to postpone our acceptance of any tendered Eligible Options for amendment or replacement upon the occurrence of any of the conditions specified in Section 7, by giving written or electronic notice of such termination or postponement to the tendering Eligible Optionees and making a public announcement thereof. Our reservation of the right to delay our acceptance of the tendered Eligible Options for amendment or replacement is limited by Rule 13e-4(f)(5) promulgated under the 1934 Act, which requires that we must pay the consideration offered or return the tendered Eligible Options promptly after termination or withdrawal of the Offer.

Amendments to the Offer may be made at any time and from time to time by public announcement of the amendment. In the case of an extension, the notice of such extension will be issued no later than 9:00 a.m. Eastern Time on the next business day after the last previously scheduled or announced Expiration Date. Any public announcement made pursuant to the Offer will be disseminated promptly to Eligible Optionees in a manner reasonably designated to inform option holders of such change.

If we materially change the terms of the Offer or the information concerning the Offer, or if we waive a material condition of the Offer, we will extend the Offer to the extent required by Rules 13e-4(d)(2) and 13e-4(e)(3) under the 1934 Act. Those rules require that the minimum period during which an Offer must remain open following material changes in the terms of the Offer or information concerning the Offer, other than a change in price or a change in percentage of securities sought, will depend on the facts and circumstances, including the relative materiality of such terms or information.

If we decide to take any of the following actions, we will give notice of such action and keep the Offer open for at least ten business days after the date of such notification:

- (1) we increase or decrease the amount of consideration offered for the Eligible Options, or
- (2) we decrease the number of Eligible Options eligible to be tendered in the Offer.

17. FEES AND EXPENSES.

We will not pay any fees or commissions to any broker, dealer or other person for soliciting submissions of Eligible Options for amendment or replacement pursuant to this Offer.

18. ADDITIONAL INFORMATION.

We have filed with the SEC a Tender Offer Statement on Schedule TO, of which this document is a part, with respect to the Offer. This document does not contain all of the information contained in the Schedule TO and the exhibits to the Schedule TO. We recommend that you review the Schedule TO, including its exhibits, and the following materials that we have filed with the SEC before making a decision on whether to tender your Eligible Options for amendment or replacement:

- (a) our Annual Report on Form 10-K for our fiscal year ended June 30, 2006, filed with the SEC on January 29, 2007;

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(b) our Quarterly Reports on Form 10-Q for our fiscal quarters ended September 30, 2006, December 31, 2006 and March 31, 2007 filed with the SEC on January 29, 2007, February 9, 2007 and May 7, 2007, respectively;

(c) our Current Report on Form 8-K filed with the SEC on July 11, 2006; our Current Report on Form 8-K filed with the SEC on July 26, 2006; our Current Report on Form 8-K filed with the SEC on July 27, 2006; our Current Report on Form 8-K filed with the SEC on August 3, 2006; our Current Report on Form 8-K filed with the SEC on August 7, 2006; our Current Report on Form 8-K filed with the SEC on August 29, 2006; our Current Report on Form 8-K filed with the SEC on September 15, 2006; our Current Report on Form 8-K filed with the SEC on September 20, 2006; our Current Reports on Form 8-K filed with the SEC on October 3, 2006; our Current Report on Form 8-K/A filed with the SEC on October 4, 2006; our Current Report on Form 8-K filed with the SEC on October 6, 2006; our Current Report on Form 8-K filed with the SEC on October 12, 2006; our Current Report on Form 8-K filed with the SEC on October 18, 2006; our Current Report on Form 8-K filed with the SEC on October 30, 2006; our Current Report on Form 8-K filed with the SEC on November 6, 2006; our Current Report on Form 8-K filed with the SEC on November 16, 2006; our Current Report on Form 8-K filed with the SEC on December 27, 2006; our Current Report on Form 8-K filed with the SEC on January 5, 2007; our Current Report on Form 8-K filed with the SEC on January 31, 2007; our Current Report on Form 8-K filed with the SEC on February 2, 2007; our Current Report on Form 8-K filed with the SEC on February 22, 2007; our Current Report on Form 8-K filed with the SEC on February 27, 2007; our Current Report on Form 8-K filed with the SEC on March 15, 2007; our Current Report on Form 8-K filed with the SEC on April 5, 2007; our Current Report on Form 8-K filed with the SEC on April 26, 2007; our Current Report on Form 8-K filed with the SEC on May 4, 2007; our Current Report on Form 8-K filed with the SEC on May 9, 2007; and

(d) the description of our common stock included in our registration statement on Form 8-A/A, which was filed with the SEC on February 2, 2006, including any amendments or reports we file for the purpose of updating that description.

The SEC file number for these filings is 000-09992. These filings, our other annual, quarterly and current reports, our proxy statements and our other SEC filings are available to the public on the SEC's website at www.sec.gov. These filings may also be examined, and copies may be obtained, at the following SEC public reference room:

100 F Street, N.E.
Washington, D.C. 20549

You may obtain information on the operation of the public reference rooms by calling the SEC at 1-800-SEC-0330.

We will also provide without charge to each person to whom a copy of this document is delivered, upon the written or oral request of any such person, a copy of any or all of the documents to which we have referred you, other than exhibits to such documents (unless such exhibits are specifically incorporated by reference into such documents). Requests should be directed to:

KLA-Tencor Corporation
160 Rio Robles
San Jose, California 95134
Attn: Tracy Laboy

or by contacting Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

As you read the foregoing documents, you may find some inconsistencies in information from one document to another. If you find inconsistencies between the documents, or between a document and this document, you should rely on the statements made in the most recent document.

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The information relating to KLA-Tencor in this document should be read together with the information contained in the documents to which we have referred you.

19. FORWARD-LOOKING STATEMENTS; MISCELLANEOUS.

This document and our SEC reports referred to above contain certain forward-looking statements within the meaning of Section 27A of the Securities Act of 1933 and Section 21E of the 1934 Act. All statements other than statements of historical fact may be forward-looking statements. You can identify these and other forward-looking statements by the use of words such as “may,” “will,” “could,” “would,” “should,” “expects,” “plans,” “anticipates,” “relies,” “believes,” “estimates,” “predicts,” “intends,” “potential,” “continue,” or the negative of such terms, or other comparable terminology. Forward-looking statements also include the assumptions underlying or relating to any of the foregoing statements. Such forward-looking statements include, among others, those statements regarding the future impact of the restatement of our historical financial statements, shareholder litigation, negative tax implications and other related matters arising from the discovery that we had retroactively priced stock options (primarily from July 1, 1997 to June 30, 2002) and had not accounted for them correctly; forecasts of the future results of our operations; the percentage of spending that our customers allocate to process control; orders for our products and capital equipment generally; sales of semiconductors; the allocation of capital spending by our customers; growth of revenue in the semiconductor industry, the semiconductor capital equipment industry and business; technological trends in the semiconductor industry; our future product offerings and product features; the success and market acceptance of new products; timing of shipment of backlog; the future of our product shipments and our product and service revenues; our future gross margins; the future of our selling, general and administrative expenses; international sales and operations; maintenance of our competitive advantage; success of our product offerings; creation and funding of programs for research and development; attraction and retention of employees; results of our investment in leading edge technologies; the effects of hedging transactions; the effect of the sale of trade receivables and promissory notes from customers; our future income tax rate; dividends; the completion of any acquisitions of third parties, or the technology or assets thereof; benefits received from any acquisitions and development of acquired technologies; sufficiency of our existing cash balance, investments and cash generated from operations to meet our operating and working capital requirements; and the adoption of new accounting pronouncements.

Our actual results may differ significantly from those projected in the forward-looking statements in this document. Factors that might cause or contribute to such differences include, but are not limited to, those discussed in Item 1A, “Risk Factors” as well as in Item 1, “Business” and Item 7, “Management’s Discussion and Analysis of Financial Condition and Results of Operations” in the Annual Report on Form 10-K for the 2006 fiscal year filed with the SEC on January 29, 2007. You should carefully review these risks and also review the risks described in other documents we file from time to time with the SEC, including the Quarterly Reports on Form 10-Q that we have filed and will file in fiscal year 2007, recent Current Reports on Form 8-K and 8-K/A, and other SEC filings. You are cautioned not to place undue reliance on these forward-looking statements, and we expressly assume no obligations to update the forward-looking statements in this document that occur after the date hereof.

