

AS FILED WITH THE SECURITIES AND EXCHANGE COMMISSION ON JUNE 11, 1999

REGISTRATION NO. 333-80375

SECURITIES AND EXCHANGE COMMISSION
WASHINGTON, D.C. 20549

PRE-EFFECTIVE AMENDMENT NO. 2
TO

FORM S-4
REGISTRATION STATEMENT
UNDER
THE SECURITIES ACT OF 1933

CIENA CORPORATION
(EXACT NAME OF REGISTRANT AS SPECIFIED IN ITS CHARTER)

DELAWARE
(STATE OR OTHER JURISDICTION OF
INCORPORATION OR ORGANIZATION)

3661
(PRIMARY STANDARD INDUSTRIAL
CLASSIFICATION CODE NUMBER)

23-2725311
(I.R.S. EMPLOYER
IDENTIFICATION NUMBER)

1201 WINTERSON ROAD
LINTHICUM, MD 21090
(410) 865-8500
(ADDRESS, INCLUDING ZIP CODE, AND TELEPHONE NUMBER, INCLUDING
AREA CODE, OF REGISTRANT'S PRINCIPAL EXECUTIVE OFFICES)

G. ERIC GEORGATOS
SENIOR VICE PRESIDENT, GENERAL COUNSEL AND SECRETARY
1201 WINTERSON ROAD
LINTHICUM, MD 21090
(410) 865-8500
(NAME, ADDRESS, INCLUDING ZIP CODE, AND TELEPHONE NUMBER,
INCLUDING AREA CODE, OF AGENT FOR SERVICE)

Copies to:

MICHAEL J. SILVER
AMY BOWERMAN FREED
HOGAN & HARTSON L.L.P.
111 SOUTH CALVERT STREET
BALTIMORE, MD 21202
(410) 659-2700

PETER B. TARR
HALE AND DORR LLP
60 STATE STREET
BOSTON, MA 02109
(617) 526-6000

APPROXIMATE DATE OF COMMENCEMENT OF PROPOSED SALE TO THE PUBLIC: As soon as practicable after this Registration Statement becomes effective.

If the securities being registered on this Form are being offered in connection with the formation of a holding company and there is compliance with General Instruction G, check the following box. []

If this Form is filed to register additional securities for an offering pursuant to Rule 462(b) under the Securities Act of 1933, please check the following box and list the Securities Act of 1933 registration statement number of the earlier effective registration statement for the same offering. []

If this Form is a post-effective amendment filed pursuant to Rule 462(d) under the Securities Act of 1933, check the following box and list the Securities Act of 1933 registration statement number of the earlier effective registration statement for the same offering. []

THE REGISTRANT HEREBY AMENDS THIS REGISTRATION STATEMENT ON SUCH DATE OR DATES AS MAY BE NECESSARY TO DELAY ITS EFFECTIVE DATE UNTIL THE REGISTRANT SHALL FILE A FURTHER AMENDMENT WHICH SPECIFICALLY STATES THAT THIS REGISTRATION STATEMENT SHALL THEREAFTER BECOME EFFECTIVE IN ACCORDANCE WITH SECTION 8(a) OF THE SECURITIES ACT OF 1933, OR UNTIL THE REGISTRATION STATEMENT SHALL BECOME EFFECTIVE ON SUCH DATE AS THE COMMISSION, ACTING PURSUANT TO SAID SECTION 8(a), MAY DETERMINE.

PART II

INFORMATION NOT REQUIRED IN PROSPECTUS

ITEM 20. INDEMNIFICATION OF DIRECTORS AND OFFICERS

Under Section 145 of the Delaware General Corporation Law ("DGCL"), a corporation may indemnify its directors, officers, employees and agents and its former directors, officers, employees and agents and those who serve, at the corporation's request, in such capacities with another enterprise, against expenses (including attorneys' fees), as well as judgments, fines and settlements in nonderivative lawsuits, actually and reasonably incurred in connection with the defense of any action, suit or proceeding in which they or any of them were or are made parties or are threatened to be made parties by reason of their serving or having served in such capacity. The DGCL provides, however, that such person must have acted in good faith and in a manner such person reasonably believed to be in (or not opposed to) the best interests of the corporation and, in the case of a criminal action, such person must have had no reasonable cause to believe his or her conduct was unlawful. In addition, the DGCL does not permit indemnification in an action or suit by or in the right of the corporation, where such person has been adjudged liable to the corporation, unless, and only to the extent that, a court determines that such person fairly and reasonably is entitled to indemnity for costs the court deems proper in light of liability adjudication. Indemnity is mandatory to the extent a claim, issue or matter has been successfully defended.

