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

FORM 8-K

CURRENT REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

Date of report (Date of earliest event reported): November 16, 2007

ADVENTRX Pharmaceuticals, Inc.

(Exact Name of Registrant as Specified in Charter)

Delaware (State or Other Jurisdiction of Incorporation) **001-32157** (Commission File No.)

84-1318182 (IRS Employer Identification No.)

6725 Mesa Ridge Road, Suite 100 San Diego, CA 92121

(Address of Principal Executive Offices and Zip Code)

N/A

(Former name or former address if changed since last report)

Registrant's telephone number, including area code: (858) 552-0866

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions:

- o Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
- o Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
- o Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
- o Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

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Item 8.01. Other Events.

On November 16, 2007, ADVENTRX Pharmaceuticals, Inc. issued a press release announcing positive results from its marketing-enabling clinical study of ANX-530 (vinorelbine emulsion). The press release is attached hereto as Exhibit 99.1 and is incorporated herein by reference.

Item 9.01. Financial Statements and Exhibits.

(d) Exhibits.

The list of exhibits called for by this Item is incorporated by reference to the Index to Exhibits filed with this report.

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Dated: November 16, 2007

SIGNATURE

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned, hereunto duly authorized.

ADVENTRX PHARMACEUTICALS, INC.

By: /s/ Evan M. Levine

Name: Evan M. Levine Title: Chief Executive Officer

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99.1 Press release, dated November 16, 2007

ADVENTRX MEETS PRIMARY ENDPOINT IN ANX-530 MARKETING-ENABLING CLINICAL STUDY

SAN DIEGO — **November 16, 2007**- ADVENTRX Pharmaceuticals, Inc. (Amex: ANX) today announced positive results from its marketing-enabling clinical study of ANX-530 (vinorelbine emulsion). Pharmacokinetic equivalence, the primary endpoint of the study, was observed between ANX-530 and Navelbine®, the reference product, in patients with advanced cancer potentially sensitive to vinorelbine. Equivalence was demonstrated by a statistical comparison of both the areas under the curve (AUC) and maximum plasma concentrations (Cmax). The Company anticipates safety and full clinical results will be available during the first quarter of 2008. Results from this study will be submitted for presentation at an appropriate medical conference.

"We're very pleased with these results, which we believe will provide sufficient clinical data to support a Section 505(b)(2) New Drug Application," said Evan M. Levine, chief executive officer of ADVENTRX. "We have a meeting scheduled with the FDA in December to discuss our commercial manufacturing plans. After we receive the FDA's written comments, we intend to provide an update regarding our NDA timeline for ANX-530."

ANX-530 is a novel emulsion formulation of vinorelbine. Vinorelbine, marketed under the brand name Navelbine®, also available as generic vinorelbine, is an anti-cancer agent approved to treat advanced non-small cell lung cancer as a single agent or in combination with cisplatin. Worldwide annual sales of Navelbine and generic vinorelbine in 2006 were approximately \$200 million.

The bioequivalence study of ANX-530 was a crossover comparison of ANX-530 and Navelbine with a primary objective of demonstrating the pharmacokinetic equivalence of ANX-530 and Navelbine. Determining the safety of a single dose of ANX-530 was a secondary objective. In the first week, patients were dosed with either ANX-530 or Navelbine, and after a washout period, were dosed with the opposite drug during the second week of treatment. The FDA has indicated that this single clinical study, should it demonstrate pharmacokinetic equivalence between ANX-530 and Navelbine, would provide sufficient clinical data to support a Section 505(b)(2) NDA.

Pharmacokinetic equivalence was determined based on federal regulations and FDA guidance regarding bioequivalence studies. If the upper and lower bounds of the AUC ratio's and the Cmax ratio's 90% confidence interval ranged from 0.80 to 1.25, ANX-530 and Navelbine were considered to have equivalent pharmacokinetics. AUC is a measure of the total amount of the drug circulating in the body over time. Cmax is the maximum concentration of the drug measured in the blood at any given time. The results of a clinical study are actually estimates of what might be expected if the treatment were to be given to the entire population of interest. Confidence intervals indicate the precision of such an estimate. Pursuant to the study's protocol and statistical analysis plan, data from all 31 patients who received both study drugs were included in the analysis.

