

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

FORM 10-K

FOR ANNUAL & TRANSITION REPORTS PURSUANT TO
SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934

(MARK ONE)

Annual Report Pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934
For the fiscal year ended December 31, 2007

or

Transition Report Pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934
For the transition period from _____ to _____

Commission File Number: 001-33221

A.P. PHARMA, INC.

(Exact name of registrant as specified in its charter)

DELAWARE
(State or other jurisdiction of incorporation or organization)

94-2875566
(I.R.S. Employer Identification Number)

123 SAGINAW DRIVE, REDWOOD CITY, CALIFORNIA
(Address of principal executive offices)

94063
(Zip Code)

Registrant's telephone number, including area code:
(650) 366-2626

Securities registered pursuant to Section 12(b) of the Act:

COMMON STOCK

THE NASDAQ GLOBAL MARKET

Securities registered pursuant to Section 12(g) of the Act:

NONE

Indicate by check mark if the Registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Exchange Act. Yes No

Indicate by check mark if the Registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Exchange Act. Yes No

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes No

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of the registrant's knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K.

Large accelerated filer Accelerated filer Non-accelerated filer Smaller reporting company

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). Yes No

The aggregate market value of the voting stock of the registrant held by non-affiliates of the registrant as of June 30, 2007, was \$31,644,208⁽¹⁾ based upon the closing sale price on the NASDAQ Global Market reported for such date.

As of February 29, 2008, 30,809,654 shares of registrant's Common Stock, \$.01 par value, were outstanding.

DOCUMENTS INCORPORATED BY REFERENCE

Document

Definitive Proxy Statement to be used in connection with the 2008 Annual Meeting of Stockholders.

Form 10-
K Part

III

⁽¹⁾ Excludes 16,330,388 shares held by directors, officers and shareholders whose ownership exceeds 5% of the outstanding shares at June 30, 2007. Exclusion of such shares should not be construed as indicating that the holders thereof possess the power, directly or indirectly, to direct the management or policies of the registrant, or that such person is controlled by or under common control with the registrant.

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PART I

ITEM 1. BUSINESS

Introduction-Forward Looking Statements

This Annual Report on Form 10-K contains “forward-looking statements” as defined by the Private Securities Litigation Reform Act of 1995. These forward-looking statements involve risks and uncertainties including uncertainties associated with timely development, approval, launch and acceptance of new products, satisfactory completion of clinical studies, establishment of new corporate alliances, progress in research and development programs and other risks and uncertainties described below under the headings “Our Lead Product Candidate APF530”, “Development Pipeline”, “Our Technology Platform”, “Our Strategy”, “Patents and Trade Secrets”, and “Competition”. Such risks and uncertainties also include the matters discussed under “Risk Factors” below, and under Management’s Discussion and Analysis of Financial Condition and Results of Operations in Item 7 below.

Company Overview

In this Annual Report on Form 10-K, the “Company”, “A.P. Pharma”, “we”, “us”, and “our”, refer to A.P. Pharma, Inc.

We are a specialty pharmaceutical company focused on developing pharmaceutical products using our proprietary Biochronomer polymer-based drug delivery technology. Our product development philosophy is based on incorporating approved therapeutics into our proprietary bioerodible drug delivery technology to create controlled release pharmaceuticals to improve treatments for diseases or conditions. Our lead product candidate, APF530, is currently in a pivotal Phase III clinical trial for the prevention of acute and delayed onset chemotherapy-induced nausea and vomiting, or CINV. We expect to complete enrollment of our pivotal Phase III clinical trial in the second quarter of 2008 and to announce results of that trial in the third quarter of 2008. We expect to file our new drug application, or NDA, for approval of APF530 in the fourth quarter of 2008.

Our primary focus is to advance our proprietary Biochronomer technology, consisting of bioerodible polymers designed to release drugs over a defined period. We have completed over 100 in vivo and in vitro studies demonstrating that our Biochronomer technology is potentially applicable to a range of therapeutic areas, including prevention of nausea and vomiting, pain management, control of inflammation and treatment of ophthalmic diseases. We have also completed comprehensive animal and human toxicology studies that have established that our Biochronomer polymers are safe and well tolerated. Furthermore, our Biochronomer technology can be designed to deliver drugs over periods varying from days to several months.

Our lead product candidate, which utilizes our proprietary Biochronomer technology, is APF530. APF530 is designed to prevent CINV for at least five days and contains granisetron, a drug approved for the prevention of CINV. In September 2005, we completed a Phase II clinical trial of APF530 that achieved all of its primary and secondary endpoints. In May 2006, we initiated our pivotal Phase III clinical trial of APF530. We believe that this clinical trial will lead to regulatory approval of APF530 for the prevention of acute and delayed onset CINV for patients undergoing both moderately and highly emetogenic chemotherapy.

In addition to our lead drug candidate, we have a pipeline of other product candidates that use our Biochronomer technology. One of these, APF112, incorporates the well-known local anesthetic, mepivacaine. It is designed to provide up to 36 hours of post-surgical pain relief and to minimize the use of morphine-like drugs, or opiates, which are used extensively in post-surgical

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pain management. Post-surgical pain can be treated with local anesthetics, but the usefulness of these is currently limited by the short duration of their effectiveness. We plan to initiate a Phase IIb clinical trial for APF112 in the second quarter of 2008.

We have several additional product candidates using our Biochronomer technology in early stages of development. For example, we plan to initiate a Phase I clinical trial of APF580 in the second quarter of 2008 for the controlled delivery of an opiate for pain relief.

We were founded in February 1983 as a California corporation under the name AMCO Polymerics, Inc. AMCO changed its name to Advanced Polymer Systems, Inc. in 1984 and was reincorporated in Delaware in 1987. We changed our name to A.P. Pharma, Inc. in May 2001 to reflect our new pharmaceutical focus. Our principal executive offices are located at 123 Saginaw Drive, Redwood City, California 94063. Our telephone number is (650) 366-2626. Our website is located at www.appharma.com. Information contained on, or that can be accessed through, our website is not part of this Annual Report on Form 10-K.

Our Lead Product Candidate—APF530

CINV Background

Prevention and control of nausea and vomiting, or emesis, are paramount in the treatment of cancer patients. The majority of patients receiving chemotherapy will experience some degree of emesis if not prevented with an antiemetic. Chemotherapy treatments can be classified as moderately emetogenic, meaning that 30 – 90% of patients experience CINV, or highly emetogenic, meaning that over 90% of patients experience CINV, if not prevented with an antiemetic. Acute onset CINV occurs within the first 24 hours following chemotherapy treatment. Delayed onset CINV occurs more than 24 hours after treatment and may persist for several days. Prevention of CINV is significant because the distress caused by CINV can severely disrupt patient quality of life and can lead some patients to discontinue chemotherapy. The unmet need is greatest with patients receiving highly emetogenic chemotherapy, particularly delayed onset CINV.

Current Therapy and Market Opportunity

Vomiting is a protective reflex against ingestion of potentially harmful substances, including some chemotherapeutic agents. These chemotherapeutic agents activate or destroy cells in the lining of the gut, releasing a neurotransmitter called serotonin. When serotonin binds to the 5-HT₃ (5-hydroxytryptamine type 3) receptors, the patient experiences nausea and vomiting. By blocking the 5-HT₃ receptors, granisetron and the other 5-HT₃ antagonists prevent serotonin from binding to the 5-HT₃ receptors, thereby inhibiting the vomiting reflex. Physicians may combine these 5-HT₃ antagonists with other agents, such as corticosteroids, to better prevent CINV.

Despite evidence that delayed onset CINV affects as many as 50 – 70% of patients, and that more patients experience delayed onset CINV than acute onset CINV, oncology nurses and physicians are likely to underestimate the magnitude of these problems in the patients for whom they care. According to the results of a multi-national study published in *Cancer* (April 2004), the discrepancy between the perceived incidence and the actual incidence may, in part, be due to the fact that patients often do not report the side effects they experience at home. In this prospective study, 60% of patients receiving highly emetogenic chemotherapy, who also received antiemetics, still had delayed onset CINV.

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Current treatment options for CINV include 5-HT₃ antagonists such as palonosetron (Aloxi), ondansetron (Zofran), dolasetron (Anzemet), and granisetron (Kytril), as well as aprepitant (Emend), an NK1 (neurokinin-1) antagonist, which is always used in combination with a 5-HT₃ antagonist. As shown in the table below, all of the 5-HT₃ antagonists are approved for the prevention of acute onset CINV in patients receiving either moderately or highly emetogenic chemotherapy. Only Aloxi is approved for the prevention of delayed onset CINV in patients receiving moderately emetogenic chemotherapy. No 5-HT₃ antagonist is approved for the prevention of delayed onset CINV in patients receiving highly emetogenic chemotherapy. Aloxi sales were approximately \$251 million in 2006 and \$162 million for the first nine months of 2007. We believe the total addressable U. S. market approaches \$1 billion for use of 5-HT₃ antagonists in the prevention of CINV.

Chemotherapy Regimen	Approved 5-HT ₃ Antagonists for Acute Onset CINV	Approved 5-HT ₃ Antagonists for Delayed Onset CINV
Moderately Emetogenic	Granisetron (Kytril) Ondansetron (Zofran) Dolasetron (Anzemet) Palonosetron (Aloxi)	Palonosetron (Aloxi)
Highly Emetogenic	Granisetron (Kytril) Ondansetron (Zofran) Dolasetron (Anzemet) Palonosetron (Aloxi)	NONE

Our Solution—APF530

Our lead product, APF530, is being developed for the prevention of both acute and delayed onset CINV in patients receiving either moderately or highly emetogenic chemotherapy. APF530 is delivered by a single subcutaneous injection and contains the 5-HT₃ antagonist, granisetron. Granisetron injections and oral tablets are approved for the prevention of acute onset CINV, but not delayed onset CINV. We selected granisetron because it is a potent drug and the applicable granisetron patent expired in the United States on December 29, 2007.

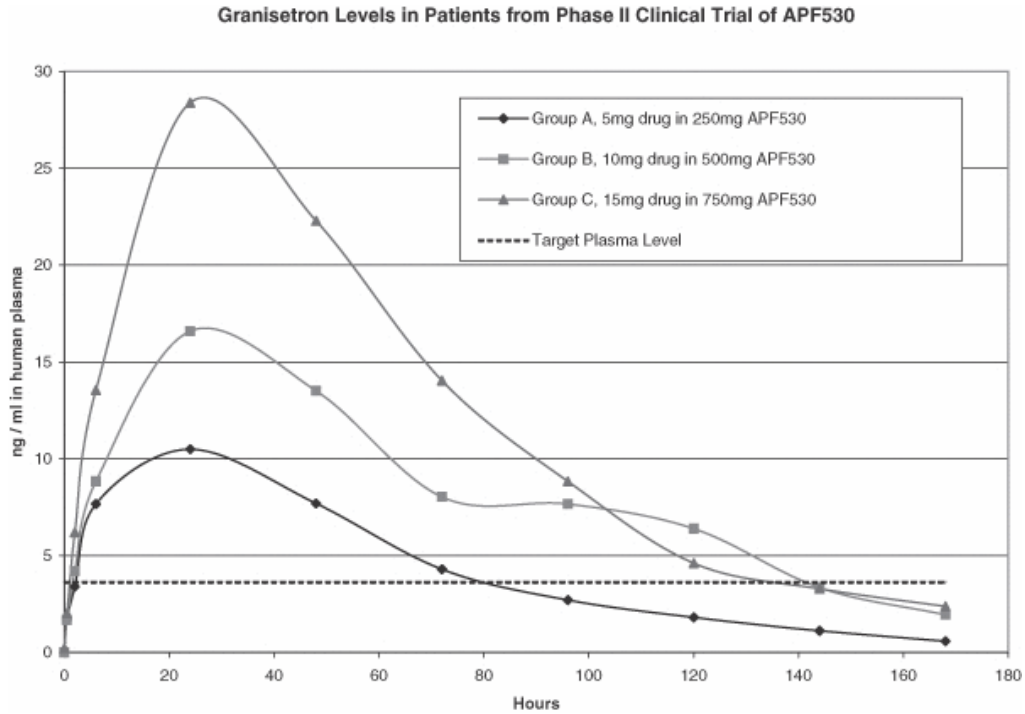
Granisetron and other 5-HT₃ antagonists, as a class, have become the most common antiemetic agents in chemotherapy. However, no 5-HT₃ antagonist formulation is currently approved for the prevention of both acute and delayed onset CINV for both moderately and highly emetogenic chemotherapy. We believe that if APF530 demonstrates that we can deliver therapeutic levels of granisetron over an extended period of time to prevent both acute and delayed onset CINV for both moderately and highly emetogenic chemotherapy, we will have a unique product with significant commercial potential. Physicians will have the opportunity to provide patients with the broadest efficacious treatment for CINV with a single injection.

Phase II Clinical Trial Results

In September 2005, we completed a Phase II clinical trial for APF530. We evaluated the safety, tolerability and pharmacokinetics of APF530 in cancer patients. In addition, efficacy endpoints were evaluated relating to emetic events and the use of additional medication for CINV. The clinical trial demonstrated that APF530 was well tolerated: there were no serious adverse events attributed to APF530; less than 10% of participating patients had injection site reactions, all of which were mild. As

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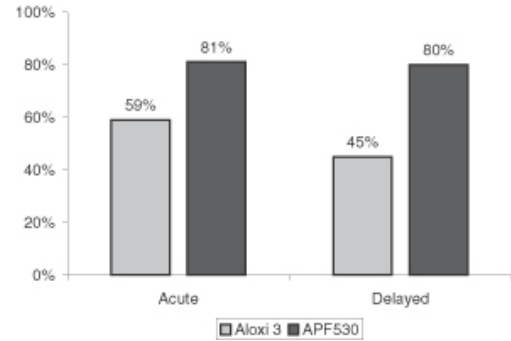
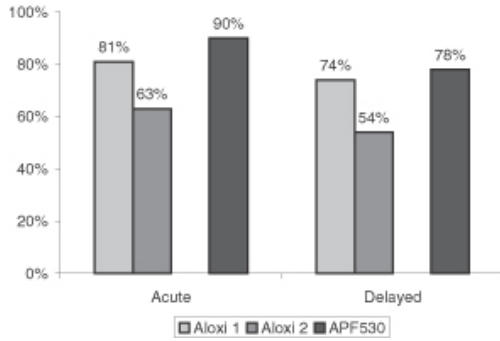
shown in the graph below, the pharmacokinetic evaluation in all three dose groups (250, 500 and 750 mg injection doses corresponding to 5, 10 and 15 mg of granisetron, respectively) demonstrated that the target plasma levels of granisetron were substantially achieved. The target plasma levels were based on oral doses of granisetron shown to have exhibited efficacy for acute onset CINV.



Analysis of the efficacy data from our open-label Phase II trial in which patient groups received either moderately or highly emetogenic chemotherapy was based on complete responders. "Complete response" is defined as an absence of vomiting and no use of additional medication for CINV during the observation period.

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Results of APF530's Phase II trial and Aloxi's Phase III trial are presented in the table below. Aloxi's Phase III trials included two trials of 189 patients each for moderately emetogenic chemotherapy and one trial involving 223 patients for highly emetogenic chemotherapy. The two trials evaluating moderately emetogenic chemotherapy indicated that the percentage of complete responders was 81% and 63% in the acute phase and 74% and 54% in the delayed phase, respectively. The study evaluating highly emetogenic chemotherapy indicated that the percentage of complete responders was 59% in the acute phase and 45% in the delayed phase. In comparison, in our APF530 Phase II trial, 20 patients were treated and evaluated for moderately emetogenic chemotherapy; the percentage of complete responders among them was 90% in the acute phase and 78% in the delayed phase. 21 patients were treated and evaluated for highly emetogenic chemotherapy; the percentage of complete responders among them was 81% in the acute phase and 80% in the delayed phase. While these trials measure complete responders, there are inherent differences between the studies for the two products including, for example: phase of study, use of adjunct medications, presence of a control group, number of patients, blinded versus unblinded and study objectives.



Based on the data from the Aloxi Phase III trials and our own Phase II results, we designed our Phase III clinical program to conclusively compare APF530 to Aloxi in a prospective randomized design.

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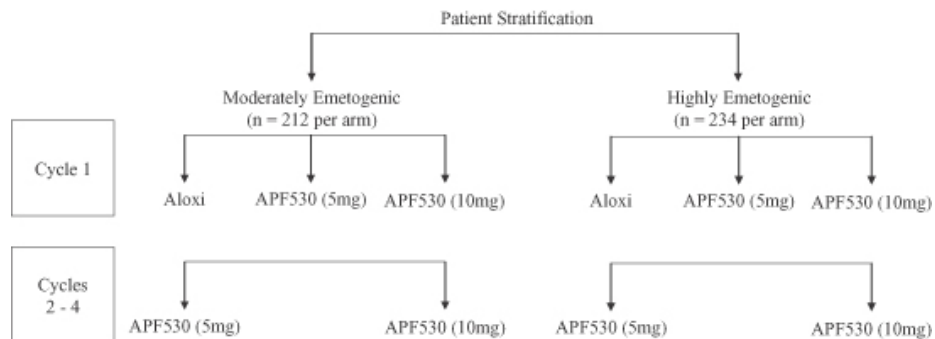
Pivotal Phase III Clinical Trial Design

In December 2005, we held our end-of-Phase-II meeting with the FDA, at which we discussed our regulatory approval strategy and our proposed design for the pivotal Phase III trial. Following this meeting, we designed our pivotal Phase III trial in accordance with FDA input. The trial's primary objectives are to demonstrate:

- non-inferiority of APF530 in comparison to Aloxi for the prevention of acute onset CINV following the administration of either moderately emetogenic or highly emetogenic chemotherapy;
- non-inferiority of APF530 in comparison to Aloxi for the prevention of delayed onset CINV following administration of moderately emetogenic chemotherapy; and
- superiority of APF530 in comparison to Aloxi for the prevention of delayed onset CINV following administration of highly emetogenic chemotherapy.

Based on our discussions with the FDA, we are planning to file our NDA under Section 505(b)(2) of the FDCA. Section 505(b)(2) of the FDCA permits the FDA, in its review of an NDA, to rely on previous FDA findings of safety and efficacy of the active ingredient in APF530, granisetron. The 505(b)(2) approval pathway is distinguished from the Abbreviated New Drug Application or generics route by the requirement that drug products approved under this section must have significant difference relative to the reference approved product. The additional information in the 505(b)(2) applications can be provided by literature or reference to past FDA findings of safety and efficacy for approved drugs, or it can be based upon studies conducted by or for the applicant to which it has obtained a right of reference. The majority of 505(b)(2) applications are filed for new formulations of currently approved drugs, so there is an existing understanding—on the part of the FDA, as well as the medical community—of their safety and efficacy.

Our pivotal Phase III clinical trial, initiated in May 2006, is a multicenter, randomized, observer-blind, actively-controlled, double-dummy, parallel group study that will compare the efficacy of APF530 with Aloxi. During 2006 and the first half of 2007, all patient enrollments were within the U.S.; beginning in the second half of 2007, enrollments were broadened to include sites in India and Poland. The trial will include approximately 1,350 patients, stratified in two groups, one receiving moderately and the other receiving highly emetogenic chemotherapeutic agents. In each group, the patients are randomized to receive in the first chemotherapy treatment cycle either APF530 high dose (10 mg), APF530 low dose (5 mg) or the currently approved dose of Aloxi. In subsequent treatment cycles (up to three additional cycles), the patients are re-randomized to either of the two APF530 doses. The diagram below provides further graphical representation of how patients are randomized in our clinical trial.



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We expect to complete enrollment of our pivotal Phase III clinical trial in the second quarter of 2008 and to announce results of that trial in the third quarter of 2008. We expect to submit our NDA for approval of APF530 in the fourth quarter of 2008.

Market Survey

We commissioned Timely Data Resources, Inc., or TDR, to conduct market research to determine oncologists' and oncology nurses' perceptions of current antiemetics for CINV. This survey, completed in August 2006, was intended to assess the market opportunity for APF530 for the prevention of CINV. TDR interviewed 75 randomly selected medical oncologists and 25 oncology nurses from across the United States. The survey concluded that there is significant unmet need in the treatment of CINV, especially delayed onset CINV. 84% of the surveyed oncologists and oncology nurses currently use Aloxi and continue to have patients who experience CINV, particularly delayed onset CINV.

Development Pipeline

In addition to our lead program, we have a pipeline of other product candidates using our Biochronomer technology:

<u>Product Candidate</u>	<u>Potential Application</u>	<u>Drug</u>	<u>Targeted Duration</u>	<u>Status</u>
APF112	Post-surgical pain relief	Mepivacaine	Up to 36 hours	Phase II
APF580	Pain relief	Undisclosed Opiate	At least seven days	Preclinical
APF328	Local anti-inflammatory (orthopedic surgery)	Meloxicam	Up to two weeks	Preclinical
APF505	Anti-inflammatory (osteoarthritis)	Meloxicam	Up to six weeks	Preclinical

APF112

APF112 utilizes our Biochronomer delivery technology to target post-surgical pain relief. The product is designed to provide up to 36 hours of localized pain relief by delivering mepivacaine directly to the surgical site. Mepivacaine is a well-known, short-acting local anesthetic with an excellent safety profile. APF112 is designed to prolong the anesthetic effect of mepivacaine and thus to minimize or eliminate the use of opiates. Opiates are currently used in the majority of surgical procedures as a means of managing post-operative pain, and while they are powerful and useful drugs, they may have side effects such as addiction, nausea, disorientation, sedation, constipation, vomiting, urinary retention and, in some situations, life-threatening respiratory depression. If efficacy in treating post-surgical pain can be demonstrated, we believe that there will be substantial potential for this product, as there are approximately 20 million surgical procedures performed annually in the United States for which the product could potentially be utilized.

During 2004, our Phase II clinical trial was conducted in surgeries for inguinal hernia repair, which is considered a moderately to severely painful procedure. The results indicated excellent safety and tolerability. The pharmacokinetics of APF112 showed sustained release of mepivacaine systemically over a period of three days (72 hours). No significant difference was shown between the two doses of APF112 and the standard of care (bupivacaine) in terms of pain scores and the amount of additional

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pain medication used. Mean Visual Analog Scale, pain scores, or VAS scores, in the standard of care group (bupivacaine) were significantly lower in this study when compared with other previously published studies in similar hernia trials. Based on published data, VAS scores for the standard of care in similar inguinal hernia studies ranged from 4.5 to 6.7, whereas in this study the mean score for the bupivacaine arm was 2.9 within the first 24 hours post surgery. We believe that we can demonstrate that APF112 is effective in controlling post surgical pain, however, we were unable to demonstrate this due to the unexpectedly low levels of pain displayed by the control group in this trial. We intend to complete additional preclinical work in 2008 with a revised protocol, followed by initiation of a Phase IIb clinical trial in the second quarter of 2008. Assuming successful completion of our Phase IIb clinical trial, we plan to explore corporate partnering opportunities to continue the development of APF112.

APF580

APF580 will incorporate an opiate into our Biochronomer technology and is designed to provide analgesia lasting at least seven days by a single injection. It is targeted for situations where the intensity and duration of pain require use of an opiate rather than a local anesthetic. APF580 may find use in acute and chronic pain settings, improve patient compliance and reduce the risk of drug abuse. Our initial animal pharmacokinetic studies completed in 2006 present a promising profile, supporting future product development for post-surgical (inpatient) and chronic pain applications (cancer pain). We plan to supplement our animal studies with additional preclinical data from an ongoing research and development agreement with a major animal health company, which is evaluating the same product for use in cats and dogs. We plan to initiate a Phase I clinical trial of APF580 in the second quarter of 2008.

APF328

APF328 represents a novel formulation in preclinical development for the potential treatment of pain following orthopedic surgery. Our Biochronomer polymer has been designed in this instance to control the local delivery of meloxicam for up to two weeks. Meloxicam is a non-steroidal anti-inflammatory drug that was developed as an oral tablet for the treatment of osteoarthritis of the knee and hip.

APF505

APF505 is an extension of the concept outlined in APF328. This Biochronomer formulation has the potential to deliver meloxicam within the knee joint for up to six weeks and may be appropriate to treat the inflammation and pain associated with osteoarthritis, a common form of arthritis that occurs in nearly 70% of the U.S. population over the age of 65. For both APF328 and APF505, our objective is to deliver the drug to the site of action, thereby avoiding the side effects associated with oral treatment, namely gastrointestinal disturbances.

Our Technology Platform

We have made significant investments in the development of our bioerodible drug delivery technologies, which have created tangible results. Specifically, we have developed a broad family of polymers with unique attributes, known collectively as poly(ortho esters), under the trade name Biochronomer. This technology has been specifically designed for use in drug delivery

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applications with a number of technical advantages, such as: ease of manufacturing, flexible delivery times, various physical forms and multiple potential applications due to a neutral pH environment for acid sensitive actives (nucleic acids, proteins, etc.).

Due to the inherent versatility of our Biochronomer technology, products can be designed to deliver drugs at a variety of implantation sites including, under the skin, at the site of a surgical procedure, in joints, in the eye, or in muscle tissue. Our Biochronomer technology can provide sustained levels of drugs in systemic circulation for prolonged efficacy.

Ease of Manufacturing. Our Biochronomer technology is formed by the coupling of various monomers into a polymer chain. Our process knowledge underlying the commercial manufacture of our Biochronomers is based on extensive, well-documented, development studies. Commercial manufacturing campaigns to date have demonstrated that our Biochronomers may be produced in a highly reproducible manner. By selecting suitable monomers the resulting polymers will melt at differing temperatures which will allow for different manufacturing techniques, e.g. injection molding, extrusion, compression molding, etc.

Flexible Delivery Times. The Biochronomer "links" or bonds are stable at neutral pH conditions. Upon coming into contact with water-containing media, such as internal body fluids, the water reacts with these bonds. This reaction is known as hydrolysis. During the hydrolysis of the Biochronomer links, acidic elements are produced in a local micro-environment, in a controlled manner, without impacting the overall neutrality of the drug delivery technology. These elements assist in the continued, controlled erosion of the polymer with a simultaneous, controlled release of the active drug contained within the Biochronomer. By varying the amount of the acidic elements in the Biochronomer, different rates of hydrolysis may be effectively realized. In this manner, delivery times ranging from days to weeks to several months can be achieved.

Various Physical Forms. Our Biochronomers can be prepared in a variety of physical forms, ranging from hard, glassy materials to semi-solids that are injectable at room temperature, by proper selection of monomers. A significant advantage of our Biochronomer technology is that drugs can be incorporated by simple mixing procedures allowing the production of formulations in the form of injectable gels, microspheres, coatings, and strands. All of these physical forms can be used in the controlled delivery of drugs without the undesirable incorporation of organic solvents in the final product.

Multiple Potential Applications. We have completed over 100 in vivo and in vitro studies demonstrating that our Biochronomer technology is potentially applicable to a range of therapeutic areas, including pain management, prevention of nausea, control of inflammation and treatment of ophthalmic diseases. We have also completed comprehensive animal and human toxicology studies that have established that our Biochronomer polymers are safe and well tolerated.

All of our current development programs utilize the same semi-solid poly(ortho ester) delivery vehicle. Additional applications for the treatment of a number of indications are under development using the same vehicle. The present forms of these products are stored under refrigeration. We are actively developing products that can be stored at room temperature.

Through our experience and continued insight obtained during our research and development, Biochronomer polymers can be extended into novel technologies via the design of additional architectures containing poly(ortho esters). One example of such a technology is our family of polymers called Bioerodimers. These polymers are poly(ethylene glycol) products that have the ability to

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form micelles in water and can be delivered intravenously. We believe this family of polymers may be safer and better tolerated than more conventional intravenous formulations which employ solvents and surfactants. At least eight patents and patent applications cover this and other aspects of our Bioerodimer technologies. The materials resulting from these inventions have the potential to be exploited in the creation of new drug delivery technologies that can be used to treat more indications via additional delivery routes.

Our Strategy

Our primary objective is to be a leading specialty pharmaceutical company focused on improving the effectiveness of existing pharmaceuticals using our proprietary drug delivery technologies. Key elements include:

Expand product pipeline. We plan to expand our product pipeline by leveraging our existing technology. We intend to develop new products based on our Biochronomer polymer-based drug delivery technology. Our research has indicated that our Biochronomer technology has potential applications across a range of therapeutic areas including prevention of nausea, pain management, control of inflammation and treatment of ophthalmic diseases. With further work on our technology platforms, we may be able to develop products that deliver proteins, peptides, sRNA (soluble RNA) and RNAi (RNA interference).

Minimize product development risk and time-to-market. We are applying our proprietary drug delivery technologies to improve the effectiveness of approved pharmaceutical products. By using our technologies to administer drugs for which clinical efficacy and safety data are available, we will reduce the cost and development risk inherent in traditional pharmaceutical product development.

Maximize the value of our lead product, APF530. We believe that establishing a partnership with an established pharmaceutical company for the commercialization of APF530 will maximize the value of APF530 for our shareholders. We expect to secure significant upfront license fees, followed by milestone payments and royalties. We also plan to evaluate separate commercial partnerships for the United States and the rest of world.

Enter into strategic partnerships. We believe that selective partnering of our future product development programs can enhance the success of our product development and commercialization efforts, and enable diversification of our product portfolio by having partners fund the major portion of our late stage clinical trials. Additionally, such partnering will enable us to leverage the sales capabilities of our partners to commercialize our products.

Manufacturing and Supply

We do not currently own or operate manufacturing facilities for the production of clinical or commercial quantities of any of our product candidates. We currently rely on a small number of third-party manufacturers to produce our compounds and expect to continue to do so to meet the preclinical and clinical requirements of our potential products and for all of our commercial needs. We do not have long-term agreements with any of these third-parties.

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We require in our manufacturing and processing agreements that all third-party contract manufacturers and processors produce active pharmaceutical ingredients, or APIs, and finished products in accordance with current good manufacturing practice, or cGMP, and all other applicable laws and regulations. We maintain confidentiality agreements with potential and existing manufacturers in order to protect our proprietary rights related to our drug candidates.

With regard to our lead product candidate, APF530, we currently use Sigma Aldrich Corporation as our primary raw materials and polymer supplier. We currently source granisetron from one supplier and know of at least three other capable suppliers. We currently ship all of our formulation components directly to our contract manufacturer, Hyaluron, Inc. We continue to evaluate potential suppliers and manufacturers.

Marketing and Sales

A key part of our business strategy is to form collaborations with pharmaceutical partners. In the past, we have successfully partnered our development stage programs with leading pharmaceutical companies. In general, we grant limited marketing exclusivity in defined markets for defined periods to our partners. However, after development is completed and a partner commercializes a formulated product utilizing our delivery technologies, we can exert only limited influence over the manner and extent of our partner's marketing efforts.

The status of our initial marketing relationships for APF530 are as follows:

- In October 2006, we announced that we had granted an exclusive license to RHEI Pharmaceuticals, Inc. to seek regulatory approval and sell APF530 in China, Taiwan, Hong Kong and Macau. The agreement included an upfront payment to us and includes provisions for milestone payments and royalties on future net sales.
- During the Phase III trial and the period preceding filing an NDA we will continue to seek additional domestic and international partners.

