

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): May 7, 2010

**BioCryst Pharmaceuticals, Inc.**

*(Exact Name of Registrant as Specified in Charter)*

**Delaware**  
*(State or Other Jurisdiction  
of Incorporation)*

**000-23186**  
*(Commission  
File Number)*

**62-1413174**  
*(IRS Employer  
Identification No.)*

**2190 Parkway Lake Drive, Birmingham, Alabama**  
*(Address of Principal Executive Offices)*

**35244**  
*(Zip Code)*

**(205) 444-4600**  
*(Registrant's telephone number, including area code)*

\_\_\_\_\_  
*(Former Name or Former Address, if Changed Since Last Report)*

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 (see General Instruction A.2 below):

- Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
  - Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
  - Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 210.14d-2(b))
  - 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 May 5, 2010, BioCryst Pharmaceuticals, Inc. (the “Company”) entered into a Fourth Amendment Agreement (the “Amendment Agreement”) with Albert Einstein College of Medicine of Yeshiva University, a Division of Yeshiva University (“AECOM”) and Industrial Research Ltd. (“IRL”), pursuant to which the Company agreed to issue 380,663 shares of its common stock, par value \$0.01 per share, to each of AECOM and IRL, respectively. The shares were issued to AECOM and IRL on May 7, 2010 in exchange for certain modifications to the License Agreement dated June 27, 2000, among the Company, AECOM and IRL, as amended, including a reduction in the percentage of certain payments the Company receives from third-party sublicensees that must be paid to AECOM and IRL. The shares were issued pursuant to the Company’s effective registration statement on Form S-3 (File No. 333-155783). The terms of the Amendment Agreement are described more fully in Item 5 of Part II of the Company’s Quarterly Report on Form 10-Q for the quarter ended March 31, 2010 (filed with the Securities and Exchange Commission on May 7, 2010).

This report is being filed for the sole purpose of filing the opinion of Gibson, Dunn & Crutcher LLP, attached hereto as Exhibit 5.1, as to the legality of the shares of common stock issued to AECOM and IRL.

**Item 9.01. Financial Statements and Exhibits.**

(d) Exhibits

<u>Exhibit No.</u>	<u>Description</u>
5.1	Opinion of Gibson, Dunn & Crutcher LLP.

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**SIGNATURES**

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.

Dated: May 7, 2010

**BioCryst Pharmaceuticals, Inc.**

By: /s/ Alane Barnes

Alane Barnes

General Counsel, Corporate Secretary

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## EXHIBIT INDEX

<u>Exhibit No.</u>	<u>Description</u>
5.1	Opinion of Gibson, Dunn & Crutcher LLP.

Client Matter No.: C 12412-00001

Direct: 202.955.8500

Fax: 202.467.0539

May 7, 2010

BioCryst Pharmaceuticals, Inc.

2190 Parkway Lake Drive

Birmingham, Alabama 35244

Re: BioCryst Pharmaceuticals, Inc. Issuance of Common Stock

Ladies and Gentlemen:

We have examined the Registration Statement on Form S-3 (File No. 333-155783) (as amended, the "Registration Statement") of BioCryst Pharmaceuticals, Inc., a Delaware corporation (the "Company"), filed with the Securities and Exchange Commission (the "Commission") pursuant to the Securities Act of 1933 (as amended, the "Securities Act"), and the prospectus and prospectus supplement with respect thereto, dated January 27, 2009, and May 7, 2010, respectively (together, the "Prospectus"), in connection with the issuance by the Company of 761,326 shares of its common stock, par value \$0.01 per share (the "Shares"). The Shares will be issued pursuant to the Fourth Amendment Agreement (the "Amendment Agreement"), dated as of May 5, 2010, among the Company, Albert Einstein College of Medicine of Yeshiva University, a Division of Yeshiva University ("AECOM"), and Industrial Research Ltd. ("Industrial").

We have examined the originals, or photostatic or certified copies, of such records of the Company, the certificates of officers of the Company and of public officials and such other documents as we have deemed relevant and necessary as the basis for the opinions set forth below. In our examination, we have assumed the genuineness of all signatures, the legal capacity and competency of all natural persons, the authenticity of all documents submitted to us as originals and the conformity to original documents of all documents submitted to us as copies.

Based upon the foregoing examination, and in reliance thereon, and subject to the foregoing assumptions and the qualifications, limitations and exceptions set forth below, we are of the opinion that the Shares, when issued and delivered to AECOM and Industrial in accordance with the terms of the Amendment Agreement, will be validly issued, fully paid and nonassessable.

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BioCryst Pharmaceuticals, Inc.

May 7, 2010

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The opinions set forth herein are subject to the following assumptions, qualifications, limitations and exceptions:

We render no opinion herein as to matters involving the laws of any jurisdiction other than the United States of America and the Delaware General Corporation Law. We are not admitted to practice in the State of Delaware; however, we are generally familiar with the Delaware General Corporation Law as currently in effect and have made such inquiries as we consider necessary to render this opinion. This opinion is limited to the effect of the current state of the United States of America and the Delaware General Corporation Law and the facts as they currently exist. We assume no obligation to revise or supplement our opinions in the event of future changes in such laws or the interpretations thereof or such facts. We express no opinion regarding the Securities Act of 1933, the Securities Exchange Act of 1934, the Trust Indenture Act of 1939 or any other federal or state securities laws or regulations.

We consent to the filing of this opinion as an exhibit to the Registration Statement, and we further consent to the use of our name under the caption "Legal Matters" in the Registration Statement and the prospectus that forms a part thereof. In giving these consents, we do not thereby admit that we are within the category of persons whose consent is required under Section 7 of the Securities Act or the rules and regulations of the Commission.

Very truly yours,

/s/ GIBSON, DUNN & CRUTCHER LLP