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 24, 2004

VERTEX PHARMACEUTICALS INCORPORATED

(Exact name of registrant as specified in its charter)

MASSACHUSETTS	**000-19319**	**04-3039129**
(State or other jurisdiction of incorporation)	(Commission File Number)	(IRS Employer Identification No.

130 Waverly Street
Cambridge, Massachusetts 02139
(Address of principal executive offices) (Zip Code)

(617) 444-6100
Registrant's telephone number, including area code:

Item 5. Other Items.

On May 24, 2004, the Registrant announced the execution of a Research, Development and Commercialization Agreement with Cystic Fibrosis Foundation Therapeutics Incorporated (the "CFF Agreement") providing for the expansion of the Registrant's drug discovery and development collaboration with Cystic Fibrosis Foundation Therapeutics Incorporated.

On June 22, 2004, the Registrant announced the execution of an Exclusive Research Collaboration, License and Commercialization Agreement with Merck & Co., Inc. (the "Merck Agreement") to develop and commercialize VX-680, the Registrant's lead Aurora kinase inhibitor.

Copies of the press releases relating to the CFF Agreement and the Merck Agreement are attached to this Current Report on Form 8-K as Exhibits 99.1 and 99.3, respectively, and are incorporated by reference herein. Copies of the CFF Agreement and the Merck Agreement (with certain confidential information deleted from both agreements) are attached to this Current Report on Form 8-K as Exhibits 99.2 and 99.4, respectively, and are incorporated by reference herein.

Item 7. Financial Statements, Pro Forma Financial Information and Exhibits.

(c) The following exhibits are filed with this Current Report on Form 8-K.

99.1 Press Release of Vertex Pharmaceuticals Incorporated dated May 24, 2004.

99.2 Research, Development and Commercialization Agreement with Cystic Fibrosis Foundation Therapeutics Incorporated by and between the Registrant and Cystic Fibrosis Foundation Therapeutics Incorporated, dated May 24, 2004 (with certain confidential information deleted).

99.3 Press Release of Vertex Pharmaceuticals Incorporated dated June 22, 2004.

99.4 Exclusive Research Collaboration, License and Commercialization Agreement by and between the Registrant and Merck & Co., Inc., dated June 21, 2004 (with certain confidential information deleted).

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.

VERTEX PHARMACEUTICALS INCORPORATED
(Registrant)

Date: July 1, 2004

/s/ Ian F. Smith
Ian F. Smith
Senior Vice President and Chief Financial Officer

EXHIBIT INDEX

The following exhibits are filed as part of this current report on Form 8-K:

Exhibit No.	Description
99.1	Press Release of Vertex Pharmaceuticals Incorporated, dated May 24, 2004.
99.2	Research, Development and Commercialization Agreement between Vertex Pharmaceuticals Incorporated and Cystic Fibrosis Foundation Therapeutics Incorporated dated May 24, 2004 (with certain confidential information deleted).
99.3	Press Release of Vertex Pharmaceuticals Incorporated, dated June 22, 2004.
99.4	Exclusive Research Collaboration, License and Commercialization Agreement by and between the Registrant and Merck & Co., Inc., dated June 22, 2004 (with certain confidential information deleted).

Cystic Fibrosis Foundation Therapeutics Awards $21 Million to Vertex Pharmaceuticals Under Expanded Agreement
- New Collaboration Builds on Drug Discovery Progress at Vertex -

Cambridge, MA and Bethesda, MD, May 24, 2004 — Vertex Pharmaceuticals Incorporated (Nasdaq: VRTX) today announced that it has expanded its drug discovery and development collaboration with Cystic Fibrosis Foundation Therapeutics, Inc. (CFFT), the nonprofit drug discovery and development affiliate of the Cystic Fibrosis Foundation. Under the expanded collaboration, CFFT will make approximately $21 million in contracted research payments to Vertex through 2004 and 2005, providing funding for Vertex's late-stage CF drug discovery effort. Recent progress at Vertex in the design of small molecule drugs targeting the basic defect in cystic fibrosis (CF) provides the foundation for the new agreement. Vertex will retain the right to develop and commercialize any compounds discovered.

Vertex Pharmaceuticals initiated its research in CF in May 2000 as part of a collaboration with the CF Foundation. Using proprietary expertise in ion channels, including high-content cell assays and medicinal chemistry, Vertex has focused on designing selective ion channel modulators that could restore the function of the defective Cystic Fibrosis Transmembrane conductance Regulator (CFTR) protein. Defective CFTR is one of the key factors that ultimately leads to the symptoms, complications and mortality in people with CF. This defective channel affects the transport of sodium and chloride in and out of the cells, which leads to the thick, sticky mucus in the lungs and the pancreas.

"Through its state-of-the-art technologies, Vertex has enabled the rapid design of small molecule compounds that, in laboratory studies, have corrected the defective ion transport in CF and therefore may address the root cause of disease," said Robert J. Beall, Ph.D., President and CEO of the CF Foundation and CFFT. "By expanding our collaboration with Vertex, we are assuring that these compounds move forward quickly and prudently, in the hopes that at least one may become an effective basic defect therapy in CF."

Under the terms of the agreement, CFFT will issue a milestone payment to Vertex for advancement of the first compound into clinical development. Vertex expects to recognize approximately $7 million as revenue from this collaboration for the calendar year 2004.

"Our new agreement with CFFT is the first of a series of business and scientific advancements in 2004 that we believe will validate Vertex's leadership position in ion channel drug discovery," said Joshua Boger, Ph.D., Vertex's Chairman and CEO. "In addition to providing near-term revenue to Vertex, this agreement brings forward potential breakthrough drug candidates for CF toward clinical development, while retaining for Vertex full commercialization rights. This underscores Vertex's

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commitment to developing breakthrough drugs for serious diseases and expands our ability to bring some of these breakthrough drugs to the marketplace ourselves."

CF Drug Discovery at Vertex Pharmaceuticals

Vertex has designed proprietary compounds for CF that are highly active in vitro and may reverse the effects of the defective ion channel via two separate mechanisms of action. One class of compounds acts as "potentiators", directly increasing the gating ability of the defective ion channel. Vertex has identified a second class of compounds that act as "correctors", enhancing the number of CFTR channels at the cell surface. Most recently, both classes of compounds have been shown to improve CFTR function in bronchial epithelial cells that have been isolated from CF patients. Drug discovery efforts under the new collaboration will focus on optimizing and selecting drug candidates for clinical development from one or both of these compound classes.

Vertex scientists will discuss recent progress in the Company's CF drug discovery program in more detail in a plenary session at CFFT's 16th Annual Williamsburg Conference in Williamsburg, Virginia on June 5, 2004. Drug candidates identified in Vertex's CF drug discovery program may have important future application in CF, as well as more broadly in the treatment of pulmonary diseases.

About Vertex

Vertex Pharmaceuticals Incorporated is a global biotechnology company committed to the discovery and development of breakthrough small molecule drugs for serious diseases. The Company's strategy is to commercialize its products both independently and in collaboration with major pharmaceutical partners. Vertex's product pipeline is principally focused on viral diseases, inflammation, autoimmune diseases and cancer. Vertex co-promotes the new HIV protease inhibitor Lexiva™ (fosamprenavir calcium) with GlaxoSmithKline.

About Cystic Fibrosis and the Cystic Fibrosis Foundation

Cystic fibrosis (CF) is a genetic disease affecting approximately 30,000 people in the United States. A defective gene causes the body to produce abnormally thick, sticky mucus that leads to chronic and life-threatening lung infections and impairs digestion. When the CF Foundation was created in 1955, few children lived to attend elementary school. Today, because of research and care supported by the CF Foundation with money raised through donations from individuals, corporations and foundations, the median age of survival for people with CF is in the early 30s.

The mission of the Cystic Fibrosis Foundation is to assure the development of the means to cure and control CF and to improve the quality of life for those with the disease. For more information on CF and the programs of the CF Foundation, call (800) FIGHT CF or visit www.cff.org.

This press release may contain forward-looking statements, including statements that (i) proprietary Vertex compounds may have important future application in the treatment of cystic fibrosis or pulmonary diseases; (ii) the agreement with CFF is the first in a series of business and commercial advancements that will validate Vertex's leadership position in ion channels; and (iii) compounds generated in this collaboration have the potential to be breakthrough drugs. While management makes its best efforts to be accurate in making forward-looking statements, such statements are subject to risks and uncertainties that could cause Vertex's actual results to vary materially. These risks and uncertainties include, among other things, the risks that efforts to select and optimize development candidates may not proceed due to financial, technical, commercial or other reasons, that laboratory results may not be predictive of future clinical results for Vertex's compounds, that other advancements in Vertex's ion channels effort may not materialize and other risks listed under Risk Factors in Vertex's form 10-K filed with the Securities and Exchange Commission on March 15, 2004.

Lexiva is a registered trademark of the GlaxoSmithKline group of companies.

Vertex Contacts:

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Cystic Fibrosis Foundation Contact:

Allison Tobin, Director of Media Relations, (301) 841-2665

Confidential Treatment Requested.
Confidential portions of this document have been redacted and have been separately filed with the Commission.

RESEARCH, DEVELOPMENT AND COMMERCIALIZATION AGREEMENT

between

Vertex Pharmaceuticals Incorporated

and

Cystic Fibrosis Foundation Therapeutics Incorporated

Research, Development and Commercialization Agreement

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RESEARCH, DEVELOPMENT AND COMMECIALIZATION AGREEMENT

Agreement made this 24th day of May, 2004, (the "Agreement"), between Vertex Pharmaceuticals Incorporated ("Vertex"), a Massachusetts corporation with principal offices at 130 Waverly Street, Cambridge, MA 02139-4242, and Cystic Fibrosis Foundation Therapeutics Incorporated, a Delaware corporation with principal offices at 6931 Arlington Road, Bethesda, Maryland 20814 ("CFFT").

This Agreement is a modification and continuation of a relationship originally set forth in an earlier Cystic Fibrosis Research Alliance and Commercialization Agreement dated as of May 19, 2000 (the "Original Agreement"), between the Cystic Fibrosis Foundation, which is an Affiliate of CFFT, and Aurora Biosciences Corporation, which was acquired by Vertex in 2001. Except as specifically provided herein, this Agreement supercedes in its entirety the Original Agreement which shall be of no further force and effect.

WHEREAS, Vertex has expertise in the discovery and development of small molecule compounds addressing a variety of diseases for which there are limited treatment options, including extensive expertise in the study of disease mechanisms and the design of novel chemical compounds which modulate biological targets with therapeutic effect; and

WHEREAS, Vertex has developed significant scientific expertise and capacity in the area of CFTR protein modulation; and

WHEREAS, CFFT is significantly focused on the discovery and development of methods of treatment for cystic fibrosis, to which CFFT and its Affiliates bring significant scientific and human resources and financial support; and

WHEREAS, CFFT wishes to continue support for, and expand, the CFTR project underway at Vertex.

NOW, THEREFORE, in consideration of the mutual covenants set forth in this Agreement, and other good and valuable consideration, the parties agree as follows:

ARTICLE I - DEFINITIONS

For purposes of this Agreement, the terms defined in this Article 1 shall have the following meanings whether used in their singular or plural forms. Use of the singular shall include the plural and vice versa, unless the context requires otherwise:

1.1 "Affiliate" shall mean, with respect to any Person, any other Person who directly or indirectly, by itself or through one or more intermediaries, controls, or is controlled by, or is under direct or indirect common control with, such Person. The term "control" means the possession, direct or indirect, of the power to direct or cause the direction of the management and policies of a Person, whether through the ownership of voting securities, by contract or otherwise. Control will be presumed if one Person owns, either of record or beneficially, more than 50% of the voting stock of any other Person. For the avoidance of any doubt, the Cystic Fibrosis Foundation and CFFT are considered to be Affiliates.

1.2 "Agreement" means this agreement, together with all appendices, exhibits and schedules hereto, and as the same may be amended or supplemented from time to time hereafter by a written agreement duly executed by authorized representatives of each party hereto.

1.3 "Back-up Compound" shall mean, with reference to any particular Development Candidate or Drug Product Candidate, a Compound which (a) has the same principal mode of action (i.e., Potentiator or Corrector) as that Development Candidate or Drug Product Candidate; and (b) was among the group of Compounds, identified by VERTEX as potential additional lead molecules having the same principal mode of action, from which the Development Candidate was selected.

1.4 "Bulk Drug Substance" shall mean a Drug Product Candidate in bulk crystal, powder or other form suitable for incorporation in a Drug Product.

1.5 "CF" means the disease known as Cystic Fibrosis.

1.6 "CF Field" means the treatment of humans diagnosed with CF.

1.7 "CFTR" shall mean a CF transmembrane conductance regulator protein which has the biological effect of transporting molecules across human cellular membranes.

1.8 "Compound" shall mean a chemical compound, including salts and prodrugs thereof, which is synthesized and/or tested by or under the direction of VERTEX or its Affiliates during the term of the Research Program under this Agreement, or which was synthesized and/or tested by and/or under the direction of Aurora or its Affiliates under the Original Agreement; which is either a Potentiator or a Corrector, or both; and which **[***]**

1.9 "Controlled" (except in the context of Section 1.1) shall mean the legal authority or right of a party hereto to grant a license or sublicense of intellectual property rights to another party hereto, or to otherwise disclose proprietary or trade secret information to such other party, without breaching the terms of any agreement with a Third Party, infringing upon the intellectual property rights of a Third Party, or misappropriating the proprietary or trade secret information of a Third Party.

1.10 "Corrector" shall mean a Compound which, as its principal mode of therapeutic action, modulates the biological effect of CFTR by increasing **[***]**

1.11 "Development Candidate" shall mean a Compound that meets the Development Candidate Criteria for the initiation of a Development Program for the treatment of CF, and which is the subject of a notice from Vertex to CFFT that Vertex intends to commence formal pre-clinical development of the Compound in the Field pursuant to the provisions of Section 3.1 hereof.

* Information redacted pursuant to a confidential treatment request. An unredacted version of this exhibit has been filed separately with the Commission.

1.12 "Development Candidate Criteria" shall mean the criteria set forth in Schedule 1.14 hereto which shall be applicable to any Compound selected by Vertex as a Development Candidate hereunder.

1.13 "Development Candidate Information" will mean a full summary of all material information known to VERTEX about a Development Candidate, which CFFT reasonably needs in order to assess the potential of that Development Candidate as a treatment for CF and to pursue CFFT's Special Rights under Sections 10.5 and 10.6, if they are applicable. Development Candidate Information will also include comparable information known to

VERTEX concerning Compounds which are Back-up Compounds, as defined herein, to the Development Candidate which is the subject of the Development Candidate Information.

1.14 "Development Candidate Milestone" shall have the meaning ascribed to it in Section 4.4 hereof.

1.15 "Development Plan" shall have the meaning ascribed to it in Section 3.2.2 hereof.

1.16 "Development Program" shall mean activities associated with development of a Drug Product Candidate which are conducted by or at the direction of Vertex, its Affiliates, licensees or sublicensees, including but not limited to (a) manufacture and formulation of Drug Product Candidates for use in pre-clinical, non-clinical and clinical studies; (b) pre-clinical and non-clinical animal studies; (c) planning, implementation, evaluation and administration of human clinical trials; (d) manufacturing process development, scale-up and manufacture/analysis/QC/QA of Drug Product for clinical trials; (e) preparation and submission of applications for Regulatory Approval; and (f) post-market surveillance of approved drug

indications, as required or agreed as part of a marketing approval by any governmental regulatory authority.

1.17 "Drug Product" shall mean a finished dosage form which is prepared from Bulk Drug Substance and is ready for administration to the ultimate consumer as a pharmaceutical.

1.18 "Drug Product Candidate" shall mean any Development Candidate for which a Development Program has commenced under Section 3.1 hereunder.

1.19 "Effective Date" shall mean April 1, 2004.

1.20 "Field" shall mean the treatment of conditions or diseases in the CF Field and the Pulmonary Field.

1.21 "First Commercial Sale" shall mean the first sale of a Drug Product by Vertex or an Affiliate, licensee or sublicensee of Vertex in a country in the Territory following Regulatory Approval of the Drug Product in that country or, if no such Regulatory Approval or similar marketing approval is required, the date upon which the Drug Product is first commercially launched in that country.

1.22 "FTE" shall mean the equivalent of the work of one Vertex scientist or other project managerial professional, full time for one year, on or directly related to the Research Program. Work in the Research Program can include, but is not limited to the following activities that relate solely to the Research Program: (i) experimental laboratory work, (ii) project and research management, (iii) intellectual property creation, (iv) management activities directed toward evaluation of the commercial potential of a possible Drug Candidate, (v) recording and writing up results, (vi) reviewing literature and references, (vii) holding scientific

discussions, (viii) traveling to and attending appropriate seminars and symposia, (ix) and carrying out Joint Research Committee duties. Activities included in calculating FTE's shall not include negotiation of this Agreement or modifications or extensions thereof or administration activities such as accounting, invoicing, personnel related activities or the like. Moreover, activities specified in (iv) through (ix) above shall be taken into account only when performed by individuals substantially all of the activities of whom are otherwise dedicated to the Research Program. FTE's shall include equivalent scientific work in the Research Program delegated to and carried out by contractors, under the general direction of Vertex scientists; provided, that not more than half of the total Research Program FTEs shall be delegated to Third Parties. FTE's which result from work delegated to and carried out by contractors, if not separately accounted for by the contractor, will be computed by dividing the total amount of the contractor's invoice by **[***]**, and the resulting FTE calculation will be separately identified by Vertex on its reports provided to CFFT under Section 4.3 hereof.

1.23 "Joint Research Committee" or "JRC" shall have the meaning ascribed to it in Section 2.6 of Agreement.

1.24 "Joint Steering Committee" or "JSC" shall have the meaning ascribed to it in Section 2.7 of Agreement.

1.25 "Net Sales" with respect to any Drug Product shall mean the gross amount invoiced by Vertex and any Vertex Affiliate, licensee or sublicensee for that Drug Product sold in bona fide, arms-length transactions to Third Parties for use in the Field, less (i) quantity and/or cash discounts from the gross invoice price which are actually allowed or taken; (ii) freight, postage and insurance included in the invoice price; (iii) amounts repaid or credited by reasons

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of rejections or return of goods or because of retroactive price reductions specifically identifiable to the Drug Product; (iv) amounts payable resulting from government (or agency thereof) mandated rebate programs; (v) third-party rebates to the extent actually allowed; (vi) invoiced customs duties and sales taxes (excluding income, value-added and similar taxes), if any, actually paid and directly related to the sale that are not reimbursed by the buyer; and (vii) any other specifically identifiable amounts included in the Drug Product's gross invoice price that should be credited for reasons substantially equivalent to those listed

above; all as determined in accordance with Vertex's usual and customary accounting methods, which are in accordance with generally accepted accounting principles.

1.25.1 In the case of any sale or other disposal of a Drug Product between or among Vertex and its Affiliates, licensees and sublicensees, for resale, Net Sales shall be calculated as above only on the value charged or invoiced on the first arm's-length sale thereafter to a Third Party;

1.25.2 In the case of any sale which is not invoiced or is delivered before invoice, Net Sales shall be calculated at the time of shipment or when the Drug Product is paid for, if paid for before shipment or invoice;

1.25.3 In the case of any sale or other disposal for value, such as barter or counter-trade, of any Drug Product, or part thereof, other than in an arm's length transaction exclusively for money, Net Sales shall be calculated as above on the value of the consideration received or the fair market price (if higher) of the Drug Product in the country of sale or disposal;

1.25.4 In the event the Drug Product is sold in a finished dosage form containing the Drug Product in combination with one or more other active ingredients (a "Combination

Product"), the Net Sales of the Drug Product, for the purposes of determining royalty payments, shall be determined by **[***]** The principles of this section shall also apply to a Combination Product in the event Sections 10.5.5, 10.5.6 and 10.6.2 are applicable.

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1.26 "Patents" means all existing patents and patent applications and all patent applications hereafter filed, including any continuation, continuation-in-part, division, provisional or any substitute applications, any patent issued with respect to any such patent applications, any reissue, reexamination, renewal or extension (including any supplementary protection certificate) of any such patent, and any confirmation patent or registration patent or patent of addition based on any such patent, and all foreign counterparts of any of the foregoing.

1.27 "Person" means any individual, corporation, partnership, association, joint-stock company, trust, unincorporated organization or government or political subdivision thereof.

1.28 "Positive Control" shall mean with respect to a Corrector, the Compound known as **[***]**, and with respect to a Potentiator, the Compound known as **[***]**, except as otherwise agreed by the Parties.

1.29 "Potentiator" shall mean a Compound which, as its principal mode of therapeutic action, modulates the biological effect of CFTR **[***]**

1.30 "Prime Rate" shall mean the average prime rate published in the *Wall Street Journal* during the relevant period.

1.31 This section has been intentionally left blank.

1.32 "Pulmonary Field" shall mean the treatment of diseases of the human pulmonary tract or lungs, other than CF.

1.33 "Regulatory Approval" shall mean, with respect to any country, all authorizations by the appropriate governmental entity or entities necessary for commercial sale of a Drug

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Product in that country including, without limitation and where applicable, approval of labeling, price, reimbursement and manufacturing. "Regulatory Approval" in the United States shall mean final approval of a new drug application pursuant to 21 CFR § 314, permitting marketing of the applicable Drug Product in interstate commerce in the United States. "Regulatory Approval" in the European Union shall mean final approval of a Marketing Authorization Application, or equivalent.

1.34 "Research Plan" shall have the meaning set forth in Section 2.4 hereof.

1.35 "Research Program" shall mean all research activities undertaken under this Agreement associated with the identification and design of Compounds and Development Candidates as provided herein; including but not limited to the identification and initial testing of Compounds; the conduct of those activities referenced in the Development Candidate Criteria with respect to Compounds; selection of Development Candidates and the presentation of those Development Candidates and related Development Candidate Information to CFFT.

1.36 "Research Termination Date" shall mean the earlier of December 31, 2005 or the date upon which the Research Program is terminated under Article X.

1.37 "Termination Know-How Package" shall mean, for the Research Program generally or for a particular Program (Primary or Alternate) within the Research Program, as the context may require, (a) all data and study results (including formulae for calculating EC50 and efficacy) from *in vitro* and *in vivo* efficacy testing and experimentation conducted with respect to Compounds under that Program, pursuant to the applicable Research Plan or Subplan, all as recorded in electronic form in Vertex's electronic database known as VERDI (Vertex Research Data Interface), and including Compound structure information; (b) standard operating

procedures for the following assays: **[***]** all as conducted with commercially available instruments and equipment, and any other assay the creation of which was substantially paid for by CFFT under the Research Program or the Original Agreement and supported by medicinal chemistry during the Research Program or the Original Agreement; and (c) any physical stocks of Compounds from the Program which are on hand on the date of Interruption, and information on chemical routes Controlled by Vertex for synthesis of additional stocks of Compounds.

