January 31, 2017

VIA EDGAR AND HAND DELIVERY

Mr. Gary Newberry Office of Electronics and Machinery Division of Corporation Finance U.S. Securities and Exchange Commission 100 F Street, N.E. Washington, D.C. 20549

> SolarEdge Technologies, Inc. Form 10-K for the Fiscal Year Ended June 30, 2016 Filed August 17, 2016 Form 10-Q for the Fiscal Quarter Ended September 30, 2016 Filed November 9, 2016 File No. 001-36894

Dear Mr. Newberry:

Re:

On behalf of SolarEdge Technologies, Inc. (the "<u>Company</u>"), this letter responds to your letter, dated January 27, 2017 (the "<u>Comment Letter</u>"), regarding the above-referenced Annual Report on Form 10-K for the fiscal year ended June 30, 2016 (the "<u>Annual Report</u>"), filed with the Securities Exchange Commission (the "Commission") on August 17, 2016, and Quarterly Report on Form 10-Q for the fiscal quarter ended September 30, 2016 (the "<u>Quarterly Report</u>"), filed with the Commission on November 9, 2016. Each comment of the Staff of the Division of Corporation Finance (the "<u>Staff</u>") is set forth below, followed by the corresponding response. For ease of reference, the headings and numbered paragraphs below correspond to the headings and numbered comments in the Comment Letter. Each response of the Company is set forth in ordinary type beneath the corresponding comment of the Staff appearing in bold type.

Form 10-K for the Fiscal Year Ended June 30, 2016

Exhibits 32.1 and 32.2

1. We note that your Section 906 certifications are not dated. Please file a full amendment to your June 30, 2016 Form 10-K that includes the entire filing, including Exhibit 31 certifications, together with corrected Exhibit 32 certifications that are dated as of the date you file the amendment.

Response No. 1: The Company respectfully acknowledges the Staff's comment and advises the Staff that the Company has filed a full amendment to the Annual Report, which amendment includes Section 906 certifications that are dated.

Form 10-Q for the Fiscal Quarter Ended September 30, 2016

Exhibits 31.1 and 31.2

2. We note these certifications do not include paragraph 4(b) and the introductory language in paragraph 4 referring to internal control over financial reporting after the end of the transition period that allows for these omissions. Please amend the filing to provide revised certifications. You may file an abbreviated amendment that is limited to the cover page, explanatory note, signature page and paragraphs 1, 2, 4 and 5 of the certification.

Response No. 2: The Company respectfully acknowledges the Staff's comment and advises the Staff that it inadvertently omitted certain statements from the certifications filed as Exhibit 31.1 and 31.2 to the Quarterly Report. As requested by the Staff, the Company has filed an abbreviated amendment to the Quarterly Report, which includes the requested paragraphs of such certifications. The Company further acknowledges that the certifications, in the form filed with the amendments to the Quarterly Report, were each true and correct as of the original filing date of the Quarterly Report.

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We would be pleased to address any further Staff comments or questions related to the above matters. If the Staff wishes to discuss this letter at any time, please do not hesitate to contact Rachel Prishkolnik, General Counsel, at (972) 9-9576620 or our counsel at Gibson, Dunn & Crutcher LLP, John Gaffney at (212) 351-2626 or Eric Scarazzo at (212) 351-2389.

Very truly yours,

/s/ Ronen Faier

Ronen Faier Chief Financial Officer

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