We are not aware of any jurisdiction where the making of the Offer is not in compliance with applicable law. If we become aware of any jurisdiction where the making of the Offer is not in compliance with any valid applicable law, we intend to make a good faith effort to comply with such law. If, after such good faith effort, we cannot comply with such law or we determine that further efforts to comply are not advisable, the Offer will not be made to, nor will tenders be accepted from or on behalf of, the holders of Eligible Options residing in such jurisdiction.

We have not authorized anyone to give you any information or to make any representations in connection with the Offer other than the information and representations contained in this document, the related Tender Offer Statement on Schedule TO or in the related Letter of Transmittal and accompanying Stock Option Amendment and Special Bonus Agreement. If anyone makes any representation to you or gives you any information different from the representations and information contained in this document, the related Tender Offer Statement on Schedule TO or in the related Letter of Transmittal and accompanying Stock Option Amendment and Special Bonus Agreement, you must not rely upon that representation or information as having been authorized by us.

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We have not authorized any person to make any recommendation on our behalf as to whether you should tender or refrain from tendering your Eligible Options pursuant to the Offer. You should rely only on the representations and information contained in this document, the related Tender Offer Statement on Schedule TO or in the related Letter of Transmittal and accompanying Stock Option Amendment and Special Bonus Agreement or to which we have referred you.

KLA-Tencor Corporation

May 16, 2007

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SCHEDULE I

INFORMATION CONCERNING THE DIRECTORS AND EXECUTIVE OFFICERS OF KLA-TENCOR CORPORATION

The members of the KLA-Tencor board of directors and the KLA-Tencor executive officers and their respective positions and offices as of May 16, 2007, are set forth in the following table:

<u>NAME</u>	<u>POSITION AND OFFICES HELD</u>
Richard P. Wallace	Chief Executive Officer and Director
John H. Kispert	President and Chief Operating Officer
Jeffrey L. Hall	Senior Vice President and Chief Financial Officer
Brian Martin	Senior Vice President and Chief Legal Officer
Jorge L. Titinger	Senior Vice President and Chief Administrative Officer
Benjamin Tsai	Executive Vice President and Chief Technology Officer
H. Raymond Bingham	Director
Robert T. Bond	Director
David C. Wang	Director
Lida Urbanek	Director
Edward W. Barnholt	Director
Stephen P. Kaufman	Director
Robert Calderoni	Director
Kevin J. Kennedy	Director
John Trevor Dickson	Director

The address of each board member and executive officer is c/o KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134.

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SCHEDULE II

BENEFICIAL OWNERSHIP OF KLA-TENCOR SECURITIES BY KLA-TENCOR DIRECTORS AND EXECUTIVE OFFICERS

The following table shows the holdings of KLA-Tencor common stock as of March 31, 2007 by each director and each executive officer of KLA-Tencor. Shares that become issuable under outstanding restricted stock units upon satisfaction of applicable vesting requirements are not included in the table but are indicated in footnote 18 to such table:

<u>Name of Beneficial Owner (1)(i)</u>	<u>Amount and Nature of Beneficial Ownership</u>	<u>Percent of Class (17)</u>
Richard P. Wallace (2)	250,801	*
Edward W. Barnholt (3)	74,957	*
H. Raymond Bingham (4)	65,000	*
Robert T. Bond (5)	59,500	*
Robert Calderoni (6)	1,250	*
John Trevor Dickson	—	—
Stephen P. Kaufman (7)	38,500	*
Kevin J. Kennedy	—	—
Kenneth Schroeder (8)(16)	158,627	*
Lida Urbanek (9)	1,387,081	*
David Wang (10)	2,500	*
Avi Cohen (11)(16)	63,027	—
John H. Kispert (12)	183,073	*
Jeffrey L. Hall (13)	93,071	*
Benjamin Tsai	2,915	*
Brian Martin	—	—
Jorge L. Titinger (14)	50,097	*
Lance Glasser (15)(16)	176,132	*
All Directors and executive officers as a group (16 persons)	2,229,195	1.17%

* Does not exceed 1% of the outstanding shares.

(1) Correspondence to all executive officers and directors of the Company may be mailed to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134.

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- (2) Includes 246,543 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (3) Includes 73,957 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (4) Includes 65,000 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (5) Includes 57,500 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (6) Includes 1,250 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (7) Includes 37,500 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (8) Includes 25,969 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (9) Includes 84,166 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007, 1,271,414 shares of which are held in trust for the benefit of Ms. Urbanek's family, and 29,555 shares of which are held by the Urbanek Family Foundation.
- (10) Includes 2,500 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (11) Includes 59,831 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (12) Includes 175,699 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007 and 7,241 shares which are held in trust for the benefit of Mr. Kispert's family.
- (13) Includes 90,442 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (14) Includes 47,497 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (15) Includes 171,615 shares subject to options which are presently exercisable or will become exercisable within 60 days after March 31, 2007.
- (16) No longer an executive of the Company as of March 31, 2007.
- (17) As of March 31, 2007, there were 190,478,888 shares of common stock outstanding.
- (18) As of March 31, 2007, the executive officers listed below each held restricted stock units. Each restricted stock unit will entitle that officer to one share of the Company's common stock upon satisfaction of the applicable service or performance vesting requirement in effect for that unit.

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<u>Name</u>	<u>Number of Shares Subject to Restricted Stock Units</u>
Richard P. Wallace	203,611
John H. Kispert	160,833
Jeffrey L. Hall	43,750
Jorge Titingar	37,600
Benjamin Tsai	50,000

EMAIL ANNOUNCEMENT REGARDING COMMENCEMENT OF OFFER

May 16, 2007

We are pleased to announce that KLA-Tencor's Tender Offer is officially launching today, May 16, 2007 and will remain open until June 14, 2007 at 11:59 p.m. Pacific Time (unless we extend it).

The Tender Offer will provide you with the opportunity to avoid the unfavorable tax consequences under Section 409A of the Internal Revenue Code you may otherwise incur with respect to your retroactively priced options. The specifics of the program are described in complete detail in the formal Offer to Amend or Replace that we filed with the Securities and Exchange Commission today. A copy of that document is available on the KLA-Tencor intranet at the following hyperlink:

http://ca1blwssfe01:38681/corp/hr/hronline/finances/stock_grants/Stock%20Grants%20Documents%20and%20Forms/TO2.pdf

You may obtain a printed copy of these documents by contacting Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com. We urge you to read the Offer to Amend or Replace and the exhibits thereto very carefully.

Options will remain subject to adverse tax consequences under Section 409A until the close of the Tender Offer and the official amendment or replacement of such options on the first business day following the expiration of the Tender Offer. Therefore, we remind you that should you exercise your tendered options prior to the amendment or replacement of your tendered options, you will be solely responsible for any taxes, penalties or interest you may incur under Section 409A.

In order to tender one or more of your Eligible Options for amendment or replacement pursuant to the Offer, you must properly complete, duly execute and date your Letter of Transmittal and deliver it to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy, either by mail, courier, hand delivery or facsimile ((408) 875-6677). We must receive your completed Letter or Transmittal before 11:59 p.m. Pacific Time on June 14, 2007. If we extend the Offer beyond that time, you must deliver your completed and executed Letter of Transmittal before the extended expiration date of the Offer.

KEY DATES TO REMEMBER

The commencement date of the Offer is May 16, 2007.

The Offer will expire at 11:59 pm Pacific Time on June 14, 2007 (unless we extend it).

The Eligible Options will be amended or replaced on June 15, 2007 (unless we extend the Offer). Please be aware that your option account at your broker may not accurately reflect the amendment or replacement for one to two business days following the amendment date.

