

SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, D.C. 20549

FORM S-8
Registration Statement
Under
The Securities Act of 1933

KADANT INC.
(Exact name of registrant as specified in its charter)

DELAWARE
(State or other jurisdiction of
incorporation or organization)

52-1762325
(I.R.S. Employer
Identification Number)

245 Winter Street
Waltham, Massachusetts 02451
(Address of Principal Executive Offices) (Zip Code)

EQUITY INCENTIVE PLAN

(Full Title of the Plan)

Sandra L. Lambert, Secretary
Kadant Inc.
245 Winter Street
Waltham, Massachusetts 02451
(Name and Address of Agent for Service)

(781) 370-1650
(Telephone Number, Including Area Code, of Agent For Service)

CALCULATION OF REGISTRATION FEE

Title of securities to be registered	Amount to be registered	Proposed Maximum Offering Price Per Share	Proposed Maximum Aggregate Offering Price	Amount of Registration Fee
Common Stock, \$0.01 par value per share	1,600,000 shares	\$15.005(1)	\$24,008,000 (1)	\$6,002

In addition, pursuant to Rule 416(c) under the Securities Act of 1933, this Registration Statement also covers an indeterminate number of shares of Kadant's common stock as may be issuable in connection with adjustments under the employee benefit plan described herein to reflect certain changes in Kadant's capital structure, including stock dividends or stock splits.

(1) Estimated solely for the purpose of calculating the amount of the registration fee in accordance with Rule 457(h) under the Securities Act of 1933. The calculation of the proposed maximum aggregate offering price has been based upon (1) the registration hereunder of an aggregate of 1,600,000 shares and (2) the average of the high and low sales prices, \$16.50 and \$13.51, respectively, of Kadant's common stock on the American Stock Exchange on July 13, 2001 as reported in the consolidated transaction reporting system.

EXPLANATORY NOTE

This Registration Statement is filed pursuant to General Instruction E of Form S-8 in order to register additional securities of the same class as other securities for which a registration statement relating to Kadant's Equity Incentive Plan is effective. All share numbers in this Registration Statement reflect a one for five reverse stock split effected on July 12, 2001.

On September 7, 1994, Kadant (under its former name, Thermo Fibertek Inc.) filed a registration statement on Form S-8 (Reg. No. 33-83718) to register an aggregate of 200,000 shares of Common Stock reserved for issuance under the Equity Incentive Plan (as subsequently adjusted by stock splits to 450,000 shares). The filing of this Registration Statement increases the number of shares registered for issuance under the Equity Incentive Plan by 1,600,000. The contents of the previously filed registration statement relating to the Equity Incentive Plan are incorporated herein by reference except for the items that are set forth below. Pursuant to Instruction E, this Registration Statement contains such information required by Form S-8 that is not otherwise included in the previous registration statement.

PART I

INFORMATION REQUIRED IN THE SECTION 10(a) PROSPECTUS

The information required by Part I is included in documents sent or given to the participants in the plan registered hereunder pursuant to Rule 428(b)(1) under the Securities Act of 1933, as amended.

PART II

INFORMATION REQUIRED IN THE REGISTRATION STATEMENT

Item 3. Incorporation of Documents by Reference.

Kadant is subject to the informational and reporting requirements of Sections 13(a), 13(c), 14 and 15(d) of the Securities Exchange Act of 1934, as amended, and in accordance therewith files reports, proxy statements and other information with the Securities and Exchange Commission. The following documents, which are on file with the Commission, are incorporated in this Registration Statement by reference:

- (a) Kadant's Annual Report on Form 10-K for the fiscal year ended December 30, 2000 (filed under Kadant's former name, Thermo Fibertek Inc.).

- (b) Kadant's Quarterly Report on Form 10-Q for the quarter ended March 31, 2001 (filed under Kadant's former name, Thermo Fibertek Inc.).
- (c) Kadant's Current Report on Form 8-K filed with the Commission on June 19, 2001 (filed under Kadant's former name, Thermo Fibertek Inc.).
- (d) Kadant's Current Report on Form 8-K filed with the Commission on July 12, 2001.
- (e) The description of the common stock which is contained in Kadant's Registration Statement on Form 8-A filed under the Exchange Act, as such description may be amended from time to time.

