



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

Mail Stop 3030

March 17, 2009

VIA U.S. MAIL and FACSIMILE

Mr. Maurice E. Carson
Senior Vice President and Chief Financial Officer
Kulicke and Soffa Industries, Inc.
1005 Virginia Drive
Fort Washington, PA 19034

RE: **Kulicke and Soffa Industries, Inc.**
Form 10-K for the fiscal year ended September 27, 2008
Filed December 11, 2008
File No. 0-00121

Dear Mr. Carson:

We have reviewed your filing and have the following comments. Where indicated, we think you should revise your document in future filings in response to these comments. If you disagree, we will consider your explanation as to why our comment is inapplicable or a revision is unnecessary. Please be as detailed as necessary in your explanation. In some of our comments, we may ask you to provide us with information so we may better understand your disclosure. After reviewing this information, we may raise additional comments.

Please understand that the purpose of our review process is to assist you in your compliance with the applicable disclosure requirements and to enhance the overall disclosure in your filing. We look forward to working with you in these respects. We welcome any questions you may have about our comments or on any other aspect of our review. Feel free to call us at the telephone numbers listed at the end of this letter.

Form 10-K as of September 27, 2008

Schedule II – Valuation and Qualifying Accounts, page 89

1. We note you reclassified fully depreciated demonstration and evaluation equipment from inventory to property, plant and equipment in the amount of \$3.3 million during fiscal year 2008. Please tell us more about this reclassification. Also, clarify why demonstration units included in inventory were depreciated instead of valued using estimated net realizable value, in accordance with ARB 43. Support that your current accounting complies with GAAP.

Form 10-Q for the quarterly period ended December 27, 2008

Note 2. Discontinued Operations, page 11

2. We note on September 29, 2008 that you completed the sale of your wire business for gross proceeds of \$155.0 million. We also note that in conjunction with the sale, you entered into a joint development and engineering services agreement (“the Agreement”) with the purchaser. The agreement, among other things, indicates that you will continue to provide process engineering and research and development activities for the business for five years and additional transitional services for at least one year to the purchaser. We also note that you collected cash on behalf of the purchaser totaling \$5.8 million as of December 27, 2008. In light of the provisions of the agreement and your continuing involvement in the operations, please tell us why you believe your presentation as discontinued operations is appropriate. Note that any significant continuing involvement in the operations of the component after the disposal transaction would preclude discontinued operations reporting. Refer to the guidance in paragraph 42 of SFAS 144 and EITF 03-13 in your response.

Note 5. Goodwill and Intangible Assets, page 14

3. We note your disclosure that “no triggering events have occurred during fiscal year 2009” that would have the effect of reducing the fair value of goodwill below its carrying value. Please explain how you analyzed the difference between your market capitalization and your book value of your equity to conclude that an impairment test was not necessary. Explain any qualitative and quantitative factors you considered (e.g. reconciliation).

Note 9. Shareholder's Equity, page 20

4. We note that your "total equity-based compensation expense" for the three months ended December 27, 2008 reflects a "reversal of expense." Please tell us more about this reversal and refer to the GAAP literature that supports your accounting.

As appropriate, please respond to these comments within 10 business days or tell us when you will provide us with a response. Please furnish a cover letter with your response that keys your responses to our comments and provides any requested information. Detailed cover letters greatly facilitate our review. Please submit your cover letter on EDGAR. Please understand that we may have additional comments after reviewing your responses to our comments.

We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filing to be certain that the filing includes all information required under the Securities Exchange Act of 1934 and that they have provided all information investors require for an informed investment decision. Since the company and its management are in possession of all facts relating to a company's disclosure, they are responsible for the accuracy and adequacy of the disclosures they have made.

In connection with responding to our comments, please provide, in writing, a statement from the company acknowledging that:

- the company is responsible for the adequacy and accuracy of the disclosure in the filings;
- staff comments or changes to disclosure in response to staff comments do not foreclose the Commission from taking any action with respect to the filing; and
- the company may not assert staff comments as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States.

In addition, please be advised that the Division of Enforcement has access to all information you provide to the staff of the Division of Corporation Finance in our review of your filing or in response to our comments on your filing.

You may contact Dennis Hult, Staff Accountant, at (202) 551-3618 or me at (202) 551-3554 if you have questions regarding comments on the financial statements and related matters. In this regard, do not hesitate to contact Martin James, Senior Assistant Chief Accountant, at (202) 551-3671.

Maurice E. Carson
Kulicke and Soffa Industries, Inc.
March 17, 2009
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Sincerely,

Angela J. Crane
Accounting Branch Chief