The Amended and Restated Certificate of Incorporation of CIENA (the "CIENA Certificate") contains provisions that provide that no director of CIENA shall be liable for breach of fiduciary duty as a director except for (1) any breach of the directors' duty of loyalty to CIENA or its stockholders; (2) acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of the law; (3) liability under Section 174 of the DGCL; or (4) any transaction from which the director derived an improper personal benefit. The CIENA Certificate contains provisions that further provide for the indemnification of directors and officers to the fullest extent permitted by the DGCL. Under the Bylaws of CIENA, CIENA is required to advance expenses incurred by an officer or director in defending any such action if the director or officer undertakes to repay such amount if it is determined that the director or officer is not entitled to indemnification. In addition, CIENA has entered into indemnity agreements with each of its directors pursuant to which CIENA has agreed to indemnify the directors as permitted by the DGCL. CIENA has obtained directors and officers liability insurance against certain liabilities, including liabilities under the Securities Act.

ITEM 21. EXHIBITS AND FINANCIAL STATEMENT SCHEDULES

(a) EXHIBITS

2.1	Merger Agreement (included as Appendix A to the prospectus/proxy statement)
2.2	Form of Escrow Agreement (included as Appendix C to the prospectus/proxy statement)
2.3(4)	Form of Stockholder Voting Agreement
4.1(1)	Specimen Stock Certificate
4.2(2)	Rights Agreement dated December 29, 1997
4.3(3)	Amendment to Rights Agreement
5.1	Hogan & Hartson L.L.P. Opinion
8.1	Hale and Dorr LLP Tax Opinion
23.1(4)	Consent of Independent Accountants
23.2(4)	Consent of Independent Accountants
23.3	Consent of Hogan & Hartson L.L.P. (included in Exhibit 5.1)
23.4	Consent of Hale and Dorr LLP (included in Exhibit 8.1)
99.1(4)	Form of Proxy Card

-
- (1) Incorporated by reference from the Company's Registration Statement on Form S-1 (333-17729).
- (2) Incorporated by reference to the Company's Form 8-K dated December 29, 1997.
- (3) Incorporated by reference to the Company's Form 8-K dated October 14, 1998.
- (4) Previously filed on June 10, 1999 as exhibits to the Company's Registration Statement on Form S-4 (SEC File No. 333-80375).

(B) FINANCIAL STATEMENT SCHEDULES

None

(C) REPORTS, OPINIONS OR APPRAISALS

None

ITEM 22. UNDERTAKINGS

Insofar as indemnification for liabilities arising under the Securities Act may be permitted to directors, officers and controlling persons of the registrant pursuant to the foregoing provisions, or otherwise, the registrant has been advised that in the opinion of the Securities and Exchange Commission such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the registrant of expenses incurred or paid by a director, officer or controlling person of the registrant 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, the registrant 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 Securities Act and will be governed by the final adjudication of such issue.

The undersigned registrant hereby undertakes to respond to requests for information that is incorporated by reference into the prospectus pursuant to Items 4, 10(b), 11 or 13 of this Form, within one business day of receipt of such request, and to send the incorporated documents by first class mail or other equally prompt means. This includes information contained in documents filed subsequent to the effective date of this Registration Statement through the date of responding to the request.

The undersigned registrant hereby undertakes to supply by means of a post-effective amendment all information concerning a transaction, and the company being acquired involved therein, that was not the subject of and included in this Registration Statement when it became effective.

The undersigned registrant hereby undertakes to file, during any period in which offers or sales are being made, a post-effective amendment to this Registration Statement:

- to include any prospectus required by Section 10(a)(3) of the Securities Act of 1933 (the "Securities Act");
- to reflect in the prospectus any facts or events arising after the effective date of this Registration Statement (or the most recent post-effective amendment hereof) which, individually or in the aggregate, represents a fundamental change in the information set forth in this 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 Securities and Exchange Commission pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than a 20% change in the maximum aggregate offering price set forth in the "Calculation of Registration Fee" table in this Registration Statement when it becomes effective; and
- to include any material information with respect to the plan of distribution not previously disclosed in this Registration Statement or any material change to such information in this Registration Statement.

The undersigned registrant hereby undertakes that, for the purpose of determining any liability under the Securities Act, 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.

The undersigned registrant hereby undertakes 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.

The undersigned registrant hereby undertakes that, for purposes of determining any liability under the Securities Act, each filing of the registrant's annual report pursuant to Section 13(a) or 15(d) of the Securities Exchange Act 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.

The undersigned registrant hereby undertakes as follows: that prior to any public reoffering of the securities registered hereunder through the use of a prospectus which is a part of this Registration Statement, by any person or party who is deemed to be an underwriter within the meaning of Rule 145(c), the issuer undertakes that such reoffering prospectus will contain the information called for by Form S-4 with respect to reofferings by persons who may be deemed underwriters, in addition to the information called for by the other items of Form S-4.