The cash bonus will be paid on the first regularly scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008.

KLA-TENCOR CORPORATION
OFFER TO AMEND OR REPLACE ELIGIBLE OPTIONS

FREQUENTLY ASKED QUESTIONS

The following are answers to some of the questions that you may have about the Offer to Amend or Replace and the accompanying Letter of Transmittal (which, together with the Stock Option Amendment and Special Bonus Agreement, as they may each be amended or supplemented from time to time, constitute the "Offer"). We urge you to read carefully the Offer because the information in this summary is not complete and does not contain all of the information that is important to you.

1. WHEN DOES THE OFFER COMMENCE?

The commencement date of the Offer is May 16, 2007.

2. WHEN DOES THE OFFER EXPIRE?

The Offer will expire on June 14, 2007, at 11:59 p.m. Pacific Time, unless we extend the Offer. If the Offer is extended, we will make a public announcement of the extension no later than 9:00 a.m. Eastern Time on the next business day following the previously-scheduled expiration date of the Offer.

3. HOW AND WHEN DO I TENDER MY ELIGIBLE OPTIONS?

In order to tender one or more of your Eligible Options for amendment or replacement pursuant to the Offer, you must properly complete, sign and date your Letter of Transmittal and deliver it to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy, either by mail, courier, hand delivery or facsimile ((408) 875-6677). We must receive your completed Letter or Transmittal before 11:59 p.m. Pacific Time on June 14, 2007. If we extend the Offer beyond that time, you must deliver your completed and signed Letter of Transmittal before the extended expiration date of the Offer.

We will not accept delivery of any Letter of Transmittal after expiration of the Offer. If we do not receive a properly completed and signed Letter of Transmittal from you before the expiration of the Offer, we will not accept your Eligible Options for amendment or replacement. Those options will not be amended or replaced pursuant to this Offer, and no Cash Bonus will be paid with respect to those options.

We reserve the right to reject any or all tenders of Eligible Options that we determine are not in appropriate form or that we determine are unlawful to accept. Otherwise, we intend to accept all properly and timely tendered Eligible Options that are not validly withdrawn. Subject to our rights to extend, terminate or amend the Offer, we currently expect that we will accept all properly tendered Eligible Options upon the expiration of the Offer, and we will amend or replace those options on the next business day thereafter.

4. DURING WHAT PERIOD OF TIME MAY I WITHDRAW MY PREVIOUSLY TENDERED OPTIONS?

You may withdraw your tendered Eligible Options at any time before 11:59 p.m. Pacific Time on June 14, 2007 (or any extended expiration date of the Offer). To withdraw your tendered options, you must send to us, either by delivery at 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy or by facsimile at (408) 875-6677, a properly completed and signed Withdrawal Form, with the required information while you still have the right to withdraw those options. Once you have withdrawn your Eligible Options, you may re-tender those options pursuant to this Offer only if you again comply with the tender procedures as described in this document and the Letter of Transmittal prior to the expiration of the Offer.

5. WHAT DO I DO IF I FIND AN ERROR REGARDING MY ELIGIBLE OPTIONS IN THE LETTER OF TRANSMITTAL?

If you think there is an error in the information contained on your Letter of Transmittal, please contact Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

6. WHERE CAN I OBTAIN A COPY OF THE LETTER OF TRANSMITTAL AND STOCK OPTION AMENDMENT AND SPECIAL BONUS AGREEMENT?

Your individualized Letter of Transmittal will be sent to you promptly after the commencement of the Offer. To obtain another copy of the Letter of Transmittal and Stock Option Amendment and Special Bonus Agreement, please contact Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

7. WHAT WILL HAPPEN TO MY TENDERED OPTIONS?

If KLA-Tencor accepts your tendered options pursuant to the terms of the Offer, then each of those options will be amended to increase the exercise price per share to the lower of (i) the fair market value per share of KLA-Tencor common stock on the actual date on which that option was granted and (ii) the closing price per share of such common stock on the date on which the option is amended.

However, if an Eligible Option you tender for amendment has an exercise price per share at or above the closing price per share of KLA-Tencor common stock on the amendment date, that option will be canceled on that date and immediately replaced with a new option that is exactly the same as the canceled option, including the same exercise price per share and no loss of vesting or change to the expiration date, but with a new grant date. Such cancellation and re-grant is necessary in order to avoid adverse taxation of that option under IRC Section 409A.

8. WHAT ARE SOME OF THE KEY DATES TO REMEMBER?

The commencement date of the Offer is May 16, 2007.

The Offer will expire at 11:59 pm Pacific Time on June 14, 2007 (unless we extend it).

The Eligible Options will be amended or replaced on June 15, 2007 (unless we extend the Offer).

The cash bonus will be paid on the KLA-Tencor's first regularly scheduled payroll date following January 1, 2008, which is scheduled to be January 10, 2008.

9. WHO CAN I TALK TO IF I HAVE QUESTIONS ABOUT THE OFFER?

For additional information or assistance, you should contact Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

FORM OF LETTER OF TRANSMITTAL

KLA-TENCOR CORPORATION
 LETTER OF TRANSMITTAL
 RE: TENDER OF ELIGIBLE OPTION(S) PURSUANT TO THE OFFER TO AMEND OR REPLACE
 DATED MAY 16, 2007

THE OFFER AND WITHDRAWAL RIGHTS EXPIRE AT 11:59 P.M., PACIFIC TIME, ON JUNE 14, 2007, UNLESS
 THE OFFER IS EXTENDED.

Name: _____ Employee ID: _____
 Address: _____

Important: Read the remainder of this Letter of Transmittal **before** completing and signing this page.

The chart below provides information regarding the grant date indicated for each Eligible Option in the applicable grant notice or option agreement, the exercise price per share currently in effect for that option, the actual grant date of that option, the fair market value per share of KLA-Tencor common stock on that date, the number of shares currently outstanding under the option and the portion of the option that qualifies as an Eligible Option.

Indicate your decision to tender your Eligible Option(s) identified below by checking the "Amend This Eligible Option" box. Only the portion of your option that is subject to Section 409A of the Internal Revenue Code will be amended. If you do not want to tender one or more of your Eligible Options for amendment, check the "Do Not Amend This Eligible Option" box for each option you choose not to tender. If you do not clearly mark the "Amend This Eligible Option" box with respect to an Eligible Option, your election with respect to that option will default to "Do Not Amend This Eligible Option." In that event, such Eligible Option will not be amended, and you will not become entitled to any special cash bonus with respect to that Eligible Option. In addition, you will be solely responsible for any taxes, penalties or interest you may incur under Section 409A (or state tax laws).

<u>Indicated Grant Date</u>	<u>Current Exercise Price Per Share</u> \$	<u>Actual Grant Date</u>	<u>Fair Market Value Per Share on Actual Grant Date</u> \$	<u>Total Number of Shares Subject to Outstanding Option</u>	<u>Number of Shares Qualifying as an Eligible Option (1)</u>	<u>Amend This Eligible Option</u> <input type="checkbox"/>	<u>Do Not Amend This Eligible Option</u> <input type="checkbox"/>
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(1) Reflects the portion of the option potentially subject to taxation under IRC Section 409A.

Signature: _____
 Date: _____

IMPORTANT: YOU MUST ALSO SIGN ON PAGE 3.

To: KLA-Tencor Corporation:

By checking the "Amend This Eligible Option" box in the table on the cover page of this Letter of Transmittal, I understand and agree to all of the following:

1. I hereby tender my Eligible Option(s) identified on the cover page of this Letter of Transmittal (the "Letter") to KLA-Tencor Corporation, a Delaware corporation ("KLA-Tencor"), for amendment or replacement in accordance with the terms of the offer (the "Offer") set forth in (1) the Offer to Amend or Replace dated May 16, 2007, of which I hereby acknowledge receipt, and (2) this Letter of Transmittal. Each tendered Eligible Option will be amended or replaced on June 14, 2007, or, if the Offer is extended, the first business day following the extended expiration date. The date on which the tendered Eligible Options are amended or replaced will constitute the "Amendment Date." All other capitalized terms used in this Letter of Transmittal but not defined herein have the meaning assigned to them in the Offer to Amend or Replace document.