All reports or proxy statements filed by Kadant pursuant to Sections 13(a), 13(c), 14 and 15(d) of the Exchange Act subsequent to the date of this Registration Statement and prior to the filing of a post-effective amendment that indicates that all securities offered herein have been sold, or that deregisters all such securities then remaining unsold, shall be deemed to be incorporated by reference in this Registration Statement and to be a part hereof from the respective dates of filing of such documents.

Item 4. Description of Securities.

Not applicable.

Item 5. Interests of Named Experts and Counsel.

The validity of the common stock offered hereby has been passed upon by John A. Piccione, Esq., Deputy General Counsel of Kadant. Mr. Piccione is a full-time employee of Thermo Electron and owns or has the right to acquire 57,933 shares of the common stock of Thermo Electron.

Item 6. Indemnification of Directors and Officers.

The Delaware General Corporation Law and Kadant's Certificate of Incorporation and By-Laws limit the monetary liability of directors to Kadant and to its stockholders and provide for indemnification of Kadant's officers and directors for liabilities and expenses that they may incur in such capacities. In general, officers and directors are indemnified with respect to actions taken in good faith in a manner reasonably believed to be in, or not opposed to, the best interests of Kadant and, with respect to any criminal action or proceeding, actions that the indemnitee had no reasonable cause to believe were unlawful. Kadant also has indemnification agreements with its directors and officers that provide for the maximum indemnification allowed by law.

Thermo Electron has an insurance policy which insures the directors and officers of Thermo Electron and its subsidiaries, including Kadant, against certain liabilities which might be incurred in connection with the performance of their duties.

Item 7. Exemption from Registration Claimed.

Not Applicable.

Item 8. Exhibits.

The Exhibit Index immediately preceding the exhibits is attached hereto and incorporated herein by reference.

Item 9. Undertakings.

(a) The undersigned Registrant hereby undertakes:

(1) To file, during any period in which offers or sales are being made, a post-effective amendment to this registration statement:

(i) To include any prospectus required by Section 10(a)(3) of the Securities Act of 1933;

(ii) To reflect in the prospectus any facts or events arising after the effective date of the registration statement (or the most recent post-effective amendment thereof) which, individually or in the aggregate, represent a fundamental change in the information set forth in the registration statement. Notwithstanding the foregoing, any increase or decrease in volume of securities offered (if the total dollar value of securities offered would not exceed that which was registered) and any deviation from the low or high end of the estimated maximum offering range may be reflected in the form of prospectus filed with the Commission pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than 20 percent change in the maximum aggregate offering price set forth in the "Calculation of Registration Fee" table in the effective registration statement;

(iii) To include any material information with respect to the plan of distribution not previously disclosed in the registration statement or any material change to such information in the registration statement.

Provided, however, that paragraphs (a)(1)(i) and (a)(1)(ii) do not apply if the information required to be included in a post-effective amendment by those paragraphs is contained in periodic reports filed with or furnished to the Commission by Kadant pursuant to Section 13 or Section 15(d) of the Securities Exchange Act of 1934 that are incorporated by reference in the registration statement.

(2) That, for the purpose of determining any liability under the Securities Act of 1933, each such post-effective amendment shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(3) To remove from registration by means of a post-effective amendment any of the securities being registered which remain unsold at the termination of the offering.

(b) The undersigned Registrant hereby undertakes that, for purposes of determining any liability under the Securities Act of 1933, each filing of Kadant's annual report pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934 (and, where applicable, each filing of an employee benefit plan's annual report pursuant to Section 15(d) of the Securities Exchange Act of 1934) that is incorporated by reference in the registration statement shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(c) Insofar as indemnification for liabilities arising under the Securities Act of 1933 may be permitted to directors, officers and controlling persons of Kadant pursuant to the foregoing provisions, or otherwise, Kadant has been advised that in the opinion of the Securities and Exchange Commission such indemnification is against public policy as expressed in the Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by Kadant of expenses incurred or paid by a director, officer or controlling person of Kadant in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, Kadant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Act and will be governed by the final adjudication of such issue.

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, Kadant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-8 and has duly caused this Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Waltham, Commonwealth of Massachusetts, on this 16th day of July, 2001.

KADANT INC.