Patents and Trade Secrets

As part of our strategy to protect our current products and to provide a foundation for future products, we have filed a number of United States patent applications on inventions relating to the composition of a variety of polymers, specific products, product groups and processing technology. In addition to obtaining patents in a number of foreign countries, we have also filed the United States and foreign patent applications on our polymer technology with the Patent Cooperation Treaty (PCT), the European Patent Office, Australia, Canada, China, Hong Kong, Japan, South Korea, Singapore and Taiwan. We have a total of 21 issued United States patents and an additional 64 issued (or registered) foreign patents. The patents on the bioerodible technologies expire between January 2016 and November 2022.

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Although we believe the bases for these patents and patent applications are sound, they are untested, and there is no assurance that they will not be successfully challenged. There can be no assurance that any patent previously issued will be of commercial value, that any patent applications will result in issued patents of commercial value, or that our technology will not be held to infringe patents held by others.

We also rely on unpatented trade secrets and know-how to protect certain aspects of our production technologies. Our employees, consultants, advisors and corporate partners have entered into confidentiality agreements with us. These agreements, however, may not necessarily provide meaningful protection for our trade secrets or proprietary know-how in the event of unauthorized use or disclosure. In addition, others may obtain access to, or independently develop, these trade secrets or know-how.

Competition

There are several companies that are developing new formulations of existing drugs using novel drug delivery technologies. Many of these companies have substantially greater financial, research and development, manufacturing, sales and marketing and distribution resources and experience than we do. The following are our major competitors:

- Alkermes, Inc.
- Depomed, Inc.
- Durect Corporation
- ProStrakan Group PLC
- SkyePharma PLC

Additionally, APF530 is expected to face competition from Eisai/MGI Pharma's Aloxi (palonosetron), Roche's Kytril (granisetron), GlaxoSmithKline's Zofran (ondansetron), and Aventis' Anzemet (dolasetron), as well as Hana Biosciences' Zensana (oral ondansetron), including generic versions of certain of these products. We are also aware of several companies which have developed or are developing both generic and new formulations of granisetron, including transdermal formulations. APF112 is expected to face competition from Durect Corporation's Posidur (injectable controlled release bupivacaine) and SkyePharma PLC's recently divested DepoBupivacaine (injectable controlled release bupivacaine).

Government Regulation and Product Approvals

The manufacturing and marketing of our potential products and our ongoing research and development activities are subject to extensive regulation by the FDA and comparable regulatory agencies in state and local jurisdictions and in foreign countries.

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United States Regulation

Before any of our products can be marketed in the United States, they must secure approval by the FDA. To secure approval, any drug we develop must undergo rigorous preclinical testing and clinical trials that demonstrate the product candidate's safety and effectiveness for each chosen indication for use. This extensive regulatory process controls, among other things, the development, testing, manufacture, safety, efficacy, record keeping, labeling, storage, approval, advertising, promotion, sale, and distribution of biopharmaceutical products.

In general, the process required by the FDA before investigational drugs may be marketed in the United States involves the following steps:

- preclinical laboratory and animal tests;
- submission of an investigational new drug application, or IND, which must become effective before human clinical trials may begin;
- adequate and well-controlled human clinical trials to establish the safety and efficacy of the proposed drug for its intended use;
- pre-approval inspection of manufacturing facilities and selected clinical investigators; and
- FDA approval of a new drug application, or NDA, or of a NDA supplement (for subsequent indications).

Preclinical Testing

In the United States, drug candidates are tested in animals until adequate proof of safety is established. These preclinical studies generally evaluate the mechanism of action of the product and assess the potential safety and efficacy of the product. Tested compounds must be produced according to applicable current good manufacturing practice (cGMP) requirements and preclinical safety tests must be conducted in compliance with FDA and international regulations regarding good laboratory practices (GLP). The results of the preclinical tests, together with manufacturing information and analytical data, are generally submitted to the FDA as part of an investigational new drug application, or IND, which must become effective before human clinical trials may commence. The IND will automatically become effective 30 days after receipt by the FDA, unless before that time the FDA requests an extension or raises concerns about the conduct of the clinical trials as outlined in the application. If the FDA has any concerns, the sponsor of the application and the FDA must resolve the concerns before clinical trials can begin. Submission of an IND may not result in FDA authorization to commence a clinical trial. A separate submission to the existing IND must be made for each successive clinical trial conducted during product development, and the FDA must grant permission for each clinical trial to start and continue. Regulatory authorities may require additional data before allowing the clinical studies to commence or proceed from one Phase to another, and could demand that the studies be discontinued or suspended at any time if there are significant safety issues. Furthermore, an independent institutional review board, or IRB, for each medical center proposing to participate in the conduct of the clinical trial must review and approve the clinical protocol and patient informed consent before the center commences the study.

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Clinical Trials

Clinical trials for new drug candidates are typically conducted in three sequential phases that may overlap. In Phase I, the initial introduction of the drug candidate into human volunteers, the emphasis is on testing for safety or adverse effects, dosage, tolerance, metabolism, distribution, excretion, and clinical pharmacology. Phase II involves studies in a limited patient population to determine the initial efficacy of the drug candidate for specific targeted indications, to determine dosage tolerance and optimal dosage and to identify possible adverse side effects and safety risks. Once a compound shows evidence of effectiveness and is found to have an acceptable safety profile in Phase II evaluations, pivotal Phase III trials are undertaken to more fully evaluate clinical outcomes and to establish the overall risk/benefit profile of the drug, and to provide, if appropriate, an adequate basis for product labeling. During all clinical trials, physicians will monitor patients to determine effectiveness of the drug candidate and to observe and report any reactions or safety risks that may result from use of the drug candidate. The FDA, the IRB (or their foreign equivalents) or the sponsor may suspend a clinical trial at any time on various grounds, including a finding that the subjects are being exposed to an unacceptable health risk.

The data from the clinical trials, together with preclinical data and other supporting information that establishes a drug candidate's safety, are submitted to the FDA in the form of a new drug application, or NDA, or NDA supplement (for approval of a new indication if the product candidate is already approved for another indication). Under applicable laws and FDA regulations, each NDA submitted for FDA approval is usually given an internal administrative review within 45 to 60 days following submission of the NDA. If deemed complete, the FDA will "file" the NDA, thereby triggering substantive review of the application.

The FDA can refuse to file any NDA that it deems incomplete or not properly reviewable. The FDA has established internal substantive review goals of six months for priority NDAs (for drugs addressing serious or life threatening conditions for which there is an unmet medical need) and ten months for regular NDAs. The FDA, however, is not legally required to complete its review within these periods, and these performance goals may change over time. Moreover, the outcome of the review, even if generally favorable, is not typically an actual approval, but an "action letter" that describes additional work that must be done before the NDA can be approved. The FDA's review of a NDA may involve review and recommendations by an independent FDA advisory committee. The FDA may deny approval of a NDA or NDA supplement if the applicable regulatory criteria are not satisfied, or it may require additional clinical data and/or an additional pivotal Phase III clinical trial. Even if such data are submitted, the FDA may ultimately decide that the NDA or NDA supplement does not satisfy the criteria for approval.

Data Review and Approval

Satisfaction of FDA requirements or similar requirements of state, local, and foreign regulatory agencies typically takes several years and requires the expenditure of substantial financial resources. Information generated in this process is susceptible to varying interpretations that could delay, limit, or prevent regulatory approval at any stage of the process. Accordingly, the actual time and expense required to bring a product to market may vary substantially. We cannot assure you that we will submit applications for required authorizations to manufacture and/or market potential products or that any such application will be reviewed and approved by the appropriate regulatory authorities in a timely manner, if at all. Data obtained from clinical activities is not always conclusive and may be susceptible to varying interpretations, which could delay, limit, or prevent regulatory approval. Success in early stage clinical trials does not ensure success in later stage clinical trials. Even if a product candidate receives regulatory approval, the approval may be significantly limited to specific disease states, patient populations, and dosages, or have conditions placed on them that restrict the commercial applications, advertising, promotion, or distribution of these products.

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Once issued, the FDA may withdraw product approval if ongoing regulatory standards are not met or if safety problems occur after the product reaches the market. In addition, the FDA may require testing and surveillance programs to monitor the effect of approved products which have been commercialized, and the FDA has the power to prevent or limit further marketing of a product based on the results of these post-marketing programs. The FDA may also request additional clinical trials after a product is approved. These so-called Phase 4 studies may be made a condition to be satisfied after a drug receives approval. The results of Phase IV studies can confirm the effectiveness of a product candidate and can provide important safety information to augment the FDA's voluntary adverse drug reaction reporting system. Any products manufactured or distributed by us pursuant to FDA approvals would be subject to continuing regulation by the FDA, including record-keeping requirements and reporting of adverse experiences with the drug. Drug manufacturers and their subcontractors are required to register their establishments with the FDA and certain state agencies, and are subject to periodic unannounced inspections by the FDA and certain state agencies for compliance with good manufacturing practices, which impose certain procedural and documentation requirements upon us and our third-party manufacturers. We cannot be certain that we or our present or future suppliers will be able to comply with the good manufacturing practices regulations and other FDA regulatory requirements. If our present or future suppliers are not able to comply with these requirements, the FDA may halt our clinical trials, require us to recall a drug from distribution, or withdraw approval of the NDA for that drug. Furthermore, even after regulatory approval is obtained, later discovery of previously unknown problems with a product may result in restrictions on the product or even complete withdrawal of the product from the market.

The FDA closely regulates the marketing and promotion of drugs. Approval may be subject to post-marketing surveillance and other record keeping and reporting obligations, and involve ongoing requirements. Product approvals may be withdrawn if compliance with regulatory standards is not maintained or if problems occur following initial marketing. A company can make only those claims relating to safety and efficacy that are approved by the FDA. Failure to comply with these requirements can result in adverse publicity, warning letters, corrective advertising, and potential civil and criminal penalties. Physicians may prescribe legally available drugs for uses that are not described in the product's labeling and that differ from those tested by us and approved by the FDA. Such off-label uses are common across medical specialties. Physicians may believe that such off-label uses are the best treatment for many patients in varied circumstances. The FDA does not regulate the behavior of physicians in their choice of treatments. The FDA does, however, restrict manufacturers' communications on the subject of off-label use.

Section 505(b)(2) Applications

Some of our product candidates may be eligible for submission of applications for approval under the FDA's Section 505(b)(2) approval process, which requires less information than the NDAs described above. Section 505(b)(2) applications may be submitted for drug products that represent a modification (e.g., a new indication or new dosage form) of an eligible approved drug and for which investigations other than bioavailability or bioequivalence studies are essential to the drug's approval. Section 505(b)(2) applications may rely on the FDA's previous findings for the safety and effectiveness of the listed drug, scientific literature, and information obtained by the 505(b)(2) applicant needed to support the modification of the listed drug. For this reason, preparing Section 505(b)(2) applications is generally less costly and time-consuming than preparing an NDA based entirely on new data and information from a full set of clinical trials. The law governing Section 505(b)(2) or FDA's current policies may change in such a way as to adversely affect our applications for approval that seek to utilize the Section 505(b)(2) approach. Such changes could result in additional costs associated with additional studies or clinical trials and delays.

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The FDA provides that reviews and/or approvals of applications submitted under Section 505(b)(2) will be delayed in various circumstances. For example, the holder of the NDA for the listed drug may be entitled to a period of market exclusivity, during which the FDA will not approve, and may not even review a Section 505(b)(2) application from other sponsors. If the listed drug is claimed by patent that the NDA holder has listed with the FDA, the Section 505(b)(2) applicant must submit a patent certification. If the 505(b)(2) applicant certifies that the patent is invalid, unenforceable, or not infringed by the product that is the subject of the Section 505(b)(2), and the 505(b)(2) applicant is sued within 45 days of its notice to the entity that holds the approval for the listed drug and the patent holder, the FDA will not approve the Section 505(b)(2) application until the earlier of a court decision favorable to the Section 505(b)(2) applicant or the expiration of 30 months. The regulations governing marketing exclusivity and patent protection are complex, and it is often unclear how they will be applied in particular circumstances.

In addition, both before and after approval is sought, we and our collaborators are required to comply with a number of FDA requirements. For example, we are required to report certain adverse reactions and production problems, if any, to the FDA, and to comply with certain limitations and other requirements concerning advertising and promotion for our products. Also, quality control and manufacturing procedures must continue to conform to continuing GMP after approval, and the FDA periodically inspects manufacturing facilities to assess compliance with continuing GMP. In addition, discovery of problems such as safety problems may result in changes in labeling or restrictions on a product manufacturer or NDA holder, including removal of the product from the market.

Foreign Approvals

In addition to regulations in the United States, we will be subject to a variety of foreign regulations governing clinical trials and commercial sales and distribution of our products. Whether or not we obtain FDA approval for a product, we must obtain approval of a product by the comparable regulatory authorities of foreign countries before we can commence clinical trials or marketing of the product in those countries. The approval process varies from country to country, and the time may be longer or shorter than that required for FDA approval. The requirements governing the conduct of clinical trials, product licensing, pricing and reimbursement vary greatly from country to country.

Under European Union regulatory systems, we may submit marketing authorizations either under a centralized or decentralized procedure. The centralized procedure provides for the grant of a single marketing authorization that is valid for all European Union member states. The decentralized procedure provides for mutual recognition of national approval decisions. Under this procedure, the holder of a national marketing authorization may submit an application to the remaining member states. Within 90 days of receiving the applications and assessment report, each member state must decide whether to recognize approval.

The policies of the FDA and foreign regulatory authorities may change and additional government regulations may be enacted which could prevent or delay regulatory approval of our investigational drugs or approval of new diseases for our existing products. We cannot predict the likelihood, nature or extent of adverse governmental regulation that might arise from future legislative or administrative action, either in the United States or abroad.

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Employees

As of February 29, 2008, we had 44 full-time employees, six of whom hold Ph.D. degrees. There were 37 employees engaged in research and development and quality control, and seven working in finance, business development, human resources and administration.

We consider our relations with employees to be good. None of our employees is covered by a collective bargaining agreement.

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ITEM 1A. RISK FACTORS

Our business is subject to various risks, including those described below. You should consider carefully these risk factors and all of the other information included in this Form 10-K. Any of these risk factors could materially adversely affect our business, operating results and financial condition.

Risks Related To Our Business

We have a history of losses, we expect to generate losses in the near future, and we may never achieve or maintain profitability.

We have incurred recurring losses and had an accumulated deficit of \$107.9 million as of December 31, 2007. We expect to continue to generate substantial losses over at least the next several years as we:

- expand drug product development efforts;
- conduct preclinical testing and clinical trials; and
- pursue additional applications for our existing delivery technologies.

To achieve and sustain profitability, we must, alone or with others, successfully develop, obtain regulatory approval for, manufacture, market and sell our products. We will incur substantial expenses in our efforts to develop and commercialize products and we may never generate sufficient revenue to become profitable or to sustain profitability.

Additional capital will be needed to enable us to implement our business plan. Raising such capital may have to be accomplished on unfavorable terms, possibly causing dilution to our existing stockholders

We will require additional capital resources in order to conduct our operations and develop our products. We may not be able to obtain required funding on favorable terms and required funding may cause dilution to our existing stockholders. The timing and degree of any future capital requirements will depend on many factors, including:

- the number of product development programs we pursue and the pace of each program;
- the scope, rate of progress, results and costs of preclinical testing and clinical trials;
- the time and costs involved in seeking regulatory approvals;
- scientific progress in our research and development programs;
- the magnitude and scope of our research and development programs;

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- our ability to establish and maintain strategic collaborations or partnerships for research, development, clinical testing, manufacturing and marketing; and
- market conditions and other factors.

We intend to acquire additional funding through strategic collaborations, in the form of license fees, research and development fees and milestone payments, and/or possibly through sales of our common stock or other company securities. In the event that additional funds are obtained through arrangements with collaborative partners, these arrangements may require us to relinquish rights to some of our technologies, product candidates or products that we would otherwise seek to develop and commercialize ourselves. If we issue additional equity securities or securities convertible into equity securities to raise funds, our stockholders will suffer dilution of their investment and it may adversely affect the market price of our common stock. If adequate funds are not available, we will be required to delay, reduce the scope of, or eliminate one or more of our product development programs and reduce personnel-related and other costs, which will have a material adverse effect on our business.

We are substantially dependent upon the success of our APF530 product candidate. Clinical trials for this product may not demonstrate efficacy or lead to regulatory approval.

We will not be able to commercialize our lead product candidate, APF530, until we obtain regulatory approval in the United States or foreign countries. To satisfy FDA or foreign regulatory approval standards for the commercial sale of our product candidates, we must demonstrate in adequate and controlled clinical trials that our product candidates are safe and effective. Success in preclinical testing and early clinical trials does not ensure that later clinical trials will be successful. A number of companies in the pharmaceutical industry, including us, have suffered significant setbacks in advanced clinical trials, even after obtaining promising results in earlier clinical trials.

Our lead product candidate, APF530, is designed to provide at least five days prevention of CIN V. In September 2005, we completed a Phase II human clinical trial of APF530 that achieved all of its primary and secondary endpoints. In May 2006, we initiated our pivotal Phase III clinical trial of APF530.

Although we believe that this clinical trial will lead to regulatory approval of APF530 for the prevention of acute and delayed onset CIN V for patients undergoing both moderately and highly emetogenic, or vomit-inducing, chemotherapy, the results of initial preclinical testing and clinical trials to date do not necessarily predict the results that we will get from subsequent or more extensive preclinical testing and clinical trials. Clinical trials of APF530 and our other product candidates may not demonstrate that they are safe and effective to the extent necessary to obtain regulatory approvals. If we cannot adequately demonstrate through the clinical trial process that the product we are developing is safe and effective, regulatory approval of that product would be delayed or prevented, which would impair our reputation, increase our costs and prevent us from earning revenue.

We may not obtain regulatory approval for our products. Regulatory approval may also be delayed or cancelled or may entail limitations on the indicated uses of a proposed product.

The regulatory process, particularly for biopharmaceutical products like ours, is uncertain, can take many years and requires the expenditure of substantial resources. Any product that we or our collaborative partners develop must receive all relevant

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regulatory agency approvals or clearances, if any, before it may be marketed in the United States or other countries. In particular, human pharmaceutical therapeutic products are subject to rigorous preclinical and clinical testing and other requirements by the Food and Drug Administration, or FDA, in the United States and similar health authorities in foreign countries. We may not receive necessary regulatory approvals or clearances to market APF530 or any other product candidate.

Data obtained from preclinical and clinical activities is susceptible to varying interpretations that could delay, limit or prevent regulatory agency approvals or clearances. For example, the FDA may require additional clinical data to support approval, such as confirmatory studies, carcinogenicity studies and other data or studies to address questions or concerns that may arise during the FDA review process. Delays or rejections also may be encountered as a result of changes in regulatory agency policy during the period of product development and/or the period of review of any application for regulatory agency approval or clearance for a product. Delays in obtaining regulatory agency approvals or clearances could:

- significantly harm the marketing of any products that we or our collaborators develop;
- impose costly procedures upon our activities or the activities of our collaborators;
- diminish any competitive advantages that we or our collaborative partners may attain; or
- adversely affect our ability to receive royalties and generate revenue and profits.

Even though we intend to apply for approval of most of our products in the United States under Section 505(b)(2) of the United States Food, Drug and Cosmetic Act, or FDCA, which applies to reformulations of approved drugs and that may require smaller and shorter safety and efficacy testing than that for entirely new drugs, the approval process will still be costly, time-consuming and uncertain. We plan to file the NDA for APF530 under Section 505(b)(2) of the FDCA, to rely on previous FDA findings of safety and efficacy of the active ingredient in APF530, granisetron. While we believe that Section 505(b)(2) is applicable to APF530, it is possible that the FDA may disagree and require us to submit a "stand-alone" or "full" Section 505(b)(1) NDA, which would require significantly more clinical studies and or other data collection or analysis.

We or our collaborators may not be able to obtain necessary regulatory approvals on a timely basis, if at all, for any of our potential products. Even if granted, regulatory approvals may include significant limitations on the uses for which products may be marketed. Failure to comply with applicable regulatory requirements can, among other things, result in warning letters, imposition of civil penalties or other monetary payments, delay in approving or refusal to approve a product candidate, suspension or withdrawal of regulatory approval, product recall or seizure, operating restrictions, interruption of clinical trials or manufacturing, injunctions and criminal prosecution.

In addition, the marketing and manufacturing of drugs and biological products are subject to continuing FDA review, and later discovery of previously unknown problems with a product, its manufacture or its marketing may result in the FDA requiring further clinical research or restrictions on the product or the manufacturer, including withdrawal of the product from the market.

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Clinical trials are expensive and may not result in commercially viable products.

Conducting clinical trials is a lengthy, time-consuming and expensive process. For example, we are incurring significant expenses in developing APF530, and even if approved, it may not result in a commercially viable product. Before obtaining regulatory approvals for the commercial sale of any products, we or our partners must demonstrate through preclinical testing and clinical trials that our product candidates are safe and effective for use in humans. We have incurred, and we will continue to incur, substantial expense for, and devote a significant amount of time to, preclinical testing and clinical trials.

Our business, results of operations and financial condition may be materially adversely affected by any delays in, or termination of, our clinical trials. Factors impacting our ability to generate commercially viable products through the conduct of clinical trials include:

- insufficient funds to continue necessary clinical trials;
- inability to find partners;
- failure of clinical trials to demonstrate the safety and efficacy of our products to the extent necessary to obtain regulatory approvals;
- failure of preclinical testing and early clinical trials to predict results of later clinical trials;
- delay in completion of clinical trials, resulting in increased costs; and
- inability to obtain regulatory approval of our products following completion of clinical trials, or delays in obtaining such approvals.

Delays in clinical testing could increase our costs and delay our ability to obtain regulatory approval and commercialize our product candidates.

Before we or our collaborators can file for regulatory approval for the commercial sale of our potential products, the FDA will require extensive preclinical safety testing and clinical trials to demonstrate their safety and efficacy. Significant delays in preclinical and clinical testing could materially impact our product development costs and delay regulatory approval of our product candidates. For example, enrollment in the Phase III trial for APF530 has been slower than we expected, resulting in delays in our development timeline and increased costs. Completing clinical trials in a timely manner depends on, among other factors:

- obtaining regulatory approval to commence a trial;
- obtaining clinical materials;
- reaching agreement on acceptable clinical study terms with prospective sites and clinical research organizations;

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- obtaining institutional review board approval to conduct a study at a prospective site; and
- recruiting patients to participate in a study.

We rely on third parties to conduct our clinical trials, and their failure to perform their obligations in a timely and competent manner may delay development and commercialization of our product candidates.

We are using clinical research organizations in the U.S., India and Poland to oversee our ongoing clinical trial of APF530 and we expect to use the same or similar organizations for our future clinical trials. There are numerous alternative sources to provide these services; however, we may face delays outside of our control if these parties do not perform their obligations in a timely or competent fashion, or if we are forced to change service providers. Different cultural and operational issues in India or Poland could cause delays or unexpected problems with the patient enrollments or with the data obtained from those locations. If we experience significant delays in the progress of our clinical trials and in our plans to file NDAs or problems with the quality of data derived from various clinical sites, the prospects for approval of APF530 in general and on a timely basis could decrease.

We have yet to demonstrate the full commercial viability of our technology, and we cannot be certain that attainment of such a goal can be accomplished.

Our bioerodible drug delivery technology is at an early stage of development. We may not be able to substantiate the capability of our drug delivery technology for a variety of reasons:

- selection of inappropriate therapeutic compound for delivery;
- selection of inappropriate application for the particular product candidate;
- failure to receive regulatory approval on a timely basis or at all; or
- difficulties with manufacturing in commercial quantities at an acceptable cost.

Successful development of delivery technologies will require significant preclinical and clinical testing prior to regulatory approval, if any. Because of these scientific, regulatory and commercial hurdles, any program could be abandoned or otherwise fail, even after significant resources have been expended.

Recent changes in management may be disruptive.

We had significant changes in management in the past two years. On October 9, 2006, Michael O'Connell, our President and Chief Executive Officer (CEO) began a temporary leave of absence for medical reasons. Effective that same date, Gregory Turnbull, formerly an independent director of the Company, began to serve as President and Chief Executive Officer. Effective September 27, 2006, Stephen Whiteford was appointed the Company's Vice President, Finance and Chief Financial Officer to replace our former Chief Financial Officer who left the Company on September 12, 2006 to pursue another opportunity. In May 2007, Mr. Whiteford left the Company when Mr. O'Connell returned to active employment as our Chief Operating Officer and

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Chief Financial Officer. In December 2007, we announced a CEO succession plan, wherein we were initiating recruitment via an executive recruitment firm of a permanent CEO to take over that position from Mr. Turnbull, who will continue in that role until such a successor is successfully engaged. Then in January 2008, Mr. O'Connell resigned, and Mr. Turnbull assumed the added responsibilities of Chief Financial Officer in addition to his roles as President and Chief Executive Officer. In March 2008, our Controller left her position for another opportunity and we engaged the services of an experienced financial consultant. Additions of new personnel and departures of existing personnel, particularly in key positions, can be disruptive, might lead to additional departures of existing personnel and could have a material adverse effect on our business, operating results, financial condition and internal controls over financial reporting.

If any products that we or our collaborators may develop do not attain adequate market acceptance by healthcare professionals and patients, our business prospects and results of operations will suffer.

Even if a product candidate receives regulatory approval for commercial sale, the revenue received or to be received from the sale of the product may not be significant and will depend on many factors that are outside of our control. Factors that may affect revenue from our product candidates, if and when approved, include:

- perception of physicians and other members of the health care community of their safety and efficacy relative to that of competing products;
- cost-effectiveness;
- patient and physician satisfaction with these products;
- ability to manufacture commercial products successfully and on a timely basis;
- cost and availability of raw materials;
- market size for these products;
- reimbursement policies of government and third-party payors;
- unfavorable publicity concerning these products or similar drugs;
- the introduction, availability and acceptance of competing treatments, including those of our collaborators;
- adverse event information relating to these products;
- product labeling or product insert required by the FDA or regulatory authorities in other countries;
- regulatory developments related to the manufacture or continued use of these products;

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- extent and effectiveness of sales and marketing and distribution support for the products; and
- our collaborators' decisions as to the timing of product launches, pricing and discounting.

Our product revenue will be adversely affected if, due to these or other factors, the products we or our collaborators are able to commercialize do not gain significant market acceptance.

We depend on contract manufacturers and collaborators for manufacturing our products; if they do not perform as expected, our revenue and customer relations will suffer.

We do not own or operate manufacturing facilities for the production of clinical or commercial quantities of any product. We rely on a small number of third-party manufacturers to produce our compounds and expect to continue to do so to meet the preclinical and clinical requirements of our potential products and for all of our commercial needs. We have no long-term agreements with any of these third parties. We may not be able to extend these agreements at satisfactory terms, or at all, and we may not be able to find a replacement contract manufacturer at satisfactory terms or on a timely basis.

Further, our contract manufacturers and our collaborators are required to comply with FDA requirements related to product testing, quality assurance, manufacturing and records and documentation. Our contract manufacturers or our collaborators may not be able to comply with the applicable FDA regulatory requirements, which could result in an enforcement or other action, prevent commercialization of our product candidates and impair our reputation and results of operations.

If we fail to comply with continuing federal, state and foreign regulations, we could lose our approvals to market drugs and our business would be seriously harmed.

Following initial regulatory approval of any drugs we may develop, we will be subject to continuing regulatory review, including review of adverse drug experiences and clinical results that are reported after our drug products become commercially available. This would include results from any post-marketing tests or continued actions required as a condition of approval. The manufacturer and manufacturing facilities we use to make any of our drug candidates will be subject to periodic review and inspection by the FDA. If a previously unknown problem or problems with a product or a manufacturing and laboratory facility used by us is discovered, the FDA or foreign regulatory agency may impose restrictions on that product or on the manufacturing facility, including requiring us to withdraw the product from the market. Any changes to an approved product, including the way it is manufactured or promoted, often require FDA approval before the product, as modified, can be marketed. We and our contract manufacturers will be subject to ongoing FDA requirements for submission of safety and other post-market information. If we and our contract manufacturers fail to comply with applicable regulatory requirements, a regulatory agency may:

- issue warning letters;
- impose civil or criminal penalties;
- suspend or withdraw our regulatory approval;

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- suspend or terminate any of our ongoing clinical trials;
- refuse to approve pending applications or supplements to approved applications filed by us;
- impose restrictions on our operations;
- close the facilities of our contract manufacturers; or
- seize or detain products or require a product recall.

Additionally, such regulatory review covers a company's activities in the promotion of its drugs, with significant potential penalties and restrictions for promotion of drugs for an unapproved use. Sales and marketing programs are under scrutiny for compliance with various mandated requirements, such as illegal promotions to healthcare professionals. We are also required to submit information on our open and completed clinical trials to public registries and databases; failure to comply with these requirements could expose us to negative publicity, fines and penalties that could harm our business.

If we are unable to recruit and retain skilled employees, we may not be able to achieve our objectives.

We depend on a small number of key management and technical personnel. Retaining our current employees and recruiting qualified scientific personnel to perform future research and development work will be critical to our success. There is a shortage of skilled personnel in our industry, competition is intense for experienced scientists, and an inability to recruit or retain sufficient skilled personnel could result in delays to product development or approval, loss of sales and diversion of management resources.

We face intense competition from other companies.

We face intense competition from companies that are developing new formulations of existing drugs using novel drug delivery technologies. Many of our competitors have much greater financial, research and development, manufacturing, marketing, sales, distribution and managerial resources and experience than we do. Many of them also have much more experience than we do in preclinical testing and clinical trials of new drugs and in obtaining FDA and foreign regulatory approvals.

The following are our major competitors:

- Alkermes, Inc.
- Depomed, Inc.
- Durect Corporation

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- ProStrakan Group PLC
- SkyePharma PLC

Additionally, APF530 is expected to face competition from Eisai/MGI Pharma's Aloxi, Roche's Kytril, GlaxoSmithKline's Zofran, and Aventis' Anzemet, each of which is currently on the market, as well as Hana Biosciences' Zensana, or generic versions of certain of these products. We are also aware of several companies which have developed or are developing both generic and new formulations of granisetron, including transdermal formulations. APF112 is expected to face competition from Durect's Posidur and SkyePharma's recently divested DepoBupivacaine. Most or all of the products we could develop or commercialize will face competition from different therapeutic agents intended for treatment of the same indications or from other products incorporating drug delivery technologies. The competition potentially includes all of the pharmaceutical and drug delivery companies in the world. To the extent that we develop or market products incorporating drugs that are off-patent, or are being developed by multiple companies, we will face competition from other companies developing and marketing similar products.

Major technological changes can happen quickly in the biotechnology and pharmaceutical industries, and the development of technologically improved or different products or drug delivery technologies may make our product candidates or platform technologies obsolete or noncompetitive.

Because we or our collaborators must obtain regulatory approval to market our products in the United States and foreign jurisdictions, we cannot predict whether or when we will be permitted to commercialize our products.