2. The Offer is currently set to expire at 11:59 p.m. Pacific Time on June 14, 2007 (the "Expiration Date"), unless KLA-Tencor, in its discretion, extends the period of time during which the Offer will remain open. In such event, the term "Expiration Date" will mean the latest time and date at which the Offer, as so extended, expires.

3. Except as otherwise provided in Paragraph 5 below, the exercise price of each of my tendered Eligible Option(s) will be amended on the Amendment Date to an exercise price per share equal to the *lower* of (i) the fair market value per share of KLA-Tencor common stock on the actual grant date of that option or (ii) the closing price per share of such common stock on the Amendment Date. The new exercise price will constitute the "Adjusted Exercise Price," and each of my tendered Eligible Options with such Adjusted Exercise Price will be designated an "Amended Option." Except for the Adjusted Exercise Price, the terms and provisions of each Amended Option will be the same as in effect for the corresponding Eligible Option immediately before the amendment.

4. I will become entitled to receive a cash bonus (the "Cash Bonus") in an amount determined by multiplying (i) the number of shares of KLA-Tencor common stock subject to each Amended Option by (ii) the amount by which the Adjusted Exercise Price exceeds the current exercise price per share in effect for that Eligible Option. The Cash Bonus will be paid on the first regularly scheduled payroll date in January 2008, whether or not I continue in the employ of KLA-Tencor (or any subsidiary) through such date, but the payment will be subject to KLA-Tencor's collection of all applicable withholding taxes.

5. Should an Eligible Option I tender for amendment have an exercise price per share at or above the closing price per share of the common stock on the Amendment Date, then that option will be canceled on such date and immediately replaced with a New Option that is exactly the same as the canceled option, including the same exercise price per share, vesting schedule and expiration date, but with a new grant date. A stock option agreement for the New Option will be delivered to me as soon as administratively practicable following the Amendment Date.

6. If I cease to be employed by KLA-Tencor or its subsidiaries after I tender my Eligible Option(s) but before KLA-Tencor accepts such option(s) for amendment or replacement, my Eligible Options will not be amended or replaced, and I will not be entitled to receive the Cash Bonus.

7. Until the Expiration Date, I will have the right to withdraw my tendered Eligible Option(s). However, after that date I will have no withdrawal rights, unless KLA-Tencor does not accept my tendered Eligible Option(s) before July 13, 2007, the 40th business day after commencement of the Offer. I may then withdraw my tendered Eligible Option(s) at any time prior to KLA-Tencor acceptance of such options for amendment or replacement pursuant to the Offer.

8. The tender of my Eligible Option(s) pursuant to the procedure described in Section 4 of the Offer and the instructions to this Letter of Transmittal will constitute my acceptance of all of the terms and conditions of the Offer. Acceptance by KLA-Tencor of my tendered Eligible Option(s) for amendment or replacement pursuant to the Offer will constitute a binding agreement between KLA-Tencor and me upon the terms and subject to the conditions of the Offer.

9. I am the registered holder of the Eligible Option(s) tendered hereby, and my name, employee identification number and other information appearing on the cover page of this Letter of Transmittal are true and correct.

10. I am not required to tender my Eligible Option(s) pursuant to the Offer. However, if I do not tender such option(s), then I must take other action on my own with respect to such option(s) in order to bring such option(s) into compliance with Section 409A of the Internal Revenue Code ("Section 409A") and thereby avoid the potentially adverse tax consequences of Section 409A. I will be solely responsible for any penalty taxes, interest payments or other liabilities I may incur under Section 409A (and applicable state tax laws) with respect to any Eligible Option that is not amended or replaced pursuant to the Offer.

11. KLA-Tencor cannot give me legal, tax or investment advice with respect to the Offer and has advised me to consult with my own legal, tax and investment advisors as to the consequences of participating or not participating in the Offer.

12. Under certain circumstances set forth in the Offer to Amend or Replace, KLA-Tencor may terminate or amend the Offer and postpone its acceptance of the tendered Eligible Options for amendment or replacement. Should the Eligible Option(s) tendered herewith not be accepted for amendment or replacement, such option(s) will be returned to me promptly following the expiration or termination of the Offer.

I understand that neither KLA-Tencor nor the KLA-Tencor Board is making any recommendation as to whether I should tender or refrain from tendering my Eligible Option(s) for amendment or replacement, and that I must make my own decision whether to tender my Eligible Option(s), taking into account my own personal circumstances and preferences. I understand that the Amended Option(s) or New Option(s) resulting from the amendment or replacement of my tendered Eligible Option(s) may decline in value and may be "out of the money" when I decide to exercise such option(s). I further understand that past and current market prices of KLA-Tencor common stock may provide little or no basis for predicting what the market price of KLA-Tencor common stock will be when KLA-Tencor amends my tendered option(s) or at any other time in the future.

SIGNATURE OF OPTIONEE

(Signature of Optionee or Authorized Signatory)

(Optionee's Name, please print in full)

Date: _____, 2007

Address (if different than on cover page)

Office Telephone: (_____) _____

Email address:

Employee Identification Number (see cover page): _____

Please read the instructions on pages 5 and 6 of this Letter of Transmittal and then complete, sign and date the table on the cover page and the signature block on page 3 and return the entire Letter of Transmittal (including the instructions) to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy by mail, courier, hand delivery or facsimile ((408) 875-6677).

**DELIVERY OF THIS LETTER OF TRANSMITTAL TO AN ADDRESS
OTHER THAN THE ADDRESS ABOVE OR TRANSMISSION VIA FACSIMILE
TO A NUMBER OTHER THAN THE FACSIMILE NUMBER ABOVE
WILL NOT CONSTITUTE A VALID DELIVERY.**

INSTRUCTIONS

FORMING PART OF THE TERMS AND CONDITIONS OF THE OFFER

1. *Delivery of Letter of Transmittal.* A properly completed and duly executed original of the entire Letter of Transmittal (including the instructions), or a facsimile thereof, must be received by KLA-Tencor, at its address or at its facsimile number set forth on the signature page of the Letter of Transmittal, by 11:59 p.m. Pacific Time on the Expiration Date.

The method by which you deliver the Letter of Transmittal is at your election and risk, and the delivery will be deemed made only when actually received by KLA-Tencor. If you elect to deliver your Letter of Transmittal by mail, KLA-Tencor recommends that you use certified mail with return receipt requested. If you elect to deliver your Letter of Transmittal by fax, KLA-Tencor recommends that you retain the fax transmittal receipt. You should in all events allow sufficient time to ensure timely delivery.

Tenders of Eligible Options made pursuant to the Offer may be withdrawn up to 11:59 p.m. Pacific Time on the Expiration Date. If the Offer is extended by KLA-Tencor beyond that time, you may withdraw your tendered Eligible Options at any time until the extended expiration of the Offer. In addition, if KLA-Tencor does not accept your tendered options by 11:59 p.m. Pacific Time on July 14, 2007, you may withdraw your tendered Eligible Options at any time thereafter until such options are accepted for amendment or replacement. To validly withdraw your tendered Eligible Options, you must deliver a written notice of withdrawal, or a facsimile thereof, with the required information to KLA-Tencor while you still have the right to withdraw your tendered options. Withdrawals may not be rescinded, and any Eligible Options withdrawn will thereafter be deemed not to have been properly tendered for purposes of the Offer, unless the withdrawn options are properly re-tendered prior to the Expiration Date by following the tendering procedures described above.

KLA-Tencor will not accept any alternative, conditional or contingent tenders. All person tendering Eligible Options shall, by execution of this Letter of Transmittal (or a facsimile of it), waive any right to receive any notice of the acceptance of their tender, except as provided for in the Offer.