1.38 "Territory" shall mean worldwide.

1.39 "Third Party" shall mean any person or entity which is not a party or an Affiliate of any party to this Agreement.

1.40 "Third Party Referral" shall mean the procedure for resolution of certain disputes hereunder which is set forth in Section 12.2(b) hereof.

1.41 "Vertex CF Technology" shall mean all data, technical information, know-how, inventions (whether or not patented) trade secrets, processes and methods discovered or developed, and Controlled by Vertex or its Affiliates, in the course of its performance of the Research Program under this Agreement, or in the course of activities undertaken by Vertex or Aurora under the Original Agreement, and related to CFTR modulation; provided, however, that the term "Vertex CF Technology" shall not apply to Vertex's general drug design technology whether in hardware or software form, tangible or intangible.

1.42 "Vertex Patents" shall mean any Patents Controlled by Vertex or its Affiliates claiming Vertex CF Technology.

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ARTICLE II— RESEARCH PROGRAM

2.1 Commencement; Objective.

Research under the Original Agreement commenced on May 19, 2000 and is being continued under this Agreement pursuant to the Research Program described below. Vertex will be principally responsible for the conduct of the Research Program and CFFT will provide financial support, consultation and advice as provided herein and through its participation on the JRC and the JSC as provided below. The Research Program will be directed toward the identification of Development Candidates which are suitable for development and commercialization as human therapeutics for the treatment of CF.

2.2 Term.

The Research Program will be deemed to have commenced on the Effective Date, and will conclude on December 31, 2005, unless extended by agreement of the parties (including any such extension, the "Research Termination Date"), or unless earlier terminated in accordance with the provisions of Article X hereof. The parties may discuss at any time whether, and upon what basis, the Research Program might be extended beyond the initial Research Termination Date, and those discussions may include proposed extensions under Section 2.9 hereof.

2.3 Research Diligence.

The common objective of the parties is to identify Development Candidates as soon as practicable for worldwide development and marketing under the terms of this Agreement. Vertex will work diligently and use all reasonable efforts, consistent with prudent business judgment, to identify Development Candidates and to commence the development of those Development Candidates as Drug Product Candidates. Vertex will dedicate to the Research

Program at least that level of staffing referenced in Section 4.1 hereof, and expects to employ an optimal combination of experience and training in the CF Field.

2.4 Research Plan.

2.4.1 General. Vertex and CFFT have agreed upon an overall research plan for the Research Program, a copy of which is attached to this Agreement as Exhibit 2.4. The JRC will review and evaluate the Research Plan, taking into consideration ongoing research outcomes and other scientific and commercial developments, at each meeting of the JRC after the Effective Date, and any resulting modifications will be incorporated into the Research Plan (the original plan, and any such modifications are referred to herein as the "Research Plan"). Modifications to the Research Plan may be proposed by either Vertex or CFFT and will be reviewed by the JRC before being adopted. Any modification to the Research Plan that would (a) reduce the levels of FTE

resources to be devoted by Vertex to the Research Program below the minimum provided in Section 4.1; or (b) materially alter the overall allocation of Research Program resources between the Primary and the Alternate Program, from the allocation specified in Section 4.1 hereof or (c) materially alter the goals and/or scientific focus of the Research Plan, shall not be adopted without the approval of CFFT, which will act expeditiously on any such proposal made by Vertex.

2.4.2 Primary and Alternate Programs. Potentiators and Correctors are thought to operate through different CFTR modulator mechanisms. Based on research efforts conducted under the Original Agreement and during 2004, Vertex in consultation with CFFT will determine, on or before the end of 2004, whether in its judgment the development of Potentiators or Correctors represents the most promising approach to disease modification in the

Field, based on scientific, regulatory, medical and business considerations. Thereafter, Vertex's activities under the Research Program aimed at identifying Development Candidates which act through the mechanism deemed by Vertex to be the most promising — either Potentiator or Corrector — will be called the "Primary Program" of research, and research activity directed toward the other mechanism will be referred to as the "Alternate Program."

2.4.3 Primary and Alternate Subplans. As soon as practicable after the Primary and Alternate Programs have been designated, Vertex will prepare and submit to the JRC for its review and comment research plans for the Primary Program (a "Primary Subplan") and the Alternate Program (an "Alternate Subplan") in each case covering the balance of the time remaining until the Research Termination Date. The Plans will be accompanied by budgets for the remaining period prior to the Research Termination Date. The budgets will each specify the aggregate amounts allocated for internal FTE's and other costs and the aggregate amounts allocated for external FTE's and other costs, and will be otherwise consistent with the requirements of Section 4.1 hereof. The date upon which the Primary Subplan, the Alternate Subplan, and the related budgets have been submitted to the JRC shall be called the "Primary Program Designation Date."

2.5 CFFT Special Rights at Program Selection Point.

If CFFT shall disagree with Vertex's choice in designating the Primary Program, it may refer the matter to the JSC for review under Section 2.7.1(iii) hereof, and may in any event:

2.5.1 Accept any decision of the JSC and proceed accordingly; or

2.5.2 Terminate support of the Primary and Alternative Programs upon the terms and with the consequences specified in Section 10.5 hereof;

2.6 Joint Research Committee.

2.6.1 Composition and Purposes. Vertex and CFFT have established a Joint Research Committee ("**JRC**") consisting of at least **[***]** (as may be increased or decreased by the JRC), half of whom shall be designated from time to time by each party. If the JRC chooses to designate a Committee Chair, the Chair will be appointed from among the members of the Committee designated by VERTEX. The JRC shall meet formally no less frequently than once in each three (3) month period during the Research Program, and at such time and location, as may be established by the Committee, for the following purposes:

(i) To review reports prepared by Vertex, which shall be submitted to the JRC within fifteen (15) days prior to each meeting, and shall include a thorough summary in written text of progress made during the preceding three month period under the Research Plan (although chemical structures will only be disclosed to CFFT in the context of a publication referenced in Article VII hereof, or as part of the Termination Know-How Package provided to CFFT in connection with an Interruption) and to CFFT's chemistry advisors in accordance with the following sentence. Chemical Structures will be separately disclosed to CFFT's chemistry advisors serving on the JRC, who will agree to maintain the confidentiality of the structures, to allow them to fulfill their JRC

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responsibilities; provided that Vertex shall not be required to disclose structures to any advisors other than CFFT's chemistry advisors who are currently working with Vertex on CFFT's behalf, and to any other chemistry advisors approved by Vertex, which approval shall not be unreasonably withheld.

(ii) To review and discuss the Research Plan, and the Primary and the Alternate Subplans prepared by Vertex as provided in Section 2.4.3 above, and evaluate any proposed revisions to any of those Plans;

(iii) To assist Vertex in determining as soon as possible whether the Potentiator or Corrector approach should be the subject of the Primary Program; and

(iv) To review Development Candidates proposed by Vertex and to assess whether a given Development Candidate proposed by Vertex meets the Development Candidate Criteria.

Vertex shall prepare and deliver minutes of the meeting to the members of the JRC, within thirty (30) days after the date of each meeting, setting forth, *inter alia*, all decisions of the JRC, and including as an attachment the report on the progress of work performed required by Section 2.6.1(i).

2.6.2 Decision-Making.

(i) Each of Vertex and CFFT shall have one vote on the JRC. The objective of the JRC shall be to reach agreement by consensus on all matters within the scope of the Research Plan or any Subplan. However, in the event of a deadlock with respect to any action (which shall be deemed to have occurred if either party shall request a vote of the JRC on a matter and that vote shall either not be taken within thirty (30) days of the request or if taken shall result in a tie vote) and subject to the procedure set forth in subsections (ii) and (iii) below as to certain matters, the vote of Vertex, rendered after reasonable and open discussion among the members of the JRC, shall be final and controlling.

(ii) Notwithstanding the foregoing, with respect to JRC decisions

(x) as to which approach — Potentiator or Corrector — should be the subject of the Primary Program, any disagreement between the parties that cannot be resolved within thirty (30) days by the JRC shall be referred to the JSC and, failing agreement, Vertex's selection shall be controlling and CFFT shall have the alternatives set forth in Sections 10.5.1 and 10.5.3 below; and

(y) as to whether or not a given Compound proposed by Vertex as a Development Candidate actually

meet the Development Candidate Criteria, any disagreement between the parties that cannot be resolved within thirty (30) days by the JRC shall be referred to the JSC for resolution and if not resolved within seven (7) business days after referral, shall be referred for resolution by the Chief Executive Officer of Vertex and the Chief Executive Officer of CFFT, and failing resolution, the matter will be referred for final decision under the provisions of Section 12.2(b) of this Agreement; and

(z) as to the nature and extent of any additional Development Candidate Criteria referenced in Section 2.6.3 hereof, if any disagreement cannot be resolved by the JRC and the JSC as provided in (x) above, then there will be no change in the Development Candidate Criteria.

(iii) Notwithstanding the provisions of Section 2.6.2(i) hereof, if Vertex and CFFT deadlock on any matters being considered by the JRC which might have a significant impact on the time or likely success of the Research Program (other than those matters addressed in Section 2.6.2(ii) hereof), the matter shall be referred to the JSC for resolution in accordance with Section 2.7.1(iii) hereof.

(iv) Each party shall retain the rights, powers, and discretion granted to it under this Agreement, and the JRC shall not be delegated or vested with any such rights, powers or discretion except as expressly provided in this Agreement. The JRC shall not have the power to amend or modify this Agreement, which may only be amended or modified as provided in Section 12.15.

2.6.3 Additional Development Candidate Criteria. The parties acknowledge that it may be necessary or appropriate to adopt additional Development Candidate Criteria which more specifically define the pre-development characteristics of Compounds which the parties believe may be suitable for development and commercialization based upon the particular mode of action of that Compound as a Potentiator or Corrector. The parties will use good faith efforts through their respective representatives on the JRC to agree on any such additional Development Candidate Criteria as soon as practicable after a change is proposed to the JRC by either party. Any disagreements with respect to the selection of additional Development Candidate Criteria hereunder will be addressed as provided in Section 2.6.2(ii).

2.7 Joint Steering Committee.

2.7.1 Composition and Purposes. Vertex and CFFT have established and will continue to participate in a Joint Steering Committee ("JSC") which shall consist of an equal number of senior management personnel as may be agreed by the parties from time to time. The JSC shall initially have six (6) members. If the JSC chooses to designate a Committee Chair, the Chair will be appointed from among the members of the JSC designated by Vertex. The JSC

shall meet semi-annually, or with such other frequency, and at such time and location, as may be established by the Committee, for the following purposes:

(i) To provide general oversight of the Research Program ;

(ii) To periodically review the overall goals and strategy of the Research Program;

(iii) To discuss and attempt to resolve any deadlocked issues submitted to it by the JRC, although the vote of Vertex's representatives shall prevail if the JSC is unable to reach a consensus on any matter other than matters referred to it under Section 2.6.2(ii)(x) and 2.6.2 (ii)(z), which shall be resolved as provided therein.

2.8 Exchange of Information.

2.8.1 Vertex will share information with the JRC, as soon as it is available, necessary to facilitate mutual understanding of the status of the Research Program and decision-making in connection therewith.

2.8.2 CFFT shall not use Vertex CF Technology (excluding information which is no longer subject to confidentiality restrictions under Article V by reason of the exceptions set forth in Section 6.2) for any purpose, including the filing of patent applications containing such information, without Vertex's consent, except as otherwise explicitly permitted in this Agreement.

2.9 Extension of Research Termination Date.

Vertex and CFFT may extend the term of the Research Program, or the term of either the Primary Program or the Alternate Program, by mutual agreement. Any party desiring such an extension shall notify the other party in writing of that fact not less than sixty (60) days prior to the initial Research Termination Date. That notice shall include a summary of the material terms upon which the extension is proposed. The general expectation of the parties is that any such extension would be undertaken on terms substantially identical to those which appear in this Agreement, except that CFFT would bear only **[***]** of Vertex's on-going research costs. Any such proposal that relates to an extension of the Research Program, generally, shall be called a "Research Extension Proposal," and proposals that relate to extensions of the Primary Program or the Alternate Program, respectively, shall be called a "Primary Extension Proposal" or an "Alternate Extension Proposal."

2.10 Third Party Testing.

At CFFT's written request (a "Testing Request") delivered as provided below, Vertex will supply to an "Agreed Lab" reasonably adequate quantities of its "Lead Compounds" as necessary to enable the Agreed Lab to conduct *in vitro* testing of the efficacy and potency of the Lead Compounds in agreed CF assay models. All such testing will be undertaken at the expense of CFFT in addition to any funding otherwise provided hereunder.

An "Agreed Lab" is a commercial testing laboratory unaffiliated with either CFFT or Vertex and reasonably acceptable to both, which (a) specializes in rendering services to the pharmaceutical industry and has nationally recognized expertise in the testing of pharmaceutical

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compounds; (b) has a superior reputation for integrity in dealing with the proprietary information of others and would be free of any real or apparent conflict of interest in performing the services which are the subject of this Section 2.10; and (c) is bound by the terms of a confidentiality agreement with Vertex which is customary in form and content, which covers the testing contemplated by this Section 2.10, and which permits the Lab to report to CFFT, directly, the results which it obtains with respect to efficacy and potency of the Lead Compounds, but only those results.

A "Testing Request" is a written request relating to the testing of Lead Compounds from either or both of the Primary and the Alternate Programs, which is delivered by CFFT to Vertex during any of the following periods: (i) the ninety day period beginning on the Primary Program Designation Date; (ii) the ninety day period prior to the due date for delivery to Vertex of any Early Termination Notice under Section 10.5.2 hereof; and (iii) the sixty day period beginning with the delivery by either party to the other of a Research Extension Proposal as provided in Section 2.9 hereof.

"Lead Compounds" shall mean not more than two Compounds from each Program — Primary or Alternate - for which a Testing Request is delivered, none of which are a Development Candidate, which meet the following criteria: (i) the Compound(s) have been selected by Vertex from the Primary Program and/or the Alternate Program, as relevant to the Testing Request (assuming CFFT has not terminated the Alternate Program under the provisions of Section 10.5.3 hereof); (ii) each Compound will be representative of those Compounds in each Program which Vertex believes to be the most promising as potential Drug Products; and

(iii) each Compound shall have been previously tested by Vertex, *in vitro*, as to potential efficacy and potency in CF, and the results of that testing shall have been provided to CFFT.

Vertex and CFFT acknowledge that commercially available assays for the testing of Lead Compounds may yield results which are less robust than the results obtained by Vertex in its own proprietary assays. The parties also acknowledge that the transfer of Vertex's proprietary assays to an Agreed Lab may be difficult, and the results less than satisfactory, without a commitment of substantial time and effort by Vertex which, if undertaken, may adversely impact the progress of the Research Program. Therefore, the parties agree that Vertex's responsibility for the testing provided under this Section 2.10 shall be

limited as follows: (a) Vertex will cooperate with CFFT in the selection of an Agreed Lab as soon as practicable following the Effective Date, as may be requested by CFFT, and thereafter will assist in the determination whether commercially available assays conducted by the Lab are likely to provide satisfactory results; (b) Vertex will provide the Lab with requisite amounts of each Lead Compound, in connection with formal Testing Requests from CFFT as provided above, and up to three additional Compounds from each of the Primary or Alternate Programs, out of any supplies which Vertex may have on hand, the chemical structures of which have been published by Vertex in peer-reviewed journals or through posters or presentations at scientific conferences, which the Agreed Lab may use for control purposes; (c) Vertex will provide telephone consulting to appropriate representatives of the Agreed Lab concerning applicable assay methodology; (d) if the parties conclude that conventional testing will not yield adequate results, and upon the formal written request of CFFT rendered with due regard to **[***]** to establish an assay based on proprietary protocols from Vertex, Vertex will provide its proprietary assay protocol to the Agreed Lab sufficiently in

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advance of any testing provided for in this Section 2.10 to accommodate such testing, under provisions of confidentiality, restricted access and non-use (for other than testing hereunder), and will ensure that appropriate Vertex representatives are available by telephone from time to time to answer questions and otherwise assist the Agreed Lab representatives in their efforts to establish Vertex's proprietary assay. Vertex shall in no event be responsible for any failure by the Agreed Lab to establish an effective assay using Vertex's protocols, nor shall any time periods provided herein for action by CFFT be extended by reason of any such failure.

ARTICLE III- DEVELOPMENT

3.1 Commencement of Development Program.

As soon as Vertex has identified a Development Candidate which it believes meets the Development Candidate Criteria, it will so notify CFFT and the JRC and will include with that notice the Development Candidate Information with respect to that Development Candidate and its Back-up Compounds. Vertex will promptly commence and pursue a Development Program with respect to that Development Candidate, at its expense, applying diligent, commercially reasonable efforts to develop Drug Product Candidates into Drug Products, consistent with those used by Vertex for its own compounds of similar potential.

3.2 Joint Development Committee.

3.2.1 Formation and Responsibilities. As soon as practicable after the commencement by Vertex of a Development Program with respect to a Drug Product Candidate, VERTEX will establish a Joint Development Committee ("JDC") which shall include a

representative designated by CFFT. Additional JDC's, which shall also include one CFFT representative, may be established from time to time in connection with the development of additional Drug Product Candidates. The JDC (or its successor organization, as designated by Vertex) will be the principal organization through which the development of a Drug Product Candidate is planned, administered, evaluated and completed, subject to appropriate review and approval at senior management levels as required by VERTEX from time to time. In addition to the CFFT member, the JDC will typically have members from the various functional groups (e.g., research, preclinical safety, clinical, regulatory, marketing) which are or will be expected to be involved in development and launch of the Drug Product Candidate. VERTEX will appoint the JDC Chair. The JDC will typically meet at least quarterly, depending on the level of current development activity, and will be responsible for preparation and implementation of the Development Plan described in Section 3.2.2 below with respect to each Drug Product Candidate.

3.2.2 Development Plan. The JDC shall be responsible for review of the goals and strategy for development of each Drug Product Candidate and shall prepare and oversee the implementation of an overall Development Plan for each Drug Product Candidate. The Development Plan shall, among other things, detail, schedule and fully describe the proposed toxicology studies, clinical trials, regulatory plans, clinical trial and commercial material requirements, and process development and manufacturing plans for each Drug Product Candidate, along with relevant budget information for the described items, and will outline the key elements involved in obtaining Regulatory Approval in each country where the Drug Product is to be marketed.

3.2.3 Meeting Materials. The JDC will consider all information that is material to an assessment of the status, direction and progress of the Development Program, including all clinical trials protocols, data and reports. The JDC Chair will ensure that minutes are prepared and distributed to each member of the JDC promptly after each meeting. Those minutes shall contain a report on the activities of the JDC during its meeting. CFFT's representative on the JDC will receive all documents and information distributed or communicated to members of the JDC, and may review copies of all other information material to the development of a Drug Product Candidate unless the JDC denies access to that information for demonstrable competitive reasons.

3.2.4 CFFT and its Affiliates will use good faith efforts to enlist the Therapeutic Development Network and its resources and expertise in support of the development efforts for each Drug Product Candidate, and will involve appropriate Vertex representatives in that effort.

3.3 Development Responsibility and Costs.

Vertex will have sole responsibility for, and bear the cost of conducting, the Development Program with respect to each Drug Product Candidate.

3.4 Regulatory Approvals.

Vertex shall be solely responsible for preparing and submitting registration dossiers for Regulatory Approval of Drug Product Candidates in the Territory.

3.4.1 Vertex Ownership. All Regulatory Approvals shall be held by and in the name of Vertex, and Vertex shall own all submissions in connection therewith.

3.4.2 Principal Interface. All formulary or marketing approvals shall also be obtained by and in the name of Vertex, and Vertex will be the principal interface with and will otherwise handle all interactions with regulatory agencies concerning any Drug Product.

3.4.3 Regulatory Meetings. If requested by Vertex, CFFT will arrange for one or more representatives of CFFT to participate in meetings between representatives of Vertex and any of the FDA, the EMEA and Koseisho (MHW Japan), to the extent that Vertex reasonably believes that representatives from CFFT would further the regulatory approval process.

ARTICLE IV — PAYMENTS

4.1 Staffing and Research Support Payments.

CFFT will make the payments to Vertex specified below during 2004 and 2005 in support of the Research Program under this Agreement.

[***]

Vertex will dedicate a minimum average **[***]** during its term, **[***]**. Unless otherwise agreed in writing by CFFT, from and after the earlier of the date upon which Vertex notifies CFFT of its selection of a Primary and an Alternate Program, Vertex will devote **[***]** to the Alternate Program, and will apply **[***]**. Subject to the foregoing requirements, the research support specified above can be allocated as Vertex may determine in good faith between

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in-house and outside resources, between the Primary Program and the Alternative Program, and between and among individual budget line items.

4.2 Budget.

The initial budget for the Research Program is attached hereto as Exhibit 4.2 (the "Initial Budget"). Any material revisions to the Initial Budget which would result in an increase in total funding for the Research Program, or which are specified in Section 2.4.1, will require the prior approval of CFFT. Any other adjustments to the Research Program budget may be undertaken by Vertex with prior notice to, but without prior approval from, CFFT. The Initial Budget as revised or adjusted pursuant to the foregoing and in effect at any given time, shall be called the "Current Budget." Vertex will provide CFFT with quarterly reports, within thirty (30) days after the end of each quarter, showing expenses incurred under the Research Program during the quarter just ended against budgeted expenses for that quarter.

4.3 Payments.

Payments due under the Current Budget on account of internal FTEs shall be made by CFFT **[***]**. Payments due under the Current Budget on account of external costs shall be made by CFFT **[***]**. All payments shall be made without deduction for withholding or other similar taxes, in United States dollars to the credit of such bank account as may be designated by Vertex in writing to CFFT. Any payments which fall due on a date which is a legal holiday in The Commonwealth of Massachusetts may be made on the next following day which is not a legal holiday in the Commonwealth. On or before each of March 1, 2005 and March 1, 2006, Vertex will provide CFFT with an accounting of all internal FTE costs and outsourcing costs incurred under the Research Program during the most recently concluded

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calendar year. Internal FTE costs will be calculated **[***]**. Costs incurred will be compared with funds provided by CFFT on account of that year, and **[***]**.