Federal, state and local governments in the United States and governments in other countries have significant regulations in place that govern many of our activities. The preclinical testing and clinical trials of the products that we develop ourselves or that our collaborators develop are subject to government regulation and may prevent us from creating commercially viable products from our discoveries. These regulations and their application may change making it more difficult or prohibitive to develop our products. In addition, the sale by us or our collaborators of any commercially viable product will be subject to government regulation from several standpoints, including the processes of:

- manufacturing;
- labeling;
- distributing;
- advertising and promoting; and
- selling and marketing.

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We depend on our collaborators to help us complete the process of developing and testing our products.

Our strategy for the development, clinical testing and commercialization of our products requires entering into collaborations with corporate partners, licensors, licensees and others. These collaborations are critical to our success in bringing our products and product candidates to the market and promoting such marketed products profitably. We are dependent upon the subsequent success of these other parties in performing their respective responsibilities and the cooperation of our partners. Our collaborators may not cooperate with us or perform their obligations under our agreements with them. We cannot control the amount and timing of our collaborators' resources that will be devoted to our research activities related to our collaborative agreements with them. Our collaborators may choose to pursue existing or alternative technologies in preference to those being developed in collaboration with us. Failure to make or maintain these arrangements or a delay in a collaborative partner's performance or factors that may affect our partner's sales may materially adversely affect our business, results of operations and financial condition.

Under agreements with collaborators, we may rely significantly on them, among other activities, to:

- fund research and development activities with us;
- pay us fees upon the achievement of milestones; and
- market with us any commercial products that result from our collaborations.

Our business strategy includes the entry into additional collaborative agreements. We may not be able to enter into additional collaborative agreements or may not be able to negotiate commercially acceptable terms for these agreements.

Our current business strategy includes the entry into additional collaborative agreements for the development and commercialization of our delivery technologies. The negotiation and consummation of these types of agreements typically involve simultaneous discussions with multiple potential collaborators and require significant time and resources from our officers, business development, legal and research and development staff. In addition, in attracting the attention of pharmaceutical and biotechnology company collaborators, we compete with numerous other third parties with product opportunities as well the collaborators' own internal product opportunities. We may not be able to consummate additional collaborative agreements, or we may not be able to negotiate commercially acceptable terms for these agreements. If we do not consummate additional collaborative agreements, we may have to consume money more rapidly on our product development efforts, defer development activities or forego the exploitation of certain geographic territories, any of which could have a material adverse effect on our business.

If we or our collaborators cannot arrange for adequate third-party reimbursement for our products, our future revenue will suffer.

In both domestic and foreign markets, sales of our potential products will depend in substantial part on the availability of adequate reimbursement from third-party payors such as government health administration authorities, private health insurers

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and other organizations. Third-party payors often challenge the price and cost-effectiveness of medical products and services and such pressure may increase in the future. Significant uncertainty exists as to the adequate reimbursement status of newly approved health care products. Any products we are able to successfully develop may not be reimbursable by third-party payors. In addition, our products may not be considered cost-effective and adequate third-party reimbursement may not be available to enable us to maintain price levels sufficient to realize a profit. Legislation and regulations affecting the pricing of pharmaceuticals may change before our products are approved for marketing and any such changes could further limit reimbursement. If any products we develop do not receive adequate reimbursement, our revenue will be severely limited.

Our inability to obtain specialized materials could slow down our research and development process.

Some of the critical materials and components used in our products in development are sourced from a single supplier. An interruption in supply of a key material could significantly delay our research and development process or increase our expenses.

Specialized materials must often be manufactured for the first time for use in drug delivery technologies, or materials may be used in the technologies in a manner different from their customary commercial uses. The quality of materials can be critical to the performance of a drug delivery technology, so a reliable source of a consistent supply of materials is important. Materials or components needed for our drug delivery technologies may be difficult to obtain on commercially reasonable terms, particularly when relatively small quantities are required, or if the materials traditionally have not been used in pharmaceutical products.

If we are unable to adequately protect or enforce our intellectual property rights or secure rights to third-party patents, we may lose valuable assets, experience reduced market share or incur costly litigation to protect our rights or our third-party collaborators may choose to terminate their agreements with us.

Our success will depend in part on our ability to obtain patents, maintain trade secret protection and operate without infringing the proprietary rights of others. We have filed a number of U. S. patent applications on inventions relating to the composition of a variety of polymers, specific products, product groups and processing technology. In addition to obtaining patents in a number of foreign countries, we have also filed U.S. and foreign patent applications on our polymer technology with the Patent Cooperation Treaty (PCT), the European Patent Office, Australia, Canada, China, Hong Kong, Japan, South Korea, Singapore and Taiwan. We have a total of 21 issued United States patents and an additional 64 issued (or registered) foreign patents. The patents on the bioerodible technologies expire between January 2016 and November 2022. Our existing patents may not cover future products, additional patents may not be issued, and current patents or patents issued in the future may not provide meaningful protection or prove to be of commercial benefit.

The patent positions of pharmaceutical companies, including ours, are uncertain and involve complex legal and factual questions. In addition, the coverage claimed in a patent application can be significantly reduced before the patent is issued. Consequently, our patent applications or those that are licensed to us may not issue into patents, and any issued patents may not provide protection against competitive technologies or may be held invalid if challenged or circumvented. Our competitors may also independently develop products similar to ours or design around or otherwise circumvent patents issued to us or licensed by us. In addition, the laws of some foreign countries may not protect our proprietary rights to the same extent as the U.S. law.

We are party to collaborative agreements. These agreements subject us to obligations which must be fulfilled and require us to manage complex relationships with third parties. If we are unable to meet our obligations or manage our relationships with our

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collaborators under these agreements or enter into additional collaboration agreements or if our existing collaborations are terminated, our revenue may decrease. Our third-party collaborators have entered into these agreements based on the exclusivity that our intellectual property rights confer on the products being developed. The loss or diminution of our intellectual property rights could result in a decision by our third-party collaborators to terminate their agreements with us. In addition, these agreements are generally complex and contain provisions that could give rise to legal disputes, including potential disputes concerning ownership of intellectual property and data under collaborations. Such disputes can lead to lengthy, expensive litigation or arbitration requiring us to devote management time and resources to such dispute which we would otherwise spend on our business.

We also rely upon trade secrets, technical know-how and continuing technological innovation to develop and maintain our competitive position. We require our employees, consultants, advisors and collaborators to execute appropriate confidentiality and assignment-of-inventions agreements with us. These agreements typically provide that all materials and confidential information developed or made known to the individual during the course of the individual's relationship with us is to be kept confidential and not disclosed to third parties except in specific circumstances, and that all inventions arising out of the individual's relationship with us shall be our exclusive property. These agreements may be breached, and in some instances, we may not have an appropriate remedy available for breach of the agreements. Furthermore, our competitors may independently develop substantially equivalent proprietary information and techniques, reverse engineer our information and techniques, or otherwise gain access to our proprietary technology. We may be unable to meaningfully protect our rights in trade secrets, technical know-how and other non-patented technology. We may have to resort to litigation to protect our intellectual property rights, or to determine their scope, validity or enforceability. In addition, interference proceedings declared by the United States Patent and Trademark Office may be necessary to determine the priority of inventions with respect to our patent applications. Enforcing or defending our proprietary rights is expensive, could cause diversion of our resources and may not prove successful. Any failure to enforce or protect our rights could cause us to lose the ability to exclude others from using our technology to develop or sell competing products.

We may infringe on the intellectual property rights of others, and any litigation could force us to stop developing or selling potential products and could be costly, divert management attention and harm our business.

We must be able to develop products without infringing the proprietary rights of other parties. Because the markets in which we operate involve established competitors with significant patent portfolios, including patents relating to the composition of a variety of polymers, specific products, product groups and processing technology, it could be difficult for us to use our technologies or develop products without infringing the proprietary rights of others. We may not be able to design around the patented technologies or inventions of others and we may not be able to obtain licenses to use patented technologies on acceptable terms, or at all. If we cannot operate without infringing the proprietary rights of others, we will not earn product revenue.

If we are required to defend ourselves in a lawsuit, we could incur substantial costs and the lawsuit could divert management attention, regardless of the lawsuit's merit or outcome. These legal actions could seek damages and seek to enjoin testing, manufacturing and marketing of the accused product or process. In addition to potential liability for significant damages, we could be required to obtain a license to continue to manufacture or market the accused product or process and any license required under any such patent may not be made available to us on acceptable terms, if at all.

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Periodically, we review publicly available information regarding the development efforts of others in order to determine whether these efforts may violate our proprietary rights. We may determine that litigation is necessary to enforce our proprietary rights against others. Such litigation could result in substantial expense, regardless of its outcome, and may not be resolved in our favor.

Furthermore, patents already issued to us or our pending patent applications may become subject to dispute, and any disputes could be resolved against us. In addition, because patent applications in the United States are currently maintained in secrecy for a period of time prior to issuance, and patent applications in certain other countries generally are not published until more than 18 months after they are first filed, and because publication of discoveries in scientific or patent literature often lags behind actual discoveries, we cannot be certain that we were the first creator of inventions covered by our pending patent applications or that we were the first to file patent applications on such inventions.

We are exposed to risks and increased expenses as a result of laws requiring small business filers to evaluate internal controls over financial reporting.

Section 404 of the Sarbanes-Oxley Act of 2002 requires our management to evaluate the effectiveness of our internal controls over financial reporting as of the end of each fiscal year, and to include a management report assessing the effectiveness of our internal control over financing reporting in our annual report on Form 10-K for each fiscal year. Section 404 also requires our independent auditors to attest to, and report on, our internal control over financial reporting beginning with the year ending December 31, 2008. We have implemented an ongoing program to perform the system and process evaluation and testing we believe to be necessary to comply with these requirements. However, we cannot assure you that we will be successful in our efforts. We expect to incur increased expense and to devote additional management resources to Section 404 compliance. Any failure to implement required new or improved controls, or difficulties encountered in the implementation or operation of these controls, could harm our operating results and cause us to fail to meet our financial reporting obligations, which could adversely affect our business and reduce our stock price.

Legislative actions, potential new accounting pronouncements and higher insurance costs are likely to impact our future financial position or results of operations.

Future changes in financial accounting standards may cause adverse, unexpected fluctuations in the timing of the recognition of revenue or expenses and may affect our financial position or results of operations. New pronouncements and varying interpretations of pronouncements have occurred with frequency and may occur in the future and we may make changes in our accounting policies in the future. Compliance with changing regulation of corporate governance and public disclosure may result in additional expenses. Changing laws, regulations and standards relating to corporate governance and public disclosure, including the Sarbanes-Oxley Act of 2002, new SEC regulations, the Public Company Accounting Oversight Board, pronouncements and The NASDAQ Global Market rules, are creating uncertainty for companies such as ours and insurance, accounting and auditing costs are increasing as a result of this uncertainty and other factors. We are committed to maintaining high standards of corporate governance and public disclosure. As a result, we intend to invest all reasonably necessary resources to comply with evolving standards, and this investment may result in increased general and administrative expenses and a diversion of management time and attention from revenue-generating activities to compliance activities.

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We could be exposed to significant product liability claims that could be time consuming and costly to defend, divert management attention and adversely impact our ability to obtain and maintain insurance coverage

The testing, manufacture, marketing and sale of our products involve an inherent risk that product liability claims will be asserted against us. Although we are insured against such risks up to an annual aggregate limit in connection with clinical trials and commercial sales of our products, our present product liability insurance may be inadequate and may not fully cover the costs of any claim or any ultimate damages we might be required to pay. Product liability claims or other claims related to our products, regardless of their outcome, could require us to spend significant time and money in litigation or to pay significant damages. Any successful product liability claim may prevent us from obtaining adequate product liability insurance in the future on commercially desirable or reasonable terms. In addition, product liability coverage may cease to be available in sufficient amounts or at an acceptable cost. An inability to obtain sufficient insurance coverage at an acceptable cost or otherwise to protect against potential product liability claims could prevent or inhibit the commercialization of our products. A product liability claim could also significantly harm our reputation and delay market acceptance of our products.

Our use of hazardous materials could subject us to liabilities, fines and sanctions.

Our laboratory and clinical testing sometimes involve use of hazardous and toxic materials. We are subject to federal, state and local laws and regulations governing how we use, manufacture, handle, store and dispose of these materials. Although we believe that our safety procedures for handling and disposing of such materials comply in all material respects with all federal, state and local regulations and standards, there is always the risk of accidental contamination or injury from these materials. In the event of an accident, we could be held liable for any damages that result and such liability could exceed our financial resources. Compliance with environmental and other laws may be expensive and current or future regulations may impair our development or commercialization efforts.

Risks Related To Our Common Stock

The price of our common stock has been and may continue to be volatile.

Our common stock has historically been volatile, with a trading price ranging from \$1.32 to \$17.80 over the past five years. The stock markets in general, and the markets for drug delivery and pharmaceutical stocks in particular, have experienced extreme volatility that has often been unrelated to the operating performance of particular companies. These broad market fluctuations may adversely affect the trading price of our common stock. In addition, the limited trading volume of our stock may contribute to its volatility.

Price declines in our common stock could result from general market and economic conditions and a variety of other factors, including:

- continuing losses and failure to achieve or maintain profitability;
- our ability to raise capital;

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- adverse results, lack of success or delays in our clinical trials of our product candidates, including APF530;
- non-approval of our product candidates, or delays in the FDA review process;
- adverse actions taken by regulatory agencies with respect to our product candidates, clinical trials, manufacturing processes or sales and marketing activities;
- delays in preclinical and clinical testing;
- failure to substantiate the capability of our drug delivery technology;
- failure to attain adequate market acceptance by healthcare professionals and patients;
- failure of our contract manufacturers and collaborators to perform as expected;
- failure to comply with continuing federal, state and foreign regulations;
- market conditions relating to our segment of the industry or the securities markets in general;
- any lawsuit involving us or our product candidates;
- announcements concerning our competitors, or the biotechnology or pharmaceutical industries in general;
- changes in accounting principles; and
- loss of any of our key scientific or management personnel.

In the past, following periods of volatility in the market price of a particular company's securities, litigation has often been brought against that company. If litigation of this type is brought against us, it could be extremely expensive and divert management's attention and our company's resources.

Our common stock may be delisted from The NASDAQ Global Market, which could negatively impact the price of our common stock and our ability to access the capital markets.

Our common stock is listed on The NASDAQ Global Market. The listing standards of The NASDAQ Global Market provide that a company may be delisted if the closing bid price of its stock drops below \$1.00 for a period of 30 consecutive business days. There is a 6 month period to cure, if the closing bid price is over \$1.00 for 10 consecutive days within 6 months of the initial 30 day period below \$1.00. Additionally, issuers must maintain either (i) stockholders' equity of at least \$10 million or (ii) total assets and total revenue of at least \$50 million, or total market value of listed securities of at least \$50 million. As of the end of the third fiscal quarter of 2005, we failed to meet the \$10 million stockholders' equity requirement, although we regained compliance with that requirement in January 2006. In early 2007 we again failed to meet the \$10 million stockholders' equity requirement, and were so notified by NASDAQ in May, 2007. Following our public offering of common stock in June, 2007, we

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regained compliance, which was subsequently confirmed by NASDAQ. Going forward should we again fail to comply with all listing standards applicable to issuers listed on The NASDAQ Global Market, our common stock may be delisted from The NASDAQ Global Market. If our common stock is delisted, it could reduce the price of our common stock and the levels of liquidity available to our stockholders. In addition, the delisting of our common stock could materially adversely affect our access to the capital markets, and any limitation on liquidity or reduction in the price of our common stock could materially adversely affect our ability to raise capital on terms acceptable to us or at all. Delisting from The NASDAQ Global Market could also result in other negative implications, including the potential loss of confidence by suppliers, customers and employees, the loss of institutional investor interest and fewer business development opportunities.

Our certificate of incorporation, our bylaws, Delaware law and our stockholder rights plan contain provisions that could discourage another company from acquiring us and may prevent attempts by our stockholders to replace or remove our current management.

Provisions of Delaware law, our certificate of incorporation, bylaws and stockholder rights plan may discourage, delay or prevent a merger or acquisition that stockholders may consider favorable, including transactions in which you might otherwise receive a premium for your shares. In addition, these provisions may frustrate or prevent any attempts by our stockholders to replace or remove our current management by making it more difficult for stockholders to replace or remove our board of directors. These provisions include:

- authorizing the issuance of “blank check” preferred stock without any need for action by stockholders; and
- providing for dilutive issuance of preferred stock, commonly referred to as a “poison pill”, which can be triggered after a person or a group acquires 20% or more of our common stock.

In addition, Section 203 of Delaware General Corporation Law may discourage, delay or prevent a change in control of our company by prohibiting stockholders owning in excess of 15% of our outstanding voting stock from merging or combining with us, unless certain approvals are obtained.

ITEM 1B. UNRESOLVED STAFF COMMENTS

None.

Available Information

We make available free of charge on or through our Internet website our annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K and all amendments to those reports as soon as reasonably practicable after they are electronically filed with, or furnished to, the Securities and Exchange Commission. Our Internet website address is “www.appharma.com.” The reference to our Internet website does not constitute incorporation by reference of the information contained on or hyperlinked from our Internet website. We file electronically with the Securities and Exchange Commission, or SEC, our annual reports on Form 10-K, quarterly reports on Form 10-Q and current reports on Form 8-K pursuant to Section 13(a) or 15(d) of the Securities and Exchange Act of 1934. The SEC maintains an Internet site that contains reports, proxy information and information statements, and other information regarding issuers that file electronically with the SEC. The

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address of that website is <http://www.sec.gov>. The materials are also available at the SEC's Public Reference Room, located at 100 F Street, Washington, D.C. 20549. The public may obtain information through the public reference room by calling the SEC at 1-800-SEC-0330.

ITEM 2. PROPERTIES

We lease 26,067 square feet of laboratory, office and warehouse space in Redwood City, California under a lease expiring in 2011. The annual rent expense for the Redwood City facility is approximately \$463,000.

We believe our facilities are adequate and suitable for current and anticipated needs.

ITEM 3. LEGAL PROCEEDINGS

While the Company is not currently a party to any material pending legal proceedings, from time to time the Company is named as a party to lawsuits in the normal course of its business. Litigation, in general, and intellectual property litigation in particular, can be expensive and disruptive to normal business operations. Moreover, the results of legal proceedings are difficult to predict.

ITEM 4. SUBMISSION OF MATTERS TO A VOTE OF SECURITY HOLDERS

None.

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PART II

ITEM 5. MARKET FOR REGISTRANT'S COMMON STOCK RELATED STOCKHOLDER MATTERS AND ISSUER PURCHASES OF EQUITY SECURITIES

Shares of our common stock trade on the NASDAQ Global Market, under the symbol APPA. As of February 29, 2007, there were 310 holders of record of our common stock.

We have never paid cash dividends and do not anticipate paying cash dividends in the foreseeable future. The following table sets forth for the fiscal periods indicated, the range of high and low sales prices for our common stock on the NASDAQ Global Market (formerly the NASDAQ National Market).

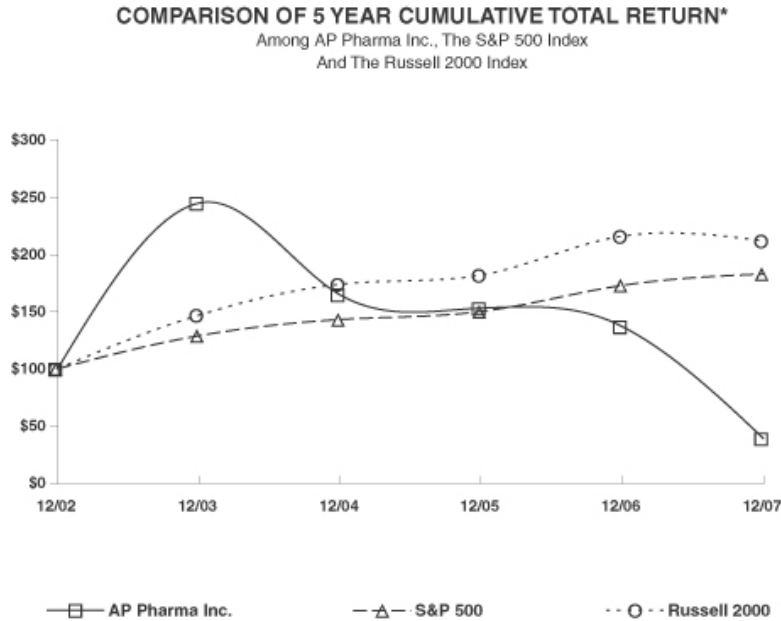
2007	High	Low	2006	High	Low
First Quarter	\$5.88	\$3.84	First Quarter	\$9.28	\$5.76
Second Quarter	4.80	1.74	Second Quarter	8.76	5.32
Third Quarter	2.78	1.95	Third Quarter	6.48	3.36
Fourth Quarter	2.35	1.35	Fourth Quarter	6.24	4.00

On March 25, 2008, the closing sale price of our common stock was \$1.39 per share.

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Performance Graph

The rules of the SEC require A.P. Pharma to include in this annual report on form 10K a line graph presentation comparing cumulative five year stockholder returns, on a dividend reinvested basis, with a broad based equity index and a published industry index. The Company selected the S&P 500 Stock Index and Russell 2000 for purposes of the comparison which appears below. The graph assumes that \$100 was invested in A.P. Pharma stock and each index on December 31, 2002, with all dividends reinvested. Past stock performance is not necessarily indicative of future results.



* \$100 invested on 12/31/02 in stock or index-including reinvestment of dividends. Fiscal year ending December 31.

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www.researchdatagroup.com/S&P.htm

	12/02	12/03	12/04	12/05	12/06	12/07
A.P. PHARMA, INC.	100	245	165	153	137	39
S&P 500	100	129	143	150	173	183
RUSSELL 2000	100	147	174	182	216	212

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ITEM 6. SELECTED FINANCIAL DATA
(IN THOUSANDS, EXCEPT PER SHARE DATA)

The following selected financial data should be read in conjunction with the "Management's Discussion and Analysis of Financial Condition and Results of Operations" and the financial statements and notes thereto, included in Item 8 of this Annual Report on Form 10-K.

For the Years Ended December 31,	2007	2006	2005	2004	2003
STATEMENTS OF OPERATIONS DATA					
Revenue:					
Royalties	\$ —	\$ —	\$ 5,247	\$ 4,972	\$ 4,502
Contract revenue	412	—	144	432	346
Total revenue	412	—	5,391	5,404	4,848
Operating Expenses:					
Research and development	19,364	15,236	10,299	11,495	8,421
General and administrative	4,681	3,628	3,565	3,225	3,039
Operating loss	(23,633)	(18,864)	(8,473)	(9,316)	(6,612)
Gain on sale of interest in royalties	2,500	23,429	—	—	—
Interest and other income, net	1,333	952	290	224	404
Income (loss) from continuing operations	(19,800)	5,517	(8,183)	(9,092)	(6,208)
Loss from discontinued operations ⁽¹⁾	(342)	(188)	(89)	(133)	(57)
Gain on disposition of discontinued operations, net of taxes ⁽²⁾	20	56	62	4	1,902
Income (loss) before income taxes	(20,122)	5,385	(8,210)	(9,221)	(4,363)
Provision for income taxes	(41)	(119)	—	—	—
Net income (loss)	<u>\$(20,163)</u>	<u>\$ 5,266</u>	<u>\$ (8,210)</u>	<u>\$ (9,221)</u>	<u>\$(4,363)</u>
Diluted income (loss) per common share:					
Income (loss) from continuing operations	\$ (1.02)	\$ 0.87	\$ (1.30)	\$ (1.59)	\$ (1.21)
Net income (loss)	\$ (1.04)	\$ 0.83	\$ (1.31)	\$ (1.61)	\$ (0.85)
Weighted average common shares outstanding used to calculate diluted earnings (loss) per common share					
	19,358	6,359	6,280	5,727	5,138

(1) Loss from discontinued operations represents the loss attributable to our Analytical Standards division that was sold to GFS Chemicals on February 13, 2003, and the loss attributable to our cosmeceutical and toiletries business that was sold to RP Scherer on July 25, 2000. See Note 9 "Discontinued Operations" in the Notes to Financial Statements of Part II, Item 8 of this Form 10-K.

(2) The gain on disposition of discontinued operations in 2003 represents the gain on sale of our Analytical Standards division to GFS Chemicals on February 13, 2003. See Note 9 "Discontinued Operations" in the Notes to Financial Statements of Part II, Item 8 of this Form 10-K.

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December 31,	2007	2006	2005	2004	2003
BALANCE SHEET DATA					
Cash, cash equivalents and marketable securities	\$ 35,062	\$ 15,522	\$ 5,809	\$ 13,596	\$ 9,484
Working capital	29,589	12,014	4,882	12,636	9,366
Total assets	36,950	17,251	8,969	17,014	13,155
Long-term liabilities	1,269	1,000	—	—	—
Accumulated deficit	(107,926)	(87,763)	(93,029)	(84,819)	(75,598)
Stockholders' equity	29,474	12,059	6,203	14,154	11,263

ITEM 7. MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

This Annual Report on Form 10-K contains "forward-looking statements" as defined by the Private Securities Litigation Reform Act of 1995. These forward-looking statements involve risks and uncertainties including uncertainties associated with timely development, approval, launch and acceptance of new products, satisfactory completion of clinical studies, establishment of new corporate alliances, progress in research and development programs and other risks and uncertainties identified below and in Item 1A "Risk Factors," herein. We caution investors that forward-looking statements reflect our analysis only on their stated date. We do not intend to update them except as required by law.

Overview

We are a specialty pharmaceutical company focused on developing pharmaceutical products using our proprietary Biochronomer polymer-based drug delivery technology. Our product development philosophy is based on incorporating approved therapeutics into our proprietary bioerodible drug delivery technology to create controlled release pharmaceuticals to improve treatments for diseases or conditions. Our lead product candidate, APF530, is currently in a pivotal Phase III clinical trial for the prevention of acute and delayed onset chemotherapy-induced nausea and vomiting, or CINV. We expect to complete enrollment of our pivotal Phase III clinical trial in the second quarter of 2008 and to announce results of that trial in the third quarter of 2008. We expect to submit our new drug application, or NDA, for approval of APF530 in the fourth quarter of 2008.

Our primary focus is to advance our proprietary Biochronomer technology, consisting of bioerodible polymers designed to release drugs over a defined period. We have completed over 100 in vivo and in vitro studies demonstrating that our Biochronomer technology is potentially applicable to a range of therapeutic areas, including prevention of nausea and vomiting, pain management, control of inflammation and treatment of ophthalmic diseases. We have also completed comprehensive animal and human toxicology studies that have established that our Biochronomer polymers are safe and well tolerated. Furthermore, our Biochronomer technology can be designed to deliver drugs over periods varying from days to several months.

Our lead product candidate, which utilizes our proprietary Biochronomer technology, is APF530. APF530 is designed to prevent CINV for at least five days and contains granisetron, a drug approved for the prevention of CINV. In September 2005, we completed a Phase II clinical trial of APF530 that achieved all of its primary and secondary endpoints. In May 2006, we initiated our pivotal Phase III clinical trial of APF530. We believe that this clinical trial will lead to regulatory approval of APF530 for the prevention of acute and delayed onset CINV for patients undergoing both moderately and highly emetogenic, or vomit-inducing, chemotherapy.

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In addition to our lead drug candidate, we have a pipeline of other product candidates that use our Biochronomer technology. One of these, APF112, incorporates the well-known local anesthetic, mepivacaine. It is designed to provide up to 36 hours of post-surgical pain relief and to minimize the use of morphine-like drugs, or opiates, which are used extensively in post-surgical pain management. Post-surgical pain can be treated with local anesthetics, but the usefulness of these is currently limited by the short duration of their effectiveness. We plan to initiate a Phase IIb clinical trial for APF112 in the second quarter of 2008.

We have several additional product candidates using our Biochronomer technology in early stages of development. For example, we plan to initiate a Phase I clinical trial of APF580 in the second quarter of 2008 for the controlled delivery of an opiate for pain relief.

Critical Accounting Policies and Estimates

Our accounting policies are more fully described in Note 2 of the Financial Statements. The preparation of financial statements in conformity with U.S. generally accepted accounting principles requires our management to make estimates and assumptions about future events that affect the amounts reported in the financial statements and accompanying notes. Actual results could differ significantly from those estimates. We believe the following policies to be critical to understanding our financial condition, results of operations, and expectations for 2008, because these policies require management to make significant estimates, assumptions and judgments about matters that are inherently uncertain.

• Revenue Recognition

Our revenue arrangements with multiple deliverables are divided into separate units of accounting if certain criteria are met, including whether the delivered item has stand-alone value to the customer and whether there is objective and reliable evidence of the fair value of the undelivered items. The consideration we receive is allocated among the separate units based on their respective fair values, and the applicable revenue recognition criteria are considered separately for each of the separate units. Advance payments received in excess of amounts earned are classified as deferred revenue until earned.

• Royalties

Contractually required minimum royalties are recorded ratably throughout the contractual period. Royalties in excess of minimum royalties are recognized as earned when the related product is shipped to the end customer by our licensees based on information provided to us by our licensees.

• Contract Revenue

Contract revenue relates to research and development arrangements that generally provide for us to invoice research and development fees based on full-time equivalent hours for each project. Revenue from these arrangements are recognized as the related development services are rendered. This revenue approximates the costs incurred.

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• **Clinical Trial Accruals**

Our expenses related to clinical trials are based on estimates of the services received and efforts expended pursuant to contracts with multiple research institutions and clinical research organizations that conduct and manage clinical trials on our behalf. Since the invoicing related to these services does not always coincide with our financial statement close process, we must estimate the level of services performed and fees incurred in determining the accrued clinical trial costs. The financial terms of these agreements are subject to negotiation and variation from contract to contract and may result in uneven payment flows. Payments under the contracts depend on factors such as the successful enrollment of patients or achievement of certain events or the completion of portions of the clinical trial or similar conditions. The Phase III clinical trials of APF530 have a significant effect on the Company's research and development expenses. Expenses related to clinical trials generally are accrued based on the level of patient enrollment and services performed by the clinical research organization or related service provider according to the protocol. We monitor patient enrollment levels and related activity to the extent possible and adjust our estimates accordingly. Historically these estimates have been accurate and no material adjustments have had to be made.

• **Income Taxes**

We make certain estimates and judgments in determining income tax expense for financial statement purposes. These estimates and judgments occur in the calculation of certain tax assets and liabilities, which arise from differences in the timing of recognition of revenue and expense for tax and financial statement purposes. As part of the process of preparing our financial statements, we are required to estimate our income taxes in each of the jurisdictions in which we operate. This process involves us estimating our current tax exposure under the most recent tax laws and assessing temporary differences resulting from differing treatment of items for tax and accounting purposes.

We assess the likelihood that we will be able to recover our deferred tax assets. We consider all available evidence, both positive and negative, including our historical levels of income and losses, expectations and risks associated with estimates of future taxable income and ongoing prudent and feasible tax planning strategies in assessing the need for a valuation allowance. If we do not consider it more likely than not that we will recover our deferred tax assets, we will record a valuation allowance against the deferred tax assets that we estimate will not ultimately be recoverable. At December 31, 2007, we believed that the amount of our deferred income taxes would not be ultimately recovered. Accordingly, we recorded a full valuation allowance for deferred tax assets. However, should there be a change in our ability to recover our deferred tax assets, we would recognize a benefit to our tax provision in the period in which we determine that it is more likely than not that we will recover our deferred tax assets.