2. *Tenders.* **If you intend to tender your Eligible Options pursuant to the Offer, you must complete the table on the cover page of the Letter of Transmittal and follow the procedures described in Instruction 1. If you decide to tender one or more Eligible Options, you must tender the entire portion of each such option that is subject to the Offer.**

3. *Signatures on This Letter of Transmittal.* The optionee must sign the Letter of Transmittal.

4. *Requests for Assistance or Additional Copies.* Any questions or requests for assistance, as well as requests for additional copies of the Offer document or the Letter of Transmittal, may be directed to Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com. Copies will be furnished promptly at KLA-Tencor's expense.

5. *Irregularities.* KLA-Tencor will determine, in its discretion, all questions as to the form of documents and the validity, form, eligibility (including time of receipt), and acceptance of any tendered option. KLA-Tencor will also decide, in its discretion, all questions as to (i) the portion of each option grant that qualifies as an Eligible Option for purposes of the Offer; (ii) the Adjusted Exercise Price to be in effect under the Amended Option, (iii) the number of shares of common stock purchasable under the Amended Option at the Adjusted Exercise Price, (iv) the amount of the Cash Bonus payable with respect to each Amended Option and (v) the cancellation of tendered Eligible Options with exercise prices at or above the Adjusted Exercise Prices determined for those options and the replacement of those options with New Options. The determination of such matters by KLA-Tencor will be final and binding on all parties. KLA-Tencor reserves the right to reject any or all tenders it determines do not comply with the conditions of the Offer, are not in proper form or the acceptance of which would be unlawful. KLA-Tencor also reserves the right to waive any of the conditions of the Offer or any defect or irregularity in the tender with respect to any particular Eligible Option or any particular optionee, and KLA-Tencor's interpretation of the terms of the Offer (including these instructions) will be final and binding on all parties. No tender of an Eligible Option will be deemed to be properly made until all defects and irregularities have been cured by the tendering optionee or waived by KLA-Tencor.

Unless waived, any defects or irregularities in connection with the tender of an Eligible Option must be cured within such time as KLA-Tencor shall determine. Neither KLA-Tencor nor any other person is or will be obligated to give notice of any defects or irregularities in tenders, and no person will incur any liability for failure to give any such notice. If the table on the cover page of the Letter of Transmittal includes options that are not eligible for the Offer, KLA-Tencor will not accept those options for amendment or replacement, but KLA-Tencor does intend to accept for amendment or replacement any properly tendered Eligible Option set forth in that table.

6. *Important Tax Information.* You should refer to Sections 2 and 15 of the Offer and the “Risks of Participation in the Offer” section of the Offer, which contain important U.S. federal tax information concerning the Offer. You are strongly encouraged to consult with your own tax advisors as to the tax consequences of your participation in the Offer.

7. *Copies.* You should make a copy of the Letter of Transmittal, after you have completed and signed it, for your records.

IMPORTANT: THE LETTER OF TRANSMITTAL (OR A FACSIMILE COPY) MUST BE RECEIVED BY KLA-TENCOR BY 11:59 P.M. PACIFIC TIME ON THE EXPIRATION DATE.

May 16, 2007

Dear KLA-Tencor Colleague:

As you are aware, we recently conducted a thorough investigation of KLA-Tencor's past option grant practices. As a result of that investigation, the Company has determined that one or more options was retroactively priced in that the exercise price currently in effect for that option was based on the fair market value per share of KLA-Tencor common stock on a date earlier than the date on which that option was actually granted. Section 409A of the Internal Revenue Code provides that an option granted with a below-market exercise price, to the extent unvested as of December 31, 2004, will be subject to adverse income taxation unless that option is brought into compliance with Section 409A. KLA-Tencor has decided to offer eligible persons holding options that may be potentially subject to Section 409A the opportunity to amend or replace each such option in order to avoid any potential adverse tax consequences under Section 409A. You are receiving this letter because you hold one or more affected options.

If you want to participate in the offer, you must complete, sign, date and return the enclosed Letter of Transmittal by 11:59 p.m. Pacific Time on June 14, 2007. A link to the Offer to Amend or Replace Eligible Options document (the "Offer Document") that contains the details of the offer has been emailed to you and will also be available on the Company intranet at

http://ca1blwssfe01:38681/corp/hr/hronline/finances/stock_grants/Stock%20Grants%20Documents%20and%20Forms/TO2.pdf, or the Offer Document can be requested from Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

This package contains a personalized Letter of Transmittal that summarizes the affected options that you currently hold, including information relating to the number of shares subject to each affected option, the current exercise price per share in effect for that option, the actual grant date for that option and the fair market value of KLA-Tencor's common stock on the actual grant date. Participation in the offer is completely voluntary and you are not required to tender any of your affected options for amendment or replacement. However, if you elect not to tender your affected options, you will be solely responsible for any adverse tax consequences that may arise under Section 409A.

As discussed in greater detail in the Offer Document, if you tender an affected option that is amended pursuant to the offer, the current exercise price in effect for that option will be increased to the *lower* of (i) the fair market value per share of the Company's common stock on the actual date on which that option was granted and (ii) the closing price per share of such common stock on the date on which the option is amended. The new exercise price per share will be designated the "Adjusted Exercise Price" and will become effective on the first business day following the expiration of the offer. No other changes will be made to your affected option. Accordingly, each amended option will otherwise continue to be subject to the same vesting schedule, exercise period, expiration date and other terms and conditions as in effect for that option immediately prior to the amendment. In addition, each individual whose affected options are so amended will become entitled to a special cash bonus from the Company. The amount of the cash bonus payable with respect to each such amended option will be determined by multiplying (i) the amount by which the Adjusted Exercise Price exceeds the exercise price currently in effect for that option by (ii) the number of shares of KLA-Tencor common stock purchasable under that option at the Adjusted Exercise Price. The cash bonus will be paid on the Company's first regularly-scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008. The payment will be subject to the Company's collection of all applicable withholding taxes and other payments required to be withheld by the Company. The cash bonus will be paid whether or not an individual remains in the Company's employ through the payment date.

However, if the Adjusted Exercise Price so determined would be *the same or lower than* the exercise price per share currently in effect for an affected option, then that option will, on the Amendment Date, instead be canceled and immediately replaced with a new option that is exactly the same as the canceled option, with the same exercise price per share, vesting schedule and expiration date, but with a new grant date. The cancellation and re-grant is necessary to evidence the remedial action required under Section 409A with respect to an affected option whose current exercise price is not increased.

If you wish to participate in the offer, you must return your completed, signed Letter of Transmittal by mail, courier, hand delivery or facsimile to:

KLA-Tencor Corporation
160 Rio Robles
San Jose, California 95134
Attn: Tracy Laboy
Facsimile: (408) 875-6677

We must receive your completed and executed Letter of Transmittal by 11:59 p.m. Pacific Time on June 14, 2007. If we extend the offer beyond that time, you must deliver your completed and signed Letter of Transmittal before the extended expiration date of the offer.

If you decide to return the Letter of Transmittal by mail, we recommend using certified mail with return receipt requested. We intend to confirm the receipt of your Letter of Transmittal within two business days after receipt. The confirmation will be sent to your KLA-Tencor email address.

Please note that if you elect to tender one or more of your options for amendment or replacement, you must sign and date pages 1 and 3 of the Letter of Transmittal and return the entire document to us.

You are solely responsible for deciding whether or not to participate in the offer and for making sure that you properly complete and sign your Letter of Transmittal and that we receive it by 11:59 p.m. Pacific Time on June 14, 2007. Please allow sufficient time to ensure that we receive your Letter of Transmittal before the deadline. If we receive your Letter of Transmittal after the deadline or you do not properly complete the Letter of Transmittal, your Letter of Transmittal will be rejected, and your affected options will not be amended or replaced pursuant to the offer.