4.4 Clinical Trial Commencement Milestone.

CFFT will pay to Vertex **[***]** with respect to the first Drug Product Candidate under the Research Program to commence human clinical trials of that Drug Product Candidate in any country with a generally accepted system of Regulatory Approvals. The first human clinical trial of a Drug Product Candidate will be deemed to have commenced when that Candidate is first dosed in a human under a clinical trial protocol which has been approved by the relevant oversight authority in the country in which the trial is being conducted. Payment with respect to a Drug Product Candidate will be made within thirty (30) days after receipt by CFFT of notice from Vertex that human clinical trials of that Drug Product Candidate have commenced.

4.5 Records.

Vertex shall keep accurate records and books of accounts containing all data reasonably required for the calculation and verification of FTE's employed, and outsourcing costs incurred, by Vertex in the Research Program. CFFT, through an independent accounting firm unaffiliated with either CFFT or Vertex, shall have the right at its expense to audit Vertex's relevant records to verify compliance with FTE and other research funding allocation requirements hereunder.

At CFFT's request, VERTEX shall make those records available, no more than once a year, during reasonable working hours, for review by a recognized independent

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accounting firm acceptable to both parties, at CFFT's expense, for the sole purpose of verifying the accuracy of those records in the calculation of Research Program FTEs and outsourcing costs. Vertex shall not, however, be required to retain or make available to CFFT or its accountants, any such records or books of account for either 2004 or 2005, beyond thirty-six (36) months from the termination of the Research Program. CFFT shall cause the accounting firm to retain all such information in confidence.

In the event that the aggregate costs actually chargeable to the Research Program during any year are less than the amount previously advanced to Vertex by CFFT and properly attributable to that year (a "Negative Difference"), in addition to reimbursing CFFT for the Negative Difference plus interest calculated at **[***]** if the Negative Difference is more than **[***]** then Vertex shall also pay the reasonable costs of the independent accountant employed by CFFT in the review.

4.6 Payments Due Under the Original Agreement.

Vertex acknowledges that no further milestone payments, beyond those made to Vertex prior to the Effective Date of this Agreement under the Original Agreement. Outsource costs incurred by Vertex under the Original Agreement prior to the Effective Date will be reimbursed by CFFT under the terms of the Original Agreement from available funds provided under the Original Agreement. Except as specified in the preceding sentence, neither Vertex nor CFFT shall have any remaining obligations under the Original Agreement after the Effective Date.

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ARTICLE V — COMMERCIALIZATION; ROYALTIES

5.1 Marketing and Promotion.

Vertex and/or its licensees and sublicensees shall have exclusive rights to market, sell and distribute all Drug Products in the Territory, subject to the Special CFFT Rights provided in Sections 10.5 and 10.6 below.

5.2 Due Diligence.

Vertex shall use diligent and commercially reasonable efforts consistent with the requirements of the Development Program and sound and reasonable business practices and judgment to effect introduction of Drug Products into major markets in North America and Europe as soon as reasonably practicable, devoting the same degree of attention and diligence to those efforts that it devotes to similar activities for its other products of comparable market potential.

5.3 Royalties.

5.3.1 Net Sales in the Field. Vertex shall pay to CFFT the following royalties on annual Net Sales of each Drug Product:

[***]

[***] Net Sales under this Section 5.3.1 shall not in any event include any Net Sales of Drug Products which are the subject of the royalty obligations set forth in Sections 5.3.2, 10.5.4, 10.5.5, and 10.5.6 hereof.

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5.3.2 Net Sales outside the Field. Vertex shall pay CFFT a royalty of **[***]** of annual Net Sales of each Drug Product for use outside the Field.

5.4 Sales Reports.

(a) After the First Commercial Sale of a Drug Product, Vertex shall furnish or cause to be furnished to CFFT on a quarterly basis a written report or reports covering each calendar quarter (each such calendar quarter being sometimes referred to herein as a "reporting period") within sixty days after the close of each quarter showing, for Net Sales in the Field and, separately, for Net Sales outside the Field, (i) the Net Sales of each Drug Product

in each country in the world during the reporting period by Vertex and each Affiliate, licensee and sublicensee; (ii) the royalties, payable in U.S. dollars ("Dollars"), which shall have accrued under Section 5.3 hereof in respect of such sales and the basis of calculating those royalties; (iii) withholding taxes, if any, required by law to be deducted from any royalties payable in respect of any such sales; (iv) the exchange rates used in converting into Dollars, from the currencies in which sales were made, any payments due which are based on Net Sales; and (v) dispositions of Drug Products other than pursuant to sale for cash. With respect to sales of Drug Products invoiced in Dollars, the Net Sales amounts and the amounts due to CFFT hereunder shall be expressed in Dollars. With respect to sales of Drug Products invoiced in a currency other than Dollars, the Net Sales and amounts due to CFFT hereunder shall be expressed in the domestic currency of the party making the sale, together with the Dollar equivalent of the amount payable to CFFT, calculated by translating foreign currency sales into U.S. dollars based on the average of the exchange rates

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reported in *The Wall Street Journal* or comparable publication over the period covered by the royalty report. If any licensee or sublicensee makes any sales invoiced in a currency other than its domestic currency, the Net Sales shall be converted to its domestic currency in accordance with the licensee's or sublicensee's normal accounting principles. Vertex shall furnish to CFFT appropriate evidence of payment of any tax or other amount required by applicable laws or regulations to be deducted from any royalty payment payable by Vertex to CFFT pursuant to this Agreement, including any tax or withholding levied by a foreign taxing authority in respect of the payment or accrual of any royalty. Reports shall be due on the thirtieth (30th) day following the close of each reporting period, although Vertex shall also provide CFFT with a "flash" report of Net Sales, only, within ten (10) business days after the end of each month. Vertex shall keep accurate records in sufficient detail to enable the amounts due hereunder to be determined and to be verified by CFFT.

(b) Amounts shown to have accrued by each sales report provided for under Section 5.4(a), above, shall be due and payable on the date that sales report is due.

(c) All payments shall be made in Dollars. If at any time legal restrictions prevent the prompt remittance of any payments with respect to any country in the Territory where Drug Products are sold, Vertex or its sublicensees shall have the right and option to make such payments by depositing the amount thereof in local currency to CFFT's account in a bank or depository in such country.

(d) Upon the written request of CFFT, at CFFT's expense and not more than once in or in respect of any calendar year, Vertex shall permit an independent accountant of national prominence selected by CFFT, to have access during normal business hours to those records of Vertex as may be reasonably necessary to verify the accuracy of the sales reports

furnished by Vertex pursuant to this Section 5.4, in respect of any calendar year ending not more than thirty-six (36) months prior to the date of such notice. The report prepared by such independent accountant, a copy of which shall be sent or otherwise provided to Vertex by such independent accountant at the same time it is sent or otherwise provided to CFFT, shall contain the conclusions of such independent accountant regarding the audit and will specify that the amounts paid to CFFT pursuant thereto were correct or, if incorrect, the amount of any underpayment or overpayment. If such independent accountant's report shows any underpayment, Vertex shall remit to CFFT within thirty (30) days after Vertex's receipt of such report, (i) the amount of such underpayment plus interest at the Prime Rate plus two (2) percentage points calculated from the date such payment is due, and (ii) if such underpayment exceeds **[***]** then being audited, the reasonable and necessary fees and expenses of such independent accountant performing the audit, subject to reasonable substantiation thereof. Any overpayments shall be fully creditable against amounts payable in subsequent payment periods. CFFT agrees that all information subject to review under this Section 5.4 or under any sublicense agreement is confidential and that CFFT shall retain and cause its accountant to retain all such information in confidence. Upon the expiration of thirty-six (36) months following the end of any calendar year, the calculation of amounts payable with respect to such fiscal year shall be binding and conclusive upon CFFT, and Vertex shall be released from any liability or accountability with respect to payments for such year.

(e) In case of any delay in payment by Vertex to CFFT not occasioned by Force Majeure, interest shall be calculated at the **[***]** from the tenth (10^{th}) day after the due date of the payment, shall be due from Vertex.

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5.5 Vertex First Negotiation Right re: CFF Royalty Disposition.

If CFFT should wish to assign, sell or otherwise transfer rights in or to any of the royalty payments due or to become due from Vertex, its Affiliates, successors, assignees, licensees or sublicensees under any of the provisions of this Agreement, or to undertake any transaction which would have the same or a similar effect as any such assignment, sale or transfer, it will provide Vertex with sixty (60) days prior written notice (a "Transfer Notice"), and during that sixty day period will at Vertex's request negotiate with Vertex in good faith, with the objective of reaching an agreement under which those CFFT rights which were the subject of the Transfer Notice would be assigned, sold or transferred to Vertex, its successors or assigns in lieu of an assignment, sale, transfer or other transaction to or with a Third Party. If at the end of the sixty day period referenced above Vertex and CFFT have been unsuccessful in negotiating mutually agreeable terms of assignment, sale or transfer, then CFFT shall be under no further obligation to Vertex under this Section 5.5, unless it shall not conclude a transaction with a Third Party covering the rights which were the subject of the initial Transfer Notice within twelve (12) months after the

date of delivery of that Transfer Notice, in which event any subsequent effort to assign, sell or transfer any of those rights shall be once again subject to the terms of this Section 5.5.

ARTICLE VI - CONFIDENTIALITY

6.1 Undertaking.

During the term of this Agreement, each party shall keep confidential, and other than as provided herein shall not use or disclose, directly or indirectly, any trade secrets,

confidential or proprietary information, or any other knowledge, information, documents or materials, owned, developed or possessed by the other party, whether in tangible or intangible form, the confidentiality of which such other party takes reasonable measures to protect ("Confidential Information"). Neither CFFT nor Vertex will use the other party's Confidential Information except as expressly permitted in this Agreement

(a) Each party shall take any and all lawful measures to prevent the unauthorized use and disclosure of the other party's Confidential Information, and to prevent unauthorized persons or entities from obtaining or using that Information.

(b) Each party will refrain from directly or indirectly taking any action which would constitute or facilitate the unauthorized use or disclosure of the other party's Confidential Information. Each party may disclose that Information to its officers, employees and agents, to authorized licensees and sublicensees, and to subcontractors in connection with the development or manufacture of Drug Candidates, Drug Product Candidates or Drug Products, to the extent necessary to enable such parties to perform their obligations hereunder or under the applicable license, sublicense or subcontract, as the case may be; provided, that such officers, employees, agents, licensees, sublicensees and subcontractors have entered into appropriate confidentiality agreements for secrecy and non-use of such Confidential Information which by their terms shall be enforceable by injunctive relief at the instance of the disclosing party.

(c) Each party shall be liable for any unauthorized use and disclosure of the other party's Confidential Information by its officers, employees and agents and any such sublicensees and subcontractors.

6.2 Exceptions.

Notwithstanding the foregoing, the provisions of Section 6.1 hereof shall not apply to Confidential Information which the receiving party can conclusively establish:

(a) has entered the public domain without such party's breach of any obligation owed to the disclosing party;

(b) is permitted to be disclosed by the prior written consent of the disclosing party;

(c) has become known to the receiving party from a source other than the disclosing party, other than by breach of an obligation of confidentiality owed to the disclosing party;

(d) is disclosed by the disclosing party to a Third Party without restrictions on its disclosure;

(e) is independently developed by the receiving party without breach of this Agreement; or

(f) is required to be disclosed by the receiving party to comply with applicable laws or regulations, to defend or prosecute litigation or to comply with governmental regulations, provided that the receiving party provides prior written

notice of such disclosure to the disclosing party and takes reasonable and lawful actions to avoid or minimize the degree of such disclosure.

Either Vertex or CFFT may at any time, by notice in writing to the other party, waive any or all of the confidentiality obligations to which the other party is subject hereunder, for any length or time or with respect to any specific information.

6.3 Publicity.

The parties will agree upon the timing and content of any initial press release or other public communications relating to this Agreement and the transactions contemplated herein.

(a) Except to the extent already disclosed in that initial press release or other public communication, no public announcement concerning the terms of this Agreement or concerning the transactions described herein shall be made, either directly or indirectly, by Vertex or CFFT, except (i) as may be legally required by applicable laws, regulations, or judicial order, or (ii) if limited to the fact that the Research

Program exists, that research is in progress, and its anticipated completion without first obtaining the approval of the other party and agreement upon the nature, text, and timing of such announcement, which approval and agreement shall not be unreasonably withheld.

(b) The party desiring to make any such public announcement shall provide the other party with a written copy of the proposed announcement in

sufficient time prior to public release to allow such other party to comment upon such announcement, prior to public release.

6.4 Survival.

The provisions of this Article VI shall survive the termination of this Agreement and shall extend **[***]**.

ARTICLE VII - PUBLICATION

Each of Vertex and CFFT reserves the right to publish or publicly present the results (the "Results") of the Research Program, subject to the following terms and conditions. The party proposing to publish or publicly present the Results (the "publishing party") will submit a draft of any proposed manuscript or speech to the other party (the "non-publishing party") for comments at least **[***]** prior to submission for publication or oral presentation. The non-publishing party shall notify the publishing party in writing **[***]** of receipt of such draft whether such draft contains (i) information of the non-publishing party which it considers to be confidential under the provisions of Article VI hereof, (ii) information that if published would have an adverse effect on a patent application covering the subject matter of this Agreement which the non-publishing party intends to file, or (iii) information which the non-publishing party reasonably believes would be likely to have a material adverse impact on the development or commercialization of a Drug Product Candidate. In any such notification, the non-publishing party shall indicate with specificity its suggestions regarding the manner and degree to which the publishing party may disclose such information. In the case of item (ii) above, the non-

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publishing party may request a delay and the publishing party shall delay such publication, for a period not exceeding **[***]**, to permit the timely preparation and filing of a patent application or an application for a certificate of invention on the information involved. In the case of item (i) above, no party may publish Confidential Information of the other party without its consent in violation of Article V of this Agreement. In the case of item (iii) above, if the publishing party shall disagree with the non-publishing party's assessment of the impact of the publication, then the issue shall be referred to the JSC for resolution. If the JSC is unable to reach agreement on the matter within thirty (30) days after such referral, the matter shall be referred by the JSC to the Chief Executive Officer of CFFT and the Chief Executive Officer of Vertex who shall attempt in good faith to reach a fair and equitable resolution of this disagreement. If the disagreement is not resolved in this manner within two (2) weeks of referral by the JSC as aforesaid, then the decision of the publishing party as to publication of any information generated by it, subject always to the confidentiality provisions of Article V hereof, shall be final, provided that such decision shall be exercised with reasonable regard for the interests of the non-publishing party. The parties agree that authorship of any publication will be determined based on the customary standards then being applied in the relevant scientific journal, and that appropriate credit will be acknowledged when the subject matter of a publication is derived in whole or in significant part from Vertex CF Technology or inventions licensed by CFFT pursuant to Section 9.1 of this Agreement. The parties will use their best efforts to gain the right to review proposed publications relating to the subject matter of the Research Program by consultants or contractors.

Notwithstanding the foregoing, Vertex intends to advance the body of general scientific knowledge of CF and its potential therapies, and to contribute to the identification of chemical tools as optimal scientific benchmarks, all in a manner consistent with its general scientific and

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commercial objectives in entering into the collaboration with CFFT to which this Agreement relates. In furtherance of that objective, Vertex would expect, after giving due consideration to the appropriate protection of intellectual property, to publish information in peer-reviewed scientific journals concerning its efforts under the Research Program, including chemical structural information about at least two Compounds. Vertex will include as co-authors of any such publication contributing CFFT personnel and consultants and other persons who would customarily be considered in that regard, including members of the JRC as appropriate. CFFT's financial contribution to the Research Program also will be acknowledged.

This Article VII shall survive the termination of this Agreement for five (5) years from the date of such termination.

ARTICLE VIII - INDEMNIFICATION

8.1 Indemnification by Vertex.

Vertex will indemnify and hold CFFT and its Affiliates, and their employees, officers and directors harmless against any loss, damages, action, suit, claim, demand, liability, expense, bodily injury, death or property damage (a "Loss"), that may be brought, instituted or arise against or be incurred by such persons to the extent such Loss is based on or arises out of:

(a) the development, manufacture, use, sale, storage or handling of a Compound, a Development Candidate, a Drug Product Candidate or a Drug Product by VERTEX or its Affiliates or their representatives, agents, authorized

licensees, sublicensees or subcontractors under this Agreement, or any actual or alleged violation of law resulting therefrom; or

(b) the breach by Vertex of any of its covenants, representations or warranties set forth in this Agreement; and

(c) provided however, that the foregoing indemnification shall not apply to any Loss to the extent such Loss is caused by the negligent or willful misconduct of CFFT or its Affiliates.

8.2 Indemnification by CFFT.

CFFT will indemnify and hold Vertex, and its Affiliates, and their employees, officers and directors harmless against any Loss that may be brought, instituted or arise against or be incurred by such persons to the extent such Loss is based on or arises out of:

(a) the development, manufacture, use, sale, storage or handling of a Compound, a Development Candidate, a Drug Product Candidate or a Drug Product by CFFT or its Affiliates or their representatives, agents, authorized licensees, sublicensees or subcontractors under this Agreement, or any actual or alleged violation of law resulting therefrom; or

(b) the breach by CFFT of any of its covenants, representations or warranties set forth in this Agreement; and

(c) provided that the foregoing indemnification shall not apply to any Loss to the extent such Loss is caused by the negligent or willful misconduct of Vertex or its Affiliates.

8.3 Claims Procedures.

Each Party entitled to be indemnified by the other Party (an "Indemnified Party") pursuant to Section 8.1 or 8.2 hereof shall give notice to the other Party (an "Indemnifying Party") promptly after such Indemnified Party has actual knowledge of any threatened or asserted claim as to which indemnity may be sought, and shall permit the Indemnifying Party to assume the defense of any such claim or any litigation resulting therefrom; provided:

(a) That counsel for the Indemnifying Party, who shall conduct the defense of such claim or any litigation resulting therefrom, shall be approved by the Indemnified Party (whose approval shall not unreasonably be withheld) and the Indemnified Party may participate in such defense at such party's expense (unless (i) the employment of counsel by such Indemnified Party has been authorized by the Indemnifying Party; or (ii) the Indemnified Party shall have reasonably concluded that there may be a conflict of interest between the Indemnifying Party and the Indemnified Party in the defense of such action, in each of which cases the Indemnifying Party shall pay the reasonable fees and expenses of one law firm serving as counsel for the Indemnified Party, which law firm shall be subject to approval, not to be unreasonably withheld, by the Indemnifying Party); and

(b) The failure of any Indemnified Party to give notice as provided herein shall not relieve the Indemnifying Party of its obligations under this Agreement to the extent that the failure to give notice did not result in harm to the Indemnifying Party.

(c) No Indemnifying Party, in the defense of any such claim or litigation, shall, except with the approval of each Indemnified Party which approval shall not be unreasonably withheld, consent to entry of any judgment or enter into any settlement which (i) would result in injunctive or other relief being imposed against the Indemnified Party; or (ii) does not include as an unconditional term thereof the giving by the claimant or plaintiff to such Indemnified Party of a release from all liability in respect to such claim or litigation.

(d) Each Indemnified Party shall furnish such information regarding itself or the claim in question as an Indemnifying Party may reasonably request in writing and shall be reasonably required in connection with the defense of such claim and litigation resulting therefrom.

ARTICLE IX— PATENTABLE INVENTIONS

9.1 Ownership.

All inventions made and all Know-How generated exclusively by either party or its Affiliates (directly or through others acting on its behalf) prior to and during the term of this Agreement relating to the Research Program shall be owned by the party making the invention or generating the Know-How claimed, or if such invention is made jointly (a "Joint Invention"), shall be owned jointly, all as determined in accordance with United States laws of inventorship; provided that, CFFT hereby grants to Vertex an exclusive (even as to CFFT worldwide) license

to its rights in any Joint Invention and any CFFT invention resulting from the Research Program for the purposes specified in this Agreement.

9.2 Preparation.

Vertex shall take responsibility for the preparation, filing, prosecution and maintenance of all Vertex Patents, and any patents and patent applications claiming Joint Inventions, and CFFT shall take responsibility for the preparation, filing, prosecution and maintenance of all CFFT Patents. Vertex shall provide the JRC with periodic reports listing, by name, Patents filed by Vertex in the United States and other jurisdictions, along with a general summary of the claims made and the jurisdictions of filing.

9.3 Costs.

[***]

ARTICLE X — TERM AND TERMINATION

10.1 Term.

This Agreement will extend until the Research Termination Date as defined herein, unless earlier terminated by either party hereto in accordance with this Agreement, or unless extended by mutual agreement of the parties.

* Information redacted pursuant to a confidential treatment request. An unredacted version of this exhibit has been filed separately with the Commission.

10.2 Termination of the Research Program by CFFT for Cause.

Upon written notice to Vertex, CFFT may at its sole discretion unilaterally terminate the Research Program and this Agreement upon the occurrence of any of the following events:

(a) Vertex shall materially breach any of its material obligations under this Agreement, and such material breach shall not have been remedied or material steps initiated to remedy the same to CFFT's reasonable satisfaction, within thirty (30) days after CFFT sends written notice of breach to Vertex; or

(b) Vertex shall cease to function as a going concern by suspending or discontinuing its business for any reason except for interruptions caused by events of Force Majeure.

In the event of any valid termination under this Section 10.2, CFFT shall not be required to make any payments under Section 3.2 hereof which have not accrued prior to receipt by Vertex of the notice of breach referenced under Section 10.2(a) or receipt by Vertex of the notice of termination pursuant to Section 10.2(b), as the case may be.

10.3 Termination of the Research Program by Vertex for Cause.

Vertex may at its sole discretion terminate this Agreement upon written notice to CFFT upon the occurrence of the following event:

CFFT shall materially breach any of its material obligations under this Agreement and such material breach shall not have been remedied or material steps initiated to remedy the

same to Vertex's reasonable satisfaction, within thirty (30) days after Vertex sends written notice of breach to CFFT.

10.4 General Effect of Termination.

(a) Except where explicitly provided elsewhere herein, termination of this Agreement for any reason, or expiration of this Agreement, will not affect: (i) obligations which have accrued as of the date of termination or expiration, and (ii) obligations and rights which, expressly or from the context thereof, are intended to survive termination or expiration of this Agreement. Without limitation, the following shall survive termination either indefinitely or for the period so stated: Section 2.9 (for the limited purposes of completing a Testing Request with respect to a Development Candidate after the Research Termination Date) and Articles III, V, VI, VII, VIII, IX, XI and XII.