• **Stock-Based Compensation**

On January 1, 2006, we adopted the provisions of Statement of Financial Accounting Standards No. 123R, "Share-Based Payment" (SFAS 123R). SFAS 123R revised SFAS 123, "Accounting for Stock-Based Compensation" and supersedes APB Opinion No. 25, "Accounting for Stock Issued to Employees." SFAS 123R requires companies to measure and recognize compensation expense for all employee share-based payments at fair value over the service period underlying the arrangement. Accordingly, we are required to record the grant-date fair value of stock options issued to employees and purchase-date fair value of employee stock purchases. We adopted SFAS 123R using the "modified prospective" method, whereby fair value of all previously-granted employee share-based arrangements remaining unvested at January 1, 2006, based on the grant-date

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value estimated in accordance with the pro forma provisions of SFAS 123, and all grants made on or after January 1, 2006, based on fair value estimated in accordance with SFAS 123(R), have been included in our determination of share-based compensation expense in 2007 and 2006. We have not restated our operating results in prior periods to reflect charges for the fair value of share-based arrangements.

Prior to January 1, 2006 we elected to account for stock-based compensation related to employees using the intrinsic value method. Accordingly, except for stock options issued to non-employees and restricted stock awards to employees and directors, no compensation cost was recognized for our stock option plans and stock purchase plan because stock option exercise prices historically equaled the per share fair values of the underlying common stock. Compensation related to options granted to non-employees was periodically re-measured as earned.

Results of Operations for the years ended December 31, 2007, 2006 and 2005 (References to Notes herein refer to Notes to Financial Statements, in Item 8, herein)

The following sets forth the statement of operations data and percentage changes as compared to the prior year (dollar amounts are presented in thousands):

	For the Years Ended December 31,			Annual % Change	
	2007	2006	2005	2007/2006	2006/2005
Royalties	\$ —	\$ —	\$ 5,247	(0)%	(100)%
Contract revenue	412	—	144	*	(100)%
Total revenue	412	—	5,391	*	(100)%
Research and development	19,364	15,236	10,299	27 %	48 %
General and administrative	4,681	3,628	3,565	29 %	2 %
Interest income	1,326	1,006	287	32 %	*
Gain on sale of royalty interests	2,500	23,429	—	(89)%	*
Loss from discontinued operations	(342)	(188)	(89)	82 %	*
Gain on disposition of discontinued operations, net of taxes	20	56	62	(64)%	(10)%

* Calculation not meaningful.

Revenue

We had no royalty revenue in 2007 and 2006, reflecting the sale of our rights to royalties on sales of Retin-A Micro and Carac on January 18, 2006, on which we recorded a gain of \$23,429,000 (see Note 12). Royalties were \$5,247,000 in 2005, mainly from royalties on sales of Carac, a topical prescription treatment for actinic keratoses which is sold by our marketing partner, Dermik Laboratories, a Sanofi-Aventis company and royalties on sales of Retin-A Micro, a topical prescription treatment for acne which is marketed by Ortho Neutrogena, a Johnson & Johnson company.

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Contract revenue increased in 2007 by \$412,000 or 100% from \$0 in 2006 a result of a collaborative research and development program with a major animal health company (See Note 12). Contract revenue decreased in 2006 by \$144,000 or 100% from \$144,000 in 2005 as a result of no collaborative research and development programs as we focused our efforts on the development of APF530 for the prevention of both acute and delayed chemotherapy-induced nausea and vomiting.

Research and Development

Research and development expense in 2007 increased by \$4,128,000 or 27% to \$19,364,000 from \$15,236,000 in 2006 due mainly to our Phase III clinical trial for APF530. Research and development expense in 2006 increased by \$4,937,000 or 48% to \$15,236,000 from \$10,299,000 in 2005 due mainly to our Phase III clinical trial for APF530. Research and development expenses in 2008 are expected to increase over those incurred in 2007, reflecting costs to be incurred for clinical trials of APF112 and APF580, added research and development personnel to support the expanded clinical trial activities, with some offset from reduced APF530 trial expenses.

The scope and magnitude of future research and development expenses are difficult to predict given the number of studies that will need to be conducted for any of our potential products. In general, biopharmaceutical development involves a series of steps, beginning with identification of a potential target, and includes proof of concept in animals and Phase I, II and III clinical studies in humans. Each step of this process is typically more expensive than the previous one, so success in development results in increasing expenditures.

We have a number of product candidates in various stages of development. The following table sets forth the current opportunities for our own portfolio of product candidates, the compound selected, the delivery duration and the status.

Product Portfolio	Drug	Targeted Duration	Status
APF530—Anti-nausea (chemotherapy)	Granisetron	At least five days	Phase III
APF112—Acute pain relief (surgical/orthopedic)	Mepivacaine	Up to 36 hours	Phase II
APF580—Pain relief	Undisclosed opiate	At least seven days	Preclinical
APF328—Anti-inflammatory (surgical/orthopedic)	Meloxicam	Up to two weeks	Preclinical
APF505—Anti-inflammatory (osteoarthritis)	Meloxicam	Up to six weeks	Preclinical

The major components of research and development expenses for 2007, 2006 and 2005 were as follows (in thousands):

For the year December 31,	2007	2006	2005
Internal research and development costs	\$ 6,264	\$ 6,455	\$ 5,197
External development costs:			
APF530	12,137	7,305	3,551
APF112	—	—	—
External general technology development costs	963	1,476	1,551
	<u>\$19,364</u>	<u>\$15,236</u>	<u>\$10,299</u>

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Internal research and development costs consist of employee salaries and benefits, laboratory supplies, depreciation, and allocation of overhead. External general technology development costs include expenditures on polymer development and manufacturing, which are performed on our behalf by third parties.

General and Administrative

General and administrative expense increased by \$1,053,000 or 29% in 2007 to \$4,681,000 from \$3,628,000 in 2006 due primarily to severance costs recorded in 2007 related to the departure of Michael O'Connell, our former Chief Financial Officer and Chief Operating Officer. General and administrative expense increased by \$63,000 or 2% in 2006 to \$3,628,000 from \$3,565,000 in 2005. General and administrative expense consists of salaries and related expenses, professional fees, directors' fees, investor relations costs, insurance expense and the related overhead cost allocation. General and administrative expense for 2008 is expected to decline from the 2007 level due to the absence of the severance costs, with such expense reductions offset somewhat by costs associated with executive recruitment activities.

Interest Income

Interest income consists primarily of income earned on our invested cash, cash equivalents and marketable securities. Interest income increased by \$320,000 in 2007 to \$1,326,000 compared to \$1,006,000 in 2006 due to a higher level of invested assets, as a result of our June 2007 financing. Interest income increased by \$719,000 in 2006 to \$1,006,000 compared to \$287,000 in 2005 due to a higher level of invested assets and higher interest rates.

Discontinued Operations

On February 13, 2003, we completed the sale of certain assets of our Analytical Standards division to GFS Chemicals, Inc. ("GFS"), a privately held company based in Columbus, Ohio. In this transaction, we received \$2.1 million on closing, and are entitled to receive royalties on sales of Analytical Standards products for a period of five years following the sale at rates ranging from 15% to 5%. The net present value of the guaranteed minimum royalties is included in the gain on disposition of these assets.

On July 25, 2000, we completed the sale of certain technology rights for our topical pharmaceutical and cosmeceutical product lines and associated assets, referred to as our cosmeceutical and toiletry business, to RP Scherer Corporation, a subsidiary of Cardinal Health, Inc. We received \$25 million at closing and were entitled to receive further earnout amounts for the subsequent three years, the amounts of which were dependent on the performance of the business sold.

Under the terms of the agreement with RP Scherer, we guaranteed a minimum gross profit percentage on RP Scherer's combined sales of products to Ortho Neutrogena and Dermik ("Gross Profit Guaranty"). The guaranty period commenced on July 1, 2000 and ends on the earlier of July 1, 2010 or the end of two consecutive guaranty periods where the combined gross profit on sales to Ortho and Dermik equals or exceeds the guaranteed gross profit (the "two period test"). The Gross Profit Guaranty expense totaled \$944,000 for the first seven guaranty years and in those years profits did not meet the two period test. Effective March 2007, in conjunction with a sale of assets by RP Scherer's successor company to an Amcol International subsidiary ("Amcol"), a new agreement was signed between us and Amcol to provide continuity of product supply to Ortho and

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Dermik. This new agreement potentially extends the gross profit guaranty period an additional three years to July 1, 2013 unless it is terminated earlier with the two period test. Therefore, we expect the annual Gross Profit Guaranty payment to range from \$100,000 to \$200,000 for the remainder of the guaranty period.

Loss from discontinued operations represents primarily the loss attributable to the Gross Profit Guaranty associated with the sale of our cosmeceutical and toiletry business. For the year 2007, the increased level of loss from prior years represents the amount of the guaranty as asserted by Amcol, which remains subject to challenge by us.

The gain on disposition of discontinued operations recorded in 2007 of \$20,000 compared to \$56,000 in 2006 and \$62,000 in 2005 and relates to the gain on the sale of our Analytical Standards division as measured by royalty receipts in excess of guaranteed minimums.

Liquidity and Capital Resources

Cash, cash equivalents and marketable securities increased by \$19,540,000 to \$35,062,000 at December 31, 2007 from \$15,522,000 at December 31, 2006, primarily as a result of our June 2007 financing offset by cash used to fund our operations.

Net cash used in continuing operating activities for the year ended December 31, 2007 was \$17,112,000 and related primarily to funding operations offset by changes in accrued expenses and accounts payable, as well as depreciation, amortization and stock-based compensation. The increase in net cash used in continuing operating activities in 2007, as compared to 2006, was primarily due to the gain of \$ 2.5 million in 2007 as compared to \$23.4 million in 2006 from the sale of our rights to royalties on sales of Retin-A Micro and Carac, and additional research and development expenses in 2007 associated with the Phase III study of APF530.

Net cash provided by continuing operating activities for the year ended December 31, 2006 was \$9,157,000 and related primarily to income from operations, including the \$23.4 million gain on sale of Retin-A Micro and Carac royalty interest, changes in operating assets and liabilities, as well as stock based compensation and depreciation and amortization.

Net cash used in continuing operating activities was \$7,652,000 for the year ended December 31, 2005 and primarily related to funding operations, offset by depreciation and amortization and stock based compensation.

The cash used in discontinued operations of \$169,000 in 2007 related to Gross Profit Guaranty payments to RP Scherer, partially offset by the royalties received from GFS for sales of Analytical Standards products. The cash provided by discontinued operations of \$24,000 and \$125,000 in 2006 and 2005, respectively, related to the royalties received from GFS for sales of Analytical Standards products, partially offset by severance payments and payments of the Gross Profit Guaranty to RP Scherer.

Net cash provided by investing activities for the year ended December 31, 2007 was \$11,202,000 compared with net cash used in investing activities for the year ended December 31, 2006 of \$7,717,000 and net cash provided by investing activities of \$5,088,000 in the year ended December 31, 2005. The increase in net cash provided by investing activities in 2007 compared with net cash used in investing activities in 2006 was primarily due to our leaving cash and cash proceeds from maturities and sales of marketable securities in cash and cash equivalents rather than investing in marketable securities. The increase

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in net cash used in investing activities in 2006 compared with net cash provided by investing activities in 2005 was primarily due to increased purchases of marketable securities and decreased maturities of marketable securities.

Our financing activities provided us with \$37,256,000, \$79,000 and \$119,000 for the years ended December 31, 2007, 2006 and 2005, respectively. The net cash provided by financing activities in 2007 primarily related to the issuance of 24,393,939 shares of common stock at \$1.65 per share for net proceeds of \$37.2 million in June 2007. The net cash provided by financing activities in 2006 and 2005 primarily related to proceeds from issuances of shares under the Employee Stock Purchase Plan and stock option plans.

We have financed our operations including technology and product research and development, primarily through royalties received on sales of Retin-A Micro and Carac, the sale of our rights to royalties on sales of Retin-A Micro and Carac, income from collaborative research and development fees, proceeds received from the sales of our Analytical Standards division and our cosmeceutical and toiletry business, sales of common stock, and interest earned on short-term investments. Our cash, cash equivalents and marketable securities at December 31, 2007 are expected to be sufficient to meet our cash needs at least through 2008. It is probable that we will seek additional financing within this timeline through convertible debt or equity financing, collaborative agreements or other arrangements.

Our capital requirements going forward from 2008 will depend on numerous factors including, among others, our ability to enter into collaborative research and development and licensing agreements; progress of product candidates in preclinical and clinical trials; investment in new research and development programs; time required to gain regulatory approvals; resources that we devote to self-funded products; potential acquisitions of technology, product candidates or businesses; and the costs of defending or prosecuting any patent opposition or litigation necessary to protect our proprietary technology.

There can be no assurance that we will be able to raise sufficient additional capital when we need it or to raise capital on favorable terms. The sale of additional equity or convertible debt securities in the future may be dilutive to our stockholders, and debt financing arrangements may require us to pledge certain assets and enter into covenants that could restrict certain business activities or our ability to incur further indebtedness and may contain other terms that are not favorable to us or our stockholders. If we are unable to obtain adequate funds on reasonable terms, we may be required to curtail operations significantly or to obtain funds by entering into financing, supply or collaboration agreements on unattractive terms.

Contractual Obligations

Below is a summary of fixed payments related to certain contractual obligations (in thousands).

	Total	Less Than 1 year	1-3 years	3-5 years	More Than 5 years
Operating Leases ⁽¹⁾	\$1,776	\$ 545	\$1,105	\$ 126	\$ —
Total	\$1,776	\$ 545	\$1,105	\$ 126	\$ —

(1) See Note 6 "Commitments and Contingencies."

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Under the terms of the agreement with RP Scherer, we guaranteed a minimum gross profit percentage on RP Scherer's combined sales of products to Ortho Neutrogena and Dermik ("Gross Profit Guaranty"). The guaranty period commenced on July 1, 2000 and ends on the earlier of July 1, 2010 or the end of two consecutive guaranty periods where the combined gross profit on sales to Ortho and Dermik equals or exceeds the guaranteed gross profit (the "two period test"). The Gross Profit Guaranty expense totaled \$944,000 for the first seven guaranty years and in those years profits did not meet the two period test. Effective March 2007, in conjunction with a sale of assets by RP Scherer's successor company to an Amcol International subsidiary ("Amcol"), a new agreement was signed between us and Amcol to provide continuity of product supply to Ortho and Dermik. This new agreement potentially extends the gross profit guaranty period an additional three years to July 1, 2013 unless it is terminated earlier with the two period test. Therefore, we expect the annual Gross Profit Guaranty payment to range from \$100,000 to \$200,000 for the remainder of the guaranty period.

Off-Balance-Sheet Arrangements

As of December 31, 2007, we did not have any off-balance-sheet arrangements, as defined in Item 303(a)(4)(ii) of Regulation S-K.

Recent Accounting Pronouncements

Recent accounting pronouncements are disclosed in Note 2 to our financial statements included in Item 8 of this Annual Report on Form 10-K.

ITEM 7A. QUANTITATIVE AND QUALITATIVE DISCLOSURE ABOUT MARKET RISK

Our exposure to market rate risk for changes in interest rates relates primarily to our investment portfolio. We do not use derivative financial instruments. We manage our interest rate risk by maintaining an investment portfolio primarily consisting of debt instruments of high credit quality and relatively short average maturities. The interest rates as of December 31, 2007 and 2006 were 5.0% and 5.1%, respectively. At December 31, 2007 and 2006, respectively, our cash equivalents and marketable securities include corporate and other debt securities as follows: (in thousands)

December 31,	2007	2006
Available-for-sale:		
Due in less than 1 year	\$33,430	\$14,665
Due after 1 year but less than 5 years	976	400
Total available-for-sale	<u>\$34,406</u>	<u>\$15,065</u>

Notwithstanding our efforts to manage interest rate risks, there can be no assurance that we will be adequately protected against the risks associated with interest rate fluctuations.

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ITEM 8. FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA

Report of Independent Registered Public Accounting Firm

The Board of Directors and Stockholders

A.P. Pharma, Inc.

We have audited the accompanying balance sheets of A.P. Pharma, Inc. as of December 31, 2007 and 2006 and the related statements of operations, stockholders' equity and cash flows for the years then ended. Our audits also included the 2007 and 2006 financial data in the financial statement schedule listed in the Index at Item 15(a)2. These financial statements and schedule are the responsibility of the Company's management. Our responsibility is to express an opinion on these financial statements and schedule based on our audits.

We conducted our audits in accordance with standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. We were not engaged to perform an audit of the Company's internal control over financial reporting. Our audits included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Company's internal control over financial reporting. Accordingly, we express no such opinion. An audit also includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the financial statements audited by us present fairly, in all material respects, the financial position of A.P. Pharma, Inc. at December 31, 2007 and 2006, and the results of its operations and its cash flows for the years then ended, in conformity with U.S. generally accepted accounting principles. Also, in our opinion, the related financial statement schedule for the years ended December 31, 2007 and 2006, when considered in relation to the basic financial statements taken as a whole, presents fairly in all material respects the information set forth therein.

As discussed in Note 11, on January 1, 2007, the Company adopted Financial Accounting Standards Board Interpretation No. 48, *Accounting for Uncertainty in Income Taxes, an Interpretation of FAS 109*. Also, as discussed in Note 2, the Company adopted SFAS No. 123(R), *Share-Based Payment*, applying the modified prospective method effective January 1, 2006.

/s/ ODENBERG, ULLAKKO, MURANISHI & CO. LLP

San Francisco, California

March 25, 2008

Report of Independent Registered Public Accounting Firm

The Board of Directors and Stockholders
A.P. Pharma, Inc.

We have audited the accompanying statements of operations, stockholders' equity, and cash flows of AP Pharma, Inc. for the year ended December 31, 2005. Our audit also included the financial statement schedule listed in the Index at Item 15(a) for the year ended December 31, 2005. These financial statements and schedule are the responsibility of the Company's management. Our responsibility is to express an opinion on these financial statements and schedule based on our audit.

We conducted our audit in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. We were not engaged to perform an audit of the Company's internal control over financial reporting. Our audit included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Company's internal control over financial reporting. Accordingly, we express no such opinion. An audit also includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. We believe that our audit provides a reasonable basis for our opinion.

In our opinion, the financial statements referred to above present fairly, in all material respects, the results of operations and cash flows of A.P. Pharma, Inc. for the year ended December 31, 2005, in conformity with U.S. generally accepted accounting principles. Also, in our opinion, the related financial statement schedule for the year ended December 31, 2005, when considered in relation to the basic financial statements taken as a whole, presents fairly in all material respects the information set forth therein.

/s/ Ernst & Young LLP

Palo Alto, California
February 24, 2006

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A.P. PHARMA, INC.
BALANCE SHEETS
(in thousands except par value and shares)

December 31,	2007	2006
ASSETS		
Current Assets:		
Cash and cash equivalents	\$ 33,510	\$ 2,333
Marketable securities	1,552	13,189
Accounts receivable	152	75
Prepaid expenses and other current assets	582	609
Total current assets	35,796	16,206
Property and equipment, net	1,079	958
Other long-term assets	75	87
Total Assets	\$ 36,950	\$ 17,251
LIABILITIES AND STOCKHOLDERS' EQUITY		
Current Liabilities:		
Accounts payable	\$ 1,437	\$ 772
Accrued expenses	4,347	3,085
Accrued disposition costs	423	335
Total current liabilities	6,207	4,192
Deferred revenue	1,000	1,000
Other long-term liabilities	269	—
Total Liabilities	7,476	5,192
Commitments and Contingencies (Note 6)		
Stockholders' Equity:		
Preferred stock, 2,500,000 shares authorized; none issued or outstanding at December 31, 2007 and 2006	—	—
Common stock, \$.01 par value, 50,000,000 shares authorized; 30,791,465 and 6,359,666 issued and outstanding at December 31, 2007 and 2006, respectively	307	64
Additional paid-in capital	137,131	99,771
Accumulated other comprehensive loss	(38)	(13)
Accumulated deficit	(107,926)	(87,763)
Total Stockholders' Equity	29,474	12,059
Total Liabilities and Stockholders' Equity	\$ 36,950	\$ 17,251

See accompanying notes to financial statements.

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A.P. PHARMA, INC.
STATEMENTS OF OPERATIONS
(in thousands except per share amounts)

For the Years Ended December 31,	2007	2006	2005
REVENUE			
Royalties	\$ —	\$ —	\$ 5,247
Contract revenue	412	—	144
Total revenue	412	—	5,391
OPERATING EXPENSES			
Research and development	19,364	15,236	10,299
General and administrative	4,681	3,628	3,565
Total operating expenses	24,045	18,864	13,864
Operating loss	(23,633)	(18,864)	(8,473)
Interest income	1,326	1,006	287
Gain on sale of royalty interest	2,500	23,429	—
Other income (loss), net	7	(54)	3
Income (loss) from continuing operations	(19,800)	5,517	(8,183)
Loss from discontinued operations	(342)	(188)	(89)
Gain on disposition of discontinued operations, net of taxes	20	56	62
Income (loss) before income taxes	(20,122)	5,385	(8,210)
Provision for income taxes	(41)	(119)	—
Net income (loss)	<u>\$(20,163)</u>	<u>\$ 5,266</u>	<u>\$(8,210)</u>
Basic income (loss) per share			
Income (loss) from continuing operations	\$ (1.02)	\$ 0.87	\$ (1.30)
Net income (loss)	<u>\$ (1.04)</u>	<u>\$ 0.83</u>	<u>\$ (1.31)</u>
Diluted income (loss) per share			
Income (loss) from continuing operations	\$ (1.02)	\$ 0.87	\$ (1.30)
Net income (loss)	<u>\$ (1.04)</u>	<u>\$ 0.83</u>	<u>\$ (1.31)</u>
Weighted average common shares outstanding—basic	19,358	6,316	6,280
Weighted average common shares outstanding—diluted	19,358	6,359	6,280

See accompanying notes to financial statements.

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A.P. PHARMA, INC.
STATEMENTS OF STOCKHOLDERS' EQUITY
(in thousands)

For the Years Ended December 31, 2007, 2006 and 2005	Common Stock		Addi- tional Paid-In Capital	Accu- mulated Deficit	Accu- mulated Other Compre- hensive Income (Loss)	Stock- holders' Equity
	Shares	Amount				
BALANCE, DECEMBER 31, 2004	6,259	\$ 62	\$ 98,927	\$ (84,819)	\$ (16)	\$ 14,154
Net loss and comprehensive loss	—	—	—	(8,210)	—	(8,210)
Common stock issued upon exercise of stock options	4	—	22	—	—	22
Fair value of stock based compensation issued to directors for services and to employees for restricted stock awards	35	1	136	—	—	137
Stock based compensation related to stock options granted to non-employees	—	—	4	—	—	4
Common stock issued to employees under the Employee Stock Purchase Plan	22	—	96	—	—	96
BALANCE, DECEMBER 31, 2005	6,320	63	99,185	(93,029)	(16)	6,203
Comprehensive income:						
Net income	—	—	—	5,266	—	5,266
Net unrealized gain on marketable securities	—	—	—	—	3	3
Comprehensive income						5,269
Common stock issued upon exercise of stock options	3	—	11	—	—	11
Fair value of stock based compensation issued to directors for services and to employees for restricted stock Awards	21	1	134	—	—	135
Stock based compensation related to stock options granted to non-employees	—	—	2	—	—	2
Common stock issued to employees under the Employee Stock Purchase Plan	16	—	67	—	—	67
Stock-based employee compensation related to stock options and ESPP	—	—	372	—	—	372
BALANCE, DECEMBER 31, 2006	6,360	64	99,771	(87,763)	(13)	12,059
Comprehensive loss						
Net loss	—	—	—	(20,163)	—	(20,163)
Net unrealized loss on marketable securities	—	—	—	—	(25)	(25)
Comprehensive loss						(20,188)
Common stock issued in public offering, net of issuance costs	24,394	243	36,955	—	—	37,198
Fair value of stock based compensation issued to directors for restricted stock awards	15	—	99	—	—	99
Common stock issued to employees under the Employee Stock Purchase Plan	22	—	57	—	—	57
Stock-based employee compensation related to stock options and ESPP	—	—	249	—	—	249
BALANCE, DECEMBER 31, 2007	30,791	\$ 307	\$137,131	\$(107,926)	\$ (38)	\$ 29,474

See accompanying notes to financial statements.

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A.P. PHARMA, INC.
STATEMENTS OF CASH FLOWS
(in thousands)

For the Years Ended December 31,	2007	2006	2005
CASH FLOWS FROM OPERATING ACTIVITIES:			
Net income (loss)	\$(20,163)	\$ 5,266	\$(8,210)
Adjustments to reconcile net income (loss) to net cash provided by (used in) operating activities:			
Loss from discontinued operations	342	188	89
Gain on disposition of discontinued operations	(20)	(56)	(62)
Loss on sale of marketable securities	—	1	4
Depreciation and amortization	359	394	387
Stock-based compensation	348	508	140
Amortization of discount and accretion of premium on marketable securities	(70)	(638)	59
Changes in operating assets and liabilities:			
Accounts receivable	(149)	1,369	(83)
Prepaid expenses and other current assets	27	(289)	74
Other long-term assets	18	75	132
Accounts payable	665	158	(83)
Accrued expenses	1,531	1,167	(99)
Deferred revenue	—	1,014	—
Net cash provided by (used in) continuing operating activities	(17,112)	9,157	(7,652)
Cash provided by (used in) discontinued operations	(169)	24	125
Net cash provided by (used in) operating activities	(17,281)	9,181	(7,527)
CASH FLOWS FROM INVESTING ACTIVITIES:			
Purchases of property and equipment	(481)	(187)	(316)
Purchases of marketable securities	—	(14,701)	(8,126)
Maturities of marketable securities	4,875	1,800	7,935
Sales of marketable securities	6,808	5,371	5,595
Net cash provided by (used in) investing activities	11,202	(7,717)	5,088
CASH FLOWS FROM FINANCING ACTIVITIES:			
Proceeds from the issuance of common stock in public offering, net of issuance costs	37,198	—	—
Proceeds from the exercise of common stock options	—	11	22
Proceeds from issuance of shares under the Employee Stock Purchase Plan	58	68	97
Net cash provided by financing activities	37,256	79	119
Net increase (decrease) in cash and cash equivalents	31,177	1,543	(2,320)
Cash and cash equivalents at the beginning of the year	2,333	790	3,110
Cash and cash equivalents at the end of the year	\$ 33,510	\$ 2,333	\$ 790
Supplemental Cash Flow Data:			
Cash paid for interest	\$ —	\$ 15	\$ 4

See accompanying notes to financial statements.

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NOTE 1 BUSINESS

We are a specialty pharmaceutical company focused on developing pharmaceutical products using our proprietary Biochronomer polymer-based drug delivery technology. Our product development philosophy is based on incorporating approved therapeutics into our proprietary bioerodible drug delivery technology to create controlled release pharmaceuticals to improve treatments for diseases or conditions. Our lead product candidate, APF530, is currently in a pivotal Phase III clinical trial for the prevention of acute onset and delayed onset chemotherapy-induced nausea and vomiting, or CINV. We expect to complete enrollment of our pivotal Phase III clinical trial in the second quarter of 2008 and to announce results of that trial in the third quarter of 2008. We expect to submit our new drug application, or NDA, for approval of APF530 in the fourth quarter of 2008.

Our primary focus is to advance our proprietary Biochronomer technology, consisting of bioerodible polymers designed to release drugs over a defined period. We have completed over 100 in vivo and in vitro studies demonstrating that our Biochronomer technology is potentially applicable to a range of therapeutic areas, including prevention of nausea, pain management, control of inflammation and treatment of ophthalmic diseases. We have also completed comprehensive animal and human toxicology studies that have established that our Biochronomer polymers are safe and well tolerated. Furthermore, our Biochronomer technology can be designed to deliver drugs over periods varying from days to several months.

On July 25, 2000, we completed the sale of certain technology rights for our topical pharmaceutical and cosmeceutical product lines and other assets ("cosmeceutical and toiletry business") to RP Scherer Corporation, a subsidiary of Cardinal Health, Inc. As a result of this transaction, our Statements of Operations reflect the payment of certain contractual obligations in the loss from discontinued operations (see Note 9).

On February 13, 2003, we completed the sale of our Analytical Standard division to GFS Chemicals, Inc. ("GFS"), a privately held company based in Columbus, Ohio. In this transaction, we received \$2.1 million and are entitled to receive royalties on sales of Analytical Standards products of 15% for the first year, 10% for the second through fourth years, and 5% for the fifth year. The net present value of the guaranteed minimum royalties is included in the gain on disposition of discontinued operations (see Note 9).

On January 18, 2006 we sold our rights to royalties on sales of Retin-A Micro(R) and Carac (R), effective October 1, 2005, for up to \$30 million. Proceeds of \$25 million were received upon the closing of the transaction and used primarily to fund pivotal clinical development of APF530, our drug candidate for the prevention of both acute and delayed chemotherapy-induced nausea and vomiting. The remaining \$5 million was to be received upon the achievement of certain milestones over the successive four years. Upon attainment of one milestone in 2007, an additional \$2.5 million was received. The remaining \$2.5 million will be paid based on the satisfaction of certain other predetermined milestones over the next two years (see Note 12). In 2007 and 2006, we recognized a gain on the sale of the royalty interest of \$2.5 million and \$23.4 million, respectively.

On October 1, 2006, we entered into an agreement with RHEI Pharmaceuticals, Inc. ("RHEI") in which we granted RHEI exclusive license to develop and market APF530 in Greater China (See Note 12).

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Reverse stock split

On May 23, 2007, we filed a Certificate of Amendment to our Certificate of Incorporation with the Secretary of State of the State of Delaware effecting a 1-for-4 reverse stock split of our common stock. All share and per share amounts for all periods presented have been retroactively restated to reflect the reverse stock split.

NOTE 2 SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Cash Equivalents and Marketable Securities

We consider all debt securities that have original maturities, from the date of purchase, of less than three months to be cash equivalents. Investments with maturities of three months and longer from the date of purchase are classified as marketable securities. Investments consist primarily of government obligations, mortgage backed securities, municipal bonds and corporate debt securities. We account for our marketable securities in accordance with SFAS115, Accounting for Certain Investments in Debt and Equity Securities. We have classified all our investments in certain debt securities as "available-for-sale", and, therefore, they are recorded at fair value with unrealized gains and losses reported as a separate component of stockholders' equity. If the estimated fair value of a security is below its carrying value, we evaluate whether we have the intent and ability to retain our investment for a period of time sufficient to allow for any anticipated recovery in market value and whether evidence indicating that the cost of the investment is recoverable within a reasonable period of time outweighs evidence to the contrary. If the impairment is considered to be other-than-temporary, the security is written down to its estimated fair value. Other-than-temporary declines in estimated fair value of all marketable securities are charged to "other income (loss), net." The cost of all securities sold is based on the specific identification method.