The undersigned registrant hereby undertakes that every prospectus (i) that is filed pursuant to the immediately preceding paragraph, or (ii) that purports to meet the requirements of Section 10(a)(3) of the Act and is used in connection with an offering of securities subject to Rule 415, will be filed as a part of an amendment to the Registration Statement and will not be used until such amendment is effective, and that, for purposes 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.

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, the Registrant has duly caused this Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Linthicum, Maryland, on this 11th day of June, 1999.

CIENA CORPORATION

By: /s/ PATRICK H. NETTLES, PH.D.

Patrick H. Nettles, Ph.D.
President and Chief Executive
Officer

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

Date: June 11, 1999

By: /s/ PATRICK H. NETTLES, PH.D.

Patrick H. Nettles, Ph.D.
President and Chief Executive Officer

Date: June 11, 1999

/s/ JOSEPH R. CHINNICI*

Joseph R. Chinnici
Sr. Vice President, Chief Financial
Officer
(Principal Financial Officer)

Date: June 11, 1999

/s/ ANDREW C. PETRIK*

Andrew C. Petrik
Vice President, Controller and Treasurer
(Principal Accounting Officer)

Date: June 11, 1999

/s/ HARVEY B. CASH*

Harvey B. Cash
Director

Date: June 11, 1999

/s/ BILLY B. OLIVER*

Billy B. Oliver
Director

Date: June 11, 1999

/s/ JAGDEEP SINGH*

Jagdeep Singh
Director

Date: June 11, 1999

/s/ MICHAEL J. ZAK*

Michael J. Zak
Director

Date: June 11, 1999

/s/ STEPHEN P. BRADLEY*

Stephen P. Bradley
Director

By: /s/ PATRICK H. NETTLES, PH.D.

* Patrick H. Nettles, Ph.D., Attorney in Fact.

INDEX TO EXHIBITS

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HOGAN & HARTSON L.L.P.
111 South Calvert Street
Baltimore, Maryland 21202

June 11, 1999

Board of Directors
CIENA Corporation
1201 Winterson Road
Linthicum, MD 21090

Ladies and Gentlemen:

We are acting as counsel to CIENA Corporation, a Delaware corporation (the "COMPANY"), in connection with its registration statement on Form S-4 (the "REGISTRATION STATEMENT") filed with the Securities and Exchange Commission relating to the registration of 16,000,000 shares of the Company's common stock, par value \$.01 per share (the "SHARES"), pursuant to the terms of the Agreement and Plan of Merger between the Company and Omnia Communications, Inc. ("OMNIA"), which provides for the merger of Omnia with and into the Company, with the Company surviving the merger (the "MERGER"). This opinion letter is furnished to you at your request to enable you to fulfill the requirements of Item 601(b)(5) of Regulation S-K, 17 C.F.R. Section 229.601(b)(5), in connection with the Registration Statement.

For purposes of this opinion letter, we have examined copies of the following documents:

1. An executed copy of the Registration Statement.
2. The Third Restated Certificate of Incorporation of the Company, as certified by the Secretary of the State of the State of Delaware on April 19, 1999 and by the Secretary of the Company on the date hereof as being complete, accurate and in effect.
3. The Bylaws of the Company, as certified by the Secretary of the Company on the date hereof as being complete, accurate and in effect.

4. Resolutions of the Board of Directors of the Company adopted at a meeting held on March 14, 1999, as certified by the Secretary of the Company on the date hereof as being complete, accurate and in effect, authorizing the issuance and sale of the Shares.
5. Executed copies of the Agreement and Plan of Merger, dated March 15, 1999, by and among the Company and Omnia (the "Merger Agreement"), relating to, among other things, the issuance of the Shares.

In our examination of the aforesaid documents, we have assumed the genuineness of all signatures, the legal capacity of all natural persons, the authenticity, accuracy and completeness of all documents submitted to us, the authenticity of all original documents and the conformity to authentic original documents of all documents submitted to us as copies (including telecopies). This opinion letter is given, and all statements herein are made, in the context of the foregoing.

This opinion letter is based as to matters of law solely on Delaware corporate law. We express no opinion herein as to any other laws, statutes, ordinances, rules, or regulations.

Based upon, subject to and limited by the foregoing, we are of the opinion that following (i) effectiveness of the Registration Statement, (ii) approval of the Merger by the Omnia stockholders, and (iii) the effectiveness of the Merger pursuant to the General Corporation Law of the State of Delaware, the Shares will be validly issued, fully paid and nonassessable.

This opinion letter has been prepared for your use in connection with the Registration Statement and speaks as of the date hereof. We assume no obligation to advise you of any changes in the foregoing subsequent to the delivery of this opinion letter.

We hereby consent to the filing of this opinion letter as Exhibit 5.1 to the Registration Statement and to the reference to this firm under the caption "Legal Matters" in the prospectus constituting a part of the Registration Statement. In giving this consent, we do not thereby admit that we are an "expert" within the meaning of the Securities Act of 1933, as amended.

