

SECURITIES AND EXCHANGE COMMISSION  
Washington, D.C. 20549

POST-EFFECTIVE AMENDMENT NO. 1  
TO  
FORM S-3

REGISTRATION STATEMENT UNDER  
THE SECURITIES ACT OF 1933

AMERICAN TOWER CORPORATION  
(Exact Name of Issuer as Specified in Its Charter)

DELAWARE  
(State or Other Jurisdiction of  
Incorporation or Organization)

65-0723837  
(I.R.S. Employer  
Identification Number)

116 HUNTINGTON AVENUE  
BOSTON, MASSACHUSETTS 02116  
(617) 375-7500  
(Address, Including Zip Code and Telephone Number, Including Area Code, of  
Registrant's Principal Executive Offices)

STEVEN B. DODGE  
CHAIRMAN AND CHIEF EXECUTIVE OFFICER  
AMERICAN TOWER CORPORATION  
116 HUNTINGTON AVENUE  
BOSTON, MASSACHUSETTS 02116  
(617) 375-7500  
(Name, Address, Including Zip Code and Telephone Number, Including Area Code, of  
Agent for Service)

---

Copies to:  
MATTHEW J. GARDELLA, ESQ.  
HALE AND DORR LLP  
60 STATE STREET  
BOSTON, MASSACHUSETTS 02109  
TELEPHONE: (617) 526-6000  
Telecopy: (617) 526-5000

#### EXPLANATORY NOTE

On November 2, 1999, the Securities and Exchange Commission declared the effectiveness of the Registration Statement on Form S-3 (Registration No. 333-89345) (the "Registration Statement") of American Tower Corporation ("American") with respect to the resale of American's 6.25% Convertible Notes due 2009 (the "6.25% Notes"), 2.25% Convertible Notes due 2009 (the "2.25% Notes", and together with the 6.25% Notes, the "Notes") and the shares of American's Class A Common Stock, \$0.01 par value per share, issuable upon the conversion of the Notes (the "Shares"). The Registration Statement was filed by American for the benefit of holders of the Notes (the "Noteholders") who were granted registration rights pursuant to a Registration Rights Agreement dated October 4, 1999 (the "Agreement").

The Agreement requires American to maintain the effectiveness of the Registration Statement until such time as all Notes held by persons who are not affiliates of American are eligible for resale under Rule 144(k) of the Securities Act of 1933, as amended. That date occurred on October 4, 2001. In accordance with the terms of the Agreement, and in accordance with American's undertaking under Regulation S-K Item 512(a)(3), American is filing this Post-Effective Amendment No. 1 to remove from registration all Notes not sold by Noteholders pursuant to the Registration Statement. American hereby requests the deregistration of an aggregate of \$29,729,000 principal amount of the 6.25% Notes, an aggregate of \$3,735,000 principal amount of 2.25% Notes and the Shares issuable upon the conversion of the Notes, and requests that upon the effectiveness of this Post-Effective Amendment No. 1, that such Notes and Shares be removed from registration.

#### SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, as amended, the Registrant certifies that it has reasonable grounds to believe that it meets all of the requirements for filing on Form S-3 and has duly caused this Registration Statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the city of Boston, Commonwealth of Massachusetts, on this 16th day of October, 2001.

AMERICAN TOWER CORPORATION

By: /s/ Steven B. Dodge\*

-----  
Steven B. Dodge  
Chairman and  
Chief Executive Officer

# SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, as amended, this Post-Effective Amendment No. 1 to this Registration Statement has been signed below by the following persons in the capacities and on the dates indicated.

Signature -----	Title -----	Date ----
/s/ Steven B. Dodge* ----- Steven B. Dodge	Chairman and Chief Executive Officer (Principal Executive Officer)	October 16, 2001
/s/ Joseph L. Winn* ----- Joseph L. Winn	Chief Financial Officer and Treasurer (Principal Financial Officer)	October 16, 2001
/s/ Justin D. Benincasa ----- Justin D. Benincasa	Senior Vice President and Corporate Controller (Principal Accounting Officer)	October 16, 2001
/s/ Alan L. Box* ----- Alan L. Box	Director	October 16, 2001
/s/ Arnold L. Chavkin* ----- Arnold L. Chavkin	Director	October 16, 2001
----- David W. Garrison	Director	October 16, 2001
/s/ J. Michael Gearon, Jr.* ----- J. Michael Gearon, Jr.	Executive Vice President and Director	October 16, 2001
/s/ Fred Lummis* ----- J. Fred Lummis	Director	October 16, 2001
/s/ Thomas H. Stoner* ----- Thomas H. Stoner	Director	October 16, 2001
/s/ Maggie Wilderotter* ----- Maggie Wilderotter	Director	October 16, 2001

\* By: /s/ Justin D. Benincasa

-----  
Justin D. Benincasa

\* As Attorney-in-Fact