Financial Instruments

The carrying values of the Company's financial instruments, including marketable securities, accounts receivable and accrued liabilities, approximate their respective fair values due to their short maturities.

Allowance for Note Receivable

A 100% allowance of \$394,000 was recorded for a note receivable at such time as management determined that collection was not reasonably assured. Interest income under the terms of the note receivable agreement is recorded when cash is received or collectibility is reasonably assured. The note receivable, net of the related allowance, is included in prepaid expenses and other current assets in the accompanying balance sheets.

Property and Equipment

Property and equipment is stated at cost less accumulated depreciation. Depreciation is computed using the straight-line method over the estimated useful lives of the assets as follows: equipment and machinery, 3 to 5 years; furniture and fixtures, 5 years; and leasehold improvements, over the shorter of the respective lease terms or the respective useful lives of the leasehold improvements.

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Long-Lived Assets

As circumstances dictate, we evaluate whether changes have occurred that would require us to consider whether those assets have been impaired. Recoverability of assets to be held and used is determined by comparing the undiscounted net cash flows of long-lived assets to their respective carrying values. If such assets are considered to be impaired, the amount of impairment to be recognized is measured based on the projected discounted cash flows using an appropriate discount rate.

Stock-Based Compensation

On January 1, 2006, we adopted the provisions of Statement of Financial Accounting Standards No. 123R, "Share-Based Payment" (SFAS 123R). SFAS 123R revised SFAS 123, "Accounting for Stock-Based Compensation" and supersedes APB Opinion No. 25, "Accounting for Stock Issued to Employees." SFAS 123R requires companies to measure and recognize compensation expense for all employee share-based payments at fair value over the service period underlying the arrangement. Accordingly, we are required to record the grant-date fair value of stock options issued to employees and purchase-date fair value of employee stock purchases. We adopted SFAS 123R using the "modified prospective" method, whereby fair value of all previously-granted employee share-based arrangements remaining unvested at January 1, 2006, based on the grant-date value estimated in accordance with the pro forma provisions of SFAS 123, and all grants made on or after January 1, 2006, based on fair value estimated in accordance with SFAS 123(R), have been included in our determination of share-based compensation expense in 2007 and 2006. We have not restated our operating results in prior periods to reflect charges for the fair value of share-based arrangements.

In November 2005, the FASB issued FASB Staff Position No. SFAS 123(R)-3 "Transition Election Related to Accounting for Tax Effects of Share-Based Payment Awards" (FSP 123(R)-3). The Company adopted the alternative transition method provided in the FASB Staff Position for calculating the tax effects of stock-based compensation pursuant to SFAS 123(R) in the fourth quarter of fiscal 2006. The alternative transition method includes simplified methods to establish the beginning balance of the additional paid-in capital pool (APIC pool) related to the tax effects for employee stock-based compensation, and to determine the subsequent impact on the APIC pool and Consolidated Statements of Cash Flows of the tax effects of employee stock-based compensation awards that are outstanding upon adoption of SFAS 123(R). The adoption did not have a material impact on our results of operations and financial condition.

Prior to January 1, 2006 we elected to account for stock-based compensation related to employees using the intrinsic value method. Accordingly, except for stock options issued to non-employees and restricted stock awards to employees and directors, no compensation cost was recognized for our stock option plans and stock purchase plan because stock option exercise prices historically equaled the per share fair values of the underlying common stock. Compensation related to options granted to non-employees was periodically remeasured as earned.

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In accordance with SFAS No. 123, "Accounting for Stock-Based Compensation," as amended by SFAS No. 148, "Accounting for Stock-Based Compensation-Transition and Disclosure," we have provided, below, the pro forma disclosures of the effect on net loss and net loss per share as if SFAS No. 123 had been applied in measuring compensation expense for the year ended December 31, 2005 (in thousands, except for per share amounts) (see Note 7 "Stockholders' Equity"):

Net loss—as reported	\$(8,210)
Add:	
Stock-based employee compensation expense for restricted stock awards	24
Deduct:	
Stock-based employee compensation expense determined under SFAS 123	(360)
Net loss—pro-forma	<u>\$(8,546)</u>
Basic and diluted net loss per common share—as reported	\$ (1.31)
Basic and diluted net loss per common share—pro-forma	\$ (1.36)

Use of Estimates

The preparation of financial statements in conformity with accounting principles generally accepted in the United States of America requires management to make estimates and assumptions that affect the amounts reported in the financial statements and accompanying notes. Estimates were made relating to useful lives of fixed assets, valuation allowances, impairment of assets, accruals for research and development expenses, and share-based costs. Actual results could differ materially from those estimates.

Revenue Recognition

Our revenue arrangements with multiple deliverables are divided into separate units of accounting if certain criteria are met, including whether the delivered item has stand-alone value to the customer and whether there is objective and reliable evidence of the fair value of the undelivered items. The consideration we receive is allocated among the separate units based on their respective fair values, and the applicable revenue recognition criteria are considered separately for each of the separate units. Advance payments received in excess of amounts earned are classified as deferred revenue until earned.

Royalties

Royalties from licenses are based on third-party sales of licensed products or technologies and recorded as earned in accordance with contract terms when third-party results can be reliably determined and collectibility is reasonably assured.

Generally, contractually required minimum royalties are recorded ratably throughout the contractual period. Royalties in excess of minimum royalties are recognized as earned when the related product is shipped to the end customer by our licensees based on information provided to us by our licensees.

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Contract Revenue

Contract revenue relates to research and development arrangements that generally provide for us to invoice research and development fees based on full-time equivalent hours for each project. Revenue from these arrangements is recognized as the related development services are rendered. This revenue approximates the costs incurred.

Research and Development

Research and development consists of costs incurred for Company-sponsored and collaborative research and development expenses. These costs consist primarily of employee salaries and other personnel-related expenses, facility-related expenses, lab consumables, polymer development manufacturing, clinical and pre-clinical related services performed by clinical research organizations, research institutions and other outside service providers.

Expenses related to clinical trials generally are accrued based on the level of patient enrollment and services performed by the clinical research organization or related service provider according to the protocol. We monitor patient enrollment levels and related activity to the extent possible and adjusts estimates accordingly.

Research and development expenses under collaborative agreements approximate the revenue recognized, excluding milestone and up-front payments received under such arrangements.

Net Income (Loss) Per Share

Basic income (loss) per share is estimated based on the weighted-average number of common shares outstanding. Diluted earnings per share is calculated using the weighted-average number of common shares outstanding and other dilutive securities (See Note 8).

Concentrations of Credit Risk

Financial instruments that potentially subject us to concentrations of credit risk consist primarily of cash equivalents, short-term investments and trade accounts receivable. We invest excess cash in a variety of high grade short-term, interest-bearing securities. This diversification of risk is consistent with our policy to ensure safety of principal and maintain liquidity.

Segment and Geographic Information

Our operations are confined to a single business segment, the design and commercialization of polymer technologies for pharmaceutical and other applications. Substantially all of our revenue are derived from customers within the United States.

Recent Accounting Pronouncements

In September 2006, the Financial Accounting Standards Board ("FASB") issued SFAS 157, Fair Value Measurements ("SFAS157"), which establishes a framework for measuring fair value in generally accepted accounting principles, and expands

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NOTES TO FINANCIAL STATEMENTS DECEMBER 31, 2007, 2006 AND 2005

disclosures about fair value measurements. SFAS 157 does not require any new fair value measurements, but provides guidance on how to measure fair value by providing a fair value hierarchy used to classify the source of the information. SFAS 157 is effective for fiscal years beginning after November 15, 2007. However, on December 14, 2007, the FASB issued proposed FSP FAS 157-b which would delay the effective date of SFAS 157 for all nonfinancial assets and nonfinancial liabilities, except those that are recognized or disclosed at fair value in the financial statements on a recurring basis (at least annually). This proposed FSP partially defers the effective date of Statement 157 to fiscal years beginning after November 15, 2008, and interim periods within those fiscal years for items within the scope of this FSP. Effective for 2008 we will adopt SFAS 157 except as it applies to those nonfinancial assets and nonfinancial liabilities as noted in FSP FAS 157-b. The partial adoption of SFAS 157 will not have a material impact on our consolidated financial position, results of operations or cash flows.

In February 2007, the FASB issued SFAS No. 159, The Fair Value Option for Financial Assets and Financial Liabilities- including an amendment of FASB Statement No. 115 ("SFAS 159"), which allows an entity to choose to measure certain financial instruments and liabilities at fair value. Subsequent measurements for the financial instruments and liabilities an entity elects to fair value will be recognized in earnings. SFAS 159 also establishes additional requirements. SFAS 159 is effective for us beginning January 1, 2008. We have not decided if we will choose to measure eligible financial assets and liabilities at fair value.

In December 2007, the FASB issued SFAS 141 (revised 2007), Business Combinations ("SFAS141R"). SFAS 141R establishes principles and requirements for how an acquirer recognizes and measures in its financial statements the identifiable assets acquired, the liabilities assumed, any noncontrolling interest of the acquiree and the goodwill acquired. SFAS 141R also establishes disclosure requirements to enable the evaluation of the nature and financial effects of the business combination. This statement is effective for us beginning January 1, 2009. We will assess the potential impact of the adoption of SFAS 141R if and when a future acquisition occurs.

On June 27, 2007, EITF 07-3, Accounting for Advance Payments for Goods and Services to be Received for Use in Future Research and Development Activities, was ratified which requires companies to defer and capitalize prepaid nonrefundable research and development payments to third parties until the research and development activities are performed or the services are provided, subject to an assessment of recoverability. The guidance is effective for new contracts entered into in fiscal years beginning after December 15, 2007, including interim periods within those fiscal years. We do not expect that the adoption of this pronouncement will have a material effect on our financial position or results of operations.

NOTE 3 CASH EQUIVALENTS AND MARKETABLE SECURITIES

We consider our investments in debt securities as available-for-sale and, accordingly, we have recorded these investments at fair value. Our marketable securities as of December 31, 2007 consist of highly liquid short term money market funds and asset backed securities with the underlying assets consisting of high quality pools of residential mortgages. All the securities retained AAA ratings as of December 31, 2007. We assessed the decline in the fair value of the asset-backed securities of \$38,000 as of December 31, 2007 to be temporary. There were no realized gains or losses for the year ended December 31, 2007. Realized losses totaled \$1,000 and \$4,000 for the years ended December 31, 2006 and 2005, respectively.

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At December 31, 2007 and 2006, the amortized cost and estimated fair value of investments in debt securities and cash equivalents are set forth in the tables below:

December 31, 2007 (in thousands)	Cost	Unrealized Gains	Unrealized Losses	Estimated Fair Value
Available-for-sale:				
Asset-backed securities	\$ 1,590	\$ —	\$ (38)	\$ 1,552
Money market fund	32,854	—	—	32,854
Total available-for-sale	\$34,444	\$ —	\$ (38)	\$ 34,406

December 31, 2006 (in thousands)	Cost	Unrealized Gains	Unrealized Losses	Estimated Fair Value
Available-for-sale:				
Corporate debt securities	\$ 4,293	\$ 1	\$ (4)	\$ 4,290
Asset-backed securities	3,992	—	—	3,992
Government debt securities	4,813	—	(10)	4,803
Money market funds	1,876	—	—	1,876
Other debt securities	104	—	—	104
Total available-for-sale	\$15,078	\$ 1	\$ (14)	\$ 15,065

The table below summarizes fair value disclosures at December 31 (in thousands):

	2007		2006	
	Cost	Estimated Fair Value	Cost	Estimated Fair Value
Cash equivalents	\$32,854	\$ 32,854	\$ 1,876	\$ 1,876
Marketable securities	1,590	1,552	13,202	13,189
Totals	\$34,444	\$ 34,406	\$15,078	\$ 15,065

The cost and estimated fair value of available-for-sale debt securities as of December 31, 2007, by contractual maturity, follows (in thousands):

	Cost	Estimated Fair Value
Available-for-sale:		
Due in one year or less	\$33,444	\$ 33,430
Due in more than one year but less than 5 years	1,000	976
Total available-for sale	\$34,444	\$ 34,406

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NOTE 4 PROPERTY AND EQUIPMENT

Property and equipment consist of the following:

December 31, (in thousands)	2007	2006
Leasehold improvements	\$ 1,338	\$ 1,359
Furniture and equipment	3,126	2,771
Total property and equipment	4,464	4,130
Accumulated depreciation and amortization	(3,385)	(3,172)
Property and equipment, net	\$ 1,079	\$ 958

Depreciation expense amounted to \$359,000, \$394,000 and \$387,000 for the years ended December 31, 2007, 2006 and 2005, respectively.

NOTE 5 ACCRUED EXPENSES

Accrued expenses consist of the following:

December 31, (in thousands)	2007	2006
Professional fees	\$ 268	\$ 228
Accrued salaries	815	294
Accrued bonus	347	250
Clinical studies	2,632	1,987
Other	285	326
Total	\$ 4,347	\$ 3,085

NOTE 6 COMMITMENTS AND CONTINGENCIES

We lease office, warehouse and laboratory space and certain office equipment under operating lease arrangements which expire in 2011. Our future minimum lease payments under these noncancelable operating leases for facilities and equipment are as follows (in thousands):

Year Ending December 31,	Minimum Payments
2008	\$ 545
2009	547
2010	558
2011	126
	\$ 1,776

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Total rental expense for facilities and equipment was \$550,000, \$500,000 and \$492,000 for 2007, 2006 and 2005, respectively.

As part of the sale of our cosmeceutical and toiletry business to RP Scherer Corporation in July 2000, we guaranteed a minimum gross profit percentage on RP Scherer's sales of products to Ortho Neutrogena and Dermik (See Note 9 "Discontinued Operations").

As permitted under Delaware law and in accordance with our bylaws, we indemnify our officers and directors for certain events or occurrences while the officer or director is or was serving at the Company's request in such capacity. The term of the indemnification period is for the officer's or director's lifetime. The maximum amount of potential future indemnification is unlimited; however, we have a director or officer insurance policy that limits our exposure and may enable us to recover a portion of any future amounts paid. We believe the fair value of these indemnification agreements is minimal. Accordingly, we have not recorded any liabilities for these agreements as of December 31, 2007.

In the normal course of business, we provide indemnifications of varying scope under our agreements with other companies, typically our clinical research organizations, investigators, clinical sites, suppliers and others. Pursuant to these agreements, we generally indemnify, hold harmless, and agree to reimburse the indemnified parties for losses suffered or incurred by the indemnified parties in connection with use or testing of our products or product candidates or with any U.S. patent or any copyright or other intellectual property infringement claims by any third party with respect to our products. The term of these indemnification agreements is generally perpetual. The potential future payments we could be required to make under these indemnification agreements is unlimited. Historically, costs related to these indemnification provisions have been immaterial. We also maintain various liability insurance policies that limit our exposure. As a result, we believe the fair value of these indemnification agreements is minimal. Accordingly, we have not recorded any liabilities for these agreements as of December 31, 2007.

NOTE 7 STOCKHOLDERS' EQUITY

On June 19, 2007, we sold 24,393,939 shares of our common stock in a public offering at a price of \$1.65 per share, for net proceeds of approximately \$37.2 million after deducting underwriting fees and costs associated with the offering. The shares were offered under our registration statement on Form S-1, as amended (Registration No. 333-14-1918)

Reverse stock split

On May 23, 2007, we filed a Certificate of Amendment to our Certificate of Incorporation with the Secretary of State of the State of Delaware effecting a 1-for-4 reverse stock split of our common stock. All share and per share amounts for all periods presented have been retroactively restated to reflect the reverse stock split.

Shareholders' Rights Plan

On December 18, 2006, we entered into a Preferred Shares Rights Agreement. As part of this agreement, preferred stock purchase rights ("the rights") were distributed to stockholders of record as of January 2, 2007 (and to each person who acquires our common stock after that date unless determined otherwise by the board of directors) at the rate of one right for

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each share of common stock held. The rights become exercisable only upon the acquisition, or the acquisition of the right to acquire, by a person or group of affiliated or associated persons, of 20% or more of the outstanding shares of the Company's common stock. Once exercisable, each right entitles the holder to purchase, at a price of \$44.00, one one-thousandth of a share of Series A Participating Preferred Stock. For a limited period of time following the announcement of any such acquisition or offer, the rights are redeemable by the Company at a price of \$0.01 per right. If the rights are not redeemed or exchanged, each right will then entitle the holder to receive, upon exercise of such right, a number of shares of the Company's common stock having a then current value equal to two times the purchase price of such right. Similarly, if the rights are not redeemed or exchanged and following the acquisition of 20% or more of the outstanding shares of the Company's common stock by a person or group of affiliated or associated persons, (i) the Company consolidates with or merges into another entity, (ii) another entity consolidates with or merges into the Company or (iii) the Company sells or otherwise transfers 50% or more of its consolidated assets or earning power, each right will then entitle the holder to receive, upon exercise of such right, a number of shares of common stock of the acquiring company having a then current value equal to two times the purchase price. For a limited period of time after the exercisability of the rights, each right, at the discretion of the board of directors, may be exercised for such number of shares of common stock determined in accordance with the rights agreement. The Company has initially reserved 200,000 shares of preferred stock pursuant to the exercise of these rights. These rights expire on December 31, 2016.

Stock-Based Compensation Plans

We have two types of stock-based compensation plans, which consist of a stock purchase plan and three stock option plans.

In 1997, our stockholders approved our 1997 Employee Stock Purchase Plan (the "Plan"). In December 2007 the stockholders authorized the increase in shares reserved for issuance under the Plan by 100,000 to 300,000 to our employees, nearly all of whom are eligible to participate. Under the terms of the Plan, employees can elect to have up to a maximum of 10 percent of their base earnings withheld to purchase our common stock. The purchase price of the stock is 85 percent of the lower of the closing prices for our common stock on: (i) the first trading day in the enrollment period, as defined in the Plan, in which the purchase is made, or (ii) the purchase date. The length of the enrollment period may not exceed a maximum of 24 months. Enrollment dates are the first business day of May and November and the first enrollment date was April 30, 1997. Approximately 43 percent of eligible employees participated in the Plan in 2007. Under the Plan, we issued 22,860 shares in 2007 and 16,175 shares in 2006. The weighted average fair value of purchase rights granted during 2007 and 2006 was \$1.82 and \$2.60, respectively. The weighted average exercise price of the purchase rights exercised during 2007 and 2006 was \$2.52 and \$4.20, respectively. We had 133,160 and 55,846 shares reserved for issuance under the Plan at December 31, 2007 and 2006, respectively.

We have three stock option plans currently from which we can grant options to employees, officers, directors and consultants. In December 2007 the stockholders approved our 2007 Equity Incentive Plan (the "2007 Plan"). The Company is authorized to issue up to 3,000,000 shares under the 2007 plan. We also grant stock options under the 2002 Stock Incentive Plan (the "2002 Plan") and the Non-Qualified Stock Plan. The Company is authorized to issue up to 425,000 shares under the 2002 Plan, 100,000 of which were approved by stockholders in May 2006, and 1,062,500 shares under the Non-Qualified Stock Plan, an inducement option plan, 1,000,000 of which were added to the plan by the board in September 2007. The options to purchase our common stock are granted with an exercise price which equals fair market value of the underlying common stock on the grant dates, and expire no later than ten years from the date of grant. The options are exercisable in accordance with vesting schedules that generally provide for them to be fully vested and exercisable four years after the date of grant. Any

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shares that are issuable upon exercise of options granted under the 2002 Plan and the Non-Qualified Stock Plan that expire or become unexercisable for any reason without having been exercised in full are available for future grant and issuance under the same stock option plan.

We adopted SFAS 123R, *Share-Based Payment*, on January 1, 2006. Accordingly, we recorded the grant-date or purchase-date fair value of stock options and purchase rights issued to employees in conjunction with our stock option plans or employee stock purchase plan. We have also recorded compensation expense for stock options issued to non-employees and restricted stock awards to employees and directors.

The fair value of each employee and director grant of options to purchase common stock and purchase rights under the employee stock purchase plan is estimated on the date of the grant using the Black-Scholes option-pricing model assuming no dividends and the following weighted-average assumptions:

	2007	2006
Expected term (years):		
Stock options	6.25	6.25
Employee Stock Purchase Plan	1.25	1.25
Risk-free interest rate:		
Stock options	4.3%	4.8%
Employee Stock Purchase Plan	3.87%	4.9%
Volatility:		
Stock options	240%	240%
Employee Stock Purchase Plan	57%	82%

The expected term of options granted is based on the simplified method provided in Staff Accounting Bulletin No. 107 for "plain vanilla options" and the expected term for the employee stock purchase plan is based on the weighted -average purchase period of the plan. The expected volatility is based on the Company's historical stock prices and the estimated forfeiture rate of the options is based on historical data.

The Black-Scholes option valuation model requires the input of highly subjective assumptions, including the expected life of the award and stock price volatility. The assumptions listed above represent management's best estimates, but these estimates involve inherent uncertainties and the application of management judgment. As a result, if other assumptions had been used, our recorded and pro forma stock based compensation expense could have been materially different.

The SFAS 123R share-based compensation expenses recorded for awards granted under the stock option plans and employee stock purchase plan were approximately \$249,000 and \$372,000, net of estimated forfeitures, for the years ended December 31, 2007 and 2006, respectively. The share-based compensation expense of \$106,000 and \$143,000 was recorded in research and development expense and general and administrative expense for the year ended December 31, 2007, respectively. The share-based compensation expense of \$134,000 and \$238,000 was recorded in research and development and general and administrative expense for the year ended December 31, 2006, respectively. No tax benefit was recognized related to share-based compensation expense since we have incurred operating losses and we have established a full valuation allowance to offset all the potential tax benefits associated with our deferred tax assets.

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We granted options to purchase common stock to consultants from time to time in exchange for services rendered and these options vest over a period of two to four years. No options were granted to consultants in 2007 and 2006. We recorded compensation expense related to option grants to consultants of approximately \$2,000 and \$4,000 in 2006 and 2005, respectively, which represents the fair market value of the portion of the awards that vested during 2006 and 2005. The unvested shares held by consultants have been revalued using the Black-Scholes option pricing model at the end of each accounting period. As of December 31, 2007, all shares held by consultants have been vested.

The following table summarizes option activity for 2007, 2006 and 2005:

	2007				2006		2005	
	Shares	Weighted Average Exercise Price	Weighted Average Remaining Contractual Term	Aggregate Intrinsic Value as of December 31, 2007	Shares	Weighted Average Exercise Price	Shares	Weighted Average Exercise Price
Outstanding at beginning of year	532,308	\$ 10.68			541,492	\$ 13.60	551,409	\$ 14.40
Granted	93,757	3.58			109,985	5.72	45,500	6.44
Exercised	—	—			(2,402)	4.64	(3,764)	5.80
Expired or Forfeited	(75,682)	16.45			(116,767)	20.92	(51,653)	16.32
Outstanding at end of year	<u>550,383</u>	8.57	5.67	\$ —	<u>532,308</u>	10.68	<u>541,492</u>	13.60
Options exercisable at year end	416,599		4.63	\$ —	415,721		457,208	
Shares available for future grant at year end	4,064,444				137,321		134,685	
Weighted-average fair value of stock options granted during the year		\$ 3.57				\$ 5.72		\$ 4.20

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As of December 31, 2007 there was approximately \$311,516 of total unrecognized compensation expense related to unvested stock options. This expense is expected to be recognized over a weighted-average period of 2.61 years.

The following table summarizes information about stock options outstanding at December 31, 2007:

Range of Exercise Prices	OPTIONS OUTSTANDING			OPTIONS EXERCISABLE	
	Number Outstanding	Weighted Average Remaining Contractual Life (years)	Weighted Average Exercise Price	Number Exercisable	Weighted Average Exercise Price
\$1.70-\$4.84	114,768	8.3	\$ 3.40	48,910	\$ 4.38
\$5.00-\$6.40	146,278	7.6	5.64	84,898	5.67
\$6.52-\$9.80	118,374	5.4	8.55	111,828	8.63
\$10.00-\$13.38	110,838	3.2	11.61	110,838	11.61
\$13.75-\$27.25	60,125	1.0	20.02	60,125	20.02
\$1.70-\$27.25	<u>550,383</u>	5.7	8.57	<u>416,599</u>	9.97

In 2007, we granted 15,000 shares of restricted stock awards under the 2002 Plan to directors. In 2006, we granted 10,000 shares of restricted stock awards under the 2002 Plan to employees and directors. As of December 31, 2007, we had a total of 33,750 shares of unvested restricted stock awards granted to employees and directors. The compensation cost that has been expensed in the statements of operations for the restricted stock awards issued to employees and directors was \$99,000 and \$57,000 for 2007 and 2006, respectively. Also in 2006, we granted our non-employee directors 11,000 shares representing directors' fees, and recorded \$77,000 of expense in our statement of operations.

The following table summarizes unvested restricted stock awards activity for the year ended December 31, 2007.

	Shares	Weighted Average Grant Date Fair Value
Outstanding at beginning of year	27,500	\$ 6.70
Awarded	15,000	2.99
Released	(8,750)	6.52
Forfeited	0	0
Outstanding at end of year	<u>33,750</u>	<u>\$ 5.10</u>

The table regarding the net loss and net loss per share included in Note 2, "Summary of Significant Accounting Policies," prepared in accordance with SFAS 123 has been determined as if we had accounted for our employee stock options and employee stock purchase plan under the fair value method prescribed by SFAS 123.

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NOTES TO FINANCIAL STATEMENTS
DECEMBER 31, 2007, 2006 AND 2005

Fair values of awards granted under the stock option plans and employee stock purchase plan prior to January 1, 2006 were estimated at grant or purchase dates using a Black-Scholes option pricing model. For pro forma disclosure, the estimated fair value of the options is amortized to expense over the vesting period of the options using the straight line method. The multiple option approach is used to value the purchase rights granted under the employee stock purchase plan. We used the following assumptions:

Year Ended December 31,	2005
Expected term (in years):	
Stock options	5
Employee Stock Purchase Plan	0.5 - 2
Risk-free interest rate:	
Stock options	4.0%
Employee Stock Purchase Plan	3.15% - 3.63%
Volatility	
Stock options	78%
Employee Stock Purchase Plan	94% - 105%
Expected dividend yield	0%

NOTE 8 NET INCOME (LOSS) PER SHARE

The following is a reconciliation of the numerators and denominators of the basic and diluted earnings per share computations (in thousands).

	2006
Numerator:	
Net income	\$5,266
Denominator:	
Weighted-average shares outstanding used to compute basic earnings per share	6,316
Effect of dilutive stock options, employee stock purchase and restricted stock awards	43
Weighted-average shares outstanding and dilutive securities used to compute diluted earnings per share	6,359

The following options and unvested restricted stock awards were outstanding as of December 31, 2007 and 2005, but were not included in the computation of diluted net loss per share since inclusion of these potentially dilutive securities would have been anti-dilutive for the periods presented (in thousands):

	2007	2005
Number of options outstanding	550	541
Number of unvested restricted stock awards outstanding	34	19

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NOTES TO FINANCIAL STATEMENTS
DECEMBER 31, 2007, 2006 AND 2005

NOTE 9 DISCONTINUED OPERATIONS

We completed the sale of certain assets of our Analytical Standards division as well as certain technology rights for our topical pharmaceutical and cosmeceutical product lines and other assets ("cosmeceutical and toiletry business") in February 2003 and July 2000, respectively.

The Analytical Standards division and cosmeceutical and toiletry business are reported as discontinued operations for all periods presented in the accompanying Statements of Operations.

Loss from discontinued operations represents primarily the loss attributable to changes in estimates of our cosmeceutical and toiletry business that was sold to RP Scherer on July 25, 2000, as follows (in thousands):

For the years ended December 31,	2007	2006	2005
Cosmeceutical and Toiletry Business			
Change in estimates for severance costs and guarantees	<u>\$(342)</u>	<u>\$(188)</u>	<u>\$(89)</u>

There was no revenue relating to discontinued operations for the years ended December 31, 2007, 2006 and 2005.

The following table sets forth the Company's basic and diluted income (loss) per common share from discontinued operations excluding the gain on sale for the years ended December 31, 2007, 2006 and 2005:

For the years ended December 31,	2007	2006	2005
Basic income (loss) per common share from discontinued operations	<u>\$(0.02)</u>	<u>\$(0.03)</u>	<u>\$(0.01)</u>
Diluted income (loss) per common share from discontinued operations	<u>\$(0.02)</u>	<u>\$(0.03)</u>	<u>\$(0.01)</u>

The gain on disposition of discontinued operations recorded in 2007 of \$20,000 compared to \$56,000 in 2006 and \$62,000 in 2005 relates to the gain on the sale of our Analytical Standards division as measured by royalty receipts in excess of guaranteed minimums.

As of December 31, 2007, liabilities related to the discontinued operations in the amount of \$423,000 include severance costs and accruals for gross profit guarantees. These liabilities are reported as accrued disposition costs in the accompanying balance sheets.

The cash used in discontinued operations of \$169,000 in 2007 relates to two payments made for the Gross Profit Guaranty, partially offset by the royalties received from GFS Chemicals, Inc. ("GFS"), a privately held company based in Columbus, Ohio, from sales of Analytical Standards products. The cash provided by discontinued operations of \$24,000 and \$125,000 in 2006 and 2005, respectively, relates to the royalties received from GFS from sales of Analytical Standards products, partially offset by severance payments made to former employees who were terminated as a result of the sale of the Analytical Standards division and a payment relating to the Gross Profit Guaranty.

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NOTES TO FINANCIAL STATEMENTS
DECEMBER 31, 2007, 2006 AND 2005

Analytical Standards Division

On February 13, 2003, we completed the sale of our Analytical Standards division to GFS. In this transaction, we received \$2.1 million on closing and are entitled to receive royalties on sales of Analytical Standards products for a period of five years following the sale at rates ranging from 5% to 15%. The net present value of the guaranteed minimum royalties is included in the gain on disposition of discontinued operations.

As a result of the sale of the Analytical Standards division, we recorded severance charges of \$210,000 in the year ended December 31, 2003 as a partial offset to the gain on disposition of the Analytical Standards division. An increase to the estimated severance charges of \$1,000 was recorded in 2007. Approximately \$231,000 of these severance charges has been paid through December 31, 2007.

Cosmeceutical and Toiletry Business

On July 25, 2000, we completed the sale of certain technology rights for our topical pharmaceutical and cosmeceutical product lines and other assets ("cosmeceutical and toiletry business") to RP Scherer Corporation, a subsidiary of Cardinal Health, Inc.

Under the terms of the agreement with RP Scherer, we guaranteed a minimum gross profit percentage on RP Scherer's combined sales of products to Ortho Neutrogena and Dermik ("Gross Profit Guaranty"). The guaranty period commenced on July 1, 2000 and ends on the earlier of July 1, 2010 or the end of two consecutive guaranty periods where the combined gross profit on sales to Ortho and Dermik equals or exceeds the guaranteed gross profit (the "two period test"). The Gross Profit Guaranty expense totaled \$944,000 for the first seven guaranty years and in those years profits did not meet the two period test. Effective March 2007, in conjunction with a sale of assets by RP Scherer's successor company to an Amcol International subsidiary ("Amcol"), a new agreement was signed between us and Amcol to provide continuity of product supply to Ortho and Dermik. This new agreement potentially extends the gross profit guaranty period an additional three years to July 1, 2013 unless it is terminated earlier with the two period test. Therefore, we expect the annual Gross Profit Guaranty payment to range from \$100,000 to \$200,000 for the remainder of the guaranty period. As there is no minimum amount of Gross Profit Guaranty due, no accrual for the guaranty is estimable for future years. A liability of \$420,000 related to the current amount due under gross profit guarantees is included in accrued disposition costs as of December 31, 2007.