Very truly yours,

HOGAN & HARTSON L.L.P.

[HALE AND DORR LETTERHEAD]

Counsellors at Law

60 State Street, Boston, Massachusetts 02109
617-526-6000 - fax 617-526-5000

June 11, 1999

Omnia Communications, Inc.
100 Nickerson Road
Marlborough, MA 01752

Re: Merger pursuant to Agreement and Plan of Merger among
CIENA Corporation and Omnia Communications, Inc.

Ladies and Gentlemen:

This opinion is being delivered to you in connection with the filing of a registration statement (the "Registration Statement") on Form S-4, which includes the Proxy Statement and Prospectus relating to the Agreement and Plan of Merger dated as of March 15, 1999 (the "Merger Agreement"), by and among CIENA Corporation, a Delaware corporation ("CIENA"), and Omnia Communications, Inc., a Delaware corporation ("Omnia"). Pursuant to the Merger Agreement, Omnia will merge with and into CIENA (the "Merger"). Except as otherwise provided, capitalized terms not defined herein have the meanings set forth in the Merger Agreement and the exhibits thereto or in the letters delivered to Hale and Dorr LLP by CIENA and Omnia containing certain representations of CIENA and Omnia relevant to this opinion (the "Representation Letters"). All section references, unless otherwise indicated, are to the United States Internal Revenue Code of 1986, as amended (the "Code").

In our capacity as counsel to Omnia in the Merger, and for purposes of rendering this opinion, we have examined and relied upon the Registration Statement, the Merger Agreement and the exhibits thereto, the Representation Letters, and such other documents as we considered relevant to our analysis. In our examination of documents, we have assumed the authenticity of original documents, the accuracy of copies, the genuineness of signatures, and the legal capacity of signatories.

OMNIA COMMUNICATIONS, INC.
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We have assumed that all parties to the Merger Agreement and to any other documents examined by us have acted, and will act, in accordance with the terms of such Merger Agreement and documents and that the Merger will be consummated at the Effective Time pursuant to the terms and conditions set forth in the Merger Agreement without the waiver or modification of any such terms and conditions. Furthermore, we have assumed that all representations contained in the Merger Agreement, as well as the factual representations contained in the Representation Letters, are, and at the Effective Time will be, true and complete in all material respects. We have not attempted to verify independently such representations, but in the course of our representation, nothing has come to our attention that would cause us to question the accuracy thereof.

The conclusions expressed herein represent our judgment as to the proper treatment of certain aspects of the Merger under the income tax laws of the United States based upon the Code, Treasury Regulations, case law, and rulings and other pronouncements of the Internal Revenue Service (the "IRS") as in effect on the date of this opinion. No assurances can be given that such laws will not be amended or otherwise changed prior to the Effective Time, or at any other time, or that such changes will not affect the conclusions expressed herein. Nevertheless, we undertake no responsibility to advise you of any developments after the Effective Time in the application or interpretation of the income tax laws of the United States.

Our opinion represents our best judgment of how a court would decide if presented with the issues addressed herein and is not binding upon either the IRS or any court. Thus, no assurances can be given that a position taken in reliance on our opinion will not be challenged by the IRS or rejected by a court.

This opinion addresses only the specific United States federal income tax consequences of the Merger set forth below, and does not address any other federal, state, local, or foreign income, estate, gift, transfer, sales, use, or other tax consequences that may result from the Merger or any other transaction (including any transaction undertaken in connection with the Merger). We express no opinion regarding the tax consequences of the Merger to shareholders of Omnia that are subject to special tax rules, and we express no opinion regarding the tax consequences of the Merger arising in connection with the ownership of options or warrants for Omnia stock.

On the basis of, and subject to, the foregoing, and in reliance upon the representations and assumptions described above, we are of the following opinions:

OMNIA COMMUNICATIONS, INC.

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1. The Merger will constitute a reorganization within the meaning of Section 368(a) and

2. The discussion under the section "Federal Income Tax Consequences" in the Registration Statement accurately describes the material federal income tax considerations relevant to Omnia stockholders receiving CIENA Common Stock in the Merger.

No opinion is expressed as to any federal income tax consequence of the Merger except as specifically set forth herein, and this opinion may not be relied upon except with respect to the consequences specifically discussed herein.

This opinion has been prepared solely for use in connection with the Registration Statement and speaks as of the date hereof. We hereby consent to the filing of this opinion as an exhibit to the Registration Statement and further consent to the use of our name in the Registration Statement in connection with references to this opinion and the tax consequences of the Merger. In giving this consent, however, we do not hereby admit that we are in the category of persons whose consent is required under Section 7 of the Securities Act of 1933, as amended.

Very truly yours,

HALE AND DORR LLP