(b) Upon termination or expiration of this Agreement, Vertex will retain exclusive rights to Vertex CF Technology and the inventions licensed to it by CFFT pursuant to Section 9.1 of this Agreement (including intellectual property), except CFFT shall hold those

rights specified under Sections 10.5 and 10.6 hereof, as applicable.

10.5 CFFT Special Termination Rights.

CFFT at its sole discretion may exercise the following Special Termination Rights at or within the time period stated, before the Research Termination Date.

10.5.1 Termination after Program Designation. At any time after the Primary Program Designation Date referenced in Section 2.4 hereof, CFFT may request in writing (a "Selection Disagreement Notice") that Vertex reconsider its Primary Program choice and its primary focus on either Potentiators or Correctors. If Vertex does not elect by written notice to CFFT to amend its choice and select for the Primary Program the mode of action (i.e., Potentiator or Corrector), preferred by CFFT (the "Preferred CFFT Mode of Action"), then the Agreement will terminate effective sixty (60) days following receipt by Vertex of the Selection Disagreement Notice, unless that Notice is earlier withdrawn by CFFT by further notice in writing delivered to Vertex within sixty (60) days after receipt by Vertex of the Selection Disagreement Notice.

10.5.2 Early Termination. At its sole discretion, CFFT may terminate this Agreement effective June 30, 2005, upon not less than sixty (60) days prior written notice to Vertex, (an "Early Termination Notice").

10.5.3 Alternate Program Termination. CFFT may by written notice delivered to Vertex (the "Alternate Program Termination Notice") elect to terminate the Alternate Program and all funding which under the Current Budget would have been allocated to the Alternate Program after the effective date of termination. Termination will be effective on the 30th day following receipt by Vertex of the Alternate Program Termination Notice (the "Alternate Program Termination Date"). Notwithstanding such Termination, CFFT will reimburse Vertex during the ninety (90) days following such Termination for all outsourced costs **[***]**. From and after the date the Alternate Program Termination Notice is received by Vertex, CFFT will not be obligated to fund any other outsourcing costs allocated in the Current Budget to the

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Alternate Program. Funding for FTEs which are allocated to the Alternate Program may at Vertex's discretion, after consultation with CFFT, be allocated to provide additional FTE support for the Primary Program. The required minimum FTE level set forth in Section 4.1 hereof will be adjusted as appropriate to reflect termination of the Alternate Program as provided herein.

10.5.4 Upon the effective date of termination of this Agreement under Section 10.5.1 above, Vertex hereby grants to CFFT and its Affiliates an exclusive, worldwide license, with the right to sublicense, under the Vertex CF Technology to make, have made, use, have used, import, offer for sale, sell and have sold drug products in the Field for which the principal mode of action is the Preferred CFFT Mode of Action, and the license to Vertex of inventions pursuant to Section 9.1 of this Agreement regarding such Mode of Action shall terminate. In consideration of the foregoing license, CFFT will pay Vertex **[***]**.

10.5.5 In the event this Agreement is terminated by CFFT under Section 10.5.2 hereof, and in lieu of any other obligations (including royalty obligations under Section 5.3 hereof) owed by Vertex to CFFT hereunder except obligations that explicitly survive termination of this Agreement, Vertex shall pay CFFT **[***]**.

10.5.6 In the event the Alternate Program is terminated by CFFT under Section 10.5.3 hereof, and Vertex thereafter sells a Drug Product in the Field which relies for its principal therapeutic effect in the Field on the mode of action which was the subject of the Alternate Program, then in lieu of the royalty obligation set forth in Section 5.3 hereof, Vertex will pay to CFFT **[***]**.

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10.5.7 For purposes of Section 10.5.5 and 10.5.6, a product shall constitute a Drug Product even though the notice for a Development Candidate specified in Section 1.11 has not been issued by Vertex.

10.6 Consequences of an Interruption.

10.6.1 For purposes of this Agreement, an "Interruption" shall be deemed to have occurred in any of the following circumstances:

(a) with respect to either the Primary Program or the Alternate Program, considered separately, if at any time after the Research Termination Date and before a Drug Product is achieved, Vertex or its Affiliates, licensees, sublicensees, assignees or partners (collectively, and for purposes of this Section 10.6 only, "Vertex") either, as applicable, (i) ceases reasonable research efforts directed toward identification of a Development Candidate, or (ii) ceases reasonable development efforts with respect to a Development Candidate (if one has been designated by Vertex), for a period of more than 180 consecutive days, and CFFT delivers written notice (an "Interruption Notice") to Vertex stating that an Interruption under this Section 10.6 has occurred; provided that an Interruption will not be deemed to have occurred

with respect to a Development Candidate unless Vertex commences reasonable development efforts with respect to another Development Candidate from the same Program, within thirty (30) days after receipt of any such Interruption Notice and such development efforts continue uninterrupted for no less than three hundred sixty (360) days;

10.6.2 Upon the effective date of any Interruption under Section 10.6.1 above, the license granted to Vertex under Section 9.1 for any CFFT invention shall terminate with respect to the applicable Program described below, and the following license in favor of CFFT shall become effective:

(a) If the Program to which the Interruption relates involves the design of Compounds which are intended to act as Potentiators, then CFFT shall have an exclusive right **[***]** and with respect to those Compounds, CFFT shall have an irrevocable, exclusive worldwide license, with the right to sublicense, under the Vertex CF Technology to develop, manufacture, have manufactured, use, sell, offer to sell and import those Compounds in the Field.

(b) If the Program to which the Interruption relates involves the design of Compounds which are intended to act as Correctors, then CFFT shall have an exclusive right **[***]** and with respect to those Compounds, CFFT shall have an irrevocable, exclusive worldwide license, with the right to sublicense, under the Vertex CF Technology to develop, manufacture, have manufactured, use, sell, offer to sell and import those Compounds in the Field.

(c) In lieu of any other obligation owed by CFFT to Vertex pursuant to this Agreement, except obligations that explicitly survive termination of this Agreement, CFFT shall pay Vertex **[***]**.

(d) In connection with either or both of the foregoing licenses, Vertex will deliver to CFFT the Termination Know-How Package associated with the

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Program to which the license relates expeditiously upon the occurrence of an Interruption.

(e) For purposes of CFFT's compound selection right under subsection (a) or (b) above, the classification of a particular Compound as a Potentiator or a Corrector will be determined as specified in the respective definitions of those terms which are set forth in Article I hereof.

10.7 Refused Program Extension.

If (a) Vertex proposes a Research Program Extension under Section 2.9 hereof which is a "Qualifying Extension Proposal" as defined below: and

(b) CFFT refuses that proposal and declines to continue funding of the relevant Program (a "Refused Program") as specified in the Qualifying Extension Proposal; and

(c) Vertex continues funding of the Refused Program for the proposed term, on a funding level for the proposed term at least equal to Vertex's share of the funding provided in the Qualified Extension Proposal and a Drug Product is thereafter sold by Vertex then the royalty otherwise payable to CFFT under Section 5.3 hereof with respect to any Development Candidate selected from the Refused Program by Vertex more than twelve (12) months after the Research Termination Date, shall be reduced **[***].** An extension of any efforts by Vertex pursuant to the foregoing shall be called a "Refused Program Extension."

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For purposes of this Section 10.7, a "Qualifying Extension Proposal" shall mean, with respect to any Program, a proposed extension of that Program beyond the Research Termination Date (i) at an average annualized cost not greater than the level provided under the Current Budget in effect for the six month period immediately preceding the Research Termination Date with respect to that Program; (ii) on relevant terms substantially similar to those set forth in this Agreement; but (iii) with the aggregate funding commitment divided equally between Vertex and CFFT.

ARTICLE XI — REPRESENTATIONS AND WARRANTIES

11.1 Representations and Warranties of Vertex.

Vertex represents and warrants to CFFT that this Agreement has been duly executed and delivered by Vertex and constitutes the valid and binding obligation of Vertex, enforceable against Vertex in accordance with its terms except as enforceability may be limited by bankruptcy, fraudulent conveyance, insolvency, bankruptcy, reorganization, moratorium and other laws relating to or affecting creditors' rights generally and by general equitable principles. The execution, delivery and performance of this Agreement have been duly authorized by all necessary action on the part of VERTEX, its officers and directors.:

11.2 Representations and Warranties of CFFT.

CFFT represents and warrants to Vertex that this Agreement has been duly executed and delivered by CFFT and constitutes the valid and binding obligation of CFFT, enforceable against CFFT in accordance with its terms except as enforceability may be limited by bankruptcy, fraudulent conveyance, insolvency,

bankruptcy, reorganization, moratorium and other laws relating to or affecting creditors' rights generally and by general equitable principles. The execution, delivery and performance of this Agreement have been duly authorized by all necessary action on the part of CFFT, its officers and directors.

ARTICLE XII — DISPUTE RESOLUTION

12.1 Governing Law, and Jurisdiction.

This Agreement shall be governed and construed in accordance with the internal laws of The Commonwealth of Massachusetts.

12.2 Dispute Resolution Process.

(a) General. Except as set forth in (b) below or as otherwise explicitly provided herein, in the event of any controversy or claim arising out of or relating to any provision of this Agreement, or the collaborative effort contemplated hereby, the parties shall, and either party may, initially refer such dispute to the JSC, and failing resolution of the controversy or claim within thirty (30) days after such referral, the matter shall be referred to the Chief Executive Officer of Vertex and the Chief Executive Officer of CFFT who shall, as soon as practicable, attempt in good faith to resolve the controversy or claim. If such controversy or claim is not resolved within sixty (60) days of the date of initial referral of the matter to the JSC, either party shall be free to initiate proceedings in any court having requisite jurisdiction.

(b) Third Party Referral. Any dispute or claim relating to the "Referral Matters" as defined below which the parties are unable to resolve pursuant to the other dispute resolution mechanisms provided in this Agreement (other than litigation) shall, upon the written request of one party delivered to the other party, be submitted to and settled by a panel of Third Parties (a "Third Party Panel") appointed by Vertex and CFFT as provided below. The "Referral Matter" shall consist solely of disagreements concerning whether a particular Compound has satisfied all of the applicable Development Candidate Criteria. Within thirty (30) days after delivery of the above-referenced written request, each party will appoint one person who is not an Affiliate of the party appointing that person, and who is knowledgeable in the areas of pharmaceutical science, business and commercial aspects of drug development and sale, or the clinical development of pharmaceuticals, to hear and determine the dispute. The two persons so chosen will select another impartial Third Party and their majority decision will be final and conclusive upon the parties hereto. If either party fails to designate its appointee within the thirty (30) day period referenced above, then the appointee who has been designated by the other party will serve as the sole member of the Third Party Panel and will be deemed to be the single, mutually approved party to resolve the dispute. Each party will bear its own costs in the Third Party Referral process, and the parties will split equally the costs of the Third Party Panel members. The Third Party Panel will, upon the request of either party, issue its final determination in writing.

ARTICLE XIII — MISCELLANEOUS PROVISIONS

13.1 Waiver.

No provision of this Agreement may be waived except in writing by both parties hereto. No failure or delay by either party hereto in exercising any right or remedy hereunder or under applicable law will operate as a waiver thereof, or a waiver of any right or remedy on any subsequent occasion.

13.2 Force Majeure.

Neither party will be in breach hereof by reason of its delay in the performance of or failure to perform any of its obligations hereunder, if that delay or failure is caused by strikes, acts of God or the public enemy, riots, incendiaries, interference by civil or military authorities, compliance with governmental priorities for materials, or any fault beyond its control or without its fault or negligence.

13.3 Severability.

Should one or more provisions of this Agreement be or become invalid, then the parties hereto shall attempt to agree upon valid provisions in substitution for the invalid provisions, which in their economic effect come so close to the invalid provisions that it can be reasonably assumed that the parties would have accepted this Agreement with those new provisions. If the parties are unable to agree on such valid provisions, the invalidity of such one or more provisions of this Agreement shall nevertheless not affect the validity of the Agreement as a whole, unless the invalid provisions are of such essential importance for this Agreement that it may be reasonably presumed that the parties would not have entered into this Agreement without the invalid provisions.

13.4 Government Acts.

In the event that any act, regulation, directive, or law of a country or its government, including its departments, agencies or courts, should make impossible or prohibit, restrain, modify or limit any material act or obligation of CFFT or Vertex under this Agreement, the party, if any, not so affected, shall have the right, at its option, to suspend or terminate this Agreement as to such country, if good faith negotiations between the parties to make such modifications therein as may be necessary to fairly address the impact thereof, are not successful after a reasonable period of time in producing mutually acceptable modifications to this Agreement.

13.5 Assignment.

This Agreement may not be assigned or otherwise transferred by either party without the prior written consent of the other party; provided, however, that either party may assign this Agreement, without the consent of the other party, (i) to any of its Affiliates, if the assigning party guarantees the full performance of its Affiliates' obligations hereunder, or (ii) in connection with the transfer or sale of all or substantially all of its assets or business or in the event of its merger or consolidation with another company. Any purported assignment in contravention of this Section 13.5 shall, at the option of the non-assigning party, be null and void and of no effect. No assignment shall release either party from responsibility for the performance of any accrued obligation of such party hereunder. This Agreement shall be binding upon and enforceable against the successor to or any permitted assignees from either of the parties hereto.

13.6 Counterparts.

This Agreement may be executed in duplicate, each of which shall be deemed to be original and both of which shall constitute one and the same Agreement.

13.7 No Agency.

Nothing herein contained shall be deemed to create an agency, joint venture, amalgamation, partnership or similar relationship between CFFT and Vertex. Notwithstanding any of the provisions of this Agreement, neither party to this Agreement shall at any time enter into, incur, or hold itself out to third parties as having authority to enter into or incur, on behalf of the other party, any commitment, expense, or liability whatsoever, and all contracts, expenses and liabilities in connection with or relating to the obligations of each party under this Agreement shall be made, paid, and undertaken exclusively by such party on its own behalf and not as an agent or representative of the other.

13.8 Notice.

All communications between the parties with respect to any of the provisions of this Agreement will be sent to the addresses set out below, or to such other addresses as may be designated by one party to the other by notice pursuant hereto, by prepaid, certified air mail (which shall be deemed received by the other party on the seventh business day following deposit in the mails), or by facsimile transmission, or other electronic means of communication (which shall be deemed received when transmitted), with confirmation by first class letter, postage pre-paid, given by the close of business on or before the next following business day:

if to CFFT, at:
Cystic Fibrosis Foundation Therapeutics Incorporated
6931 Arlington Road
Bethesda, Maryland 20814
Attention: Dr. Robert J. Beall, President

with a copy to: Kenneth I. Schaner, Esq.
Swidler Berlin Shereff Friedman, LLP
3000 K Street, N.W., Suite 300
Washington, D.C. 20007

if to Vertex, at:
Vertex Pharmaceuticals Incorporated
130 Waverly Street
Cambridge, MA 02139-4211
Attention: President

with a copy to: Legal Department
Attention: General Counsel

13.9 Headings.

The paragraph headings are for convenience only and will not be deemed to affect in any way the language of the provisions to which they refer.

13.10 Authority.

The undersigned represent that they are authorized to sign this Agreement on behalf of the parties hereto. The parties each represent that no provision of this Agreement will violate any other agreement that such party may have with any other person or company. Each party has relied on that representation in entering into this Agreement.

13.11 Entire Agreement.

This Agreement contains the entire understanding of the parties relating to the matters referred to herein, and may only be amended by a written document, duly executed on behalf of the respective parties.

13.12 Notice of Pharmaceutical Side-Effects.

During the term of this Agreement, the parties shall keep each other promptly and fully informed and will promptly notify appropriate authorities in accordance with applicable law, after receipt of information with respect to any serious adverse event (as defined by the ICH Harmonized Tripartite Guideline on Clinical Safety Data Management), directly or indirectly attributable to the use or application of Compounds, a Development Candidate, Bulk Drug Substance, a Drug Product Candidate, a Drug Product, and any other product for which royalties are payable under this Agreement.

13.13 Invoice Requirement.

Any amounts payable to Vertex hereunder shall be made within thirty days after receipt by CFFT, or its nominee designated for that purpose in advance by CFFT in writing to Vertex, of an invoice covering such payment.

VERTEX PHARMACEUTICALS INCORPORATED

By: /s/ Kenneth S. Boger
Kenneth S. Boger
Title: Senior Vice President and General Counsel

CYSTIC FIBROSIS FOUNDATION THERAPEUTICS INCORORATED

By: /s/ Robert J. Beall
Title: President and Chief Executive Officer

EXHIBIT 2.4

RESEARCH PLAN

Research Plan

for the

CFFT — Vertex Pharmaceuticals Collaboration

May 10, 2004

[***]

[***]

* Information redacted pursuant to a confidential treatment request. An unredacted version of this exhibit has been filed separately with the Commission.

[***]

EXHIBIT 4.2

INITIAL BUDGET FOR RESEARCH PROGRAM

Vertex/CFFT — CFTR Drug Discovery Budget

2004-2005

[***]

Merck & Co., Inc. and Vertex Announce Broad Collaboration to Develop and Commercialize VX-680, a Novel Compound for the Treatment of Cancer

Whitehouse Station, NJ and Cambridge, MA, June 22, 2004 — Merck & Co., Inc. (NYSE: MRK) and Vertex Pharmaceuticals Incorporated (Nasdaq: VRTX) announced today that they have entered into a global collaboration to develop and commercialize VX-680, Vertex's lead Aurora kinase inhibitor that is expected to enter clinical development this year for the treatment of cancer.

Under the terms of the agreement, Vertex will receive a $20 million up-front payment and an additional $14 million in research funding over the next two years. In addition, Vertex could receive as much as $350 million in milestone payments, including $130 million for the successful development of VX-680 in the first oncology indication and additional milestone payments for development of VX-680 and follow-on compounds in subsequent major oncology indications. Merck will be responsible for clinical development and commercialization of VX-680 worldwide and will pay Vertex royalties on product sales.

In addition, the companies will conduct a joint research program to characterize VX-680's activity across a broad range of cancer types as well as to identify follow-on drug candidates directed at Aurora kinases, using molecular profiling approaches and microarray technologies pioneered by Merck.

Merck will fund research conducted jointly by the two companies, and lead the clinical development of VX-680 and any subsequent compounds selected from the joint research program, with development input from Vertex. Vertex will have an opportunity to negotiate a co-promotion agreement with Merck prior to commercialization. In addition, Vertex could earn additional milestone payments for the development of Aurora kinase inhibitors outside the area of oncology.

An investigational new drug application (IND) for VX-680 has been filed by Vertex with the U.S. Food and Drug Administration (FDA) to support clinical development in the United States. Merck and Vertex expect Phase I clinical studies of VX-680 to begin by the end of 2004.

Aurora kinases are implicated in the onset and progression of many different human cancers, and novel Aurora kinase inhibitors such as VX-680 have the potential to play an important future role in the treatment and management of a wide range of tumor types. Preclinical results for VX-680 reported by Vertex scientists in early 2004 demonstrated for the first time that a compound targeting the Aurora mechanism could induce tumor regression in human models of solid tumor cancers.

" Merck has made a strategic commitment to address the challenges of developing novel and efficacious therapies for cancer," said Stephen H. Friend, M.D., Ph.D., Senior Vice President for Molecular Profiling and Basic Cancer Research at Merck Research Laboratories. "This collaboration unites Vertex's drug discovery leadership targeting

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Aurora kinases with Merck's proprietary molecular profiling technologies and clinical development infrastructure in oncology. Working together, we will seek to conduct an information-intensive, parallel clinical development program involving multiple major cancer indications."

" We are pleased to enter this collaboration with Merck, which shares our vision of Aurora kinase inhibitors as a class of drugs that may have the potential to transform the future of cancer treatment," said Joshua Boger, Ph.D., Chairman and CEO of Vertex. "In Merck, we have a partner that is a global leader in the development and commercialization of innovative medicines, and one with the breadth of capabilities and resources that we expect to be required to establish the clinical benefit of an Aurora kinase inhibitor across a spectrum of solid tumors and hematologic cancers.

" This agreement places a significant value on our innovations in the area of Aurora kinases and cancer, and highlights Vertex's progress in realizing our 2004 business development and collaborative revenue objectives," Boger added.

" We are delighted to partner with Vertex to advance the development of a promising new class of cancer drugs, and we look forward to a productive relationship," said Dr. Peter S. Kim, President of Merck Research Laboratories. "Oncology represents a key area of focus for Merck going forward, and this collaboration is consistent with Merck's strategy to develop external alliances that complement our substantial internal research efforts."

Aurora Kinases and Cancer

Cancer cells typically contain mutations in a number of genes, which ultimately results in uncontrolled cell growth and tumor metastasis. As enzymes specific for and essential to cell growth and division, Aurora kinases hold the potential to be important control points for slowing the growth and spread of tumors. Aurora kinases (also known as BTAK and STK15) are a family of serine-threonine kinases that are believed to play multiple roles in the development and progression of cancer, by acting as regulators of cell proliferation, by transforming normal cells into cancer cells, and by down regulating p53, one of the body's natural tumor suppressors. Aurora kinases are known to be overexpressed in many tumor types, including colon cancer, breast cancer, and leukemia. Amplification of Aurora genes is associated with progression of colorectal cancer and poor prognosis in certain types of breast cancer.

Cancer, the second leading cause of death in the United States, leads to the deaths of about 500,000 Americans each year. More than one million solid tumor cancers are diagnosed in the United States annually, including more than 200,000 new cases of breast cancer and 150,000 cases of colorectal cancer. The five-year relative survival rates for patients with metastatic breast cancer and patients with colorectal cancer are 21% and 8% respectively. There are more than 30,000 new cases of leukemia in the U.S. every year, and more than 20,000 deaths.

Discovery of VX-680

VX-680 was discovered by scientists at Vertex's Oxford, UK research site as part of a broad research effort targeting the kinase gene family. Vertex researchers published the three-dimensional atomic crystal structure of Aurora-A kinase in 2002, a key scientific advance that enabled the design and optimization of multiple classes of small molecule Aurora kinase inhibitors. VX-680 was advanced to preclinical development in 2002, following evaluation of the compound's activity in tumor cell lines and in animal models of tumor growth. In studies published in 2003 and 2004, Vertex reported that VX-680 induced tumor regression of 22% in a human pancreatic xenograft model; induced tumor regression of 56% in a human colon cancer xenograft model; and prolonged survival and induced sustained remission in an oncogene driven model of human acute myelocytic leukemia (AML).