NOTE 10 DEFINED CONTRIBUTION PLAN

We have a defined contribution plan (401k) covering substantially all of our employees. In the past three calendar years, we made matching cash contributions equal to 50% of each participant's contribution during the plan year up to a maximum amount equal to the lesser of 3% of each participant's annual compensation or \$6,750, \$6,600 and \$6,300 for 2007, 2006 and 2005, respectively, and such amounts were recorded as expense in the corresponding years. We may also contribute additional discretionary amounts to the defined contribution plan as we may determine. For the years ended December 31, 2007, 2006 and 2005, we contributed to the plan approximately \$84,000, \$85,000 and \$73,000, respectively. No discretionary contributions have been made to the plan since its inception.

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NOTES TO FINANCIAL STATEMENTS
DECEMBER 31, 2007, 2006 AND 2005

NOTE 11 INCOME TAXES

There was no provision for income taxes in 2007 and 2005 because we have incurred operating losses. In 2006, we had a provision of \$119,000 reflecting alternative minimum tax on the gain on the sale of our right to receive royalties on the sales of Retin A Micro and Carac (see Note 12 for details). Deferred income taxes reflect the net tax effects of net operating loss and tax credit carryovers and temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes. Significant components of our deferred tax assets are as follows (in thousands):

December 31,	2007	2006
Deferred Tax Assets:		
Net operating loss carryforwards	\$ 28,840	\$ 22,840
Research credits	3,500	2,700
Capitalized research expenses	100	100
Other	1,240	600
Total deferred tax assets	33,680	26,240
Valuation allowance	(33,680)	(26,240)
Net deferred tax assets	\$ —	\$ —

Realization of deferred tax assets is dependent upon future earnings, if any, the timing and amount of which are uncertain. Accordingly, the net deferred tax assets have been fully offset by a valuation allowance. The valuation allowance increased by \$7.44 million, decreased by \$1.9 million and increased by \$600,000 during 2007, 2006 and 2005, respectively. In accordance with SFAS 123(R), we have excluded certain tax benefits resulting from employee stock option exercises from our deferred tax asset at December 31, 2007 and 2006. In the future, if and when such tax benefits are ultimately realized, the amount of the excess tax benefits will be credited to additional paid-in capital in our statements of stockholders' equity.

As of December 31, 2007, we had federal and California net operating loss carryforwards of \$81.5 million and \$38.5 million, respectively, and federal and California research and development tax credit carryforwards of \$1.9 million and 2.4 million, respectively. Approximately \$2.9 million of federal and state net operating loss carryforwards represent stock option deductions arising from activity under our stock option plan, the benefits of which will increase additional paid-in capital, when realized.

The federal and state net operating losses and the federal research and development credit carryforwards expire at various dates beginning in the years 2008 through 2027, if not utilized. The Internal Revenue Code of 1986, as amended, contains provision that may limit the net operating loss and tax credit carry forwards available for use in any given period upon the occurrence of certain events, including a significant change in ownership interests. We recently conducted an analysis of our stock ownership to determine whether Section 382 would limit the use of these tax attributes. Based on that analysis, we believe our net operating losses and tax attributes are not subject to the limitation under this section of the Internal Revenue Code. However, utilization of our net operating loss and research and development credit carryforwards may still be subject to substantial annual limitations due to ownership change limitations provided by the Internal Revenue Code and similar state provisions for ownership changes after December 31, 2007. Such an annual limitation could result in the expiration of the net operating loss and research and development credit carryforwards available as of December 31, 2007 before utilization.

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NOTES TO FINANCIAL STATEMENTS DECEMBER 31, 2007, 2006 AND 2005

We adopted the provisions of FIN 48 as of January 1, 2007, which resulted in the reversal of certain fully reserved deferred tax assets totaling \$1.02 million and the related valuation allowance. The following is a tabular reconciliation of the total amount of unrecognized tax benefits for the year ended December 31, 2007 (in thousands):

Unrecognized tax benefit at January 1, 2007	\$ 1,022
Gross increases – tax positions in current period	—
Gross decreases – tax positions in current period	—
Unrecognized tax benefit at December 31, 2007	<u>\$ 1,022</u>

The unrecognized tax benefit, if recognized in full, would reduce our income tax expense by \$1.02 million and result in adjustments to other tax accounts, primarily deferred taxes. We do not currently anticipate any significant changes to the unrecognized tax benefits within 12 months of December 31, 2007. Our policy is to recognize interest and penalties accrued on any unrecognized tax benefits as a component of tax expense. To date, we have not used the unrecognized tax benefits to reduce any of our past tax obligations. As a result, we had no accrual for the payment of interest and penalties related to the unrecognized tax benefits at January 1, 2007 nor was any amount of interest and penalties recognized during the year ended December 31, 2007. As of December 31, 2007, our tax returns were subject to future examination in the U.S. federal and state tax jurisdictions for the tax years 1993 through 2006, due to net operating losses and research credits that are being carried forward.

NOTE 12 SIGNIFICANT AGREEMENTS

Paul Royalty Fund

On January 18, 2006 we sold our rights to royalties on sales of Retin-A Micro and Carac effective October 1, 2005 to an affiliate of the Paul Royalty Fund for up to \$30 million. Proceeds of \$25 million were received upon the closing of the transaction and used primarily to fund pivotal clinical development of APF530, our drug candidate for the prevention of both acute and delayed chemotherapy-induced nausea and vomiting. The remaining \$5 million was to be received upon the achievement of certain milestones over the successive four years. Upon attainment of one milestone in 2007, an additional \$2.5 million was received. The remaining \$2.5 million will be paid based on the satisfaction of certain other predetermined milestones over the next two years.

RHEI Pharmaceuticals, Inc.

On October 1, 2006, we entered into an agreement with RHEI in which we granted RHEI exclusive license to develop and market APF530 in Greater China. We received a license fee on the signing of the contract, which has been recorded as deferred revenue on the Balance Sheet, and will receive additional milestone payments upon the achievement of certain regulatory approvals. Furthermore, we will receive royalties on future sales of APF530 in Greater China.

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NOTES TO FINANCIAL STATEMENTS
DECEMBER 31, 2007, 2006 AND 2005

Animal Health Company

On January 22, 2007 we entered a collaborative research and development agreement with a major animal health company to develop a product providing the slow release of an undisclosed opiate for use in the control of pain for dogs and cats. Under the terms of the agreement, we will be reimbursed for certain costs incurred by us and will receive milestone payments upon the achievement of certain development milestones. The animal health company will retain rights for use of the product in its field, paying us a royalty, while we retain rights to the same technology for potential use for humans.

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DECEMBER 31, 2007, 2006 AND 2005**NOTE 13 QUARTERLY RESULTS OF OPERATIONS (UNAUDITED)**

The following table presents summarized unaudited results of operations for each of our quarters in the years ended December 31, 2007 and 2006.

Quarterly Results of Operations
(in thousands, except per share data)
(unaudited)

	First Quarter	Second Quarter	Third Quarter	Fourth Quarter
Year Ended December 31, 2007				
Total revenue	\$ —	\$ 160	\$ 121	\$ 131
Operating expenses	6,105	4,635	5,357	7,948
Interest and other, net	148	2,660	557	468
Income (loss) from continuing operations	(5,957)	(1,815)	(4,679)	(7,349)
Discontinued operations	(8)	40	1	(356)
Net income (loss) before income taxes	(5,965)	(1,775)	(4,678)	(7,705)
Provision for income taxes	(36)	—	(8)	4
Net income (loss)	(6,001)	(1,775)	(4,686)	(7,701)
Basic income (loss) per common share:				
Income (loss) from continuing operations	(0.94)	(0.19)	(0.15)	(0.24)
Net income (loss)	(0.95)	(0.19)	(0.15)	(0.25)
Diluted income (loss) per common share:				
Income (loss) from continuing operations	(0.94)	(0.19)	(0.15)	(0.24)
Net income (loss)	(0.95)	(0.19)	(0.15)	(0.25)

	First Quarter	Second Quarter	Third Quarter	Fourth Quarter
Year Ended December 31, 2006				
Total revenue	\$ —	\$ —	\$ —	\$ —
Operating expenses	4,401	4,790	3,948	5,725
Interest and other, net	23,693	274	195	219
Income (loss) from continuing operations	19,292	(4,516)	(3,753)	(5,506)
Discontinued operations	7	(34)	(64)	(41)
Net income (loss) before income taxes	19,299	(4,550)	(3,817)	(5,547)
Provision for income taxes	—	—	—	(119)
Net income (loss)	19,299	(4,550)	(3,817)	(5,666)
Basic income (loss) per common share:				
Income (loss) from continuing operations	3.06	(0.72)	(0.60)	(0.90)
Net income (loss)	3.06	(0.72)	(0.60)	(0.90)
Diluted income (loss) per common share:				
Income (loss) from continuing operations	3.03	(0.72)	(0.60)	(0.90)
Net income (loss)	3.03	(0.72)	(0.60)	(0.90)

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ITEM 9. CHANGES IN AND DISAGREEMENTS WITH ACCOUNTANTS ON ACCOUNTING AND FINANCIAL DISCLOSURE

None.

ITEM 9A. CONTROLS AND PROCEDURES

Evaluation of Disclosure Controls and Procedures

Based on an evaluation as of the end of the period covered by this report, our chief executive officer and chief financial officer has concluded that our disclosure controls and procedures (as defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act were effective as of the end of the period covered by this report to ensure that information that we are required to disclose in reports that we file or submit under the Exchange Act is recorded, processed, summarized and reported within the time periods specified in SEC rules and forms.

Our disclosure controls and procedures are designed to provide reasonable assurance of achieving their objectives, and our chief executive officer and chief financial officer has concluded that these controls and procedures are effective at the “reasonable assurance” level. We believe that a control system, no matter how well designed and operated, cannot provide absolute assurance that the objectives of the control system are met, and no evaluation of controls can provide absolute assurance that all control issues and instances of fraud, if any, within a company have been detected.

Management’s Report on Internal Control Over Financial Reporting

Our management is responsible for establishing and maintaining adequate internal control over financial reporting. A company’s internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles.

There are inherent limitations in the effectiveness of any system of internal control, including the possibility of human error and the circumvention or overriding of controls. Accordingly, even effective internal controls can provide only reasonable assurances with respect to financial statement preparation. Further, because of changes in conditions, the effectiveness of internal control may vary over time.

Our management assessed the effectiveness of our internal control over financial reporting as of December 31, 2007. In making this assessment, management used the criteria set forth by the Committee of Sponsoring Organizations (COSO) of the Treadway Commission in *Internal Control—Integrated Framework*. Based on our assessment using the COSO criteria, management concluded that, as of December 31, 2007, our internal control over financial reporting is effective.

This annual report does not include an attestation report of our independent registered public accounting firm regarding internal control over financial reporting. Our internal control over financial reporting was not subject to attestation by our independent registered public accounting firm pursuant to temporary rules of the SEC that permit us to provide only management’s report in this annual report.

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Changes in Internal Controls Over Financial Reporting

There were no changes in our internal controls over financial reporting that occurred during our most recent fiscal quarter that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

ITEM 9B. OTHER INFORMATION

None.

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PART III

ITEM 10. DIRECTORS, EXECUTIVE OFFICERS, AND CORPORATE GOVERNANCE

We have incorporated by reference the information set forth under the captions "Election of Directors", "Executive Officers", "Corporate Governance" and "Compliance with Section 16(a) of the Securities Exchange Act" of the Company's Proxy Statement (the "Proxy Statement") for the 2008 annual meeting of shareholders.

Code of Ethics

We have adopted a Code of Ethics that applies to all of our directors, officers and employees. The Code of Ethics is posted on our website at <http://www.appharma.com> under the caption Investor Relations.

ITEM 11. EXECUTIVE COMPENSATION

We have incorporated by reference the information set forth under the captions "Executive Compensation" and "Director Compensation" of the Proxy Statement.

ITEM 12. SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT AND RELATED STOCKHOLDER MATTERS

We have incorporated by reference the information set forth under the captions "Common Stock Ownership of Certain Beneficial Owners and Management" and "Equity Compensation Plan Information" of the Proxy Statement.

ITEM 13. CERTAIN RELATIONSHIPS AND RELATED TRANSACTIONS AND DIRECTOR INDEPENDENCE

We have incorporated by reference the information set forth under the captions "Related Party Transactions" and "Corporate Governance" of the Proxy Statement.

ITEM 14. PRINCIPAL ACCOUNTANT FEES AND SERVICES

We have incorporated by reference the information set forth under the captions "Report of the Audit Committee," "Ratification of Independent Registered Public Accountants" and "Auditors Fees & Services" of the Proxy Statement.

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PART IV

ITEM 15. EXHIBITS AND FINANCIAL STATEMENT SCHEDULES

(a) 1. Financial Statements

The financial statements and supplementary data set forth in Part II of the 10-K Annual Report are included herein.

2. Financial Statement Schedules

Schedule II Valuation Accounts

All other schedules have been omitted because the information is not required or is not so material as to require submission of the schedule, or because the information is included in the financial statements or the notes thereto.

3. Exhibits

See Exhibit Index beginning on page 81.

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SIGNATURES

Pursuant to the requirement of Section 13 or 15 (d) of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

A.P. PHARMA, INC.

By: /s/ Gregory Turnbull
Gregory Turnbull
President, Chief Executive Officer

POWER OF ATTORNEY

KNOW ALL PERSONS BY THESE PRESENT, that each person whose signature appears below constitutes and appoints Gregory Turnbull, and Paul Goddard, jointly and severally, his or her attorneys-in-fact, with the power of substitution, for him or her in any and all capacities, to sign any amendments to this Annual Report on Form 10-K and to file the same, with exhibits thereto and other documents in connection therewith, with the Securities and Exchange Commission, hereby ratifying and confirming all that said attorneys-in-fact, or his substitute or substitutes, may do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Exchange Act of 1934, this report has been signed by the following persons in the capacities and on the dates indicated.

Signature	Title	Date
<u>/s/ Gregory Turnbull</u> Gregory Turnbull	President, Chief Executive Officer, Interim Chief Financial Officer (Principal Executive Officer and Principal Financial and Accounting Officer) and Director	March 28, 2008
<u>/s/ Paul Goddard</u> Paul Goddard	Chairman of the Board of Directors	March 28, 2008
<u>/s/ Peter Riepenhausen</u> Peter Riepenhausen	Director	March 28, 2008
<u>/s/ Toby Rosenblatt</u> Toby Rosenblatt	Director	March 28, 2008
<u>/s/ Arthur Taylor</u> Arthur Taylor	Director	March 28, 2008
<u>/s/ Robert Zerbe</u> Robert Zerbe	Director	March 28, 2008

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VALUATION AND QUALIFYING ACCOUNTS (in thousands)

	Beginning Balance	Additions Charged to Cost and Expense	Deductions, Write-Offs and Recoveries	Ending Balance
DECEMBER 31, 2007				
Note receivable, allowance for doubtful note	\$ 394	\$ —	\$ —	\$ 394
DECEMBER 31, 2006				
Note receivable, allowance for doubtful note	\$ 394	\$ —	\$ —	\$ 394
DECEMBER 31, 2005				
Note receivable, allowance for doubtful note	\$ 394	\$ —	\$ —	\$ 394

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EXHIBIT INDEX

FORM 10-K ANNUAL REPORT

- 2.1 – Copy of Asset Purchase Agreement between Registrant and RP Scherer South, Inc. dated June 21, 2000.⁽¹⁾
- 3-A – Copy of Registrant's Certificate of Incorporation⁽²⁾
- 3-B – Copy of Registrant's Bylaws.⁽²⁾
- 3-C – Copy of Registrant's Certificate of Designation.⁽³⁾
- 3-D – Copy of Registrant's Certificate of Amendment of Certificate of Incorporation.
- 3-E – Copy of Registrant's Certificate of Amendment of Certificate of Incorporation.⁽⁴⁾
- 3-F – Copy of Registrant's Certificate of Amendment of Certificate of Incorporation.⁽⁵⁾
- 4-A – Copy of Registrant's Preferred Shares Rights Agreement.⁽⁶⁾
- 4-B – Copy of Registrant's Form of Rights Certificate⁽⁷⁾
- 10-C – Registrant's 1992 Stock Plan dated August 11, 1992.^{(8)*}
- 10-D – Registrant's 1997 Employee Stock Purchase Plan, as amended to date
- 10-E – Lease Agreement between Registrant and Metropolitan Life Insurance Company for lease of Registrant's executive offices in Redwood City dated as of November 17, 1997.⁽⁹⁾
- 10-F – Registrant's 2002 Equity Incentive Plan dated June 13, 2002.^{(10)*}
- 10-G – Agreement between Registrant and RHEI Pharmaceuticals, Inc. (RHEI) granting exclusive license to RHEI to develop and sell APF530 in Greater China dated October 1, 2006.⁽¹¹⁾
- 10-H – Royalty Interest Agreement between Registrant and Paul Royalty Fund dated January 18, 2006.⁽¹²⁾
- 10-I – Amended and Restated Retention and Non-Competition Agreement between the Registrant and Michael O'Connell effective August 23, 2007.⁽¹³⁾
- 10-J – Management Retention Agreement between the Registrant and Dr. John Barr dated as of November 8, 2007.⁽¹⁴⁾
- 10-K – Registrant's 2007 Equity Incentive Plan.⁽¹⁵⁾
- 10-L – Form of 2007 Equity Incentive Plan Stock Option Agreement.⁽¹⁶⁾
- 10-M – Form of 2007 Equity Incentive Plan Restricted Stock Unit Agreement.⁽¹⁷⁾
- 10-N – Agreement with Johnson & Johnson dated April 14, 1992.⁽¹⁸⁾
- 10-O – Form of 2007 Equity Incentive Plan Restricted Stock Award Agreement*
- 10-P – Form of 2002 Equity Incentive Plan Stock Option Agreement*
- 10-Q – Form of 2002 Equity Incentive Plan Restricted Stock Agreement*
- 10-R – Amendment to the Registrant's Non-Qualified Plan.⁽¹⁹⁾
- 10-S – Form of Indemnification Agreement*
- 10-T – Registrant's Non-Qualified Plan dated June 13, 2002.^{(20)*}
- 23.1 – Consent of Independent Registered Public Accounting Firm.
- 23.2 – Consent of Independent Registered Public Accounting Firm.
- 31.1 – Certification of Chief Executive Officer and Chief Financial Officer pursuant to Rules 13A-15(e) Promulgated under the Securities Exchange Act of 1934 as amended.
- 32 – Certification of Chief Executive Officer and Chief Financial Officer pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.

⁽¹⁾ Filed as an Exhibit with corresponding Exhibit No. to Registrant's Form 8-K dated July 25, 2000, and incorporated herein by reference.

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- (2) Filed as an Exhibit with corresponding Exhibit No. to Registrant's Registration Statement on Form S-1 (Registration No. 33-15429) and incorporated herein by reference.
 - (3) Filed as an Exhibit with corresponding Exhibit No. to Registrant's Form 8-K dated December 19, 2006, and incorporated herein by reference.
 - (4) Filed as an Exhibit No. 3.1 to Registrant's Form 8-K dated May 14, 2001, and incorporated herein by reference.
 - (5) Filed as Exhibit 3.1.1 to the registrant's Registration Statement on Form S-1/A (Registration No. 333-141918) and incorporated herein by reference.
 - (6) Filed as an Exhibit with corresponding Exhibit No. to Registrant's Form 8-K dated December 19, 2006, and incorporated herein by reference.
 - (7) Filed as an Exhibit with corresponding Exhibit No. to Registrant's Form 8-K dated December 19, 2006, and incorporated herein by reference.
 - (8) Filed as Exhibit No. 28.1 to Registrant's Registration Statement on Form S-8 (Registration No. 33-50640), and incorporated herein by reference.
 - (9) Filed as an Exhibit with corresponding Exhibit No. to Registrant's Annual Report on Form 10-K for the year ended December 31, 1997, and incorporated herein by reference.
 - (10) Filed as Exhibit No. 99.1 to Registrant's Registration Statement on Form S-8 (Registration No. 333-90428), and incorporated herein by reference.
 - (11) Filed as Exhibit 99.1 to Registrant's Form 8-K dated December 19, 2006, and incorporated herein by reference.
 - (12) Filed on Form 8K dated January 18, 2006.
 - (13) Filed as Exhibit 10.14 to the Registrant's Form 10-Q dated November 14, 2007 and incorporated herein by reference.
 - (14) Filed as Exhibit 10.15 to the Registrant's Form 10-Q dated November 14, 2007 and incorporated herein by reference.
 - (15) Filed as Exhibit No 4.1 to Registrant's Registration Statement on Form S-8 (Registration No. 333-148660) and incorporated herein by reference.
 - (16) Filed as Exhibit no. 4.3 to Registrant's Registration Statement on Form S-8 (Registration No 333-148660) and incorporated herein by reference.
 - (17) Filed as Exhibit No 4.4 to Registrant's Registration Statement on Form S-8 (Registration No. 333-148660), and incorporated herein by reference.
 - (18) Filed as an Exhibit with corresponding Exhibit No. to Registrant's Annual Report on Form 10-K for the year ended December 31, 1992, and incorporated herein by reference.
 - (19) Filed as Exhibit 10.16 to the Registrant's Form 10-Q dated November 14, 2007 and incorporated herein by reference.
 - (20) Filed as Exhibit No. 99.2 to Registrant's Registration Statement on Form S-8 (Registration No. 333-90428), and incorporated herein by reference.
- * Management contract or compensatory plans.

CERTIFICATE OF AMENDMENT OF
CERTIFICATE OF INCORPORATION OF
ADVANCED POLYMER SYSTEMS, INC.

Advanced Polymer Systems, Inc., a corporation duly organized and existing under the General Corporation Law of the State of Delaware (the "Corporation"), does hereby certify:

FIRST: That Article I of the Certificate of Incorporation of the Corporation is hereby amended to read in its entirety as follows:

"I: Name. The name of the corporation is AP Pharma, Inc."

SECOND: That said amendment was duly adopted in accordance with the provisions of Section 242 of the Delaware General Corporation Law.

In witness whereof, the Corporation has caused this Certificate of Amendment to be executed by its duly authorized person this 9th day of May, 2001.

/s/ Michael O'Connell

Michael O'Connell,
President and Chief
Executive Officer

A.P. PHARMA, INC.
1997 EMPLOYEE STOCK PURCHASE PLAN

1. PURPOSE. This A.P. Pharma, Inc. 1997 Employee Stock Purchase Plan is designed to encourage and assist employees of A.P. Pharma, Inc. and participating subsidiaries to acquire an equity interest in the Company through the purchase of shares of Company common stock.

2. DEFINITIONS. As used herein, the following definitions shall apply:

(a) "Administrator" shall mean the entity, either the Board or the committee of the Board, responsible for administering this Plan, as provided in Section 3.

(b) "Board" shall mean the Board of Directors of the Company, as constituted from time to time.

(c) "Code" shall mean the Internal Revenue Code of 1986, as amended from time to time, and any successor statute.

(d) "Company" shall mean A.P. Pharma, Inc., a Delaware corporation, and Participating Subsidiaries.

(e) "Common Stock" shall mean the Common Stock, \$.01 par value, of the Company.

(f) "Employee" shall mean any individual who is an employee of the Company or a Participating Subsidiary within the meaning of Section 3401(c) of the Code and the Treasury Regulations thereunder.

(g) "Enrollment Date" shall have the meaning set forth in Section 6.

(h) "Fair market value" means as of any given date: (i) the closing price of the Common Stock on the Nasdaq National Market as reported in the Wall Street Journal; or (ii) if the Common Stock is no longer quoted on the Nasdaq National Market, but is listed on an established stock exchange or quoted on any other established interdealer quotation system, the closing price for the Common Stock on such exchange or system, as reported in the Wall Street Journal; or (iii) in the absence of an established market for the Common Stock, the fair market value of the Common Stock as determined by the Administrator in good faith.

(i) "Lower Price Enrollment Date" shall have the meaning set forth in Section 6.

(j) "Option Period" shall have the meaning set forth in Section 7(b).

(k) "Participating Subsidiary" shall mean a Subsidiary which has been designated by the Administrator as covered by the Plan.

(l) "Plan" shall mean this A.P. Pharma, Inc. 1997 Employee Stock Purchase Plan, as it may be amended from time to time.

(m) "Purchase Date" shall have the meaning set forth in Section 9(a).

(n) "Section" unless the context clearly indicates otherwise, shall refer to a Section of this Plan.

(o) "Subsidiary" shall mean a "subsidiary corporation" of the Company, whether now or hereafter existing, within the meaning of Section 424(f) of the Code, but only for so long as it is a "subsidiary corporation."

(p) "Trading Day" means any day on which regular trading occurs on any established stock exchange or market system on which the Common Stock is traded.

3. ADMINISTRATION.

(a) Administrator. The Plan shall be administered by the Board or, upon delegation by the Board, by a committee of the Board (in either case, the "Administrator"). In connection with the administration of the Plan, the Administrator shall have the powers possessed by the Board. The Administrator may act only by a majority of its members. The Administrator may delegate administrative duties to such employees of the Company as it deems proper, so long as such delegation is not otherwise prohibited by Rule 16b-3 under the Securities Exchange Act of 1934, as amended, or other applicable law. The Board at any time may terminate the authority delegated to any committee of the Board pursuant to this Section 3(a) and revert in the Board the administration of the Plan.

(b) Administrator Determinations Binding. The Administrator may adopt, alter and repeal administrative rules, guidelines and practices governing the Plan and the options granted under it as it shall deem advisable from time to time, may interpret the terms and provisions of the Plan and the Options granted under it, may correct any defect, omission or inconsistency in the Plan or in any Option; and may otherwise supervise the administration of the Plan and the Options granted under it. The Administrator may establish, under guidelines from the Board, limits on the number of shares which may be purchased by each participant on an annual or other periodic basis or on the number of shares which may be purchased on any Purchase Date. All decisions made by the Administrator under the Plan shall be binding on all persons, including the Company and all participants in the Plan. No member of the Administrator shall be liable for any action that he or she has in good faith taken or failed to take with respect to this Plan.

4. NUMBER OF SHARES.

(a) The Company has reserved for sale under the Plan 300,000 shares of Common Stock. Shares sold under the Plan may be newly issued shares or shares reacquired in private transactions or open market purchases, but all shares sold under the Plan, regardless of source, shall be counted against the 300,000 share limitation. If at any Purchase Date, the shares available under the Plan are less than the number all participants would otherwise be entitled to purchase on such date, purchases shall be reduced proportionately to eliminate the deficit. If, at any Purchase Date, the shares which may be purchased by a participant are restricted on account of a limit on the aggregate shares which may be purchased per employee, purchases under each option shall be reduced proportionately. Any funds that cannot be applied to the purchase of shares due to such reductions shall be refunded to participants as soon as administratively feasible.

(b) In the event of any reorganization, recapitalization, stock split, reverse stock split, stock dividend, combination of shares, merger, consolidation, offering of rights, or other similar change in the capital structure of the Company, the Board may make such adjustment, if any, as it deems appropriate in the number, kind, and purchase price of the shares available for purchase under the Plan and in the maximum number of shares subject to any option under the Plan.

5. ELIGIBILITY REQUIREMENTS.

(a) Each Employee of the Company, except those described in the next paragraph, shall become eligible to participate in the Plan in accordance with Section 6 on the first Enrollment Date on or following commencement of his or her employment by the Company or following such period of employment as is designated by the Administrator from time to time. Participation in the Plan is entirely voluntary.

(b) The following Employees are not eligible to participate in the Plan:

(i) Employees who would, immediately upon enrollment in the Plan, own directly or indirectly, or hold options or rights to acquire stock possessing, five percent (5%) or more of the total combined voting power or value of all classes of stock of the Company or any subsidiary of the Company; and

(ii) Employees who are customarily employed by the Company fewer than twenty (20) hours per week or fewer than five (5) months in any calendar year.

6. ENROLLMENT. Any eligible employee may enroll or re-enroll in the Plan each year as of the close of the first trading day of: (a) May and November of each such year; or (b) such other days as may be established by the Board from time to time (the "Enrollment Dates"); provided, that the first Enrollment Date shall be April 30, 1997. In order to enroll, an eligible employee must complete, sign, and submit to the Company an enrollment form. Any enrollment form received by the Company by the 20th day of the month preceding an Enrollment Date (or by the Enrollment Date in the case of employees hired after such 20th day or in the case of the first Enrollment Date), or such other date established by the Administrator from time to time, will be effective on that Enrollment Date. In addition, the Administrator may re-enroll existing participants in the Plan on any Enrollment Date (the "Lower Price Enrollment Date") on which the fair market value of the Common Stock is lower than the fair market value on such participant's existing Enrollment Date. A participant may elect not to re-enroll on a Lower Price Enrollment Date by filing a written statement with the Company declaring such election prior to the Lower Price Enrollment Date.

7. GRANT OF OPTION ENROLLMENT.

(a) Enrollment or re-enrollment by a participant in the Plan on an Enrollment Date will constitute the grant by the Company to the participant of an option to purchase shares of Common Stock from the Company under the Plan. Any participant whose option expires and who has not withdrawn from the Plan will automatically be re-enrolled in the Plan and granted a new option on the Enrollment Date immediately following the date on which the option expires.

(b) Except as provided in Section 10, each option granted under the Plan shall have the following terms:

(i) the option will have a term of not more than twenty-four (24) months or such shorter option period as may be established by the Board from time to time (the "Option Period"). Notwithstanding the foregoing, however, whether or not all shares have been purchased thereunder,

the option will expire on the earlier to occur of: (A) the completion of the purchase of shares on the last Purchase Date occurring within twenty-four (24) months after the Enrollment Date for such option, or such shorter option period as may be established by the Board before an Enrollment Date for all options to be granted on such date; or (B) the date on which the employee's participation in the Plan terminates for any reason;

(ii) payment for shares purchased under the option will be made only through payroll withholding in accordance with Section 8;

(iii) purchase of shares upon exercise of the option will be effected only on the Purchase Dates established in accordance with Section 9;

(iv) the option, if not altered, amended or revoked by the Company prior to the relevant Purchase Date, may be accepted only by (x) there having been withheld from the compensation of the employee in accordance with the terms of the Plan amounts sufficient to purchase the Common Stock intended to be purchased under the option, and (y) the employee being employed by the Company and not having withdrawn from the Plan on the relevant Purchase Date.