Please go to the following KLA-Tencor intranet site to access the Offer Document:

http://ca1blwssfe01:38681/corp/hr/hronline/finances/stock_grants/Stock%20Grants%20Documents%20and%20Forms/TO2.pdf

If you have any questions, you may contact Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

KLA-TENCOR CORPORATION

**STOCK OPTION AMENDMENT
AND
SPECIAL BONUS AGREEMENT**

AGREEMENT made by KLA-Tencor Corporation (the "Company") which shall be effective on the date executed by a validly-authorized officer of the Company.

WHEREAS, the Company previously granted to _____ (the "Optionee") the options identified on attached *Schedule I* (the "Options") to purchase shares of the Company's common stock under the Company's 2004 Equity Incentive Plan (the "Plan").

WHEREAS, the Company and Optionee entered into a formal Stock Option Agreement (the "Option Agreement") evidencing each such Option.

WHEREAS, in order to avoid adverse tax consequences under section 409A of the Internal Revenue Code, Optionee desires to amend each of the Options to increase the exercise price per share to be in effect for the unexercised portion of that Option which is subject to section 409A and identified as such on *Schedule I* (the "Covered Portion") to the higher exercise price per share indicated for that portion of such Option on *Schedule I*.

WHEREAS, in order to compensate Optionee for the increased exercise prices to be in effect for the Covered Portions of the Options, the Company is willing to pay Optionee a special cash bonus in a dollar amount equal to the aggregate increase in the exercise prices for the Covered Portions of the Options listed on *Schedule I*, with the actual dollar of that bonus indicated as the Total Special Bonus on *Schedule I*.

NOW THEREFORE, the parties hereby agree as follows:

1. Increased Exercise Price. The exercise price per share set forth in the Option Agreement for each of the Options listed on *Schedule I* is hereby increased, with respect to the shares subject to the Covered Portion of that Option, to the higher exercise price per share set forth for that Option on *Schedule I*.

2. Special Bonus. Optionee shall become entitled to receive a cash bonus from the Company (the "Special Bonus") in the gross dollar amount indicated as his or her Total Special Bonus on attached *Schedule I*. Payment shall be made on the Company's first regularly-scheduled payroll date after January 1, 2008, which is scheduled to be January 10, 2008. However, the Special Bonus shall be subject to the Company's collection of all applicable federal, state and local income and employment withholding taxes, and Optionee shall be paid only the net amount of such bonus remaining after such taxes have been collected. Optionee need not remain in the Company's employ to receive the Special Bonus.

3. Entire Agreement. This Agreement, together with the Option Agreements (to the extent not expressly amended hereby) and the Plan, represents the entire agreement of the parties with respect to the Options, the Covered Portions thereof and the Special Bonus and supersedes any and all previous contracts, arrangements or understandings between the parties with respect to such Options and the Special Bonus. This Agreement may be amended at any time only by means of a writing signed by Optionee and an authorized officer of the Company.

4. Continuation of Option Agreements. Except for the foregoing increases to the exercise prices per share for the Covered Portions of the Options, no other terms or provisions of the Option Agreements for such Options or the Plan have been modified as a result of this Agreement, and those terms and provisions shall continue in full force and effect.

IN WITNESS WHEREOF, this Agreement has been executed on behalf of KLA-Tencor Corporation by a duly-authorized officer on the date indicated below.

KLA-TENCOR CORPORATION

By: _____

TITLE: _____

DATED: _____, 2007

SCHEDULE I

AMENDED OPTION AND SPECIAL BONUS

Grant Date	Total Number of Shares Subject to Outstanding Option	Exercise Price Per Share Prior to Amendment	New Exercise Price Per Share Following Amendment	Number of Outstanding Option Shares Subject to Amended Exercise Price	Number of Outstanding Option Shares Not Subject to Amended Exercise Price	Special Bonus Payable on first regularly scheduled payroll date following January 1, 2008
		\$	\$			\$

Total Special Bonus: \$ _____

Note: This schedule will be completed by the Company and sent to you at your KLA-Tencor email address as soon as practicable following the Amendment Date.

KLA-TENCOR CORPORATION
OFFER TO AMEND OR REPLACE ELIGIBLE OPTIONS

WITHDRAWAL FORM

**THE OFFER AND WITHDRAWAL RIGHTS EXPIRE AT 11:59 P.M., PACIFIC TIME,
ON JUNE 14, 2007 UNLESS THE OFFER IS EXTENDED**

You previously received (1) an offer (the "Offer") from KLA-Tencor Corporation ("KLA-Tencor") to amend or replace your Eligible Options as described in the Offer to Amend or Replace Eligible Options dated May 16, 2007 (the "Offer to Amend") and (2) a Letter of Transmittal for your Eligible Option(s). You signed and returned your Letter of Transmittal in which you tendered one or more Eligible Option(s) for amendment or replacement pursuant to the Offer. You should submit this Withdrawal Form only if you now wish to change your decision and withdraw one or more of your tendered Eligible Options. Capitalized terms not defined herein shall have the meaning assigned to such terms in the Offer to Amend.

The Offer is currently set to expire at 11:59 p.m. Pacific Time on June 14, 2007 (the "Expiration Date"), unless KLA-Tencor, in its discretion, extends the period of time during which the Offer will remain open. In such event, the term "Expiration Date" will mean the latest time and date at which the Offer, as so extended, expires.

To withdraw your tendered Eligible Option(s), you must complete, sign and date this Withdrawal Form and submit it to KLA-Tencor via (i) facsimile to (408) 875-6677 or (ii) mail, courier or hand delivery to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy.

For your withdrawal to be effective, this Withdrawal Form must be received by KLA-Tencor by 11:59 p.m. Pacific Time on the Expiration Date.

Each withdrawn Eligible Option will continue to be governed by the 2004 Equity Incentive Plan under which that withdrawn Eligible Option was granted and by the existing Notice of Stock Option Grant and/or Stock Option Agreement between you and KLA-Tencor evidencing that option.

You should note that if you withdraw your tendered Eligible Option(s), such option(s) will not be amended or replaced, and you will not receive any Cash Bonus with respect to the withdrawn option(s). In addition, you will be solely responsible for bringing your Eligible Option(s) into compliance with IRC Section 409A in order to avoid adverse tax consequences with respect to such option(s). You will be solely be responsible for any penalty taxes, interest payments or other liabilities you may incur under IRC Section 409A with respect to the withdrawn Eligible Option(s).

If you wish to withdraw any tendered Eligible Option, please check the box below labeled "Withdraw This Eligible Option" next to each particular Eligible Option you wish to withdraw.

<u>Indicated Grant Date</u>	<u>Current Exercise Price Per Share</u>	<u>Actual Grant Date</u>	<u>Fair Market Value Per Share on Actual Grant Date</u>	<u>Total Number of Shares Subject to Outstanding Option</u>	<u>Number of Shares Qualifying as an Eligible Option</u>	<u>Withdraw This Eligible Option</u>
	\$		\$			<input type="checkbox"/>
	\$		\$			<input type="checkbox"/>

If you withdraw any of your tendered Eligible Option(s), you may again elect to tender the withdrawn Eligible Option(s) for amendment or replacement pursuant to the Offer by submitting a new Letter of Transmittal to KLA-Tencor via (i) facsimile to (408) 875-6677 or (ii) mail, courier or hand delivery to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy. For such tender to be effective, your new Letter of Transmittal must be received by KLA-Tencor by 11:59 p.m. Pacific Time on the Expiration Date.

Please read the instructions on pages 3 and 4 of this Withdrawal Form and then complete, sign and date this Withdrawal Form.

Signature: _____

Name (Please print): _____

Date: _____

KLA-TENCOR CORPORATION

INSTRUCTIONS TO THE WITHDRAWAL FORM
FORMING PART OF THE TERMS AND CONDITIONS OF THE OFFER

1. *Delivery of Withdrawal Form.* A properly completed and executed original of this Withdrawal Form, must be received by KLA-Tencor at the following address or via fax at the following number by 11:59 p.m., Pacific Time, on the Expiration Date:

For delivery by facsimile, you must use the following facsimile number: (408) 875-6677.