Conference Call and Webcast:

Vertex Pharmaceuticals will host a conference call on June 22, 2004 at 11:00 a.m. ET to review advances in the development of Aurora kinase inhibitors and the Company's progress in achieving its business development goals for 2004. This call will be broadcast via the Internet at www.vrtx.com in the investor center. Alternatively, to listen to the call on the telephone, dial (800) 374-0296 (U.S. and Canada) or (706) 634-2394 (International).

The call will be available for replay via telephone commencing June 22, 2004 at 2:00 p.m. ET. The replay phone number for the U.S. and Canada is (800) 642-1687. The international replay number is (706) 645-9291 and the conference ID number is 8306808. Following the live webcast, an archived version will be available on Vertex's website until 5:00 p.m. ET on July 6, 2004.

About Merck

Merck & Co., Inc. is a global research-driven pharmaceutical products company. Merck discovers, develops, manufactures and markets a broad range of innovative products to improve human and animal health, directly and through its joint ventures.

About Vertex

Vertex Pharmaceuticals Incorporated is a global biotechnology company committed to the discovery and development of breakthrough small molecule drugs for serious diseases. The Company's strategy is to commercialize its products both independently and in collaboration with major pharmaceutical partners. Vertex's product pipeline is

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principally focused on viral diseases, inflammation, autoimmune diseases and cancer. Vertex co-promotes the new HIV protease inhibitor, Lexiva™, with GlaxoSmithKline.

Merck Safe Harbor Statement

This press release contains "forward-looking statements" as that term is defined in the Private Securities Litigation Reform Act of 1995. These statements involve risks and uncertainties, which may cause results to differ materially from those set forth in the statements. The forward-looking statements include statements regarding product development and product potential. No forward-looking statement can be guaranteed, and actual results may differ materially from those projected. Merck undertakes no obligation to publicly update any forward-looking statement, whether as a result of new information, future events, or otherwise. Forward-looking statements in this press release should be evaluated together with the many uncertainties that affect Merck's business, particularly those mentioned in the cautionary statements in Item 1 of Merck's Form 10-K for the year ended Dec. 31, 2003, and in its periodic reports on Form 10-Q and Form 8-K (if any) which Merck incorporates by reference.

Vertex Safe Harbor Statement

This press release may contain forward-looking statements, including statements that (i) VX-680 and other Aurora kinase inhibitors have the potential to play an important future role in the treatment and management of a wide range of tumor types; (ii) Vertex will receive $14 million in research funding and could receive an additional $350 million in milestone payments from Merck; and (iii) and that Merck and Vertex will advance the development of Aurora kinases as a new approach to the treatment of cancer. While management makes its best efforts to be accurate in making forward-looking statements, such statements are subject to risks and uncertainties that could cause Vertex's actual results to vary materially. Those risks and uncertainties include the risk that preclinical results targeting Aurora kinases may not be predictive of human clinical results, that development of VX-680 may not be pursued due to clinical, technical or financial issues, that Merck may not develop VX-680 or any other Aurora kinase inhibitor discovered by Vertex, and that Vertex may fail to realize revenue through its collaboration with Merck because of lack of research and clinical progress, and other risks listed under Risk Factors in Vertex's Form 10-K filed with the Securities and Exchange Commission on March 15, 2004.

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EXCLUSIVE RESEARCH COLLABORATION, LICENSE AND COMMERCIALIZATION AGREEMENT

between

MERCK & CO., INC.

and

VERTEX PHARMACEUTICALS INCORPORATED

EXCLUSIVE RESEARCH COLLABORATION, LICENSE AND COMMERCIALIZATION AGREEMENT

This EXCLUSIVE RESEARCH COLLABORATION, LICENSE AND COMMERCIALIZATION AGREEMENT (this "Agreement") is effective as of June 21, 2004, (the "Effective Date") and is entered into by and between Merck & Co., Inc., a New Jersey corporation ("Merck"), and Vertex Pharmaceuticals Incorporated, a Massachusetts corporation ("Vertex").

Background:

A. Vertex has undertaken a broad drug discovery program relating to Aurora kinases.

B. Merck is interested in developing and commercializing drugs targeting such Aurora kinases.

C. Vertex and Merck each believe that the other brings significant and complementary strengths to a potentially effective collaboration targeting human Aurora kinase inhibitors, and desire to enter into a collaboration on the terms set out in this Agreement.

D. Vertex has exclusive rights to VX-680, Existing Compounds, Compounds, Vertex Know-How and Patent Rights (as hereinafter defined), and Merck desires to obtain a license to the same on the terms set out in this Agreement and Vertex desires to grant such a license.

NOW, THEREFORE, in consideration of the foregoing premises and the mutual covenants herein contained, the receipt and sufficiency which are hereby acknowledged, the Parties agree as follows:

ARTICLE 1: DEFINITIONS

Unless specifically set forth to the contrary herein, the following terms, whether used in the singular or plural, shall have the respective meanings set forth below.

1.1 **"Affiliate"** shall mean (i) any corporation or business entity of which fifty percent (50%) or more of the securities or other ownership interests representing the equity, the voting stock or general partnership interest are owned, controlled or held, directly or indirectly, by Merck or Vertex; or (ii) any corporation or business entity which, directly or indirectly, owns, controls or holds fifty percent (50%) (or the maximum ownership interest permitted by law) or more of the securities or other ownership interests representing the equity, the voting stock or, if applicable, the general partnership interest, of Merck or Vertex; or (iii) any corporation or business entity of which fifty percent (50%) or more of the securities or other ownership interests representing the equity, the voting stock or

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general partnership interest are owned, controlled or held, directly or indirectly, by a corporation or business entity described in (i) or (ii).

1.2 **"Aurora kinases"** means members of the human Aurora kinase family, including Aurora A, B, or C enzymes involved in chromosome segregation and cytokinesis during mitosis.

1.3 **"Calendar Quarter"** means the respective periods of three (3) consecutive calendar months ending on March 31, June 30, September 30 and December 31.

1.4 **"Calendar Year"** means each successive period of twelve (12) months commencing on January 1 and ending on December 31.

1.5 **"Change of Control"** means a transaction which results in (a) the voting securities of Vertex immediately prior to such transaction ceasing to represent at least [***] of the combined voting power of the surviving entity immediately after such transaction; (b) any Third Party (other than a trustee or other fiduciary holding securities under an employee benefit plan) becoming the beneficial owner of [***] or more of the combined voting power of the outstanding securities of Vertex; or (c) a sale or other disposition to a Third Party of all or substantially all of the assets or business of Vertex related to this Agreement.

1.6 **"Clinical Trial"** means a Phase I Clinical Trial, Phase II Clinical Trial, and Pivotal Registration Study.

1.7 **"Collaboration Patent Rights"** means all patents and patent applications, certificates of invention and applications for certificates of invention, including divisions, continuations, continuations-in-part, reissues, renewals, extensions, supplementary protection certificates or the like or any of the

foregoing and all foreign equivalents thereof that disclose and/or claim Joint Information and Inventions.

1.8 **"Combination Product"** means a Product which includes one or more therapeutically active ingredients (other than Product Candidate) in combination with Product Candidate. All references to Product in this Agreement shall be deemed to include Combination Product.

1.9 **"Compound"** means (1) VX-680, (2) Existing Compounds, (3) Merck AK Compounds, and (4) any small molecule chemical compound that is owned or Controlled by Vertex, or jointly by Vertex and Merck, including salts thereof, (i) whose [***] activity is the inhibition of one or more Aurora kinases [***], and (ii) is synthesized or tested for Aurora kinase activity [***] (including by screening) by Vertex (whether solely by Vertex or in collaboration with Merck) during the Research Program Term or during the [***] period immediately following the expiration of the Research Program Term. For the avoidance of

* Information redacted pursuant to a confidential treatment request. An unredacted version of this exhibit has been filed separately with the Commission.

doubt, "Compounds" shall not include any compound that has greater activity against a non-Aurora kinase target than its activity against an Aurora kinase, or any compound that has greater activity against a non- kinase target than its activity against an Aurora kinase.

1.10 **"Control," or "Controlled by"** means the legal authority or right of a Party to grant a license or sublicense of intellectual property to another Party without breaching the terms of any agreement with a Third Party, infringing the intellectual property rights of a Third Party, or misappropriating the proprietary or trade secret information of a Third Party.

1.11 **"Co-Promotion Territory"** means Canada, the United States of America, France, Italy, Germany, Spain and the United Kingdom.

1.12 **"Deferred Candidate"** is described in Section 3.7.

1.13 **"Demonstration of Biologic Activity"** means the demonstration to the reasonable satisfaction of the JRC that a Product Candidate can be administered to a human at a concentration and for a duration that results in observed changes in the activity of a biomarker at the level that is predicted to be efficacious in humans, based on preclinical models. The biomarker activity will be compared with baseline and derived through skin biopsy, blood, bone marrow or other appropriate sampling methods.

1.14 **"Development Candidate"** means (1) a Compound that meets the Development Candidate Criteria and is proposed by the JRC for formal preclinical development during the Research Program Term or during the Washout Period; (2) a Deferred Candidate that is selected by Merck for development during the Research Program Term or the Washout Period; or (3) a Compound that has not been proposed to the JRC but is selected by Merck for development.

1.15 "**Development Candidate Criteria"** are the criteria set out in Schedule 1.15, and as such criteria may be subsequently revised by the JRC.

1.16 **"Development Election"** means the decision by Merck to select a Development Candidate for formal development as a Product Candidate, pursuant to Section 3.6.

1.17 **"Development Information"** means all material information known to Vertex about a Development Candidate, including analytical results and raw data, which Merck should reasonably require in order to decide whether to make the Development Election with respect to that Development Candidate. An example of information that would constitute Development Information is listed in Schedule 1.17.

1.18 **"Development Plan"** is described in Section 3.5.

1.19 **"Existing Compounds"** means those compounds Controlled by Vertex (other than VX-680) that have been synthesized by Vertex prior to the Effective Date and whose primary activity is the inhibition of one or more Aurora kinases, [***] including those compounds specifically identified in Schedule 1.19.

1.20 **"Field"** means the use of Compounds (including, without limitation, Lead Compounds, Development Candidates and Product Candidates) and Products for any and all purposes.

1.21 **"Filing"** of an NDA shall mean the acceptance by a Regulatory Authority of an NDA for filing.

1.22 **"First Commercial Sale"** means, with respect to any Product, the first sale for end use or consumption of such Product in a country, excluding, however, any sale or other distribution for use in a Clinical Trial.

1.23 **"Follow-on Compound"** means all Product Candidates other than a Lead Compound.

1.24 **"Full Time Equivalent"** or **"FTE"** means the equivalent of a full-time scientist's work time over a twelve-month period (including normal vacations, sick days and holidays) which equates to a total of [***] weeks or [***] hours per year of work, on or directly related to the Research Program.

1.25 **"Improvement"** means any enhancement, whether or not patentable, in the formulation, ingredients, preparation, presentation, means of delivery, or dosage of Compound, or Product discovered or developed during the Research Program Term or Wash-Out Period.

1.26 **"Indication"** means a separate and distinct disease or medical condition in humans that a Product which is in Clinical Trial(s) is intended to treat, prevent and/or diagnose, or for which a Product has received Marketing Authorization, meaning that such Indication is contained in the Product's

labeling approved by a Regulatory Authority in a Major Market as part of the Marketing Authorization for such Product. For the purposes of this Agreement, the following medical conditions and/or diseases in humans are "Indications":

(a) the following solid tumor cancers: non-small cell lung cancer, prostate cancer, breast cancer and colo-rectal cancer (each, a "Major Tumor Indication");

(b) any cancer type in humans other than as set out in 1.26(a) (such other cancer Indications are collectively referred to as "Other Oncology Indications");

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(c) any non-oncology diseases or medical conditions in humans ("Non-Oncology Indications").

As used in Article 5, the term "Cancer Indication" shall refer to any Major Tumor Indication or any Other Oncology Indication.

1.27 **"Information"** means any and all information and data, including without limitation all Merck Know-How, all Vertex Know-How, and all other scientific, pre-clinical, clinical, regulatory, manufacturing, marketing, financial and commercial information or data, whether communicated in writing or orally or by any other method, which is provided by one Party to the other Party in connection with this Agreement.

1.28 **"Initiates"** means, with respect to a Clinical Trial, the administration of the first dose to a human in such Clinical Trial.

1.29 **"Invention"** means any process, method, composition of matter, article of manufacture, discovery or finding that is conceived and/or reduced to practice in the course of the Research Program.

1.30 **"Joint Information and Inventions"** means all discoveries, Improvements, processes, methods, protocols, formulas, data, Inventions, know-how and trade secrets, patentable or otherwise, arising from the Research Program developed or invented jointly by employees of Merck and Vertex or others acting on behalf of Merck and Vertex.

1.31 **"Joint Research Committee"** and **"JRC"** is defined in Section 2.4.

1.32 **"Lead Compound"** means that Product Candidate which is in the most advanced stage of development. VX-680 shall be the Lead Compound on the Effective Date. If there is at any time no Product Candidate in development, then the Lead Compound shall mean the next Product Candidate selected for development.

1.33 **"Major Market"** shall mean any one of the following countries: [***].

1.34 **"Marketing Authorization"** means all approvals from the relevant Regulatory Authority necessary to market and sell a Product in any country (including without limitation, all applicable pricing and governmental reimbursement approvals even if not legally required to sell Product in a country).

1.35 **"Merck AK Compounds"** means any small molecule chemical compound that is owned or Controlled by Merck, including salts thereof: (i) whose primary and selective activity is the inhibition of one or more Aurora kinases [***]; (ii) is synthesized or tested for Aurora kinase activity in an *in vitro* biochemical binding assay (including by screening) by Merck (whether solely by Merck or in

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collaboration with Vertex) during the Research Program Term [***] immediately following the expiration of the Research Program Term; and (iii) is developed by Merck as a kinase inhibitor. For the avoidance of doubt, "Merck AK Compounds" shall not include any compound that has greater activity against a [***] target than its activity against an Aurora kinase, or any compound that has greater activity against [***] target than its activity against an [***].

1.36 **"Merck AK Compound Patent Rights"** means any and all patents and patent applications in the Territory (which for the purposes of this Agreement shall be deemed to include certificates of invention and applications for certificates of invention) which during the term of this Agreement are owned or Controlled by Merck, which: (i) claim or cover Merck AK Compounds, and/or Product and Improvements; or (ii) are divisions, continuations, continuations-in-part, reissues, renewals, extensions, supplementary protection certificates, and the like of any such patents and patent applications and foreign equivalents thereof.

1.37 **"Merck Information and Inventions"** means all protocols, formulas, data, Inventions, know-how and trade secrets, patentable or otherwise, developed or invented solely by employees of Merck, or other persons not employed by Vertex acting on behalf of Merck, in the course of its performance of the Research Program or the Invention of any Merck AK Compound.

1.38 **"Merck Know-How"** means any information and materials, including but not limited to, discoveries, Improvements, processes, methods, protocols, formulas, data, inventions (including without limitation Merck Information and Inventions and Merck's rights in Joint Information and Inventions), know-how and trade secrets, patentable or otherwise, which are (i) identified or conceived by Merck or its Affiliates in the course of its performance of the Research Program under this Agreement, (ii) in Merck's Control, (iii) not generally known and (iv) necessary or useful to Vertex in the performance of Vertex's obligations under the Research Program.

1.39 **"Milestone"** is defined in Section 5.3.

1.40 **"Milestone Payment"** is defined in Section 5.3.

1.41 **"NDA"** means a New Drug Application, Worldwide Marketing Application, Marketing Application Authorization, or similar application or submission for Marketing Authorization of a Product filed with a Regulatory Authority to obtain marketing approval for a pharmaceutical product in that country or in that group of countries.

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1.42 **"Net Sales"** means the gross invoice price of Product sold by Merck or its Related Parties to the first Third Party after deducting, if not previously deducted, from the amount invoiced or received:

(a) trade and quantity discounts other than early pay cash discounts;

(b) returns, rebates, chargebacks and other allowances;

(c) retroactive price reductions that are actually allowed or granted;

(d) the standard inventory cost of devices or delivery systems used for dispensing or administering Product; and

(e) a fixed amount equal to [***] of the amount invoiced to cover bad debt, sales or excise taxes, early payment cash discounts, transportation and insurance, custom duties, and other governmental charges.

With respect to sales of Combination Products, Net Sales shall be calculated [***]. If Product is sold only as a Combination Product, [***].

1.43 **"Patent Rights"** means any and all patents and patent applications in the Territory (which for the purposes of this Agreement shall be deemed to include certificates of invention and applications for certificates of invention) which during the term of this Agreement are owned or Controlled by Vertex, including, but not limited to, those listed on Schedule 1.43, which: (i) claim or cover Compounds, and/or Product (including without limitation (and for the avoidance of doubt) Development Candidates, Lead Compounds, Follow-On Compounds, Deferred Candidates and Product Candidates) and Improvements; (ii) claim or cover Vertex Information and Inventions; or (iii) are divisions, continuations, continuations-in-part, reissues, renewals, extensions, supplementary protection certificates, and the like of any such patents and patent applications and foreign equivalents thereof.

1.44 **"Party"** means Merck or Vertex, and **"Parties"** shall mean Merck and Vertex.

1.45 **"Phase I Clinical Trial"** means a human clinical trial in any country that would satisfy the requirements of 21 CFR 312.21(a).

1.46 **"Phase II Clinical Trial"** means a human clinical trial in any country that would satisfy the requirements of 21 CFR 312.21(b).

1.47 **"Pivotal Registration Study"** means a human clinical trial conducted for inclusion in (i) that portion of the FDA submission and approval process which provides for the continued trials of a Product Candidate on sufficient numbers of human patients to generate safety and efficacy data to support Marketing

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Authorization in the proposed therapeutic Indication, as more fully defined in 21 CFR 312.21(c), or (ii) equivalent Regulatory Agency submissions with similar requirements in a Major Market other than the United States.

1.48 **"Product(s)"** means any pharmaceutical or biological preparation in final form containing a Product Candidate (i) for sale by prescription, over-the-counter or any other method, or (ii) for administration to human patients in a Clinical Trial, for any and all uses in the Field, including without limitation, any Combination Product.

1.49 **"Product Candidate"** means a Development Candidate that has been selected by Merck for formal development, pursuant to exercise of its Development Election or otherwise. For the avoidance of doubt, VX-680 is a "Product Candidate."

1.50 **"Product Development Team"** and **"PDT"** is described in Section 3.5.

1.51 **"Regulatory Authority"** shall mean any applicable government regulatory authority involved in granting approvals for the manufacturing, marketing, reimbursement and/or pricing of a Product in the Territory, including, in the United States, the United States Food and Drug Administration, and any successor governmental authority having substantially the same function.

1.52 **"Related Party"** shall mean Merck, its Affiliates, and permitted sublicensees (which term does not include distributors).

1.53 **"Research Plan"** is described in Section 2.1

1.54 **"Research Program"** means the research activities undertaken by the Parties as set forth in Article 2 and Schedule 2.1.

1.55 **"Research Program Term"** means the two (2) year period starting on the Effective Date and ending on the second anniversary of the Effective Date. The Parties may mutually agree to extend the Research Program Term for an additional period, and the initial two-year term plus any agreed extension shall be referred to in this Agreement as the "Research Program Term."

1.56 **"Subsequent MT"** means a Major Tumor Indication being pursued with respect to a Product Candidate that was initially developed (and for which a Milestone Payment was made) for an Other Oncology Indication.

1.57 **"Territory"** means all of the countries in the world, and their territories and possessions.

1.58 **"Third Party"** means an entity other than Merck and its Related Parties, and Vertex and its Affiliates.

1.59 **"Third Party License"** is defined in Section 5.17.

1.60 "**Valid Patent Claim**" means a claim of an issued and unexpired patent included within the Patent Rights, Merck AK Compound Patent Rights, or Collaboration Patent Rights which claims any Product Candidate or Product as a composition of matter, which claim has not been revoked or held unenforceable or invalid by a decision of a court or other governmental agency of competent jurisdiction (which decision is not appealable or has not been appealed within the time allowed for appeal), and which claim has not been disclaimed, denied or admitted to be invalid or unenforceable through reissue, re-examination or disclaimer or otherwise.

1.61 **"Vertex Information and Inventions"** shall mean all discoveries, Improvements, processes, methods, protocols, formulas, data, Inventions, know-how and trade secrets, patentable or otherwise, discovered or developed, and Controlled by Vertex or its Affiliates, in the course of its performance of the Research Program under this Agreement, and related to the inhibition by a small molecule of one or more Aurora kinases, solely by employees of Vertex or other persons not employed by Merck acting on behalf of Vertex, provided, however, that the term "Vertex Information and Inventions" shall not apply to Vertex's general drug design technology whether in hardware or software form, tangible or intangible.

1.62 "**Vertex Know-How"** shall mean all information and materials, including but not limited to, discoveries, Improvements, processes, methods, protocols, formulas, data, inventions (including without limitation Vertex Information and Inventions and Vertex's rights in Joint Information and Inventions), know-how and trade secrets, patentable or otherwise, which are (i) discovered, developed, conceived, used or applied, and (ii) Controlled by Vertex or its Affiliates, either (x) in connection with the performance by Vertex of the Research Program, or (y) in connection with the conduct of a development program for a Product Candidate, prior to the end of the Wash-Out Period, and that are necessary or useful to Merck in connection with Merck's obligations under this Agreement, including the research, development, utilization, manufacture or use of Compounds, Development Candidates, Product Candidates or Products (other than any such technology that is exclusive to kinases other than any of the Aurora kinases); provided, however, that the term "Vertex Know-How" shall not apply to Vertex's general drug design technology whether in hardware or software form, tangible or intangible.

1.63 **"VX-680"** is described in Schedule 1.63.

1.64 **"Washout Period"** means the [***] period immediately following the end of the Research Program Term.

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ARTICLE 2: RESEARCH PROGRAM

2.1 **Research Program - General.** Vertex and Merck shall engage in the Research Program upon the terms set out in this Agreement. The Research Plan shown in Schedule 2.1 sets out a detailed description of specific activities to be undertaken during the first twenty-four months of the Research Program. The Research Plan may be amended from time to time upon the mutual written agreement by authorized representatives of the Parties. The JRC will review and update the Research Plan annually. Subject to review and adjustment by the JRC, the Research Plan will set forth expectations with respect to the relative contributions of each Party to the Research Program.