(v) the price per share under the option will be determined as provided in Section 9;

(vi) the maximum number of shares available for purchase under an option for each one percent (1%) of compensation designated by an employee in accordance with Section 8 will, unless otherwise established by the Board before an Enrollment Date for all options to be granted on such date, be determined by dividing \$25,000 by the fair market value of a share of Common Stock on the Enrollment Date, dividing the result by the maximum number of percentage points that an employee may designate under Section 8 at the time such option is granted, and multiplying the result by the number of calendar years included in whole or in part in the period from grant to expiration of the option;

(vii) the option (taken together with all other options then outstanding under this and all other similar stock purchase plans of the Company and any subsidiary of the Company, collectively "Options") will in no event give the participant the right to purchase shares at a rate per calendar year which accrues in excess of \$25,000 of fair market value of such shares, less the fair market value of any shares accrued and already purchased during such year under Options which have expired or terminated, determined at the applicable Enrollment Dates; and

(viii) the option will in all respects be subject to the terms and conditions of the Plan, as interpreted by the Administrator from time to time.

8. PAYROLL AND TAX WITHHOLDING; USE BY COMPANY.

(a) Each participant shall elect to have amounts withheld from his or her compensation paid by the Company during the Option Period, at a rate equal to any whole percentage up to a maximum of ten percent (10%), or such lesser percentage as the Board may establish from time to time before an Enrollment Date. Compensation includes regular salary payments, annual and quarterly bonuses, hire-on bonuses, cash recognition awards, commissions, overtime pay, shift premiums, and elective contributions by the participant to qualified employee benefit plans, but excludes all other payments including, without limitation, long-term disability or workers compensation payments, car allowances, employee referral bonuses, relocation payments, expense

reimbursements (including but not limited to travel, entertainment, and moving expenses), salary gross-up payments, and non-cash recognition awards. The participant shall designate a rate of withholding in his or her enrollment form and may elect to increase or decrease the rate of contribution effective as of any Enrollment Date, by delivery to the Company, not later than ten (10) days before such Enrollment Date, of a written notice indicating the revised withholding rate.

(b) Payroll withholdings shall be credited to an account maintained for purposes of the Plan on behalf of each participant, as soon as administratively feasible after the withholding occurs. The Company shall be entitled to use the withholdings for any corporate purpose, shall have no obligation to pay interest on withholdings to any participant, and shall not be obligated to segregate withholdings.

(c) Upon disposition of shares acquired by exercise of an option, the participant shall pay, or make provision adequate to the Company for payment of, all federal, state, and other tax (and similar) withholdings that the Company determines, in its discretion, are required due to the disposition, including any such withholding that the Company determines in its discretion is necessary to allow the Company to claim tax deductions or other benefits in connection with the disposition. A participant shall make such similar provisions for payment that the Company determines, in its discretion, are required due to the exercise of an option, including such provisions as are necessary to allow the Company to claim tax deductions or other benefits in connection with the exercise of the option.

9. PURCHASE OF SHARES.

(a) On the last Trading Day immediately preceding an Enrollment Date (other than the first Enrollment Date), or on such other days as may be established by the Board from time to time prior to an Enrollment Date for all options to be granted on such Enrollment Date (each a "Purchase Date"), the Company shall apply the funds then credited to each participant's payroll withholdings account to the purchase of whole shares of Common Stock. The cost to the participant for the shares purchased under any option shall be not less than eighty-five percent (85%) of the lower of:

- (i) the fair market value of the Common Stock on the Enrollment Date for such option; or
- (ii) the fair market value of the Common Stock on the date such option is exercised.

(b) Any funds in an amount less than the cost of one share of Common Stock left in a participant's payroll withholdings account on a Purchase Date shall be carried forward in such account for application on the next Purchase Date.

(c) Notwithstanding the terms of Section 9(a), no funds credited to any employee's payroll withholdings account shall be used to purchase Common Stock on any date prior to the date that the Plan has been approved by the stockholders of the Company, as noted in Section 21. If such approval is not forthcoming within one year from the date that the Plan was approved by the Board of Directors, all amounts withheld shall be distributed to the participants as soon as administratively feasible.

10. WITHDRAWAL FROM THE PLAN. A participant may withdraw from the Plan in full (but not in part) at any time, effective after written notice thereof is received by the Company. Unless the Administrator elects to permit a withdrawing participant to invest funds credited to his or her withholding

account on the Purchase Date immediately following notice of withdrawal, all funds credited to a participant's payroll withholdings account shall be distributed to him or her without interest within sixty (60) days after notice of withdrawal is received by the Company. Any eligible employee who has withdrawn from the Plan may enroll in the Plan again on any subsequent Enrollment Date in accordance with the provisions of Section 6.

11. **TERMINATION OF EMPLOYMENT.** Participation in the Plan terminates immediately when a participant ceases to be employed by the Company for any reason whatsoever (including death or disability) or otherwise becomes ineligible to participate in the Plan. As soon as administratively feasible after termination, the Company shall pay to the participant or his or her beneficiary or legal representative, all amounts credited to the participant's payroll withholdings account; provided, however, that if a participant ceases to be employed by the Company because of the commencement of employment with a Subsidiary of the Company that is not a Participating Subsidiary, funds then credited to such participant's payroll withholdings account shall be applied to the purchase of whole shares of Common Stock at the next Purchase Date and any funds remaining after such purchase shall be paid to the participant.

12. **DESIGNATION OF BENEFICIARY.**

(a) Each participant may designate one or more beneficiaries in the event of death and may, in his or her sole discretion, change such designation at any time. Any such designation shall be effective upon receipt in written form by the Company and shall control over any disposition by will or otherwise.

(b) As soon as administratively feasible after the death of a participant, amounts credited to his or her account shall be paid in cash to the designated beneficiaries or, in the absence of a designation, to the executor, administrator, or other legal representative of the participant's estate. Such payment shall relieve the Company of further liability with respect to the Plan on account of the deceased participant. If more than one beneficiary is designated, each beneficiary shall receive an equal portion of the account unless the participant has given express contrary written instructions.

13. **ASSIGNMENT.**

(a) The rights of a participant under the Plan shall not be assignable by such participant, by operation of law or otherwise. No participant may create a lien on any funds, securities, rights, or other property held by the Company for the account of the participant under the Plan, except to the extent that there has been a designation of beneficiaries in accordance with the Plan, and except to the extent permitted by the laws of descent and distribution if beneficiaries have not been designated.

(b) A participant's right to purchase shares under the Plan shall be exercisable only during the participant's lifetime and only by him or her, except that a participant may direct the Company in the enrollment form to issue share certificates to the participant and his or her spouse in community property, to the participant jointly with one or more other persons with right of survivorship, or to certain forms of trusts approved by the Administrator.

14. **ADMINISTRATIVE ASSISTANCE.** If the Administrator in its discretion so elects, it may retain a brokerage firm, bank, or other financial institution to assist in the purchase of shares, delivery of reports, or other administrative aspects of the Plan. If the Administrator so elects, each participant shall (unless prohibited by the laws of the nation of his or her

employment or residence) be deemed upon enrollment in the Plan to have authorized the establishment of an account on his or her behalf at such institution. Shares purchased by a participant under the Plan shall be held in the account in the name in which the share certificate would otherwise be issued pursuant to Section 13(b).

15. COSTS. All costs and expenses incurred in administering the Plan shall be paid by the Company, except that any stamp duties or transfer taxes applicable to participation in the Plan may be charged to the account of such participant by the Company. Any brokerage fees for the purchase of shares by a participant shall be paid by the Company, but brokerage fees for the resale of shares by a participant shall be borne by the participant.

16. EQUAL RIGHTS AND PRIVILEGES. All eligible employees shall have equal rights and privileges with respect to the Plan so that the Plan qualifies as an "employee stock purchase plan" within the meaning of Section 423 of the Code and the related Treasury Regulations. Any provision of the Plan which is inconsistent with Section 423 of the Code shall without further act or amendment by the Company or the Board be reformed to comply with the requirements of Section 423. This Section 16 shall take precedence over all other provisions of the Plan.

17. APPLICABLE LAW. The Plan shall be governed by the substantive laws (excluding the conflict of laws rules) of the State of California.

18. MODIFICATION AND TERMINATION.

(a) The Board may amend, alter, or terminate the Plan at any time, including amendments to outstanding options. No amendment shall require stockholder approval, except:

- (i) for an increase in the number of shares reserved for purchase under the Plan;
- (ii) to the extent required for the Plan to comply with Section 423 of the Code;
- (iii) to the extent required by other applicable laws, regulations or rules; or
- (iv) to the extent the Board otherwise concludes that stockholder approval is advisable.

(b) In the event the Plan is terminated, the Board may elect to terminate all outstanding options either immediately or upon completion of the purchase of shares on the next Purchase Date, or may elect to permit options to expire in accordance with their terms (and participation to continue through such expiration dates). If the options are terminated prior to expiration, all funds contributed to the Plan that have not been used to purchase shares shall be returned to the participants as soon as administratively feasible.

(c) In the event of the sale of all or substantially all of the assets of the Company, or the merger of the Company with or into another corporation, or the dissolution or liquidation of the Company, each option outstanding under the Plan shall be assumed by any purchaser of all or substantially all of the assets of the Company or by a successor by merger to the Company (or the parent company of such purchaser or successor) in compliance with Section 424 of the Code, unless otherwise provided by the Board in its sole discretion, in which event, a Purchase Date shall occur immediately before the effective date of such event.

19. RIGHTS AS AN EMPLOYEE. Nothing in the Plan shall be construed to give any person the right to remain in the employ of the Company or to affect the Company's right to terminate the employment of any person at any time with or without cause.

20. RIGHTS AS A SHAREHOLDER; DELIVERY OF CERTIFICATES. Unless otherwise determined by the Board, certificates evidencing shares purchased on any Purchase Date shall be delivered to a participant only if he or she makes a written request to the Administrator. Participants shall be treated as the owners of their shares effective as of the Purchase Date.

21. BOARD AND SHAREHOLDER APPROVAL. The Plan was approved by the Board of Directors on March 5, 1997, and by the holders of a majority of the votes cast at a duly held shareholders' meeting on June 18, 1997, at which a quorum of the voting power of the Company was represented in person or by proxy.

A.P. PHARMA, INC

2007 EQUITY INCENTIVE PLAN

RESTRICTED STOCK PURCHASE AGREEMENT

THIS RESTRICTED STOCK PURCHASE AGREEMENT (the "Agreement"), dated _____, is entered into between A.P. Pharma, Inc., a Delaware corporation (the "Company") and _____ (the "Purchaser"). Unless otherwise defined herein, the terms of this Agreement will have the same meaning as defined in the A.P. Pharma, Inc. 2007 Equity Incentive Plan (the "Plan"). The Agreement is entered into as follows:

WHEREAS, the consultant services of Purchaser is considered by the Company to be important for the Company's continued growth; and

WHEREAS, in order to induce Purchaser to remain with the Company and to assure his continued commitment to the success of the Company, the Board of Directors of the Company (the "Board") has determined that Purchaser shall be granted the right to purchase ("Stock Purchase Award") covering shares of the Company's common stock (the "Shares"), under the Plan and subject to the restrictions stated below.

THEREFORE, the parties agree as follows:

1. **Sale of Stock.** Subject to the terms and conditions of this Agreement and the Plan, which is incorporated herein by reference, the Company will issue and sell to Purchaser, and Purchaser agrees to purchase from the Company, [number = \$25K / FMV on DOG] Shares of the Company's Common Stock at a purchase price of \$[FMV on DOG] per Share and a total purchase price of \$25,000. The term Shares refers to purchased Shares and all securities received in replacement of or in connection with the Shares pursuant to stock dividends or splits, all securities received in replacement of the Shares in a recapitalization, merger, reorganization, exchange or the like, and all new, substituted or additional securities or other properties to which Purchaser is entitled by reason of Purchaser's ownership of the Shares.

2. **Vesting Schedule.** So long as Purchaser's service relationship with the Company continues during the following vesting term, the interest of Purchaser in the Shares shall vest as follows: [____ Shares subject to the Stock Award will vest [____] months after [____] (the "Vesting Commencement Date") and ____ Shares shall vest every [____] months after the Vesting Commencement Date.] Therefore, provided Purchaser has not experienced a termination of his Continuous Service (as defined in the Plan) prior to the close of business on the [____] anniversary of the Vesting Commencement Date, the interest of Purchaser in the Shares shall become fully vested on that date.

3. **Repurchase Option.**

(a) In the event of the voluntary or involuntary termination of Purchaser's Continuous Service for any reason (including death or disability), with or without cause, the Company shall upon the date of such termination (the "Termination Date") have an irrevocable, exclusive option (the "Repurchase Option") for a period of 90 days from such date to repurchase all or any portion of the Shares held by Purchaser as of the Termination Date which have not yet been released from the Company's Repurchase Option at the original purchase price per Share specified in Section 1 (adjusted for any stock splits, stock dividends and the like).

(b) Unless the Company notifies Purchaser within 90 days from the Termination Date of Purchaser's employment or consulting relationship that it does not intend to exercise its Repurchase Option with respect to some or all of the Shares, the Repurchase Option shall be deemed automatically exercised by the Company as of the 90th day following such termination, provided that the Company may notify Purchaser that it is exercising its Repurchase Option as of a date prior to such 90th day. Unless Purchaser is otherwise notified by the Company pursuant to the preceding sentence that the Company does not intend to exercise its Repurchase Option as to some or all of the Shares to which it applies at the time of termination, execution of this Agreement by Purchaser constitutes written notice to Purchaser of the Company's intention to exercise its Repurchase Option with respect to all Shares to which such Repurchase Option applies. The Company, at its choice, may satisfy its payment obligation to Purchaser with respect to exercise of the Repurchase Option by either (A) delivering a check to Purchaser in the amount of the

purchase price for the Shares being repurchased, or (B) in the event Purchaser is indebted to the Company, canceling an amount of such indebtedness equal to the purchase price for the Shares being repurchased, or (C) by a combination of (A) and (B) so that the combined payment and cancellation of indebtedness equals such purchase price. In the event of any deemed automatic exercise of the Repurchase Option pursuant to this Section 3(a)(ii) in which Purchaser is indebted to the Company, such indebtedness equal to the purchase price of the Shares being repurchased shall be deemed automatically canceled as of the 90th day following termination of Purchaser's employment or consulting relationship unless the Company otherwise satisfies its payment obligations. As a result of any repurchase of Shares pursuant to this Section 3(a), the Company shall become the legal and beneficial owner of the Shares being repurchased and shall have all rights and interest therein or related thereto, and the Company shall have the right to transfer to its own name the number of Shares being repurchased by the Company, without further action by Purchaser.

(c) [Number of shares from Section 1] of the Shares shall initially be subject to the Repurchase Option. [_____] of the total number of shares shall be released from the Repurchase Option on the [_____] month anniversary of the Vesting Commencement Date (as set forth on the signature page of this Agreement), and an additional [_____] of the total number of Shares shall be released from the Repurchase Option every [_____] months after the date of issuance of the Shares on the Vesting Commencement Date (as set forth in Section 1), until all Shares are released from the Repurchase Option. Fractional shares shall be rounded to the nearest whole share.

(d) All transferees of Shares or any interest therein will receive and hold such Shares or interest subject to the provisions of this Agreement, including insofar as applicable the Company's Repurchase Option. Any sale or transfer of the Shares shall be void unless the provisions of this Agreement are satisfied.

(e) Upon the expiration or exercise of the Repurchase Option, a new certificate or certificates representing the Shares not repurchased shall be issued, on request, without the legend referred to in Section 10 below and delivered to Purchaser.

4. Escrow of Shares.

(a) To ensure that Purchaser's unvested Shares are delivered to the Company in the event the Company exercises its Repurchase Option described in Section 3, Purchaser agrees to promptly following the execution of this Agreement, deliver to and deposit with the escrow agent (the "Escrow Agent") named in the Joint Escrow Instructions attached as Exhibit A, the certificate(s) evidencing the unvested Shares and an Assignment Separate from Certificate executed by Purchaser (with date and number of shares in blank) in the form attached as Exhibit B. The certificate(s) evidencing the unvested Shares and the Assignment Separate from Certificate shall be delivered to the Escrow Agent and held under the Joint Escrow Instructions, which shall be delivered to the Escrow Agent promptly following the execution of this Agreement.

(b) Promptly following the date when the Shares have vested in full, the Company shall direct the Escrow Agent to deliver to Purchaser a certificate or certificates representing the Shares.

5. Transfer Restrictions. In addition to any other limitation on transfer created by applicable securities laws, Purchaser shall not assign, encumber or dispose of any interest in the Shares while the Shares are subject to the Company's Repurchase Option, as described in Section 3 above.

6. Stockholder Rights. Purchaser shall be entitled to all of the rights and benefits generally accorded to stockholders with respect to the Shares. All dividends on Shares that are subject to any restrictions, including vesting, shall be subject to the same restrictions, including those set forth in Sections 2 and 3, as the Shares on which the dividends were paid.

7. Taxes.

(a) Purchaser shall be liable for any and all taxes, including withholding taxes, arising out of this grant or the vesting of Shares hereunder. In the event that the Company is required to withhold taxes as a result of the grant or vesting of the Shares, or subsequent sale of the Shares, Purchaser shall surrender a sufficient number of

whole Shares or make a cash payment, in the discretion of the Company, as necessary to cover all applicable required withholding taxes and required social security contributions at the time the Shares vest and the Repurchase Option on the Shares lapses (or at such other time as required by applicable laws), unless alternative procedures for such payment are established by the Company. Purchaser will receive a cash refund for any fraction of a surrendered Share not necessary for required withholding taxes and required social security contributions. To the extent that any surrender of Shares or payment of cash or alternative procedure for such payment is insufficient, Purchaser authorizes the Company, its affiliates and subsidiaries, which are qualified to deduct tax at source, to deduct all applicable required withholding taxes and social security contributions from Purchaser's compensation. Purchaser agrees to pay any amounts that cannot be satisfied from wages or other cash compensation, to the extent permitted by law.

(b) Purchaser understands that Section 83(a) of the Internal Revenue Code of 1986, as amended (the "Code"), taxes as ordinary income the difference between the amount paid for the Shares and the fair market value of the Shares as of the date any Repurchase Option on the Shares lapses. In this context, "restrictions" mean the repurchase option in the event of the Termination of Continuous Service of Purchaser as set forth in Section 12 of the Plan and the restriction on transferability as set forth in Section 5 of this Agreement and in Section 13 of the Plan. Purchaser understands that Purchaser may elect to be taxed at the time the Shares are issued, based on the value of the Shares at the issuance date rather than when and as the Repurchase Option lapses (on the vesting dates), by filing an election under Section 83(b) (an "83(b) Election") of the Code with the Internal Revenue Service within 30 days from the date of issuance. Purchaser acknowledges that the foregoing is only a summary of the effect of United States federal income taxation with respect to issuance and vesting of the Shares hereunder, and does not purport to be complete. The Company has directed Purchaser to seek independent advice regarding the applicable provisions of the Code, the income tax laws of any municipality, state or foreign country in which Purchaser may reside, the tax consequences of Purchaser's death, and the decision as to whether or not to file an 83(b) Election (as well as appropriate advice and assistance with the actual filing of any such 83(b) Election) in connection with the issuance of the Shares.

(c) Regardless of any action the Company takes with respect to any or all income tax, social insurance, payroll tax, payment on account or other tax-related withholding ("Tax-Related Items"), Purchaser acknowledges and agrees that the ultimate liability for all Tax-Related Items legally due by Purchaser is and remains Purchaser's responsibility and that the Company (i) make no representations nor undertakings regarding the treatment of any Tax-Related Items in connection with any aspect of this issuance of Shares, including the vesting of the Shares or the subsequent sale of the Shares; and (ii) do not commit to structure the terms or any aspect of this issuance of Shares to reduce or eliminate Purchaser's liability for Tax-Related Items. Upon the vesting of the Shares, Purchaser shall pay the Company any amount of Tax-Related Items that the Company may be required to withhold as a result of Purchaser's receipt of the Stock Purchase Award or Purchaser's receipt of Shares that cannot be satisfied by the means previously described. The Company may refuse to deliver the Shares if Purchaser fails to comply with Purchaser's obligations in connection with the Tax-Related Items.

8. Acknowledgment and Waiver. By accepting this grant of a Stock Purchase Award, Purchaser acknowledges and agrees that:

(a) the grant of a Stock Purchase Award is voluntary and occasional and does not create any contractual or other right to receive future grants of Stock Purchase Awards or Shares, even if Stock Purchase Awards or Shares have been granted repeatedly in the past;

(b) the grant of a Stock Purchase Award shall not create a right to employment or a service relationship with the Company, shall not create an employment agreement between Purchaser and the Company and shall not interfere with the ability of the Company to terminate Purchaser's employment or service relationship at any time with or without cause and it is expressly agreed and understood that employment is terminable at the will of either party, insofar as permitted by law;

(c) the grant of a Stock Purchase Award, Shares and resulting benefits are extraordinary items that do not constitute compensation of any kind for services of any kind rendered to the Company, and are outside the scope of Purchaser's service relationship contract, if any; and the grant of a Stock Purchase Award, Shares and resulting benefits are not part of normal or expected compensation or salary for any purposes, including, but not limited to calculating any severance, resignation, termination, redundancy, end of service payments, bonuses, long-service awards, pension or retirement benefits or similar payments insofar as permitted by law;

(d) in consideration of this grant of a Stock Purchase Award, no claim or entitlement to compensation or damages shall arise from termination of this Stock Purchase Award or diminution in value of the Shares resulting from termination of Continuous Service by the Company (for any reason whatsoever and whether or not in breach of local labor laws) and Purchaser irrevocably releases the Company from any such claim that may arise; if, notwithstanding the foregoing, any such claim is found by a court of competent jurisdiction to have arisen, then, by accepting the terms of this Agreement, Purchaser shall be deemed irrevocably to have waived any entitlement to pursue such claim; and

(e) notwithstanding any terms or conditions of the Plan to the contrary, in the event of involuntary termination of Continuous Service (whether or not in breach of local labor laws), Purchaser's right to receive benefits under this Agreement, if any, will terminate effective as of the date that Purchaser is no longer actively employed and will not be extended by any notice period mandated under local law (e.g., active service relationship would not include a period of "garden leave" or similar period pursuant to local law); furthermore, in the event of involuntary termination of Continuous Service (whether or not in breach of local labor laws), Purchaser's right to receive benefits under this Agreement after termination of Continuous Service, if any, will be measured by the date of termination of Purchaser's active service relationship and will not be extended by any notice period mandated under local law.

9. Conditions Upon Issuance of Shares. Notwithstanding any other provision of this Agreement, the Company shall not be obligated, and shall have no liability for failure, to issue or deliver any Shares under this Agreement unless such issuance or delivery would comply with applicable laws, with such compliance determined by the Company in consultation with its legal counsel.

10. Restrictive Legends and Stop-Transfer Orders.

(a) The certificate or certificates representing the Shares shall bear the following legend (as well as any legends required by applicable state and federal corporate and securities laws):

THE SHARES REPRESENTED BY THIS CERTIFICATE MAY BE TRANSFERRED ONLY IN ACCORDANCE WITH THE TERMS OF AN AGREEMENT BETWEEN THE COMPANY AND THE STOCKHOLDER, A COPY OF WHICH IS ON FILE WITH THE SECRETARY OF THE COMPANY.

(b) Purchaser agrees that, in order to ensure compliance with the restrictions referred to herein, the Company may issue appropriate "stop transfer" instructions to its transfer agent, if any, and that, if the Company transfers its own securities, it may make appropriate notations to the same effect in its own records.

(c) The Company shall not be required (i) to transfer on its books any Shares that have been sold or otherwise transferred in violation of any of the provisions of this Agreement or (ii) to treat as owner of such Shares or to accord the right to vote or pay dividends to any purchaser or other transferee to whom such Shares shall have been so transferred.

11. Miscellaneous.

(a) The Company shall not be required to treat as the owner of Shares, and associated benefits hereunder, any transferee to whom such Shares or benefits shall have been so transferred in violation of this Agreement.

(b) The parties agree to execute such further instruments and to take such action as may reasonably be necessary to carry out the intent of this Agreement.

(c) Any notice required or permitted hereunder shall be given in writing and shall be deemed effectively given upon delivery to Purchaser at Purchaser's address then on file with the Company.

(d) The Plan is incorporated herein by reference. The Plan and this Agreement constitute the entire agreement of the parties with respect to the subject matter hereof and supersede in their entirety all prior undertakings and agreements of the Company and Purchaser with respect to the subject matter hereof, and may not be modified adversely to Purchaser's interest except by means of a writing signed by the Company and Purchaser. This Agreement is governed by the laws of the state of Delaware.

(e) The provisions of this Agreement are severable and if any one or more provisions are determined to be illegal or otherwise unenforceable, in whole or in part, the remaining provisions shall nevertheless be binding and enforceable.

[Signature page follows]

Accepted by Purchaser:

A.P. PHARMA, INC.

By _____

RETAIN THIS AGREEMENT FOR YOUR RECORDS

EXHIBIT A

JOINT ESCROW INSTRUCTIONS

[_____, _____]

[_____]

A.P. Pharma, Inc.
123 Saginaw Drive
Redwood City, CA 94063

Dear Sir or Madam:

As Escrow Agent for A.P. Pharma, Inc. (the "Company"), and [_____] (the "Purchaser"), you are authorized and directed to hold the Assignment Separate from Certificate form(s) executed by Purchaser and the certificate(s) of stock representing Purchaser's unvested shares transferred in accordance with the terms of the Restricted Stock Purchase Agreement (the "Agreement") entered into between the Company and Purchaser, in accordance with the following instructions:

1. In the event of the exercise of the Repurchase Option by the Company described in Section 3 of the Agreement, Purchaser and the Company hereby irrevocably authorize and direct you to effect the contemplated Repurchase Option, and to promptly deliver the stock certificates.
2. Promptly following the exercise of the Repurchase Option by the Company described in Section 3 of the Agreement, you are directed (a) to date the Assignment Separate from Certificate form(s) necessary for the transfer in question, (b) to fill in the number of shares being transferred, and (c) to deliver the form(s), together with the certificate or certificates evidencing the shares to be transferred, to the Company.
3. Purchaser irrevocably authorizes the Company to deposit with you any certificates evidencing shares to be held by you under this letter and any additions and substitutions to the shares as defined in the Agreement. Purchaser irrevocably appoints you as his or her attorney-in-fact and agent for the term of this escrow to execute, with respect to the shares of stock, all documents necessary or appropriate to make such securities negotiable and to complete any transaction contemplated by these Joint Escrow Instructions. Subject to the provisions of this Section 3, Purchaser shall exercise all rights and privileges, including but not limited to, the right to vote and to receive dividends (if any), of a stockholder of the Company while the shares are held by you.
4. In accordance with the terms of Section 4(b) of the Agreement, you may deliver to Purchaser a certificate or certificates representing shares that are no longer subject to the Company's repurchase option described in Section 3 of the Agreement.
5. This escrow shall terminate upon the release of all shares held under the terms and provisions hereof.
6. If at the time of termination of this escrow you should have in your possession any documents, securities or other property belonging to Purchaser, you shall deliver them to Purchaser and shall be discharged from all further obligations under these Joint Escrow Instructions.
7. Your duties under these Joint Escrow Instructions may be altered, amended, modified or revoked only by a writing signed by all of the parties.

8. You shall be obligated to perform the duties described in these Joint Escrow Instructions and shall be protected in relying or refraining from acting on any instrument reasonably believed by you to be genuine and to have been signed or presented by the proper party or parties. You shall not be personally liable for any act or omission as Escrow Agent or as attorney-in-fact of Purchaser while acting in good faith and in the exercise of your own good judgment, and any act or omission by you pursuant to the advice of your own attorneys shall be conclusive evidence of such good faith.

9. You are expressly authorized to disregard any and all warnings given by any of the parties hereto or by any other person or corporation, excepting only orders or process of courts of law, and are expressly authorized to comply with and obey orders, judgments or decrees of any court. In case you obey or comply with any such order, judgment or decree of any court, you shall not be liable to any of the parties under these Joint Escrow Instructions or to any other person, firm or corporation by reason of such compliance, notwithstanding any such order, judgment or decree being subsequently reversed, modified, annulled, set aside, vacated or found to have been entered without jurisdiction.

10. You shall not be liable in any respect on account of the identity, authority or rights of the parties executing or delivering or purporting to execute or deliver the Agreement or any documents or papers deposited or called for under these Joint Escrow Instructions.

11. You shall not be liable for the outlawing of any rights under any statute of limitations with respect to these Joint Escrow Instructions or any documents deposited with you.

12. You shall be entitled to employ such legal counsel and other experts as you may deem necessary properly to advise you in connection with your obligations under these Joint Escrow Instructions and may rely upon the advice of such counsel.

13. Your responsibilities as Escrow Agent under these Joint Escrow Instructions shall terminate if you shall cease to be employed by the Company or if you shall resign by written notice to each party. In the event of any such termination, the Company shall appoint any officer of the Company as successor Escrow Agent.

14. If you reasonably require other or further instruments in connection with these Joint Escrow Instructions or obligations under these Joint Escrow Instructions, the parties shall furnish such instruments.

15. It is understood and agreed that should any dispute arise with respect to the delivery and/or ownership or right of possession of the securities held by you under these Joint Escrow Instructions, you are authorized and directed to retain in your possession without liability to anyone all or any part of the securities until the dispute is settled either by mutual written agreement of the parties or by a final order, decree or judgment of a court of competent jurisdiction after the time for appeal has expired and no appeal has been perfected. You are under no duty whatsoever to institute or defend against any such proceedings.

16. Any notice required or permitted under these Joint Escrow Instructions shall be given in writing and will be deemed effectively given upon personal delivery or upon deposit in the United States Post Office, by registered or certified mail with postage and fees prepaid, addressed to each of the other parties.

17. By signing these Joint Escrow Instructions, you become a party only for the purpose of these Joint Escrow Instructions; you do not become a party to the Agreement.

18. This instrument shall be governed by and construed in accordance with the laws of the State of Delaware.

19. This instrument shall be binding upon and inure to the benefit of the parties hereto and their respective successors and permitted assigns.

Very truly yours,

A.P. Pharma, Inc.

By _____

Its _____

ESCROW AGENT:

EXHIBIT B

ASSIGNMENT SEPARATE FROM CERTIFICATE

FOR VALUE RECEIVED, [_____] sells, assigns and transfers to A.P. Pharma, Inc. (the "Company") or its assignee _____ shares of the Common Stock of the Company (the "Shares"), standing in his or her name on the books of the Company represented by Certificate No. _____ and irrevocably constitutes and appoints [_____] as Attorney to transfer the Shares on the books of the Company with full power of substitution in the premises.

Dated: _____, _____.

[NAME]

(Signature)

Spousal Consent (if applicable)

_____ (Purchaser's spouse) indicates by the execution of this Assignment his or her consent to be bound by the terms herein as to his or her interests, whether as community property or otherwise, if any, in the Shares.

Printed Name

Signature

INSTRUCTIONS: PLEASE DO NOT FILL IN ANY BLANKS OTHER THAN THE SIGNATURE LINE. THE PURPOSE OF THIS ASSIGNMENT IS TO ENABLE THE COMPANY TO ENFORCE THE REPURCHASE OPTION SET FORTH IN THE RESTRICTED STOCK PURCHASE AGREEMENT WITHOUT REQUIRING ADDITIONAL SIGNATURE.

A.P. PHARMA, INC.

