

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

SCHEDULE 13G

Under the Securities Exchange Act of 1934

(Amendment No. _____)

Tower Semiconductor Ltd.

(Name of Issuer)

Ordinary Shares, NIS 1.00 par value per share

(Title of Class of Securities)

M87915-10-0

(CUSIP Number)

June 3, 2011

(Date of Event which Requires Filing of this Statement)

Check the appropriate box to designate the rule pursuant to which this Schedule is filed:

☐ Rule 13d-1(b)

☒ Rule 13d-1(c)

☐ Rule 13d-1(d)

*The remainder of this cover page shall be filled out for a reporting person's initial filing on this form with respect to the subject class of securities, and for any subsequent amendment containing information which would alter the disclosures provided in a prior cover page.

The information required in the remainder of this cover page shall not be deemed to be "filed" for the purpose of Section 18 of the Securities Exchange Act of 1934 ("Act") or otherwise subject to the liabilities of that section of the Act but shall be subject to all other provisions of the Act (however, see the Notes).

CUSIP No. M87915-10-0

1. Names of Reporting Persons.

Micron Technology, Inc.

2. Check the Appropriate Box if a Member of a Group (See Instructions)

(a) ☐

(b) ☐

3. SEC Use Only

4. Citizenship or Place of Organization State of Delaware

Number of Shares 5. Sole Voting Power 19,678,322

Beneficially

Owned by Each

Reporting Person

With:

6. Shared Voting Power

7. Sole Dispositive Power 19,678,322

8. Shared Dispositive Power

9. Aggregate Amount Beneficially Owned by Each Reporting Person 19,678,322 ordinary shares

10. Check if the Aggregate Amount in Row (9) Excludes Certain Shares (See Instructions)

11. Percent of Class Represented by Amount in Row (9) 6.7%*

12. Type of Reporting Person (See Instructions)

CO

* Percentage is obtained by dividing (i) 19,678,322 by (ii) 295,152,170, representing the number of ordinary shares of Tower Semiconductor Ltd. ("Tower") issued and outstanding as of May 25, 2011, based upon information provided by Tower to Micron Technology, Inc.

Item 1.

(a) Name of Issuer

Tower Semiconductor Ltd. ("Tower")

(b) Address of Issuer's Principal Executive Offices

Ramat Gavriel Industrial Park, P.O. Box 619, Migdal Haemek 23105, Israel

Item 2.

(a) Name of Person Filing

Micron Technology, Inc. ("Micron")

(b) Address of Principal Business Office or, if none, Residence

8000 South Federal Way, Boise, Idaho 83716-9632

(c) Citizenship

Micron is incorporated in the State of Delaware

(d) Title of Class of Securities

Ordinary Shares, NIS 1.00 par value per share

(e) CUSIP Number

M87915-10-0

Item 3. If this statement is filed pursuant to §§240.13d-1(b) or 240.13d-2(b) or (c), check whether the person filing is a:

- (a) o** Broker or dealer registered under Section 15 of the Act (15 U.S.C 78o).
- (b) o** Bank as defined in Section 3(a)(6) of the Act (15 U.S.C 78c).
- (c) o** Insurance company as defined in Section 3(a)(19) of the Act (15 U.S.C 78c).
- (d) o** Investment company registered under Section 8 of the Investment Company Act of 1940 (15 U.S.C 80a-8).
- (e) o** An investment adviser in accordance with §240.13d-1(b)(1)(ii)(E);
- (f) o** An employee benefit plan or endowment fund in accordance with §240.13d-1(b)(1)(ii)(F);
- (g) o** A parent holding company or control person in accordance with §240.13d-1(b)(1)(ii)(G);
- (h) o** A savings association as defined in Section 3(b) of the Federal Deposit Insurance Act (12 U.S.C. 1813);
- (i) o** A church plan that is excluded from the definition of an investment company under Section 3(c)(14) of the Investment Company Act of 1940 (15 U.S.C 80a-3);
- (j) o** A non-U.S. institution in accordance with §240.13d-1(b)(1)(ii)(J);
- (k) o** Group, in accordance with §240.13d-1(b)(1)(ii)(K).

If filing as a non-U.S. institution in accordance with §240.13d-1(b)(1)(ii)(J), please specify the type of institution: _____.

Not applicable

Item 4. Ownership

Provide the following information regarding the aggregate number and percentage of the class of securities of the issuer identified in Item 1.

(a) Amount beneficially owned:

19,678,322 ordinary shares

(b) Percent of class:

6.7%*

(c) Number of shares as to which the person has:

(i) Sole power to vote or to direct the vote

19,678,322 ordinary shares

(ii) Shared power to vote or to direct the vote

None

(iii) Sole power to dispose or to direct the disposition of

19,678,322 ordinary shares

(iv) Shared power to dispose or to direct the disposition of

None

* Percentage is obtained by dividing (i) 19,678,322 by (ii) 295,152,170, representing the number of ordinary shares of Tower issued and outstanding as of May 25, 2011, based upon information provided by Tower to Micron.

Micron acquired the Tower ordinary shares in connection with a Master Agreement dated as of May 25, 2011, by and among Micron, Micron Japan, Ltd. and Tower, pursuant to which Tower acquired Micron Japan's fabrication facility in Nishiwaki City, Hyogo, Japan.

Item 5. Ownership of Five Percent or Less of a Class

Not applicable

Item 6. Ownership of More than Five Percent on Behalf of Another Person

Not applicable

Item 7. Identification and Classification of the Subsidiary Which Acquired the Security Being Reported on By the Parent Holding Company or Control Person

Not applicable

Item 8. Identification and Classification of Members of the Group

Not applicable

Item 9. Notice of Dissolution of Group

Not applicable

Item 10. Certifications

By signing I certify that, to the best of my knowledge and belief, the securities referred to above were not acquired and are not held for the purpose of or with the effect of changing or influencing the control of the issuer of the securities and were not acquired and are not held in connection with or as a participant in any transaction having that purpose or effect.

SIGNATURE

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

Date: June 10, 2011

MICRON TECHNOLOGY, INC.

By: /s/ Ronald C. Foster

Name: Ronald C. Foster

Title: Chief Financial Officer and
Vice President of Finance