2.2 **Conduct of Research.** Vertex and Merck each shall conduct the Research Program in good scientific manner, and in compliance in all material respects with all requirements of applicable laws, rules and regulations and all applicable good laboratory practices to attempt to achieve their objectives efficiently and expeditiously. Vertex and Merck each shall proceed diligently with the work set out in the Research Program by using their respective good faith efforts to allocate sufficient time, effort, equipment and facilities to the Research Program and to use personnel with sufficient skills and experience as are required to accomplish the Research Program in accordance with the terms of this Agreement and Schedule 2.1.

Vertex and Merck shall be entitled to utilize the service of Third Parties to perform their respective Research Program activities only upon the prior written consent of the other Party, or as specifically set forth in Schedule 2.1. Each Party shall also be entitled to use the services of Third Parties that have been pre-approved by the JRC to carry out routine Research Program activities, without the need for obtaining the other Party's prior written consent. Notwithstanding any such consent or pre-approval, both Parties shall remain at all times fully liable for its respective responsibilities under the Research Program.

2.3 **Personnel Resources.** Vertex shall devote to the Research Program [***] during the period from the Effective Date through December 31, 2004. Thereafter until the end of the Research Program Term, Vertex will commit [***] on an annualized basis. Merck will devote resources to the Research Program as provided in the Research Plan, and as that Research Plan may be periodically updated.

2.4 **Joint Research Committee.** The Parties will establish a Joint Research Committee (the "JRC") with equal representation from Vertex and Merck to oversee the Research Program during the Research Program Term. The JRC will be formed as soon as practicable after the Effective Date and, thereafter, will meet formally at least quarterly to:

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(a) coordinate and review Research Program activities and interactions between Merck and Vertex;

(b) receive and review reports by Vertex and Merck concerning research being conducted under the Research Plan, including, but not limited to the status of Compounds meeting Development Candidate Criteria;

(c) review any proposed Development Candidates and notify Merck each time a Compound meets the Development Candidate Criteria;

(d) review, consider and approve revisions to the Research Plan;

(e) periodically review the overall goals and strategy of the Research Program and consider whether redirection or termination of the Research Program would be appropriate; and

(f) discuss matters relating to Research Program intellectual property.

2.4.1 During the term of the Research Program Term (and, at Vertex's option, for the [***] period immediately following the expiration of the Research Program Term), Vertex and Merck shall each appoint a representative to act as a Co-Chair of the JRC. The JRC Co-Chairs shall each have authority to call meetings of the JRC, and shall each have responsibility for circulating agenda and performing administrative tasks required to assure efficient operation of the JRC. The JRC will act by unanimous vote, with each of Merck and Vertex having one vote. The members of the JRC will attempt in good faith to reach consensus on all matters brought before the JRC. Any changes to the Research Plan which would materially alter the allocation of research responsibilities between the Parties or the cost to Vertex of implementing the Research Plan, which would change in any material respect the overall goals and strategy for the Research Program or which would provide for redirection or termination of the Research Program, will require the consent of both Parties. With respect to other matters properly subject to decision by the JRC (including proposed amendments to the Development Candidate Criteria), if the JRC is deadlocked, the dispute will be subsequently referred for resolution to the Sr. Vice President of Merck responsible for the Research Program, and the Sr. Vice President of Vertex responsible for the Research Program. Failing agreement at this level, the dispute will be referred to the President of Merck Research Laboratories, and to the President of Vertex. If agreement cannot be reached by such representatives, Merck shall have the right to make the final decision.

2.4.2 **Meetings.** The JRC shall meet in accordance with a schedule established by mutual written agreement of the Parties, but no less frequently than

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once per Calendar Quarter, with the location for such meetings alternating between Vertex and Merck facilities (or such other locations as is determined by the JRC). Alternatively, the JRC may meet by means of teleconference, videoconference or other similar communications equipment. Additional representatives or consultants may from time to time, by mutual consent of the Parties, be invited to attend JRC meetings, subject to such representative's and consultant's written agreement to comply with the requirements of Section 4.1. Each Party shall bear its own expenses related to the attendance of such meetings by its representatives.

2.5 **Exchange of Information.** Upon execution of this Agreement, and on an ongoing basis during the Research Program Term, (a) Vertex shall disclose to Merck all Vertex Know-How not previously disclosed; and (b) Merck shall disclose to Vertex all Merck Know-How not previously disclosed.

2.6 **Records and Reports**

2.6.1 **Records.** Each Party shall maintain records, in sufficient detail and in good scientific manner appropriate for patent and regulatory purposes, which shall fully and properly reflect all work done and results achieved in the performance of the Research Program.

2.6.2 **Copies and Inspection of Records.** Each Party shall have the right, during normal business hours and upon reasonable notice, to inspect and copy all such records of the other referred to in subsection 2.6.1. Each Party shall maintain such records and the information disclosed therein in confidence in accordance with Section 4.1. Each Party shall have the right to arrange for its employees and/or consultants involved in the activities contemplated hereunder to visit the offices and laboratories of the other Party during normal business hours and upon reasonable notice, and to discuss the Research Program work and its results in detail with the technical personnel and consultants of the other Party. Upon request, each Party shall provide copies of the records described in subsection 2.6.1 to the other Party.

2.7 **Research Program Information and Inventions.** The entire right, title and interest in:

2.7.1 Vertex Information and Inventions and Patent Rights shall be owned solely by Vertex;

2.7.2 Merck Information and Inventions and Merck AK Compound Patent Rights shall be owned solely by Merck; and

2.7.3 Joint Information and Inventions and Collaboration Patent Rights shall be owned jointly by Vertex and Merck.

Vertex shall promptly disclose to Merck the development, making, conception or reduction to practice of Vertex Information and Inventions and Joint Information and Inventions. Merck shall promptly disclose to Vertex the development, making, conception or reduction to practice of Merck Information and Inventions and Joint Information and Inventions. Inventorship will be determined in accordance with the United States laws of inventorship.

2.8 **Exclusive Efforts.** [***] Nothing in this Agreement prohibits either Party from counter-screening other compounds directed at other targets against Aurora kinase. If Merck begins development or commercialization of a Merck AK Compound at any time prior to the [***] of the expiration of the Washout Period, Merck shall be obligated to pay Vertex any and all applicable Milestone Payments and royalties (and any other amounts, such as interest penalties) due under Article 5 of this Agreement for such Merck AK Compound (subject to the exception set forth in Section 5.9).

ARTICLE 3: LICENSE; EXCHANGE OF INFORMATION; DEVELOPMENT AND COMMERCIALIZATION

3.1 **License Grant**

3.1.1 Subject to the terms and conditions of this Agreement (including Section 8.5), Vertex hereby grants to Merck a perpetual, exclusive license (even as to Vertex) in the Territory in the Field under Patent Rights and Vertex's rights under Collaboration Patent Rights, with a right to sublicense, to VX-680, Compounds and Products (including without limitation (and for the avoidance of doubt), Development Candidates, Lead Compounds, Follow-On Compounds, Deferred Candidates and Product Candidates), for any and all uses, including but not limited to: (i) to discharge its obligations and exercise its rights under the Research Program and Development Plan; and (ii) to develop, make, have made, use, offer to sell, sell or import VX-680, Compounds, and Products (including without limitation (and for the avoidance of doubt), Development Candidates, Lead Compounds, Follow-On Compounds, Deferred Candidates and Product Candidates).

3.1.2 Subject to the terms and conditions of this Agreement (including Section 8.5), Vertex hereby grants to Merck (a) a perpetual, non-exclusive license under all Vertex Know-How (excluding Vertex Information and Inventions and Vertex's rights in Joint Information and Inventions); and (b) a perpetual, co-exclusive license (together with Vertex) under Vertex Information and Inventions and Vertex's rights under Joint Information

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and Inventions, in the Territory in the Field, with the right to sublicense, solely to: (i) discharge its obligations and exercise its rights under the Research Program and Development Plan; and (ii) develop, make, have made, use, offer to sell, sell or import VX-680, Compounds and Products (including without limitation (and for the avoidance of doubt), Development Candidates, Lead Compounds, Follow-On Compounds, Deferred Candidates and Product Candidates).

3.1.3 Notwithstanding the foregoing, Vertex shall retain rights under the Patent Rights, Vertex Know-How, Vertex Information and Inventions, Vertex's rights in Joint Information and Inventions and Vertex's rights in Collaboration Patent Rights to the extent necessary or useful for the term of the Research Program, to discharge its obligations and exercise its rights under this Agreement.

3.1.4 Merck hereby grants to Vertex a non-exclusive license under all Merck Know-How, Merck Information and Inventions, Merck's rights under the Collaboration Patent Rights, and Joint Information and Invention, for the period of the Research Program Term and the [***] after termination of the Research Program Term, to discharge Vertex's obligations and exercise its rights under this Agreement.

3.2 **Non-Exclusive License Grant.** If the making, having made, use, offer for sale, sale or import by Merck, or Merck's Related Parties of Compound(s), Product Candidates or Product(s) otherwise permitted under this Agreement would infringe during the term of this Agreement a claim of issued letters patent which Vertex Controls and which patents are not covered by the grant in Section 3.1, Vertex hereby grants to Merck, to the extent Vertex is legally able to do so, a non-exclusive, sublicensable, royalty-free license in the Territory under such issued letters patent solely for Merck to develop, make, have made, use, sell, offer for sale or import Compound(s) and Product(s) in the Territory.

3.3 **Development and Commercialization.** As soon as practicable after the Effective Date, Merck will commence a Development Plan with respect to VX-680. With respect to each Product Candidate, Merck shall use reasonable efforts, consistent with the usual practice followed by Merck in pursuing the development, commercialization and marketing of its other pharmaceutical products of a similar commercial value, to develop, commercialize and market such Product Candidate in such countries in the Territory where in Merck's reasonable opinion it is commercially viable to do so. In the event that Merck elects not to commercialize any Product Candidate in the United States and at least four of the other Major Markets (i.e., [***]) as a result of the Product Candidate's projected commercial returns, Merck agrees to promptly inform Vertex of such election. Vertex is entitled to propose to Merck, and Merck shall discuss in good faith with

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Vertex, commercial terms for a buyout of such Product Candidate by Vertex for development by Vertex, provided, however, that Merck shall have no obligation to agree to grant Vertex rights to any Product Candidate, if such grant would in Merck's sole discretion, negatively impact any product being developed or commercialized by Merck.

3.4 **Excused Performance.** The obligations of Merck with respect to any Product under Section 3.3 are expressly conditioned upon the continuing absence of any material adverse condition or event relating to the safety or efficacy of the Product, and the obligation of Merck to develop or market any such Product shall be delayed or suspended so long as in Merck's opinion any such condition or event exists. Merck shall be obligated to take commercially reasonable and appropriate steps to investigate and attempt to resolve any such adverse condition or event. If, in Merck's opinion, such material adverse condition or event arises, Merck shall promptly inform Vertex, and will provide Vertex with an explanation for any decision to delay or to suspend the development or marketing of the Product, together with a description of actions planned by Merck to resolve (where commercially reasonable) the underlying cause of such delay or suspension.

3.5 **Product Development Teams.** As soon as practicable following the Effective Date, Merck will establish a Product Development Team ("PDT"), which shall include, at Vertex's option, [***] representatives designated by Vertex, provided that [***]. Additional Product Development Teams,

which shall also include [***]Vertex representatives, at Vertex's option, may be established from time to time in connection with the development of additional Product Candidates. The PDT will be the principal organization through which the development of a Product Candidate is planned, administered, evaluated and completed, subject to appropriate review and approval at senior management levels as required by Merck from time to time. In addition to the Vertex representatives, the PDT will typically have members from the various Merck functional groups (e.g., research, preclinical, safety, clinical, regulatory, and marketing) which are or which will be expected to be involved in developing and obtaining regulatory approval for the Product Candidate and Product. Merck will appoint each PDT Chair. The PDT will be responsible for the preparation, implementation of the Development Plan (described below) with respect to each Product Candidate.

3.5.1 **Development Plan.** The PDT shall prepare and oversee the implementation of the overall Development Plan for each Product Candidate. The Development Plan shall, among other things, detail, schedule and fully describe the proposed toxicology studies, Clinical Trials, clinical material requirements for each Product Candidate, and will outline the key elements involved in obtaining Regulatory Approval in each Major Market. Vertex's representatives on the PDT (or Vertex, if

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Vertex has no representative on the PDT) will receive all documents and information distributed or communicated to members to the PDT generally (or to any one or more members of the PDT in connection with the discharge of his or her duties on the PDT).

3.5.2 **Development Responsibility and Costs.** Merck shall have sole responsibility for, and bear the cost of implementing, the Development Plan with respect to each Product Candidate.

3.5.3 **Regulatory Approvals.** Merck shall be solely responsible for preparing and submitting registration dossiers for Regulatory Approval of Products in the Territory. All Regulatory Approvals shall be held by and in the name of Merck, and Merck shall own all submissions in connection therewith. Merck shall have sole discretion as to the regulatory strategy and decision making for any Product Candidate or Product; provided, however, that Merck shall provide Vertex with an opportunity to review Merck's general regulatory strategy and decision-making either by participating in the PDT or other approach mutually agreed-upon by the Parties.

3.6 **Development Election.** During the Research Program Term and the Washout Period, Merck shall have the exclusive right to select Compounds for further development and commercialization. The JRC will notify Merck each time a Compound meets the Development Candidate Criteria. The notice will be accompanied by the Development Information with respect to that Development Candidate. Merck may exercise its Development Election and accept the Development Candidate as a Product Candidate by delivery to Vertex, within [***] after receipt by Merck of the Development Information, of an exercise notice specifying the Development Candidate as to which the Development Election is being exercised. Notwithstanding the foregoing, if Merck shall at any time commence a Phase I Clinical Trial on a Compound without having formally exercised its Development Election, Merck shall be deemed to have exercised its Development Election with respect to such Compound.

3.7 **Deferred Candidates**. Any Development Candidate with respect to which Merck (1) elects not to accept as a Product Candidate; or (2) fails to exercise its Development Election within the [***] period referenced in Section 3.6, shall be a "Deferred Candidate." If, during the Research Program Term, Merck ceases to be actively engaged in the development of a Product Candidate, Vertex may propose a Deferred Candidate to Merck for Development Election.

During the Research Program Term and Washout Period, Merck shall be entitled, in its sole discretion, to exercise its Development Election with respect to any (1) Compounds not previously presented to it as a Development Candidate; and (2) Deferred Candidates. Vertex shall not grant to any Third Party rights which are

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inconsistent with the grant of the Development Election to Merck under this Agreement. Upon expiration of the Research Program Term and Washout Period, the rights of the Parties with respect to any Compounds and Deferred Candidates shall be as set forth in Section 8.5 of this Agreement.

3.8 **No Implied Licenses.** Except as specifically set forth in this Agreement, neither Party shall acquire any license or other intellectual property interest, by implication or otherwise, in any Information disclosed to it under this Agreement or under any patents or patent applications owned or Controlled by the other Party or its Affiliates. In addition, Vertex shall not acquire any right, title or intellectual property interest to any Merck AK Compounds or Merck AK Patent Rights, except for such rights to financial compensation, if any, with respect to Merck AK Compounds in accordance with Section 2.8 and Article 5 of this Agreement.

3.8.1 To the extent it is contractually able to do so, Vertex agrees to review with Merck during the Research Program Term the potential for further collaboration directed to kinases studied by Vertex which are believed to have a potential role in oncology therapeutics.

3.9 **Use of Vertex Logo.** Where not prohibited by law or regulation, and subject to any required Regulatory Approval, which Merck shall use reasonable efforts to obtain, Vertex's name and logo will be carried on all Product packaging, packaging inserts, labels, containers and printed material related thereto with a prominence substantially equivalent to that of Merck's name and logo, provided, however that such requirement shall no longer apply in the event of a Change of Control of Vertex. Any trademark for a Product will be selected by, and will be the property of, Merck.

3.10 **Supply of Bulk Drug Substance For Clinical Trials.** Vertex shall promptly provide Merck with its existing inventory of clinical trial material for VX-680. Vertex shall also promptly provide Merck with Information in its possession relative to the manufacturing, formulation, and packaging of VX-680. Merck will be responsible for the manufacture of all bulk drug substance and clinical drug formulations of all Product Candidates, and for all manufacturing activities relating to the production, formulation and manufacture of commercial supplies of Products.

3.11 **Co-Promotion by Vertex.** Not less than [***] before the projected market introduction of any Product in a country within the Co-Promotion Territory, Vertex is entitled to give notice and propose to Merck, and Merck shall discuss in good faith with Vertex the feasibility of a co-promotion plan for Products on a fee-for-detail basis within the Co-Promotion Territory (including minimum co-promotion sales force size) and in accordance with the conditions set out in Schedule 3.11. If the Parties jointly decide to implement such a plan, Vertex and Merck shall initiate good faith negotiations and seek to enter into a mutually

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acceptable definitive written agreement ("Co-Promotion Agreement") regarding Specialist Detailing (as described in Schedule 3.11) on a country-by-country basis no later than [***] before the projected market introduction of a Product in a country within the Co-Promotion Territory. Notwithstanding the foregoing, if Merck determines at the time of completion of [***] that earlier notice from Vertex of its intention to enter into a Co-Promotion Agreement would be desirable in order to optimally plan and execute a Product launch, the Parties will agree on a revised schedule for the negotiation and execution of the Co-Promotion Agreement consistent with the opinion of Merck's regulatory experts about the anticipated Regulatory Authority review time for the corresponding NDA. Furthermore, if the Parties enter into a Co-Promotion Agreement on this revised schedule, the Parties recognize that Vertex with [***], and Merck will take this into account in determining the minimum number of representatives Vertex will provide at launch, [***] the Co-Promotion Agreement, in a timely manner as agreed to by both Parties.

3.11.1 The Co-Promotion Agreement shall be subject to the terms and conditions set forth in Schedule 3.11. In the event that Merck elects to outsource sales of any Product Candidate or Product in the Major Markets to a Third Party with which it does not have a pre-existing business relationship, it shall promptly inform Vertex of such election and shall negotiate in good faith with Vertex with respect to sales of such Product Candidate or Product.

ARTICLE 4: CONFIDENTIALITY AND PUBLICATION

4.1 **Nondisclosure Obligation.** All Information disclosed by one Party to the other Party shall be maintained in confidence by the receiving Party and shall not be disclosed to a non-Party or used for any purpose except as set forth herein without the prior written consent of the disclosing Party, except to the extent that such Information:

4.1.1 is known by receiving Party at the time of its receipt, and not through a prior disclosure by the disclosing Party, as documented by the receiving Party's contemporaneous business records;

4.1.2 is properly in the public domain;

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4.1.3 is subsequently disclosed to the receiving Party by a Third Party who may lawfully do so and is not under an obligation of confidentiality to the disclosing Party;

4.1.4 is developed by the receiving Party independently of Information received from the disclosing Party, as documented by the receiving Party's contemporaneous business records;

4.1.5 is disclosed to governmental or other regulatory agencies to comply with applicable law or regulations, provided the receiving Party provides to the disclosing Party prompt prior written notice of its obligation to make such disclosure and take reasonable and lawful actions to avoid or minimize the degree of such disclosure;

4.1.6 is disclosed to governmental or other regulatory agencies to obtain patents or to gain or maintain approval to conduct clinical trials or to market Product, but such disclosure may be only to the extent reasonably necessary to obtain patents or authorizations; and

4.1.7 is deemed necessary by Merck in the reasonable exercise of its judgment to be disclosed to Related Parties, agents, consultants, and/or other Third Parties for any and all purposes Merck and its Affiliates deem necessary or advisable for the research and development, manufacturing and/or marketing of the Product (or for such entities to determine their interest in performing such activities) in accordance with this Agreement on the condition that such Third Parties agree to be bound by confidentiality and non-use obligations that are substantially no less stringent than those confidentiality and non-use provisions contained in this Agreement; provided the term of confidentiality for such Third Parties shall be no less than [***].

Any combination of features or disclosures shall not be deemed to fall within the foregoing exclusions merely because individual features are published or available to the general public or in the rightful possession of the receiving Party unless the combination itself and principle of operation are published or available to the general public or in the rightful possession of the receiving Party.

If a Party is required by judicial or administrative process to disclose Information that is subject to the non-disclosure provisions of this Section 4.1 or Section 4.2, such Party shall promptly inform the other Party of the disclosure that is being sought in order to provide the other Party an opportunity to challenge or limit the disclosure obligations. Information that is disclosed by judicial or administrative process shall remain otherwise subject to the confidentiality and non-use provisions of this Section 4.1 and Section 4.2, and the Party disclosing Information pursuant to law or court order shall take all steps reasonably

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necessary, including without limitation obtaining an order of confidentiality, to ensure the continued confidential treatment of such Information.

4.2 **Vertex Know-How.** Subject to the provisions of Section 4.3, Vertex agrees to keep all Vertex Know-How confidential subject to the exceptions set forth in Sections 4.1.2, 4.1.5, 4.1.6 and 4.1.7 (substituting Vertex's judgment and disclosure for Merck's) and to Vertex's contractual obligations arising prior to the Effective Date.

4.3 **Publication.**

(a) Merck and Vertex each acknowledge the other Party's interest in publishing the results of its research in order to obtain recognition within the scientific community and to advance the state of scientific knowledge. Authorship of any publication shall be determined based on the accepted standards used in peer-reviewed, academic journals at the time of the proposed publication. Each Party also recognizes the mutual interest in obtaining valid patent protection and in protecting business interests and trade secret information. Consequently, except for disclosures permitted pursuant to Section 4.1, if either Party, its employees or consultants wishes to publish or publicly present, during the Research Program Term and/or the Washout Period, results of the Research Program or any information about a Compound, Product Candidate, Product, or the results of any program to discover or develop any of the above, it shall deliver to the other Party a copy of the proposed written publication or an outline of an oral disclosure at least [***] prior to submission for publication or presentation. The reviewing Party shall notify the other Party within [***] of receipt of such proposed publication whether such draft publication contains (i) Information that is confidential to the reviewing Party, or (ii) information that if published would have an adverse effect on a patent application covering the subject matter of this Agreement. The reviewing Party shall have the right to (a) propose modifications to the publication or presentation for patent reasons, trade secret reasons, confidentiality reasons or business reasons or (b) request a reasonable delay in publication or presentation in order to protect patentable information. If the reviewing Party requests a delay to protect patentable information, the publishing Party shall delay submission or presentation for a period not to exceed [***] to enable patent applications protecting each Party's rights in such information to be filed in accordance with Article 7. Upon expiration of such [***] the publishing Party shall be free to proceed with the publication or presentation. If the reviewing Party reasonably requests modifications to the publication or presentation to prevent disclosure of trade secret or proprietary business information, the publishing Party shall edit such publication to prevent the disclosure of such information prior to submission of the publication or presentation. For the avoidance of doubt, neither Party shall be entitled publish Information of the other in violation of Section 4.1.