About ANX-530 (vinorelbine emulsion)

ANX-530 is a novel emulsion formulation of vinorelbine tartrate, a generic chemotherapy agent. ANX-530 is designed to reduce the incidence and severity of vein irritation from intravenous-delivery of vinorelbine tartrate. Vinorelbine tartrate works by disrupting microtubule formation and is a member of the vinca alkaloid class of antineoplastic agents. Vinorelbine is indicated as a single agent or in combination with cisplatin for treatment of advanced non-small cell lung cancer and has also shown activity in breast, ovarian, and other cancers.

About Section 505(b)(2)

Section 505(b)(2) of the U.S. Food, Drug & Cosmetic Act (FDCA) allows the Food and Drug Administration (FDA) to approve a follow-on drug on the basis of data in the scientific literature or conclusions regarding safety or effectiveness made by the FDA in the approval of other drugs. This regulatory pathway potentially makes it easier for drug manufacturers to obtain rapid approval of new forms of drugs based on the FDA's approval of the original drug. Some examples of products that may

be allowed to follow a 505(b)(2) path to approval are drugs that have a new dosage form, strength, route of administration, formulation or indication. Upon approval, a drug may be marketed only for the FDA-approved indications in the approved dosage forms. Further clinical trials are necessary to gain approval for the use of the product for any additional indications or dosage forms. To the extent a Section 505(b)(2) applicant is relying on the FDA's findings for an already-approved drug, the applicant is required to certify to the FDA concerning any patents listed for the approved drug in the FDA's Orange Book publication, which may include a certification that listed patents are invalid or will not be infringed by the manufacture, use or sale of the new drug.

About ADVENTRX Pharmaceuticals

ADVENTRX Pharmaceuticals is a biopharmaceutical research and development company focused on commercializing proprietary product candidates for the treatment of cancer and infectious diseases. The Company seeks to improve the performance and safety of existing treatments by addressing significant problems such as drug metabolism, bioavailability, excessive toxicity and treatment resistance. More information can be found on the Company's web site at http://www.adventrx.com.

Forward Looking Statement

ADVENTRX cautions you that statements included in this press release that are not a description of historical facts are forward-looking statements that involve risks and assumptions that, if they materialize or do not prove to be accurate, could cause ADVENTRX's results to differ materially from historical results or those expressed or implied by such forward-looking statements. These risks and uncertainties include, but are not limited to: the risk the FDA will determine that ANX-530 and Navelbine are not bioequivalent, including as a result of performing pharmacokinetic equivalence analysis based a patient population other than the population on which ADVENTRX based its analysis; difficulties or delays in manufacturing, marketing and obtaining regulatory approval for ANX-530, including validating commercial manufacturers and suppliers and the potential for automatic injunctions regarding FDA approval of ANX-530 and other challenges by patent holders during the Section 505(b)(2) process; the risk that ADVENTRX will be unable to raise sufficient capital to fund the projects necessary to meet its goals, including funding the continued development and commercialization of ANX-530; the potential for regulatory authorities to require additional preclinical work or other clinical requirements to support regulatory filings; patent and non-patent exclusivity covering Navelbine; ADVENTRX's lack of long-term agreements with suppliers of ANX-530 components and contract manufacturers of ANX-530, including its inability to timely secure commercial quantities of ANX-530 or its components on commercially reasonable terms, or at all; uncertainty under Section 505(b) (2) resulting from legal action against the FDA and the potential that future interpretations of Section 505(b)(2) could delay or prevent the FDA from approving any Section 505(b)(2) NDA; and other risks and uncertainties more fully described in ADVENTRX's press releases and periodic filings with the Securities and Exchange Commission are available at <a href="htt

You are cautioned not to place undue reliance on these forward-looking statements, which speak only as of the date when made. ADVENTRX does not intend to revise or update any forward-looking statement set forth in this press release to reflect events or circumstances arising after the date on which it was made.

Investor Contact:

ADVENTRX Pharmaceuticals

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