For delivery by mail, courier or hand delivery, the Withdrawal Form should be addressed to KLA-Tencor Corporation, 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy.

The delivery of all required documents, including the Withdrawal Form and any new Letter of Transmittal, is at your risk. Delivery will be deemed made only when actually received by KLA-Tencor. KLA-Tencor intends to confirm the receipt of your Withdrawal Form within two (2) U.S. business days. If you have not received such confirmation, it is your responsibility to ensure that your Withdrawal Form has been received by the Expiration Date.

By submitting the Withdrawal Form, you will have withdrawn one or more of your tendered Eligible Option(s) from the Offer, and the withdrawn option(s) will not be amended or replaced pursuant to the terms of the Offer. You should note that you may not rescind the withdrawal of your tendered Eligible Option(s). However, you may re-submit any withdrawn Eligible Option for amendment or replacement pursuant to the Offer, provided you do so before the Expiration Date. If KLA-Tencor extends the Offer beyond the Expiration Date, you may re-submit your withdrawn Eligible Option(s) at any time until the extended expiration of the Offer. You will not be deemed to have made a proper re-submission of your withdrawn Eligible Option(s) unless you deliver, prior to the Expiration Date, a new Letter of Transmittal following the procedures described in the instructions to the Letter of Transmittal. The new Letter of Transmittal must be signed and dated after your original Letter of Transmittal and any Withdrawal Form you have submitted. Upon the receipt of such a new, properly completed, signed and dated Letter of Transmittal, any previously submitted Letter of Transmittal or Withdrawal Form received by KLA-Tencor prior to the Expiration Date will be disregarded and will be considered replaced in full by the new Letter of Transmittal. You will be bound by the last properly submitted Letter of Transmittal or Withdrawal Form received by KLA-Tencor prior to the Expiration Date.

Although it is our intent to send you confirmation of receipt of this Withdrawal Form, by signing this Withdrawal Form you waive any right to receive any notice of the withdrawal of your tendered Eligible Option(s) from the Offer.

2. *Signatures on this Withdrawal Form.* This Withdrawal Form must be signed by the optionee.

3. *Other Information on this Withdrawal Form.* In addition to signing this Withdrawal Form, you must print your name (exactly as it appears on the Letter of Transmittal you previously submitted) and indicate the date on which you signed.

4. *Requests for Assistance or Additional Copies.* Any questions or requests for assistance, as well as requests for additional copies of the Offer to Amend, the Letter of Transmittal or this Withdrawal Form should be directed to Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com. Copies will be furnished promptly at KLA-Tencor's expense.

5. *Irregularities.* KLA-Tencor will determine, in its discretion, all questions as to the form of documents and the validity, form, eligibility (including time of receipt) and acceptance of any Withdrawal Forms. KLA-Tencor's determination of such matters will be final and binding on all parties. KLA-Tencor reserves the right to reject any Withdrawal Forms that it determines are not in appropriate form or that it determines are unlawful to accept. KLA-Tencor also reserves the right to waive any of the conditions of the Offer or any defect or irregularity in any Withdrawal Form, and KLA-Tencor's interpretation of the terms of the Offer (including these instructions) will be final and binding on all parties. No withdrawal of an Eligible Option will be deemed to have been properly made until all defects or irregularities have been cured by the withdrawing optionee or waived by KLA-Tencor. Neither KLA-Tencor nor any other person is obligated to give notice of any defects or irregularities in the Withdrawal Form and no person will incur any liability for failure to give any such notice.

6. *Additional Documents to Read.* You should be sure to read the Offer to Amend and all documents referenced therein, before making any decisions regarding participation in, or withdrawal from, the Offer.

7. *Important Tax Information.* You should refer to Sections 2 and 15 of the Offer and the “Risks of Participation in the Offer” section of the Offer to Amend which contain important U.S. federal income tax information. We also recommend that you consult with your own tax, legal and financial advisors before deciding whether or not to participate in the Offer.

IMPORTANT: THE WITHDRAWAL FORM MUST BE RECEIVED BY KLA-TENCOR, VIA MAIL, COURIER, HAND DELIVERY OR FACSIMILE BY 11:59 P.M. PACIFIC TIME ON THE EXPIRATION DATE.

FORMS OF ACKNOWLEDGEMENT OF RECEIPT OF LETTER OF TRANSMITTAL/WITHDRAWAL FORM**ACKNOWLEDGEMENT OF LETTER OF TRANSMITTAL**

KLA-Tencor Corporation ("KLA-Tencor") has received your Letter of Transmittal dated _____, 2007, by which you elected to tender your Eligible Option(s) for amendment or replacement pursuant to the terms and conditions of the Offer to Amend or Replace dated May 16, 2007 (the "Offer").

Should you change your mind, you may withdraw your tendered Eligible Option(s) by completing and signing a Withdrawal Form and sending it before 11:59 p.m., Pacific Time on June 14, 2007 (or any extended expiration date of the Offer) to KLA-Tencor Corporation via mail, courier or hand delivery to 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy or by facsimile at facsimile number (408) 875-6677. You may obtain a Withdrawal Form by contacting Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com. Only Withdrawal Forms that are complete, signed and actually received via facsimile, mail, courier or hand delivery by the deadline will be accepted. If you have questions concerning the submission of your form, please direct them to Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

Please note that KLA-Tencor's receipt of your Letter of Transmittal is not by itself an acceptance of your Eligible Option(s) for amendment or replacement. For purposes of the Offer, KLA-Tencor will be deemed to have accepted all properly tendered and unwithdrawn Eligible Options as of the date when KLA-Tencor provides the tendering optionees with notice of its acceptance of those options. Such notice may be made by press release, email or other method of communication. KLA-Tencor's formal acceptance is expected to take place shortly after the end of the offer period.

ACKNOWLEDGEMENT OF WITHDRAWAL FORM

KLA-Tencor Corporation ("KLA-Tencor") has received your Withdrawal Form dated _____, 2007, by which you withdrawn one or more Eligible Options you previously tendered for amendment or replacement pursuant to the Offer to Amend or Replace dated May 16, 2007 (the "Offer").

You may re-submit any withdrawn Eligible Option for amendment or replacement pursuant to the Offer, provided you do so before the Expiration Date. If KLA-Tencor extends the Offer beyond the Expiration Date, you may re-submit your withdrawn Eligible Option(s) at any time until the extended expiration date of the Offer. You will not be deemed to have made a proper re-submission of your withdrawn Eligible Option(s) unless you deliver, prior to the Expiration Date, a new Letter of Transmittal following the procedures described in the instructions to the Letter of Transmittal. The new Letter of Transmittal must be signed and dated after your original Letter of Transmittal and any Withdrawal Form you have submitted.

The new Letter of Transmittal may be submitted to KLA-Tencor via mail to KLA-Tencor Corporation via mail, courier or hand delivery to 160 Rio Robles, San Jose, California 95134, Attn: Tracy Laboy or by facsimile at facsimile number (408) 875-6677. Such submission must be made before 11:59 p.m., Pacific Time, on June 14, 2007 (or any extended expiration date of the Offer).

Form of Reminder of Expiration Date

REMINDER

DEADLINE: 11:59 P.M. (PDT) June 14, 2007

To all Employees Eligible to Participate in the Offer to Amend or Replace Eligible Options:

11:59 p.m. (PDT) on June 14, 2007 is presently the deadline for you to tender your Eligible Options for amendment or replacement pursuant to the formal offer made by KLA-Tencor Corporation to amend or replace those options dated May 16, 2007 (the "Offer"). The Offer document is located at the KLA-Tencor intranet at the following hyperlink: http://ca1blwssfe01:38681/corp/hr/hronline/finances/stock_grants/Stock%20Grants%20Documents%20and%20Forms/TO2.pdf

and you may obtain a printed copy of that document by contacting Tracy Laboy at (408) 875-7131 or tracy.laboy@kla-tencor.com.

If you decide to tender your Eligible Options for amendment or replacement, you must submit your Letter of Transmittal in accordance with the instructions attached to that document. The submission must be made by the deadline indicated above. We cannot accept late submissions, and we therefore urge you to respond early to avoid any last minute problems.