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(b) After the expiration of the Research Program and the Washout Period, the Parties shall continue to be obligated to adhere to the guidelines set out in Section 4.3(a), but solely with respect to publications or public presentations containing information about a Development Candidate, Product Candidate, and/or a Product, except that if Merck, its employees or consultants wishes to publish or publicly present clinical data or clinical information about a Development Candidate, Product Candidate, or Product being developed by Merck pursuant to this Agreement, it shall be obligated deliver to Vertex a copy of the proposed written publication or an outline of an oral disclosure at least [***] prior to submission for publication or presentation. Vertex shall notify Merck within [***] of receipt of such proposed publication whether such draft publication contains (i) Information that is confidential to Vertex, or (ii) information that if published would have an adverse effect on a patent application covering the subject matter of this Agreement. If Vertex reasonably requests modifications to the publication or presentation to prevent disclosure of trade secret or proprietary business information, Merck shall edit such publication to prevent the disclosure of such information prior to submission of the publication or presentation. If Vertex requests a delay to protect patentable information, Merck shall delay submission or presentation for a period not to exceed [***] to enable patent applications protecting each Party's rights in such information to be filed in accordance with Article 7. Upon expiration of such [***], Merck shall be free to proceed with the publication or presentation.

(c) This Section 4.3 shall terminate with the termination of this Agreement, but the provisions of Section 4.1 shall continue to govern the disclosure by one Party, by publication or otherwise, of Information of the other, during the period set forth in Section 8.6.

4.4 **Publicity/Use of Names.** Merck and Vertex shall agree upon the timing and content of an initial press release relating to this Agreement and the transactions contemplated herein. Except to the extent already disclosed in that initial press release, no disclosure of the existence of this Agreement, its subject matter or its terms may be made by either Party, and no Party shall use the name, trademark, trade name or logo of the other Party or its employees in any publicity, news release or disclosure relating to this Agreement or its subject matter, without the prior express written permission of the other Party, except as may be required by applicable laws, regulations, or judicial order. The Party desiring to make any such public announcement shall provide the other Party with a written copy of the proposed announcement in sufficient time prior to public release to allow such other Party to comment upon such announcement, prior to public release.

In addition to the foregoing restrictions on public disclosure, if either Party concludes that a copy of this Agreement must be filed with the Securities and Exchange Commission, such Party shall provide the other Party with a copy of

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this Agreement showing any sections as to which the Party proposes to request confidential treatment, will provide the other Party with an opportunity and a reasonable time period to comment on any such proposal and to suggest additional portions of the Agreement for confidential treatment and will take such Party's reasonable comments into consideration before filing the Agreement. If the filing Party disagrees with the other Party's additional confidential treatment request, the Parties shall have an opportunity to discuss such matter in good faith before the Agreement is filed.

ARTICLE 5: PAYMENTS; ROYALTIES AND REPORTS

5.1 **Research Program Funding.** In consideration for Vertex's performance of its obligations under the Research Program (including its FTE staffing obligations pursuant to Section 2.3), upon the terms and conditions contained herein, Merck shall pay Vertex:

(a) [***] for the period from the Effective Date through December 31, 2004, such payment to be made by Merck in two equal installments of [***], the first of which will be paid within [***] and the second of which will be paid [***]; and

(b) additional research support thereafter at an annual rate of [***] for the balance of the Research Program Term (the "Annual Research Fees"), such payments to be made in equal payments of US [***] per Calendar Quarter, payable in advance, with the first such quarterly payment due on or before [***].

The required payments are based upon the following assumptions: (a) the [***] of FTEs which Vertex will have employed in the Research Program for the portion of the Research Program that ends on [***] (the "Early Period") will be [***]; (b) the [***] of FTEs which Vertex will have employed in the Research Program for the portion of the Research Program beginning on January 1, 2005 and ending upon the termination of the Research Program Term [***]; and (c) the annual rate per FTE is [***]. If the average FTE level for any of the Early Period, Calendar Year 2005, or the remainder of the Research Program Term after Calendar Year 2005 is less than the level specified above for that period (the difference being referred to in this section as an "FTE Shortfall"), then the amount of funding specified above for that period shall be reduced by an amount (the "FTE Shortfall Amount") that bears the same relation to the total funding specified for that period as the FTE Shortfall bears to the projected FTE level for that period. The FTE Shortfall Amount shall be carried over from period to period and applied to compensate Vertex for FTE levels in subsequent periods that exceed the level for those periods as specified above. In any such subsequent

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period, Vertex shall be entitled to receive out of any remaining FTE Shortfall Amount a payment equal to the value (computed with reference to the FTE rate specified in (c) above) of any FTEs employed in the Research Period in excess of the FTE level specified above for such period.

5.2 **Consideration for License.** In consideration for the licenses granted pursuant to Article 3 and the research obligations set forth herein, upon the terms and conditions contained herein, Merck shall pay to Vertex a one-time payment of [***] within [***] business days of the Effective Date.

5.3 **Milestone Payments.** In addition to the payments set out in Sections 5.1 and 5.2, the following amounts (each, a "Milestone Payment") shall be payable only once if (and only if) the corresponding milestones with regard to a Product are satisfied (each a "Milestone"):

5.4 [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]
(d)	[***]	$	[***]
(e)	[***]	$	[***]
(f)	[***]	$	[***]

5.5 [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

5.6 [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

5.7 [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

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5.8 [***]

5.8 A [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]
(d)	[***]	$	[***]

5.8 B [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]
(d)	[***]	$	[***]

5.9 Development Election Milestones for Follow-On Compounds

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

[***]

[***]

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5.10 [***]

5.10 A [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]
(d)	[***]	$	[***]
(e)	[***]	$	[***]

5.10 B [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

5.10 C [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

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5.10 D [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]

5.11 [***]

5.11 A [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]
(d)	[***]	$	[***]

5.11 B [***]

(a)	[***]	$	[***]
(b)	[***]	$	[***]
(c)	[***]	$	[***]
(d)	[***]	$	[***]

5.12 Milestone Payments – General. (a) [***] Merck shall notify Vertex in writing within thirty (30) days upon the achievement (or deemed achievement) of each Milestone, and shall make the appropriate Milestone Payment within [***] of the achievement (or deemed achievement) of such Milestone.

(b) Once a Product achieves a Milestone for a particular Indication, it will be deemed to have achieved all earlier Milestones for such Indication, and any Milestone Payment for such earlier Milestone shall become due and payable to the extent it has not already been previously paid.

(c) [***]

(d) Each Milestone Payment shall be payable upon achievement of such Milestone by action of any of Merck or a Related Party.

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5.13 Royalties

5.13.1 Royalties Payable By Merck. Subject to the terms and conditions of this Agreement, Merck shall pay to Vertex royalties on a country-by-country basis as set out in this Section 5.13.

5.13.2 Patent Royalties

Subject to the provisions of this Agreement, including Section 5.13.3, Merck shall pay Vertex royalties in an amount equal to the following percentages of Net Sales of Products by Merck or its Related Parties, provided that the sale of Product would infringe a Valid Patent Claim in the country of sale :

- For Calendar Year Net Sales in the Territory between [***]: : [***]
- For those incremental Calendar Year Net Sales in the Territory [***]: [***]
- For those incremental Calendar Year Net Sales in the Territory greater than [***]: [***]

Royalties on each Product at the Patent royalty rates set forth above shall continue on a country-by-country basis until the later of (a) [***] from the date of First Commercial Sale of such Product in such country, or (b) the expiration of the last-to-expire Valid Patent Claim in effect in such country that would be infringed by the sale of such Product. This Section 5.13.2 shall apply to sales of Products in any country where such sale would infringe a Valid Patent Claim at any time, even if such Valid Patent Claim subsequently expires before the [***] of the date of First Commercial Sale of such Product in such country.

5.13.3 Know-How Royalty.

(a) If the sale of Product would infringe a Valid Patent Claim in the United States and at least [***] of the other Major Markets (i.e., [***]) ("Major Markets Condition"), in any countries where the sale of Product by Merck or its Related Parties would not infringe a Valid Patent Claim and royalties would not be due under Section 5.13.2 (each, a "Non-Patent Country"), Merck shall pay royalties to Vertex at the applicable royalty rate determined according to Section 5.13.2. Merck shall pay Vertex royalties at such rates for [***] from the date of First Commercial Sale of a Product in each such Non-Patent Country (the "Know-How License Term"), on a Product-by-Product and country-by-country basis. Notwithstanding the above, if at any time during the Know-How License

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Term applicable to a particular Non-Patent Country, a Third Party sells a pharmaceutical product which is a "generic version" of a Product being sold in that country (a "Third Party Product") — where "generic version" means [***], the royalties payable to Vertex by Merck on Net Sales of such Product in such country for such period shall be [***] of the applicable royalty rate determined according to Section 5.13.2.

(b) Notwithstanding the provisions of Section 5.13.2, and except as set forth in Section 5.13.3(a), in countries where the sale of Product by Merck or its Related Parties would not infringe a Valid Patent Claim and royalties would not be payable under Section 5.13.2, Merck shall pay royalty rates that shall be set at [***] of the applicable royalty rate determined according to Section 5.13.2 (the "Know-How Royalty Rate"). Such royalties shall be calculated after first calculating royalties under Section 5.13.2. Merck shall pay Vertex royalties at the Know-How Royalty rate from the date of First Commercial Sale of a Product, for [***], on a Product-by-Product and country-by-country basis.

5.13.4 Royalty tiers pursuant to 5.13.2 and 5.13.3 shall be calculated based on Net Sales of each Product in the Territory, provided that the determination of whether the royalty shall be calculated under 5.13.2 or 5.13.3 shall be determined on a country-by-country basis. All royalties are subject to the following conditions:

(x) that only one royalty shall be due with respect to the same unit of Product;

(y) that no royalties shall be due upon the sale or other transfer among Merck or its Related Parties, but in such cases the royalty shall be due and calculated upon Merck's or its Related Party's Net Sales to the first independent Third Party; and

(z) no royalties shall accrue on the disposition of Product without consideration in reasonable quantities by Merck or its Related Parties as samples (promotion or otherwise) or as donations (for example, to non-profit institutions or government agencies for a non-commercial purpose).

5.14 **Change in Sales Practices.** The Parties acknowledge that during the term of this Agreement, Merck's sales practices for the marketing and distribution of Product may change to the extent that the calculation of the payment for royalties on Net Sales may become impractical or even impossible. In such event, the Parties agree to meet and discuss in good faith new ways of compensating Vertex to the extent currently contemplated under Section 5.13.

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5.15 **Royalties for Bulk Compound.** In those cases where Merck sells bulk Compound rather than Product in packaged form to an independent Third Party, such sale shall be made in an arm's length transaction and the royalty obligations of Section 5.13 shall be applicable to the bulk Compound.

5.16 **Compulsory Licenses.** If a compulsory license required under applicable law is granted to a Third Party with respect to Product in any country in the Territory with a royalty rate lower than the royalty rate provided by Section 5.13, then the royalty rate to be paid by Merck on Net Sales in that country under Section 5.13 shall be reduced to the rate paid by the compulsory licensee.

5.17 **Third Party Licenses.** If one or more patent licenses from other Third Parties are required by Merck or its Related Parties in order to make, have made, use, offer to sell, sell or import Product Candidate or Product(s) (hereinafter **"**Third Party Patent Licenses"), or in the absence of such Third Party Patent License, the use by Merck of the Patent Rights, Vertex Know-How or Vertex Information and Inventions would infringe Third Party patents rights, then [***] of the consideration actually paid under such Third Party Patent Licenses by Merck or its Related Parties for sale of such Product in a country for a Calendar Quarter shall be creditable against the royalty payments due Vertex by Merck with respect to the sale of such Products in a country; provided, that the royalty payment to Vertex on account of sales in that country for such Calendar Quarter shall not be reduced by more than [***] the monies otherwise owed to Vertex; and any amounts not able to be reduced due to the immediately foregoing limitation shall be carried forward to future Calendar Quarters for crediting against future royalties in such country. [***]

5.18 **Reports; Payment of Royalty.** During the term of this Agreement following the First Commercial Sale of a Product, Merck shall furnish to Vertex a quarterly written report for the Calendar Quarter showing (i) the Net Sales of all Products subject to royalty payments sold by Merck and its Related Parties in the Territory during the reporting period; and (ii) the royalties payable under this Agreement. Reports shall be due on the [***] day following the close of each Calendar Quarter, although Merck shall use its commercially reasonable efforts to also provide Vertex with a "flash" report of estimated Net Sales, only, within [***]days after the end of each calendar month. Royalties shown to have accrued by each royalty report shall be due and payable on the date such royalty report is due. Merck shall keep complete and accurate records in sufficient detail to enable the royalties payable hereunder to be determined and to be verified by Vertex's accounting firm pursuant to Section 5.19.

5.19 **Audits.** Upon the written request of Vertex and not more than once in each Calendar Year, Merck shall permit an independent certified public accounting firm of nationally recognized standing selected by Vertex and reasonably

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acceptable to Merck, at Vertex's expense, to have access during normal business hours to such of the records of Merck as may be reasonably necessary to verify the accuracy of the royalty reports hereunder for any year ending not more than [***] prior to the date of such request. The accounting firm shall disclose to Vertex only whether the royalty reports are correct or incorrect and the specific details concerning any discrepancies. No other information shall be provided to Vertex.

If such accounting firm correctly identifies a discrepancy made during such period, the appropriate Party shall pay the other Party the amount of the discrepancy within [***] of the date Vertex delivers to Merck such accounting firm's written report so correctly concluding, or as otherwise agreed upon by the Parties. The fees charged by such accounting firm shall be paid by Vertex.

Merck shall include in each sublicense granted by it pursuant to this Agreement a provision requiring the sublicensee to make reports to Merck, to keep and maintain records of sales made pursuant to such sublicense and to grant access to such records by Vertex's independent accountant to the same extent required of Merck under this Agreement.

Upon the expiration of [***] following the end of any Calendar Year, the calculation of royalties payable with respect to such year shall be binding and conclusive upon Vertex, and Merck and its Related Parties shall be released from any liability or accountability with respect to royalties for such Calendar Year.

Vertex shall treat all financial information subject to review under this Section 5.19 or under any sublicense agreement in accordance with the confidentiality and non-use provisions of this Agreement, and shall cause its accounting firm to enter into an acceptable confidentiality agreement with Merck and/or its Related Parties obligating it to retain all such information in confidence pursuant to such confidentiality agreement.

5.20 **Payment Exchange Rate.** All payments to be made by Merck to Vertex under this Agreement shall be made in United States dollars and may be paid by check made to the order of Vertex or bank wire transfer in immediately available funds to such bank account in the United States designated in writing by Vertex from time to time. In the case of sales outside the United States, the rate of exchange to be used in computing the amount of currency equivalent in United States dollars due Vertex shall be made at the rate of exchange utilized by Merck in its worldwide accounting system, prevailing on the third to the last business day of the month prior to the month in which such sales are recorded by Merck.

5.21 **Income Tax Withholding.** If laws, rules or regulations require withholding of income taxes or other taxes imposed upon payments set forth in this Article 5, Merck shall make such withholding payments as required and subtract such

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withholding payments from the payments set forth in this Article 5. Merck shall submit appropriate proof of payment of the withholding taxes to Vertex within a reasonable period of time.

5.22 **Interest Penalty.** In case of any delay in payment by Merck to Vertex not occasioned by Force Majeure (as described in Section 9.3), interest at the monthly rate of [***], assessed from the thirty-first day after the due date of the payment, shall be due from Merck.

ARTICLE 6: REPRESENTATIONS AND WARRANTIES

6.1 **Vertex Representation and Warranty.** Vertex represents and warrants to Merck that as of the Effective Date:

6.1.1 to Vertex's knowledge, the Patent Rights and Vertex Know-How exist and are not invalid or unenforceable, in whole or in part;

6.1.2 it has the full corporate right, power and authority to enter into this Agreement, to perform the Research Program and to grant the licenses granted hereunder;

6.1.3 this Agreement has been duly executed and delivered by Vertex and constitutes the valid and binding obligation of Vertex, enforceable against Vertex in accordance with its terms. The execution, delivery, and performance of this Agreement have been duly authorized by all necessary action on the part of Vertex, its officers and directors;

6.1.4 it has not previously assigned, transferred, conveyed or otherwise encumbered its right, title and interest in VX-680, the Existing Compounds, Patent Rights or Vertex Know-How;

6.1.5 to Vertex's knowledge, it is the sole and exclusive owner of VX-680, the Existing Compounds, the Patent Rights and Vertex Know-How, all of which are (and shall be, in the case of Vertex Information and Inventions) free and clear of any liens, charges and encumbrances, and no other person, corporate or other private entity, or governmental entity or subdivision thereof, has or shall have any claim of ownership whatsoever with respect to the VX-680, Existing Compounds, Patent Rights and Vertex Know-How;

6.1.6 to Vertex's knowledge, the exercise of the license granted to Merck under the Patent Rights and Vertex Know-How, including without limitation the development, manufacture, use, sale and import of Compounds, Product Candidates and Products do not interfere with or infringe any intellectual property rights owned or possessed by any Third Party;

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6.1.7 there are no claims known to Vertex, and no judgments or settlements against or owed by Vertex or pending or threatened claims or litigation relating to the Patent Rights and Vertex Know-How;

6.1.8 to Vertex's knowledge, Schedules 1.19 and 1.63 together set forth all small molecule compounds Controlled by Vertex [***]; and

6.1.9 Vertex has disclosed to Merck all reasonably relevant information known to Vertex regarding the Patent Rights and Vertex Know-How licensed under this Agreement.

6.2 **Merck Representation and Warranty.** Merck represents and warrants to Vertex that as of the Effective Date:

6.2.1 it has the full corporate right, power and authority to enter into this Agreement, and perform its obligations hereunder; and

6.2.2 this Agreement has been duly executed and delivered by Merck and constitutes the valid and binding obligation of Merck, enforceable against Merck in accordance with its terms. The execution, delivery, and performance of this Agreement have been duly authorized by all necessary action on the part of Merck, its officers and directors.

ARTICLE 7: PATENT PROVISIONS

7.1 **Filing, Prosecution and Maintenance of Patents.** Vertex agrees to file, prosecute and maintain in the Territory, upon appropriate consultation with Merck, the Patent Rights licensed to Merck under this Agreement. Merck shall have the first right to file, prosecute and maintain in the Territory Collaboration Patent Rights. With respect to Vertex Information and Inventions, Vertex may elect not to file, prosecute and maintain patent applications directly thereto and if so, Merck shall have the right to file, prosecute and maintain such patent applications. In such event, Vertex shall execute such documents and perform such acts at Vertex's expense as may be reasonably necessary to effect an assignment of such Patent Rights to Merck in a timely manner to allow Merck to continue such preparation and prosecution or maintenance. In each case, the filing Party shall give the non-filing Party an opportunity to review the text of the application before filing, shall consult with the non-filing Party with respect thereto, and shall supply the non-filing Party with a copy of the application as filed, together with notice of its filing date and serial number. Vertex shall keep Merck advised of the status of the actual and prospective patent filings and upon the request of Merck, provide advance copies of any papers related to the filing, prosecution and maintenance of such patent filings. Vertex shall promptly give notice to Merck of the grant, lapse, revocation, surrender, invalidation or

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abandonment of any Patent Rights licensed to Merck for which Vertex is responsible for the filing, prosecution and maintenance. With respect to all filings hereunder, the filing Party shall be responsible for payment of all costs and expenses related to such filings.

7.2 Option to Prosecute and Maintain Patents.

(a) Merck Option. Vertex shall give notice to Merck of any desire to cease prosecution and/or maintenance of Patent Rights on a country by country basis in the Territory and, in such case, shall permit Merck, at its sole discretion, to continue prosecution or maintenance of such Patent Rights at its own expense. If Merck elects to continue prosecution or maintenance or to file based on Vertex's election not to file pursuant to Section 7.1, Vertex shall execute such documents and perform such acts at Vertex's expense as may be reasonably necessary to effect an assignment of such Patent Rights to Merck in a timely manner to allow Merck to continue such prosecution or maintenance. Any patents or patent applications so assigned shall not be considered Patent Rights.

(b) Vertex Option. Merck shall give notice to Vertex of any desire to cease prosecution and/or maintenance of Collaboration Patent Rights on a country by country basis in the Territory and, in such case, shall permit Vertex, at its sole discretion, to continue prosecution or maintenance of such Collaboration Patent Rights at its own expense. If Vertex elects to continue prosecution or maintenance or to file based on Merck's election not to file pursuant to Section 7.1, Merck shall execute such documents and perform such acts at Merck's expense as may be reasonably necessary to effect an assignment of such Collaboration Patent Rights to Vertex in a timely manner to allow Vertex to continue such prosecution or maintenance. Any patents or patent applications so assigned shall not be considered Collaboration Patent Rights.

7.3 Interference, Opposition, Reexamination and Reissue

7.3.1 Vertex shall, within ten (10) days of learning of such event, inform Merck of any request for, or filing or declaration of, any interference, opposition, or reexamination relating to Patent Rights. Merck and Vertex shall thereafter consult and cooperate fully to determine a course of action with respect to any such proceeding. Merck shall have the right to review and approve any submission to be made in connection with such proceeding.

7.3.2 Vertex shall not initiate any reexamination, interference or reissue proceeding relating to Patent Rights without the prior written consent of Merck, which consent shall not be unreasonably withheld.

7.3.3 In connection with any interference, opposition, reissue, or reexamination proceeding relating to Patent Rights and Collaboration Patent Rights, Merck and Vertex will cooperate fully and will provide each other with any information or assistance that either may reasonably request. Vertex shall keep Merck informed of developments in any such action or proceeding, including, to the extent permissible by law, consultation and approval of any settlement, the status of any settlement negotiations and the terms of any offer related thereto.

7.3.4 Vertex shall bear the expense of any interference, opposition, reexamination, or reissue proceeding relating to Patent Rights. The Parties shall share equally the expense of any interference, opposition, reexamination or re-issue proceeding relating to the Collaboration Patent Rights.