By: /s/ William A. Rainville

William A. Rainville
Its: President, Chief Executive Officer
and Director

POWER OF ATTORNEY

Each of the undersigned Directors and Officers of Kadant Inc. hereby appoints William A. Rainville, Sandra L. Lambert and Theo Melas-Kyriazi and each of them, his true and lawful attorneys-in-fact and agents, with full power of substitution, for him and in his name, place and stead, in any and all capacities, to sign any and all amendments (including post-effective amendments) to this Registration Statement, and to file the same, with all exhibits thereto, and all documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorneys-in-fact and agents, and each of them, full power and authority to do and perform each and every act and thing requisite and necessary to be done in and about the premises, as fully to all intents and purposes as he might or could do in person, hereby ratifying and confirming all that said attorneys-in-fact and agents or any of them, or their or his substitute or substitutes, may lawfully do or cause to be done by virtue thereof.

Pursuant to the requirements of the Securities Act of 1933, this Registration Statement has been signed below by the following persons in the capacities and on the dates indicated:

Signature	Title	Date
/s/ William A. Rainville ----- William A. Rainville	President, Chief Executive Officer and Director (Principal Executive Officer)	July 16, 2001
/s/ Theo Melas-Kyriazi ----- Theo Melas-Kyriazi	Vice President and Chief Financial Officer (Principal Financial and Accounting Officer)	July 16, 2001
/s/ John M. Albertine ----- John M. Albertine	Director	July 16, 2001
/s/ Francis L. McKone ----- Francis L. McKone	Director	July 16, 2001
/s/ Donald E. Noble ----- Donald E. Noble	Director	July 16, 2001
/s/ Richard F. Syron ----- Richard F. Syron	Director	July 16, 2001

EXHIBIT INDEX

Exhibit Number	Description
5	Opinion of John A. Piccione, Esq. regarding legality.
23.1	Consent of Arthur Andersen LLP
23.2	Consent of John A. Piccione, Esq. (contained in his opinion filed as Exhibit 5).
24	Power of Attorney (see signature pages to this Registration Statement).

Kadant Inc.
245 Winter Street
Waltham, Massachusetts 02451

July 16, 2001

Kadant Inc.
245 Winter Street
Waltham, Massachusetts 02451

Re: Registration Statement on Form S-8 Relating
to 1,600,000 Shares of the Common Stock,
\$1.00 par value, of Kadant Inc.

Dear Sirs:

I am Deputy General Counsel to Kadant Inc., a Delaware corporation, and have acted as counsel in connection with the registration under the Securities Act of 1933, as amended, on Form S-8 (the "Registration Statement"), of 1,600,000 shares of Kadant's Common Stock, \$.01 par value per share (the "Shares") subject to Kadant's Equity Incentive Plan (the "Plan").

I or a member of Kadant's Legal Department have reviewed the corporate proceedings taken by Kadant with respect to the authorization of the issuance of the Shares. I or a member of Kadant's Legal Department have also examined and relied upon originals or copies, certified or otherwise authenticated to my satisfaction, of all corporate records, documents, agreements or other instruments of Kadant and have made all investigations of law and have discussed with Kadant's representatives all questions of fact that I have deemed necessary or appropriate.

Based upon and subject to the foregoing, I am of the opinion that:

1. Kadant is a corporation validly existing and in corporate good standing under the laws of the State of Delaware.
2. The issuance and sale of the Shares as contemplated in the Registration Statement have been duly authorized by Kadant.
3. The Shares, when issued and sold in accordance with the provisions of the Plan, will be validly issued, fully paid and nonassessable.

This opinion is limited to the applicable provisions of the Delaware Constitution, the General Corporation Law of the State of Delaware ("Delaware Law") and reported judicial decisions interpreting Delaware Law.

I hereby consent to the filing of this opinion as Exhibit 5 to the Registration Statement.

Very truly yours,

/s/ John A. Piccione

John A. Piccione
Deputy General Counsel

Consent of Independent Public Accountants

As independent public accountants, we hereby consent to the incorporation by reference in this registration statement on Form S-8 of our report dated February 12, 2001 (except for the matters discussed in Note 18, as to which the date is July 12, 2001), included in Kadant Inc.'s Current Report on Form 8-K dated July 12, 2001.

Arthur Andersen LLP

Boston, Massachusetts
July 12, 2001