If you do not want to tender your Eligible Options, please disregard this reminder. However, you will have to take other action on your own to bring your Eligible Options into compliance with Section 409A of the Internal Revenue Code, if you are to avoid adverse tax consequences with respect to those options. Those adverse tax consequences are described in the Offer document. You will be solely responsible for any tax penalties, interest payments or other liabilities you incur under Section 409A (or applicable state tax laws) with respect to any Eligible Options you do not tender for amendment or replacement pursuant to the Offer.

This reminder is being distributed to all employees eligible to participate in the Offer. Accordingly you are receiving this notice even if you have previously submitted your Letter of Transmittal.

EMAIL TO INDIVIDUALS CHOOSING NOT TO TENDER ELIGIBLE OPTIONS

We show that you have elected not to tender one or more of your Eligible Options pursuant to the Tender Offer.

We want to make sure that you understand that your election not to tender means:

1. You agree that you will pay all additional Federal and State tax penalties with respect to the non-tendered options;
2. You decline the amendment or replacement of the non-tendered options; and
3. You decline the cash bonus payment, if applicable, in January of 2008.

If the above is not your intent, we encourage you to withdraw your election by and submitting a new, properly completed and signed Letter of Transmittal before June 14, 2007. If we extend the Offer beyond June 14, 2007, you must complete the process before the extended expiration date of the Offer.

**FORM OF NOTICE OF EXPIRATION OF OFFER, AMENDMENT OR REPLACEMENT
OF ELIGIBLE OPTIONS AND COMMITMENT TO PAY CASH BONUS**

To:

We are pleased to announce that we have completed our Offer to Amend or Replace Eligible Options. As a result of the Offer, we have amended outstanding Eligible Options covering _____ shares of KLA-Tencor common stock to increase the exercise price of each such option to the lower of (i) the fair market value per share of KLA-Tencor common stock on the actual grant date of that option or (ii) \$_____, the closing price per share of such common stock on the June __, 2007 amendment date. In addition, the participants whose Eligible Options have been so amended are now eligible to receive special cash bonuses in the aggregate amount of up to \$_____ to compensate them for the higher exercise prices per share in effect for their amended options.

In addition, we canceled tendered Eligible Options covering _____ shares of KLA-Tencor common stock because the adjusted exercise price would have been the same or lower than the exercise price in effect for those options prior to the amendment. In replacement of each such canceled option, we immediately granted a New Option that is exactly the same, including the same exercise price per share, but with a new grant date of June __, 2007.

The chart below lists each of your tendered Eligible Options that have been amended. The information in the chart confirms that the listed Eligible Options were validly submitted for amendment pursuant to the Offer and not otherwise withdrawn prior to the expiration date of the Offer. Accordingly, the adjusted exercise price per share now in effect for each of your amended Eligible Options is indicated below. Each of your amended options will continue to vest in accordance with the same vesting schedule measured from the same vesting commencement date currently in effect for that option. The amendment has no effect on the option's vesting schedule, exercise period, option term or any other term or provision of the option.

<u>Grant Date</u>	<u>Total Number of Shares Subject to Outstanding Option</u>	<u>Exercise Price Per Share Prior to Amendment</u>	<u>New Exercise Price Per Share Following Amendment</u>	<u>Number of Outstanding Option Shares Subject to Amended Exercise Price</u>	<u>Number of Outstanding Option Shares Not Subject to Amended Exercise Price</u>	<u>Special Bonus Payable in 2008</u>
		\$ _____	\$ _____			\$ _____
						Total Special Bonus Amount:
						\$ _____

In exchange for your agreement to amend your outstanding Eligible Option to the Adjusted Exercise Prices determined for those options, KLA-Tencor hereby irrevocably commits to pay you a special cash bonus in the amount of \$_____. The applicable provisions under Section 409A of the Internal Revenue Code do not permit the cash bonus to be paid in the same year in which the Eligible Options are amended. Therefore, the cash bonus will be paid on KLA-Tencor's first regularly scheduled payroll date following January 1, 2008, which is scheduled to be January 10, 2008. KLA-Tencor must withhold all applicable U.S. federal, state and local income and employment withholding taxes and other required payments, and you will receive only the portion of the payment remaining after

those taxes and payments have been withheld. You will receive your cash bonus even if your employment with KLA-Tencor terminates prior to the date on which the cash bonus is paid.

This commitment to pay you the special cash bonus is governed by the terms and conditions of the Offer as set forth in the Offer to Amend or Replace, the Letter of Transmittal and the Stock Option Amendment and Special Bonus Agreement (collectively, the "Offer Documents"), all of which are incorporated herein by reference. Accordingly, this commitment and the Offer Documents reflect the entire agreement between you and KLA-Tencor with respect to the amendment of your tendered Eligible Options.

Each New Option granted pursuant to you pursuant to the Offer is exactly the same as the tendered Eligible Option it replaced, including the same exercise price per share and no loss of vesting or change to the expiration date, but with a new grant date of June __, 2007. The chart below indicates which tendered Eligible Options were canceled and replaced with a New Option:

<u>Grant Date of Canceled Option</u>	<u>Total Number of Shares Subject to New Option</u>	<u>Exercise Price Per Share Prior to Cancellation</u>	<u>Same Exercise Price Per Share under New Option</u>
		\$	\$

KLA-TENCOR CORPORATION

By: _____

Title: _____

Date: _____

Option Grant Notification

To: «FIRST_NAME» «LAST_NAME»
 «EMAIL_ADDRESS»
 Employee ID: «ID»

Subject: Option Grant

Congratulations! We are pleased to inform you that the Board of Directors has granted to you a Non-Qualified Stock Option Number «NUM» for «SHARES_GRANTED» shares of KLA-Tencor Corporation common stock at XXXX per share. The date of grant of the option is XXXXX

Shares under this option become exercisable based upon your continuous full-time service as follows: 20% of the total shares granted become exercisable one year from XXXX. The remainder of the shares becomes exercisable at the rate of 1/48 of the remainder for each full month of continuous service thereafter. The option will be fully vested 60 months from XXXX, subject to your continued full-time service.

The vesting under this option for current or future continuous part-time service follows the schedule above and is pro rated based on your regular approved schedule of record, as follows:

≤ 4 hours	= 10%
5-8 hours	= 20%
9-12 hours	= 30%
13-16 hours	= 40%
17-20 hours	= 50%
21-24 hours	= 60%
25-28 hours	= 70%
29-32 hours	= 80%
33-36 hours	= 90%
> 36 hours	= 100%

Should you go on a leave of absence, your vesting will cease on the 1st day of your leave (unless otherwise required by law or as determined in writing by the Plan Administrator, in its sole discretion) and will recommence upon your return to work. Vesting will also cease on your termination of employment for any reason, including pursuant to a reduction-in-force.

The option will expire on XXXXXX. Any unvested options due to either part-time status or leave of absence and/or vested options not exercised on or prior to the expiration date shall expire. Vested options may be exercised up to 3 months after terminating employment with KLA-Tencor. After that date, all options will be cancelled.

The grant of an Option and the issuance of Shares upon exercise of the Option are subject to compliance with all of the applicable requirements of all laws or regulations with respect to such options. Neither the grant of this option nor the vesting schedule alter the terms of your employment, which remain at-will and subject to termination by KLA-Tencor or you at any time, with or without cause or notice.

For the other terms and conditions relating to your stock option, please see the EIP4 Stock Option Plan Document on the Employee Stock Services Web-site. Both of these can be accessed through the KLA-Tencor Intranet site: [XXXXXXXX](#)

Questions should be directed to XXXXXXXX or via e-mail at XXXXXXXX

THIS MEMO IS YOUR OFFICIAL NOTIFICATION OF THIS STOCK GRANT. NO ADDITIONAL DOCUMENTATION WILL BE SENT TO YOU CONCERNING THIS GRANT.