2002 EQUITY INCENTIVE PLAN
 [NONSTATUTORY] [INCENTIVE] STOCK OPTION
 TO PURCHASE SHARES OF COMMON STOCK

(A) Optionee:	_____	(D) Grant Date:	_____
(B) Exercise Price:	\$ _____	(E) Vesting Base Date:	_____
(C) Shares:	_____	(F) Fully-Vested Date:	_____

A.P. Pharma, Inc. (the "Company") has granted to you a [Nonstatutory] [Incentive] Stock Option to purchase the number of shares of Common Stock listed in item (C) above at the purchase price listed in item (B) above. This option is granted subject to the terms of the Company's 2002 Equity Incentive Plan (the "Plan") and to the terms and conditions set forth herein. To accept your stock option, please sign the enclosed copy of this letter and return it to _____.

General terms

Your option is intended to be [an incentive][a nonstatutory] option. The basic terms of your option grant are identified in the information block at the top of this offer letter, but other important terms and conditions are described in the Plan. We encourage you to carefully review the Plan, a copy of which is [enclosed] [available on request from our {Stock Administrator} {Human Resources Department}].

Purchase and payment

Subject to the plan, [your option vests (becomes exercisable) [to the extent of 25% of the Option Shares one year after the Vesting Base Date (or, if no Vesting Base Date is specified, the Grant Date), and then] in cumulative monthly increments of [2.0833]% of the Option Shares, calculated to the closest whole share on each monthly anniversary of the Vesting Base Date, so that all shares will become purchasable on the Fully-Vested Date shown above.]

[your option is exercisable in its entirety. However, until the Fully-Vested Date shown above, shares you purchase under this option will be subject to a repurchase right of the Company, as set out in section 15.2(a) of the Plan. That repurchase right lapses [to the extent of 25% of the Option Shares one year after the Vesting Base Date, and then] in cumulative monthly increments of [2.0833]% of the Option Shares, calculated to the closest whole share on each monthly anniversary of the Vesting Base Date, so that this repurchase right will be entirely lapsed on the Fully-Vested Date shown above.]

If you decide to purchase shares under this option, you will be required to submit a completed exercise agreement on a form approved by the Company, together with payment for the shares. You may pay for the shares (plus any associated withholding taxes) using cash, a check, a wire transfer or any other form of payment listed in section 6.4(c) of the plan and permitted by the Administrator at the time you wish to exercise. Shares available under this option must be purchased, if at all, no later than the Expiration Date.

Restrictions on the Shares

[Shares you purchase under this option may be subject to {other} repurchase rights and resale restrictions, {including market standoff requirements}. Those rights and restrictions are set forth in section 15.2 of the Plan.

I accept this option and agree to the terms of this offer letter and the plan.

Optionee signature

_____, 200_
Date

Restricted Stock Award Agreement
between A.P. Pharma, Inc. and _____
pursuant to the
A.P. Pharma, Inc. 2002 Equity Incentive Plan

A.P. Pharma, Inc. (the "Company") has awarded to you, _____, _____ shares (the "Shares") of A.P. Pharma, Inc. Common Stock ("Common Stock") as restricted stock under the Company's 2002 Equity Incentive Plan (the "Plan"). This agreement (the "Agreement") sets forth the terms and conditions of the award.

Capitalized terms used without definition in this Agreement shall have the meanings set forth in the Plan.

1. **Payment.** Under the terms of the Plan you have 15 days from the date of receipt of this Agreement to accept the award of the Shares by delivering to the Company a check for the par value of the Shares (\$0.01 per share). Payment of the par value shall constitute purchase of the Shares.

2. Forfeiture and Transfer Restrictions.

a. Except to the extent otherwise provided in paragraphs (b) or (c) below, upon termination of your agreement for any reason during the Restriction Period (as defined below), all Shares still subject to restriction shall be forfeited by you and shall be repurchased by the Company for an amount equal to the original purchase price. This restriction is referred to as the "Forfeiture Restriction." In addition, you shall not be permitted to sell, assign, transfer, pledge or otherwise encumber any Shares until lapse of the Restriction Period. This restriction is referred to as the "Transfer Restriction."

b. All Forfeiture and Transfer Restrictions on the Shares will lapse on the earlier of _____ or on your last day as an employee of the Company (the "Restriction Period"), or in the event of a Change of Control as such term is defined in the Change of Control Agreement between the parties, whichever is earlier.

c. In the event of a dissolution, liquidation, merger or consolidation under the terms of the Plan, the Administrator of the Plan may, in its discretion, arrange for new shares of restricted stock to be substituted for the Shares or for the Company's obligations as to the Shares to be assumed by an employer corporation other than the Company or by a parent or subsidiary of such employer corporation, or the Administrator may waive the restrictions on the Shares as more fully described in the Plan.

d. If the outstanding shares of Common Stock of the Company are increased or decreased in number or changed into or exchanged for a different number or kind of securities of the Company or any other corporation by reason of a recapitalization, reclassification, stock split, combination of shares, stock dividend or other event, the Administrator may, in its sole discretion, adjust the number of Shares or substitute new shares of restricted stock for the Shares.

3. **Dividends.** Cash dividends shall be automatically reinvested in additional shares of restricted stock, and dividends payable in stock shall be paid in additional shares of restricted stock. For this purpose, restricted stock issued as a dividend shall be valued at the fair market value of the shares as determined in good faith by the Administrator on the record date for determination of the stockholders to receive the dividend, and shall be treated as additional Shares hereunder.

4. Certificates; Legends.

a. Certificates representing the Shares will bear the following legend:

“The shares represented by this certificate have been issued under the A.P. Pharma, Inc. 2002 Equity Incentive Plan as shares of “Restricted Stock.” They are subject to the terms of that plan and of the terms of an agreement between the holder hereof and A.P. Pharma, Inc. dated _____. Under the terms of the plan and the agreement, the shares represented hereby are subject to forfeiture and may not be sold, assigned, transferred, pledged or otherwise encumbered without the prior written consent of A.P. Pharma, Inc. A copy of the plan and the agreement may be obtained from the secretary of A.P. Pharma, Inc.”

The foregoing legend shall be removed upon your request as restrictions on the Shares represented by a certificate lapse.

b. Certificates representing the Shares will be issued in your name and held by the Company until restrictions on the Shares have lapsed. When restrictions have lapsed on any of the Shares, certificates for such Shares will be delivered to you upon request.

5. Tax Consequences.

a. **Tax Adviser.** The tax consequences associated with the Shares and this Agreement are complex and can depend upon your particular circumstances. THE COMPANY URGES YOU TO CONSULT A TAX ADVISER. By signing below you acknowledge that neither the Company nor any of its employees, representatives or advisers has given you tax advice regarding the Shares or this Agreement and that you have made an independent decision whether to consult a tax adviser.

b. **Withholding Tax.** You are responsible for the payment of any withholding or employment taxes which, in the judgment of the Administrator of the Plan, result from the purchase of the Shares or the lapse of Forfeiture and Transfer Restrictions thereon. Payment of any withholding tax associated with the purchase of the Shares or the lapse of Forfeiture and Transfer Restrictions thereon shall be as provided in Section 10 of the Plan. The tax consequences associated with a request to withhold Shares for payment of taxes are complex, and you should consult a tax adviser before making such a request.

c. **Section 83(b) Election.** Since the Shares are subject to a “substantial risk of forfeiture,” if you do not make an election under Section 83(b) of the Code with respect to the Shares within 30 days after the date on which the Shares are granted in accordance with Section 1 above (a “Section 83(b) Election”), you will have taxable income upon lapse of the Forfeiture and Transfer Restrictions, in an amount equal to the spread between the fair market value of the stock on the date of lapse and any consideration paid for the stock. The taxable income constitutes supplemental wages subject to income and employment tax withholding, and the Company will generally receive a corresponding income tax deduction.

6. **Plan Provisions Applicable.** The Shares are being awarded under the Plan and are subject to all of the provisions of the Plan. Copies of the Plan and the related Prospectus are enclosed. NEVERTHELESS, THIS AGREEMENT CONTROLS OVER THE PLAN. THE STANDARD RESTRICTED STOCK DESCRIBED IN THE PROSPECTUS MAY VARY SUBSTANTIALLY FROM THE SHARES. YOUR RIGHTS ARE AS SET FORTH IN THIS AGREEMENT, WHICH CONTROLS IN THE EVENT OF ANY INCONSISTENCY WITH THE DESCRIPTION IN THE PROSPECTUS.

7. Governing Law. Except to the extent that the Delaware General Corporation Law shall be applicable with respect to matters relating to the internal corporate affairs of the Company, this Agreement and the award of Shares shall be governed by and construed under the laws of the State of California as applied to agreements among California residents entered into and to be performed entirely within California.

A.P. PHARMA, INC.

Company

By _____

Employee

If the optionee resides in California, or another community property jurisdiction, I as the optionee's spouse also accept and agree to be bound by the terms and conditions of this Agreement and the Plan.

Spouse

Enclosures: 2002 Stock Plan
Prospectus

INDEMNIFICATION AGREEMENT

This Agreement is made as of _____, between A.P. Pharma, Inc., a Delaware corporation (the "Company"), and _____ (the "Indemnitee").

RECITALS

Both the Company and Indemnitee recognize that highly competent persons have become more reluctant to serve publicly-held corporations as directors or in other capacities unless they are provided with adequate protection through insurance or adequate indemnification against inordinate risks of claims and actions against them arising out of their service to and activities on behalf of the Company.

In recognition of Indemnitee's need for substantial protection against personal liability in order to enhance Indemnitee's continued service to the Company in an effective manner and Indemnitee's reliance on the provisions of the Company's Certificate of Incorporation, as amended ("Certificate of Incorporation") and the Company's Bylaws (the "Bylaws") requiring indemnification of the Indemnitee to the fullest extent permitted by law, and in part to provide Indemnitee with specific contractual assurance that the protection promised by such Certificate of Incorporation and Bylaws will be available to Indemnitee (regardless of, among other things, any amendment to or revocation of such Certificate of Incorporation or Bylaws or any change in the composition of the Company's Board of Directors or acquisition transaction relating to the Company), the Company wishes to provide in this Agreement for the indemnification of and the advancing of expenses to Indemnitee to the fullest extent (whether partial or complete) permitted by law and as set forth in this Agreement.

The Certificate of Incorporation, the Bylaws and the General Corporation Law of the State of Delaware ("DGCL") expressly provide that the indemnification provisions set forth therein are not exclusive and thereby contemplate that contracts may be entered into between the Company and members of the board of directors, officers and other persons with respect to indemnification.

It is reasonable, prudent and necessary for the Company contractually to obligate itself to indemnify, and to advance expenses on behalf of, such persons to the fullest extent permitted by applicable law so that they will serve or continue to serve the Company free from undue concern that they will not be so indemnified.

This Agreement is a supplement to and in furtherance of the Certificate of Incorporation and Bylaws and any resolutions adopted pursuant thereto and shall not be deemed a substitute therefor, nor to diminish or abrogate any rights of Indemnitee thereunder.

AGREEMENT

In consideration of the premises and of Indemnitee agreeing to serve or continuing to serve the Company directly or, at its request, with another enterprise, and intending to be legally bound hereby, the parties hereto agree as follows:

1. **Indemnification.** (a) Subject to Section 3 of this Agreement, the Company shall indemnify, to the full extent that it shall have power under applicable law to do so and in a manner permitted by such law, any person who is made or threatened to be made a party to or is otherwise involved (as a witness or otherwise) in any threatened, pending, or completed action, suit, or proceeding, whether civil, criminal, administrative, or investigative (hereinafter, a "Proceeding"), by reason of the fact that such person is or was a director or officer of the Company, or while serving as a director or officer of the Company, is or was serving at the request of Company as a director, officer, employee, or agent of another corporation, partnership, joint venture, trust, or other enterprise, including service with respect to an employee benefit plan (collectively, "Another Enterprise") (such person hereinafter, a "Mandatory Indemnitee"), against expenses (including attorneys' fees), judgments, fines (including ERISA excise taxes or penalties) and amounts paid in settlement actually and reasonably incurred by him or her in connection with such Proceeding if he or she acted in good faith and in a manner he or she reasonably believed to be in or not opposed to the best interests of the Company, and, with respect to any criminal action or proceeding, had no reasonable cause to believe his or her conduct was unlawful.

(b) The Company may indemnify, to the full extent that it shall have power under applicable law to do so and in a manner permitted by such law, any person who is made or threatened to be made a party to or is otherwise involved (as a witness or otherwise) in any threatened, pending, or completed Proceeding, by reason of the fact that such person is or was an employee or agent of the Company, or while not serving as a director or officer of the Company, is or was serving at the request of the Company as a director, officer, employee, or agent of Another Enterprise (such person hereinafter, a "Permissive Indemnitee"), against expenses (including attorneys' fees), judgments, fines (including ERISA excise taxes or penalties) and amounts paid in settlement actually and reasonably incurred by him or her in connection with such Proceeding if he or she acted in good faith and in a manner he or she reasonably believed to be in or not opposed to the best interests of the Company, and, with respect to any criminal action or proceeding, had no reasonable cause to believe his or her conduct was unlawful.

(c) Anything in this Section 1 to the contrary notwithstanding, if a person was or is a party or was or is threatened to be made a party to any Proceeding by or in the right of the Company to procure a judgment in its favor by reason of the fact that such person is or was a director, officer, employee, or agent of the Company, or is or was serving at the request of the Company as a director, officer, employee, or agent of Another Enterprise, then the Company shall not indemnify such person for any judgment, fines, or amounts paid in settlement to the Company in connection with such Proceeding. The Company shall indemnify any such person who is a Mandatory Indemnitee, and may indemnify any such person who is a Permissive Indemnitee, in each case to the full extent that it shall have power under applicable law to do so and in a manner permitted by such law, and subject to Section 3 of this Agreement, against

expenses (including attorneys' fees) actually and reasonably incurred by such person in connection with the defense or settlement of such Proceeding if he or she acted in good faith and in a manner he or she reasonably believed to be in or not opposed to the best interests of the Company; provided, however, that no indemnification for such expenses shall be made in respect of any claim, issue, or matter in such Proceeding as to which the person shall have been adjudged liable to the Company unless (and only to the extent that) the Court of Chancery of the State of Delaware or the court in which such Proceeding was brought shall determine upon application that, despite the adjudication of liability but in view of all the circumstances of the case, such person is fairly and reasonably entitled to indemnity for such expenses that the Court of Chancery or such other court shall deem proper.

(d) To the extent that a present or former director or officer of the Company has been successful on the merits or otherwise in defense of any threatened, pending, or completed Proceeding referred to in Section 145(a) or (b) of the General Corporation Law of the State of Delaware, or in defense of any claim, issue, or matter therein, he or she shall be indemnified against expenses (including attorneys' fees) actually and reasonably incurred by him or her in connection therewith.

(e) The termination of any Proceeding by judgment, order, settlement, conviction, or upon a plea of nolo contendere or its equivalent, shall not, of itself, create a presumption that the person seeking indemnification did not act in good faith and in a manner he or she reasonably believed to be in or not opposed to the best interests of the Company, and, with respect to any criminal action or proceeding, had reasonable cause to believe that his or her conduct was unlawful.

2. Advancement of Expenses. (a) Subject to Section 3 of this Agreement, with respect to any person who is made or threatened to be made a party to or is otherwise involved (as a witness or otherwise) in any threatened, pending, or completed Proceeding, by reason of the fact that such person is or was a director or officer of the Company or while serving as a director or officer of the Company, is or was serving at the request of the Company as a director, officer, employee, or agent of Another Enterprise, the Company shall pay the expenses (including attorneys' fees) incurred by such person in defending any such Proceeding in advance of its final disposition (hereinafter an "advancement of expenses"); provided, however, that, if required by law, any advancement of expenses shall be made only upon receipt of an undertaking (hereinafter an "undertaking") by such person to repay all amounts advanced if it shall ultimately be determined by final judicial decision from which there is no further right to appeal that such person is not entitled to be indemnified for such expenses under this Agreement or otherwise.

(b) With respect to any person who is made or threatened to be made a party to or is otherwise involved (as a witness or otherwise) in any threatened, pending, or completed Proceeding, by reason of the fact that such person is or was an employee or agent of the Company, or while not serving as a director or officer of the Company, is or was serving at the request of the Company as a director, officer, employee, or agent of Another Enterprise, the Company may, in its discretion and upon such terms and conditions, if any, as the Company deems appropriate, pay the expenses (including attorneys' fees) incurred by such person in defending any such Proceeding in advance of its final disposition.

3. **Actions Initiated Against The Company.** Anything in Section 1(a) or Section 2(a) of this Agreement to the contrary notwithstanding, except as provided in Section 5(b) of this Agreement, with respect to a Proceeding initiated against the Company by a director or officer of the Company (whether initiated by such person in such capacity or in any other capacity, including as a director, officer, employee, or agent of Another Enterprise), the Company shall not be required to indemnify or to advance expenses (including attorneys' fees) to such person in connection with prosecuting such Proceeding (or part thereof) or in defending any counterclaim, cross-claim, affirmative defense, or like claim of the Company in such Proceeding (or part thereof) unless such Proceeding was authorized by the Board of Directors of the Company.

4. **Contract Rights.** With respect to any person who is made or threatened to be made a party to or is otherwise involved (as a witness or otherwise) in any threatened, pending, or completed Proceeding, by reason of the fact that such person is or was a director or officer of the Company, or while serving as a director or officer of the Company, is or was serving at the request of the Company as a director, officer, employee, or agent of Another Enterprise, the rights to indemnification and to the advancement of expenses conferred in Sections 1(a) and 2(a) of this Agreement shall be contract rights. Any amendment, repeal, or modification of, or adoption of any provision inconsistent with, this Agreement (or any provision hereof) shall not adversely affect any right to indemnification or advancement of expenses granted to any person pursuant hereto with respect to any act or omission of such person occurring prior to the time of such amendment, repeal, modification, or adoption (regardless of whether the Proceeding relating to such acts or omissions is commenced before or after the time of such amendment, repeal, modification, or adoption).

5. **Claims.** (a) If (X) a claim under Section 1(a) of this Agreement with respect to any right to indemnification is not paid in full by the Company within sixty days after a written demand has been received by the Company or (Y) a claim under Section 2(a) of this Agreement with respect to any right to the advancement of expenses is not paid in full by the Company within twenty days after a written demand has been received by the Company, then the person seeking to enforce a right to indemnification or to an advancement of expenses, as the case may be, may at any time thereafter bring suit against the Company to recover the unpaid amount of the claim.

(b) If successful in whole or in part in any suit brought pursuant to Section 5(a) of this Agreement, or in a suit brought by the Company to recover an advancement of expenses (whether pursuant to the terms of an undertaking or otherwise), the person seeking to enforce a right to indemnification or an advancement of expenses hereunder or the person from whom the Company sought to recover an advancement of expenses, as the case may be, shall be entitled to be paid by the Company the reasonable expenses (including attorneys' fees) of prosecuting or defending such suit.

(c) In any suit brought by a person seeking to enforce a right to indemnification hereunder (but not a suit brought by a person seeking to enforce a right to an advancement of expenses hereunder), it shall be a defense that the person seeking to enforce a right to indemnification has not met any applicable standard for indemnification under applicable law. With respect to any suit brought by a person seeking to enforce a right to indemnification or

right to advancement of expenses hereunder or any suit brought by the Company to recover an advancement of expenses (whether pursuant to the terms of an undertaking or otherwise), neither (i) the failure of the Company to have made a determination prior to commencement of such suit that indemnification of such person is proper in the circumstances because such person has met the applicable standards of conduct under applicable law, nor (ii) an actual determination by the Company that such person has not met such applicable standards of conduct, shall create a presumption that such person has not met the applicable standards of conduct or, in a case brought by such person seeking to enforce a right to indemnification, be a defense to such suit.

(d) In any suit brought by a person seeking to enforce a right to indemnification or to an advancement of expenses hereunder, or by the Company to recover an advancement of expenses (whether pursuant to the terms of an undertaking or otherwise), the burden shall be on the Company to prove that the person seeking to enforce a right to indemnification or to an advancement of expenses or the person from whom the Company seeks to recover an advancement of expenses is not entitled to be indemnified, or to such an advancement of expenses, under this Agreement or otherwise.

6. Determination of Entitlement to Indemnification. Any indemnification required or permitted under this Agreement (unless ordered by a court) shall be made by the Company only as authorized in the specific case upon a determination that indemnification of the present or former director, officer, employee or agent is proper in the circumstances because he or she has met all applicable standards of conduct set forth in this Agreement and Section 145 of the General Corporation Law of the State of Delaware. Such determination shall be made, with respect to a person who is a director or officer of the Company at the time of such determination, (i) by a majority vote of the directors who are not parties to such action, suit or proceeding, even though less than a quorum; (ii) by a committee of such directors designated by majority vote of such directors, even though less than a quorum; (iii) if there are no such directors, or if such directors so direct, by independent legal counsel in a written opinion; or (iv) by the stockholders. Such determination shall be made, with respect to any person who is not a director or officer of the Company at the time of such determination, in the manner determined by the Board of Directors (including in such manner as may be set forth in any general or specific action of the Board of Directors applicable to indemnification claims by such person) or in the manner set forth in any agreement to which such person and the Company are parties.

7. Non-Exclusive Rights. The indemnification and advancement of expenses provided herein shall not be deemed exclusive of any other rights to which any person may be entitled under any bylaw, agreement, vote of stockholders or disinterested directors, or otherwise, both as to action in such person's official capacity and as to action in another capacity while holding such office, and shall continue as to a person who has ceased to be such director, officer, employee, or agent and shall inure to the benefit of the heirs, executors, and administrators of such person.

8. Insurance. The Company may purchase and maintain insurance on behalf of any person who is or was a director, officer, employee, or agent of the Company, or is or was serving at the request of the Company as a director, officer, employee, or agent of Another Enterprise against any liability asserted against such person and incurred by such person in any such capacity, or arising out of such person's status as such, whether or not the Company would have the power to indemnify such person against such liability under the provisions of this Agreement or otherwise.

9. **Severability.** If any provision or provisions of this Agreement shall be held to be invalid, illegal, or unenforceable for any reason whatsoever: (1) the validity, legality, and enforceability of the remaining provisions of this Agreement (including, without limitation, each portion of any paragraph or clause containing any such provision held to be invalid, illegal, or unenforceable, that is not itself held to be invalid, illegal, or unenforceable) shall not in any way be affected or impaired thereby; and (2) to the fullest extent possible, the provisions of this Agreement (including, without limitation, each such portion of any paragraph or clause containing any such provision held to be invalid, illegal, or unenforceable) shall be construed so as to give effect to the intent manifested by the provision held invalid, illegal, or unenforceable.

10. **Miscellaneous.** For purposes of this Agreement: (a) references to serving at the request of the Company as a director or officer of Another Enterprise shall include any service as a director or officer of the Company that imposes duties on, or involves services by, such director or officer with respect to an employee benefit plan; (b) references to serving at the request of the Company as a employee or agent of Another Enterprise shall include any service as an employee or agent of the Company that imposes duties on, or involves services by, such employee or agent with respect to an employee benefit plan; (c) a person who acted in good faith and in a manner such person reasonably believed to be in the interest of the participants and beneficiaries of an employee benefit plan shall be deemed to have acted in a manner not opposed to the best interests of the Company; and (d) references to a director of Another Enterprise shall include, in the case of any entity that is not managed by a board of directors, such other position, such as manager or trustee or member of the governing body of such entity, that entails responsibility for the management and direction of such entity's affairs, including, without limitation, general partner of any partnership (general or limited) and manager or managing member of any limited liability company.

11. **Amendments, Termination; Waiver; Integration.** No supplement, modification, amendment or termination of this Agreement shall be binding unless executed in writing by both of the parties hereto. No waiver of any of the provisions of this Agreement shall be deemed or shall constitute a waiver of any other provisions hereof (whether or not similar) nor shall such waiver constitute a continuing waiver. This Agreement supersedes and replaces any prior or contemporaneous understanding between the parties, whether written or oral, related to the subject matter hereof, including but not limited to any indemnification agreement previously entered into between the parties hereto.

12. **Contribution.** If the indemnification provided in Sections 1 and 3 is unavailable, then, in respect of any Claim in which the Company is jointly liable with Indemnitee (or would be if joined in the Claim), the Company shall contribute to the amount of Expenses, judgments, fines, penalties and amounts paid in settlement as appropriate to reflect: (i) the relative benefits received by the Company, on the one hand, and Indemnitee, on the other hand, from the transaction from which the Claim arose, and (ii) the relative fault of the Company, on the one hand, and of Indemnitee, on the other, in connection with the events which resulted in such

Expenses, judgments, fines, penalties and amounts paid in settlement, as well as any other relevant equitable considerations. The relative fault of the Company, on the one hand, and of Indemnitee, on the other, shall be determined by reference to, among other things, the parties' relative intent, knowledge, access to information and opportunity to correct or prevent the circumstances resulting in such Expenses and Liabilities. The Company agrees that it would not be just and equitable if contribution pursuant to this Section 12 were determined by pro rata allocation or any other method of allocation which does not take account of the equitable considerations described in this Section 12.

13. **Subrogation.** In the event of payment under this Agreement, the Company shall be subrogated to the extent of such payment to all of the rights of recovery of Indemnitee, who shall execute all papers required and shall do everything that may be necessary to secure such rights, including the execution of such documents necessary to enable the Company effectively to bring suit to enforce such rights.

14. **No Duplication of Payments.** The Company shall not be liable under this Agreement to make any payment in connection with any Claim made against Indemnitee to the extent Indemnitee has otherwise actually received payment (under insurance policy, Certificate of Incorporation or otherwise) of the amounts otherwise identifiable hereunder.

15. **Binding Effect.** This Agreement shall be binding upon and inure to the benefit of and be enforceable by the parties hereto and their respective successors, assigns, including any direct or indirect successor by purchase, merger, consolidation or otherwise to all or substantially all of the business and/or assets of the Company, spouse, heirs, and personal and legal representatives. This Agreement shall continue in effect regardless of whether Indemnitee continues to serve as a director or officer (or in one of the capacities enumerated in Section 10(d) hereof) of the Company or of any other enterprise at the Board of Director's request.

16. **Severability.** The provisions of this Agreement shall be severable in the event that any of the provisions hereof (including any provision within a single section, paragraph or sentence) are held by a court of competent jurisdiction to be invalid, void or otherwise unenforceable, and the remaining provisions shall remain enforceable to the fullest extent permitted by law.

17. **Applicable Law.** This Agreement and the legal relations among the parties shall be governed by, and construed and enforced in accordance with, the laws of the State of Delaware, without regard to its conflict of laws rules.

18. **Identical Counterparts.** This Agreement may be executed in one or more counterparts, each of which shall for all purposes be deemed to be an original but all of which together shall constitute one and the same Agreement. Only one such counterpart signed by the party against whom enforceability is sought needs to be produced to evidence the existence of this Agreement.

A.P. PHARMA, INC.

By: _____
President and Chief Executive Officer

Indemnitee

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in the Registration Statements on Form S-3 (Nos. 033-88972, 333-00759, 333-04257, and 333-115163) and the Registration Statements on Form S-8 (Nos. 333-06841, 333-35151, 333-60585, 333-90428, 333-118546, 333-127574, 333-137954, and 333-148660), pertaining to the 1992 Stock Plan, the 1997 Employee Stock Purchase Plan, the 1992 Stock Plan, the 2002 Equity Incentive Plan and Non-Qualified Stock Option Plan, the 2002 Equity Incentive Plan and 1997 Employee Stock Purchase Plan, and the 2007 Equity Incentive Plan and 1997 Employee Stock Purchase Plan, of our report dated March 25, 2008, with respect to the financial statements and schedule of A.P. Pharma, Inc. included in this Annual Report on Form 10-K for the year ended December 31, 2007.

/s/ ODENBERG, ULLAKKO, MURANISHI & CO. LLP

San Francisco, California
March 26, 2008

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We consent to the incorporation by reference in the following Registration Statements:

- 1) Registration Statement (Form S-3 No. 333-115163) of A.P. Pharma, Inc.,
- 2) Registration Statement (Form S-8 No. 333-06841) pertaining to the 1992 Stock Plan of A.P. Pharma, Inc.,
- 3) Registration Statement (Form S-8 No. 333-60585) pertaining to the 1992 Stock Plan of A.P. Pharma, Inc.,
- 4) Registration Statement (Form S-8 No. 333-35151) pertaining to the 1997 Employee Stock Purchase Plan of A.P. Pharma, Inc.,
- 5) Registration Statement (Form S-8 No. 333-90428) pertaining to the 2002 Equity Incentive Plan and Non-Qualified Stock Option Plan of A.P. Pharma, Inc.,
- 6) Registration Statement (Form S-8 No. 333-118546) pertaining to the 2002 Equity Incentive Plan and 1997 Employee Stock Purchase Plan of A.P. Pharma, Inc.,
- 7) Registration Statement (Form S-8 No. 333-127574) pertaining to the 2002 Equity Incentive Plan and 1997 Employee Stock Purchase Plan of A.P. Pharma, Inc.,
- 8) Registration Statement (Form S-8 No. 333-137954) pertaining to the 2002 Equity Incentive Plan and 1997 Employee Stock Purchase Plan of A.P. Pharma, Inc., and
- 9) Registration Statement (Form S-8 No. 333-148660) pertaining to the 2007 Equity Incentive Plan and 1997 Employee Stock Purchase Plan of A.P. Pharma, Inc.;

of our report dated February 24, 2006, with respect to the financial statements and schedule of A.P. Pharma, Inc. for the year ended December 31, 2005 included in this Annual Report (Form 10-K) for the year ended December 31, 2007.

/s/ ERNST & YOUNG LLP

Palo Alto, California
March 26, 2008

CERTIFICATIONS

I, Gregory Turnbull, certify that:

1. I have reviewed this annual report on Form 10-K of A.P. Pharma, Inc. (the "registrant") ;
2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;
3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this report;
4. I am responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:
 - a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under my supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;
 - b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under my supervision to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;
 - c) Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and
 - d) Disclosed in this report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of an annual report) that has materially affected, or is reasonable likely to materially affect, the registrant's internal control over financial reporting; and
5. I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of registrant's board of directors (or persons performing the equivalent functions):
 - a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonable likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and
 - b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal control over financial reporting.

Date: March 28, 2008

/s/ Gregory Turnbull

Gregory Turnbull
President, Chief Executive Officer
and Interim Chief Financial Officer

**CERTIFICATION PURSUANT TO 18 U.S.C. SECTION 1350, AS ADOPTED
PURSUANT TO SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002**

In connection with the Annual Report of A.P. Pharma, Inc. (the "Company") on Form 10-K for the year ending December 31, 2007 as filed with the Securities and Exchange Commission on the date hereof (the "Report"), I, Gregory Turnbull, Chief Executive Officer and Interim Chief Financial Officer of the Company, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that:

- (1) The Report fully complies with the requirements of section 13(a) or 15(d) of the Securities Exchange Act of 1934; and
- (2) The information contained in the Report fairly presents, in all material respects, the financial condition and result of operations of the Company.

/s/ Gregory Turnbull

Gregory Turnbull,
Chief Executive Officer
and Interim Chief Financial Officer
March 28, 2008