7.4 Enforcement and Defense

7.4.1 Vertex shall give Merck notice of either (i) any infringement of Patent Rights, or (ii) any misappropriation or misuse of Vertex Know-How, that may come to Vertex's attention. Merck and Vertex shall thereafter consult and cooperate fully to determine a course of action, including but not limited to the commencement of legal action by either or both Merck and Vertex, to terminate any infringement of Patent Rights or any misappropriation or misuse of Vertex Know-How. However, Vertex, upon notice to Merck, shall have the first right to initiate and prosecute such legal action at its own expense and in the name of Vertex and Merck, or to control the defense of any declaratory judgment action relating to Patent Rights or Vertex Know-How. Vertex shall promptly inform Merck if it elects not to exercise such first right and Merck shall thereafter have the right to either initiate and prosecute such action or to control the defense of such declaratory judgment action in the name of Merck and, if necessary, Vertex. Each Party shall have the right to be represented by counsel of its own choice.

7.4.2 If Vertex elects not to initiate and prosecute an action as provided in Section 7.4.1, and Merck elects to do so, the costs of any agreed-upon course of action to terminate infringement of Patent Rights or misappropriation or misuse of Vertex Know-How, including without limitation the costs of any legal action commenced or the defense of any declaratory judgment, shall be shared equally by Vertex and Merck.

7.4.3 For any action to terminate any infringement of Patent Rights or any misappropriation or misuse of Vertex Know-How, in the event that Merck is unable to initiate or prosecute such action solely in its own name, Vertex will join such action voluntarily and will execute and cause its Affiliates to execute all documents necessary for Merck to initiate litigation to prosecute and maintain such action. In connection with any action, Merck and Vertex will cooperate fully and will provide each other with any information or assistance that either may reasonably request. Each Party shall keep the other informed of developments in any action or proceeding, including, to the extent permissible by law, the consultation and approval of any settlement negotiations and the terms of any offer related thereto.

7.4.4 Any recovery obtained by either or both Merck and Vertex in connection with or as a result of any action contemplated by this Section, whether by settlement or otherwise, shall be shared in order as follows:

(i) the Party which initiated and prosecuted the action shall recoup all of its costs and expenses incurred in connection with the action;

(ii) the other Party shall then, to the extent possible, recover its costs and expenses incurred in connection with the action; and

(iii) the amount of any recovery remaining shall then be allocated between the Parties on a pro rata basis taking into consideration the relative economic losses suffered by each Party.

7.4.5 Vertex shall inform Merck of any certification regarding any Patent Rights it has received pursuant to either 21 U.S.C. §§355(b)(2)(A)(iv) or (j)(2)(A)(vii)(IV) or its successor provisions or any similar provisions in a country in the Territory other than the United States and shall provide Merck with a copy of such certification within five (5) days of receipt. Vertex's and Merck's rights with respect to the initiation and prosecution of any legal action as a result of such certification or any recovery obtained as a result of such legal action shall be as defined in subsections 7.4.1 through 7.4.4; provided, however, the Vertex shall exercise its first right to initiate and prosecute any action and shall inform Merck of such decision within ten (10) days of receipt of the certification, after which time Merck shall have the right to initiate and prosecute such action.

7.4.6 **Patent Term Restoration.** The Parties hereto shall cooperate with each other in obtaining patent term restoration or supplemental protection certificates or their equivalents in any country in the Territory where

applicable to Patent Rights. In the event that elections with respect to obtaining such patent term restoration are to be made, Merck shall have the right to make the election and Vertex agrees to abide by such election.

ARTICLE 8: TERM AND TERMINATION

8.1 **Term and Expiration.** This Agreement shall be effective as of the Effective Date and unless terminated earlier pursuant to Sections 8.2 or 8.3, this Agreement shall continue in effect until expiration of all royalty obligations under Article 5. Upon expiration of this Agreement, Merck's licenses pursuant to Section 3.1 and 3.2 shall become fully paid-up, perpetual licenses.

8.2 **Termination by Merck.** Notwithstanding anything contained herein to the contrary, after June 30, 2005, Merck shall have the right to terminate this Agreement at any time in its sole discretion by giving ninety (90) days' advance written notice to Vertex; provided, however (a) during the second (2^{nd}) year of the Research Program Term, Merck shall provide [***] advance written notice to Vertex; and (b) if a Product has received a Marketing Authorization in a Major Market and such termination is for a reason other than a Valid Safety Issue, [***] advance written notice shall be required. Not later than thirty (30) days after the date of such termination, each Party shall return or cause to be returned to the other Party all Information in tangible form received from the other Party and all copies thereof, except that each Party may retain one copy in its confidential files for records purposes. In the event of termination under this Section 8.2: (i) Merck shall pay Vertex all amounts then due and owing as of the termination date; and (ii) except for the surviving provisions set forth in Section 8.6, the rights and obligations of the Parties under this Agreement shall terminate as of the date of such termination. For the purposes of this Agreement, a "Valid Safety Issue" shall mean the [***].

8.3 **Cause for Termination.** This Agreement may be terminated at any time during the term of this Agreement:

8.3.1. upon written notice by either Party if the other Party is in breach of its material obligations hereunder by causes and reasons within its control and has not cured such breach within ninety (90) days after notice requesting cure of the breach; provided, however, in the event of a good faith dispute with respect to the existence of a material breach, the ninety (90) day cure period shall be tolled until such time as the dispute is resolved pursuant to Section 9.8;

8.3.2. by either Party upon the filing or institution of bankruptcy, reorganization, liquidation or receivership proceedings, or upon an assignment of a substantial portion of the assets for the benefit of creditors by the other

Party; provided, however, in the case of any involuntary bankruptcy proceeding such right to terminate shall only become effective if the Party consents to the involuntary bankruptcy or such proceeding is not dismissed within ninety (90) days after the filing thereof.

8.4 **Effect of Termination for Cause on License**

8.4.1 If Merck terminates this Agreement under Section 8.3.1, then (i) Merck's licenses pursuant to Sections 3.1 and 3.2 shall become fully paid-up (except that the financial provisions of Sections 5.3 through 5.20 of this Agreement shall continue), exclusive, perpetual licenses; (ii) Merck shall have the right to offset against any monies owed to Vertex (pursuant to Sections 5.3 through 5.20 of this Agreement) all of its costs, losses and expenses incurred as a result of Vertex's breach as set forth in Section 8.3.1 of this Agreement; and (iii) Vertex shall, within thirty (30) days after such termination return or cause to be returned to Merck all Merck Information in tangible form, and all substances or compositions delivered or provided by Merck, as well as any other material provided by Merck in any medium. If Vertex terminates this Agreement under Section 8.3, Merck's licenses pursuant to Sections 3.1 and 3.2 shall terminate as of such termination date and Merck shall, within thirty (30) days after such termination, return or cause to be returned to Vertex all Vertex Information in tangible form, and all substances or compositions delivered or provided by Vertex, as well as any other material provided by Vertex in any medium.

8.4.2 If this Agreement is terminated by Merck pursuant to subsection 8.3.2 due to the rejection of this Agreement by or on behalf of Vertex under Section 365 of the United States Bankruptcy Code (the "Code"), all licenses and rights to licenses granted under or pursuant to this Agreement by Vertex to Merck are, and shall otherwise be deemed to be, for purposes of Section 365(n) of the Code, licenses of rights to "intellectual property" as defined under Section 101(35A) of the Code. The Parties agree that Merck, as a licensee of such rights under this Agreement, shall retain and may fully exercise all of its rights and elections under the Code, and that upon commencement of a bankruptcy proceeding by or against Vertex under the Code, Merck shall be entitled to a complete duplicate of or complete access to (as Merck deems appropriate), any such intellectual property and all embodiments of such intellectual property. Such intellectual property and all embodiments thereof shall be promptly delivered to Merck (i) upon any such commencement of a bankruptcy proceeding upon written

request therefore by Merck, unless Vertex elects to continue to perform all of its obligations under this Agreement or (ii) if not delivered under (i) above, upon the rejection of this Agreement by or on behalf of Vertex upon written request therefore by Merck.

8.4.3 The foregoing provisions of subsection 8.4.2 are without prejudice to any rights Merck may have arising under the Code or other applicable law.

8.5 Rights Upon Expiration of Research Program Term and Washout Period

Upon expiration or termination of the Research Program Term and Washout Period:

(a) Subject to the provisions of Section 8.5(c) of this Agreement, Merck's licenses pursuant to Sections 3.1 and 3.2 shall continue as to any Products, Product Candidates and Development Candidates then existing; provided, however, that with respect to any Development Candidate, such licenses shall terminate if Merck does not make its Development Election with respect to such Development Candidate within the [***] period set forth in Section 3.6;

(b) Subject to the provisions of Section 8.5(c) of this Agreement, Merck's licenses pursuant to Sections 3.1 and 3.2 shall terminate as to all Compounds and Deferred Candidates, excluding, however, any such Compounds and Deferred Candidates that have become Products, Product Candidates or Development Candidates covered by Section 8.5(a) immediately above; and

(c) Notwithstanding the provision of Sections 8.5(b), Merck shall have the right to designate [***] additional Compounds or Deferred Candidates in which Merck may have a continued interest in developing ("ROFO Compounds"). For a period of [***] from the expiration of the Washout Period, Vertex shall not (i) enter into discussions or negotiations with any Third Party regarding any business arrangement for the development, marketing or sale of any ROFO Compound; or (ii) commence or continue its own internal development, marketing or sale program with regard to any ROFO Compound, unless Vertex first offers in good faith and in writing any such ROFO Compound to Merck for development and commercialization as a Product Candidate pursuant to the terms and conditions of this Agreement. Merck must accept in writing within [***] of the delivery of such offer in order to accept such offer. If Merck rejects such offer in writing, or fails to accept within such period, Vertex may enter into discussions with Third Parties regarding such a business arrangement or conduct its own internal development, marketing or sale program with respect to such ROFO Compound.

8.6 Effect of Expiration or Termination; Survival

Expiration or termination of this Agreement shall not relieve the Parties of any obligation accruing prior to such expiration or termination. Any expiration or

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termination of this Agreement shall be without prejudice to the rights of either Party against the other accrued or accruing under this Agreement prior to expiration or termination, including without limitation the obligation to pay royalties for Product(s) sold prior to such expiration or termination. The provisions of Section 4.1 shall survive the expiration or termination of this Agreement and shall continue in effect for [***]. In addition, the provisions of Article 1, Sections 2.8, 4.3, 4.4 and 5.19, shall indefinitely survive any expiration or termination of this Agreement.

8.7 Effect of Vertex Change of Control

If (a) a Change of Control of Vertex occurs and (b) the Change of Control party is a pharmaceutical or biotechnology company or other health care company, or group of health care companies acting in concert, with (i) a market capitalization of more than [***], and/or (ii) total annual sales of pharmaceutical products (including sales by all affiliates of such company or companies) prior to such acquisition in excess of [***], then:

[***]

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[***]

ARTICLE 9: MISCELLANEOUS

9.1 Indemnification

(a) Except to the extent due to the negligence or willful misconduct of Merck, Vertex shall indemnify, defend and hold Merck and its Affiliates, and their respective directors, officers, employees and agents, harmless from and against any claims of damages (except to the extent arising from any claim of intellectual property infringement), bodily injury, death, or property damage made by a Third Party (a "Third Party Claim") to the extent arising from: (i) the negligence or willful misconduct of Vertex under this Agreement; (ii) the material breach by Vertex of any warranty, representation or obligation of Vertex under this Agreement; or (iii) the development, synthesis, testing, use, storage or handling by Vertex or its representatives or agents under this Agreement of any Compound, Development Candidate, Deferred Candidate, Follow-on Compound, Product Candidate or Product.

(b) Except to the extent due to the negligence or willful misconduct of Vertex, Merck shall indemnify, defend and hold Vertex and its Affiliates, and their respective directors, officers, employees and agents, harmless from and against any Third Party Claim resulting from (i) the negligence or willful misconduct of Merck under this Agreement; (ii) the material breach by Merck of any obligation of Merck under this Agreement; or (iii) the development, testing, synthesis, use, storage, handling, manufacture or commercialization by Merck or its representatives or agents under this Agreement of any Compound, Merck AK Compound, Development Candidate, Deferred Candidate, Follow-on Compound, Product Candidate or Product.

(c) If a Party (the "Indemnitee") intends to claim indemnification under this Section, it shall promptly notify the other Party (the "Indemnitor") in writing of any Third Party Claim for which the Indemnitee intends to claim such indemnification. The failure of the Indemnitee to deliver written notice to the Indemnitor within a reasonable time after the commencement of any such action shall relieve the Indemnitor of any obligation to the Indemnitee under this Section with respect to any such action. The Indemnitee shall permit the Imdemnitor to control the litigation and/or settlement of such Third Party Claim, and cooperate fully with Indemnitor in all matters related thereto, provided that unless agreed by Indemnitee (i) counsel appointed by Imdemnitor to defend Indemnitee shall not take any position which if sustained would cause Indemnitee not to be indemnified by Indemnitor and (ii) no settlement will involve any terms binding on Indemnitee except payment of money to by paid by Indemnitor.

(d) Neither Party shall be liable to the other for indirect, consequential, special or punitive damages under this Agreement.

9.2 [***]

9.2.1 [***]

9.2.2 [***]

9.3 **Force Majeure.** Neither Party shall be held liable to the other Party nor be deemed to have defaulted under or breached this Agreement for failure or delay in performing any obligation under this Agreement when such failure or delay is caused by or results from causes beyond the reasonable control of the affected Party including, but not limited to, embargoes, war, acts of war (whether war be declared or not), insurrections, riots, civil commotions, strikes, lockouts or other labor disturbances, fire, floods, or other acts of God, or acts, omissions or delays in acting by any governmental authority or the other Party. The affected Party shall notify the other Party of such force majeure circumstances as soon as reasonably practical, and shall promptly undertake all reasonable efforts necessary to cure such force majeure circumstances.

9.4 **Assignment.** Except as provided in this Section 9.4, this Agreement may not be assigned or otherwise transferred, nor may any right or obligation hereunder be assigned or transferred, by either Party without the consent of the other Party. Merck may, without Vertex's consent, assign this Agreement and its rights and obligations hereunder in whole or in part to a Merck Affiliate, if Merck guarantees the full performance of its Affiliate's obligations hereunder. Any permitted assignee shall assume all obligations of its assignor under this Agreement and shall be subject to all of the provisions of this Agreement. Any attempted assignment not in accordance with this Section shall be void. Notwithstanding the above, Vertex may, without Merck's consent, assign this Agreement and its rights and obligations hereunder in the event of a Change of Control of Vertex to the Change of Control party, subject to the provisions of this Agreement, including Section 8.7.

9.5 **Severability.** If any one or more of the provisions contained in this Agreement is held invalid, illegal or unenforceable in any respect, the validity, legality and enforceability of the remaining provisions contained herein shall not in any way be affected or impaired thereby, unless the absence of the invalidated provision(s) adversely affects the substantive rights of the Parties. The Parties shall in such an instance use their best efforts to replace the invalid, illegal or unenforceable provision(s) with valid, legal and enforceable provision(s) which, insofar as practical, implement the purposes of this Agreement.

9.6 **Notices.** All notices which are required or permitted hereunder shall be in writing and sufficient if delivered personally, sent by facsimile (and promptly confirmed by personal delivery, registered or certified mail or overnight courier), sent by

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nationally-recognized overnight courier or sent by registered or certified mail, postage prepaid, return receipt requested, addressed as follows:

if to Vertex, to:	Vertex Pharmaceuticals Incorporated 130 Waverly Street Cambridge, MA 02139 **Attn:** Office of Business Development Facsimile No: (617) 444-6632
and:	**Attn**: General Counsel Facsimile No.: (617) 444-7117

if to Merck, to:

Merck & Co., Inc.
One Merck Drive
P.O. Box 100 (WS 3A-65)
Whitehouse Station, NJ 08889-0100

Attn: Office of Secretary
Facsimile No.: (908) 735-1246

And

Merck & Co., Inc.
One Merck Drive (WS 2A-30)
P.O. Box 100
Whitehouse Station, NJ 08889-0100

Attn: Chief Licensing Officer
Facsimile: (908)735-1214

or to such other address as the Party to whom notice is to be given may have furnished to the other Party in writing in accordance herewith. Any such notice shall be deemed to have been given: (a) when delivered if personally delivered or sent by facsimile on a business day; (b) on the business day after dispatch if sent by nationally-recognized overnight courier; and/or (c) on the fifth business day following the date of mailing if sent by mail.

9.7 **Applicable Law.** This Agreement shall be governed by and construed in accordance with the laws of the State of New York and the patent laws of the United States without reference to any rules of conflict of laws or renvoi. The United Nations Convention on the Sale of Goods shall not apply.

9.8 **Dispute Resolution**

9.8.1 The Parties shall negotiate in good faith and use reasonable efforts to settle any dispute, controversy or claim arising from or related to this Agreement

or the breach thereof. If the Parties do not fully settle, and a Party wishes to pursue the matter, each such dispute, controversy or claim that is not an "Excluded Claim" shall be finally resolved by binding arbitration in accordance with the Commercial Arbitration Rules and Supplementary Procedures for Large Complex Disputes of the American Arbitration Association ("AAA"), and judgment on the arbitration award may be entered in any court having jurisdiction thereof.

9.8.2 The arbitration shall be conducted by a panel of three persons experienced in the pharmaceutical business. Within 30 days after initiation of arbitration, each Party shall select one person to act as arbitrator and the two Party-selected arbitrators shall select a third arbitrator within 30 days of their appointment. If the arbitrators selected by the Parties are unable or fail to agree upon the third arbitrator, the third arbitrator shall be appointed by the AAA. The place of arbitration shall be New York, New York, and all proceedings and communications shall be in English.

9.8.3 Either Party may apply to the arbitrators for interim injunctive relief until the arbitration award is rendered or the controversy is otherwise resolved. Either Party also may, without waiving any remedy under this Agreement, seek from any court having jurisdiction any injunctive or provisional relief necessary to protect the rights or property of that Party pending the arbitration award. The arbitrators shall have no authority to award punitive or any other type of damages not measured by a Party's compensatory damages. Each Party shall bear its own costs and expenses and attorneys' fees and an equal share of the arbitrators' and any administrative fees of arbitration.

9.8.4 Except to the extent necessary to confirm an award or as may be required by law, neither a Party nor an arbitrator may disclose the existence, content, or results of an arbitration without the prior written consent of both Parties. In no event shall an arbitration be initiated after the date when commencement of a legal or equitable proceeding based on the dispute, controversy or claim would be barred by the applicable New York statute of limitations.

9.8.5 The Parties agree that, in the event of a dispute over the nature or quality of performance under this Agreement, neither Party may terminate this Agreement until final resolution of the dispute through arbitration or other judicial determination. The Parties further agree that any payments made pursuant to this Agreement pending resolution of the dispute shall be refunded if an arbitrator or court determines that such payments are not due.

9.8.6 As used in this Section, the term "Excluded Claim" shall mean a dispute, controversy or claim that concerns (a) the validity or infringement of a patent, trademark or copyright; or (b) any antitrust, anti-monopoly or competition law or regulation, whether or not statutory.

9.9 **Entire Agreement; Amendments.** This Agreement, together with the Schedules hereto, contains the entire understanding of the Parties with respect to the subject matter hereof and supercedes and cancels all previous express or implied agreements and understandings, negotiations, writings and commitments, either oral or written, in respect to the subject matter hereof. The Schedules to this Agreement are incorporated herein by reference and shall be deemed a part of this Agreement. This Agreement may be amended, or any term hereof modified, only by a written instrument duly executed by authorized representatives of both Parties.

9.10 **Headings.** The captions to the several Articles, Sections and subsections hereof are not a part of this Agreement, but are merely for convenience to assist in locating and reading the several Articles and Sections hereof.

9.11 **Independent Contractors.** It is expressly agreed that Vertex and Merck shall be independent contractors and that the relationship between the two Parties shall not constitute a partnership, joint venture or agency. Neither Vertex nor Merck shall have the authority to make any statements,

representations or commitments of any kind, or to take any action, which shall be binding on the other Party, without the prior written consent of the other Party.

9.12 **Waiver.** The waiver by either Party hereto of any right hereunder, or the failure of the other Party to perform, or a breach by the other Party, shall not be deemed a waiver of any other right hereunder or of any other breach or failure by such other Party whether of a similar nature or otherwise.

9.13 **Cumulative Remedies.** No remedy referred to in this Agreement is intended to be exclusive, but each shall be cumulative and in addition to any other remedy referred to in this Agreement or otherwise available under law.

9.14 **Waiver of Rule of Construction.** Each Party has had the opportunity to consult with counsel in connection with the review, drafting and negotiation of this Agreement. Accordingly, the rule of construction that any ambiguity in this Agreement shall be construed against the drafting Party shall not apply.

9.15 **Certain Conventions.** Any reference in this Agreement to an Article, Section, subsection, paragraph, clause, Schedule or Exhibit shall be deemed to be a reference to an Article, Section, subsection, paragraph, clause, Schedule or Exhibit, of or to, as the case may be, this Agreement, unless otherwise indicated. Unless the context of this Agreement otherwise requires, (a) words of any gender

include each other gender, (b) words such as "herein", "hereof", and "hereunder" refer to this Agreement as a whole and not merely to the particular provision in which such words appear, (c) words using the singular shall include the plural, and vice versa, and (d) the words "include," "includes" and "including" shall be deemed to be followed by the phrase "but not limited to", "without limitation", "inter alia" or words of similar import.

9.16 **Counterparts.** This Agreement may be executed in two or more counterparts, each of which shall be deemed an original, but all of which together shall constitute one and the same instrument.

[Signature Page Follows]

IN WITNESS WHEREOF, the Parties have executed this Agreement as of the date first set forth above.

MERCK & CO., INC.	**VERTEX PHARMACEUTICALS INCORPORATED**
By: /s/ Peter S. Kim	By: /s/ Vicki L. Sato
Name: Peter S. Kim	Name: Vicki L. Sato
Title: President, MRL	Title: President
6/21/04	June 21, 2004
Date	Date

SCHEDULES

Schedule 1.15

Development Criteria

[***]

* Information redacted pursuant to a confidential treatment request. An unredacted version of this exhibit has been filed separately with the Commission.

Schedule 1.17

Development Information

[***]

* Information redacted pursuant to a confidential treatment request. An unredacted version of this exhibit has been filed separately with the Commission.

Schedule 1.19

Existing Compounds

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[***]

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Schedule 1.43

Patent Rights

Schedule 1.63

Description of VX-680

[***]

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Schedule 2.1

Research Program

[***]

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SCHEDULE 3.11

CO-PROMOTION

[***]

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SCHEDULE 5.17

Certain Third Party Patent Applications

[***]

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