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Press Release

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For Immediate Release

TAPESTRY PHARMACEUTICALS PRESENTS PHASE I DATA ON TPI 287 AT THE 43rd ASCO ANNUAL MEETING

Boulder, Colo., June 3, 2007 — Tapestry Pharmaceuticals, Inc. (Nasdaq: TPPH) today presented data from two Phase I clinical trials of TPI 287, the Company's leading drug candidate, at the 43rd Annual Meeting of the American Society of Clinical Oncology (ASCO) in Chicago, Ill. In these two Phase I studies, TPI 287, the Company's proprietary taxane, was found to be both safe and well-tolerated in heavily pretreated patients with advanced, incurable cancers. The studies were performed on two classic taxane schedules: a weekly for three weeks with a one week rest (TPI 287-01); and a once every three weeks (TPI 287-02). Anti-tumor activity was observed in two patients in each schedule.

"We are encouraged by the results of these two Phase I trials. The data provide a strong rationale for the further development of TPI 287," commented Dr. Sandra Silberman, Chief Medical Officer of Tapestry Pharmaceuticals. "The early signals of anti-tumor activity and the fact that we observed this activity without the emergence of significant myelosuppression, a common side effect associated with taxane therapy, was of particular interest. We look forward to evaluating TPI 287 in a comprehensive Phase II development plan being initiated this year."

The Phase I studies on TPI 287 were carried out in clinics and hospitals in the United States and in Israel. Patients were required to have failed at least one previous treatment regimen and were either no longer candidates for standard therapy, had no standard therapy available to them, or chose not to pursue standard therapy.

Results of Study TPI 287-01

In the first study (TPI 287-01), 30 patients were enrolled: 17 were male and 13 were female, with a variety of tumors, including cancers of the prostate, colon, pancreas, breast, liver, kidney, and lung. All patients had received prior therapy for their disease, with most having been exposed to multiple different regimens. All of these patients received TPI 287, and 29 of them were able to be assessed for safety and efficacy.

TPI 287 administered weekly for three weeks followed by a one week rest was started at 7 mg/m² and given in increasing doses to groups of three or four patients, up to a dose of 185 mg/m². A majority of patients experienced at least one adverse event, generally mild in severity, with the most frequently cited being fatigue, peripheral neuropathy and gastrointestinal upsets. There was a trend toward more patients experiencing these toxicities at the higher doses. Of note was the general lack of neutropenia (decreased white blood counts) in this study.

A dose limiting toxicity of Grade 3 peripheral neuropathy was seen after escalation from 127.5 mg/m² to 185 mg/m², the highest dose administered. Clinically significant neutropenia and myelosuppression were not seen, a dose limiting toxicity of the other approved taxanes. Also of note, two of the patients with peripheral neuropathy as a dose limiting toxicity had entered the study with this as a pre-existing condition. The study is in the process of exploring an intermediate dose of TPI 287 at 150 mg/m².

Although the primary objective of the study was to find a safe, well-tolerated dose of TPI 287 on this schedule, it was noted that two patients treated at doses of 85 mg/m² and 185 mg/m² showed evidence of anti-tumor activity. One patient with lung cancer had a significant decrease (greater than 50 percent) in the size of his tumor while on treatment, and another patient with pancreatic cancer had no growth of her tumor for over four months while receiving TPI 287.

Results of Study TPI 287-02

In the second study (TPI 287-02), 21 patients were enrolled: seven were male and 14 were female. These patients had a variety of tumor types, including cancers of the colon, pancreas, and breast. All patients had received prior therapy for their disease, with most having been exposed to multiple different regimens. All of these patients received TPI 287 and were able to be assessed for safety and efficacy.

TPI 287 administered on a once every three week schedule was started at a dose of 56 mg/m², based on the safety of this dose administered in the more frequent schedule in TPI 287-01 already in progress, and escalated up to a maximum dose of 185 mg/m². The most common side effects were anemia, peripheral neuropathy and gastrointestinal upsets. One patient experienced a severe allergic reaction after infusion of the drug, with shortness of breath due to constriction of the airways. This patient was treated immediately for this reaction and completely recovered.

This study established a maximum tolerated dose for TPI 287 of 160 mg/m² administered in a once every three week schedule. Again of note was the general lack of neutropenia in patients treated with TPI 287.

Although the primary objective of the study was to find a safe, well-tolerated dose of TPI 287 on this schedule, two patients treated at doses of 160 mg/m² and 185 mg/m² showed evidence of anti-tumor activity. One patient with pancreatic cancer metastatic to the liver had a significant decrease (greater than 50 percent) in the size of her tumors. This benefit lasted for over 10 months. In the other patient who had breast cancer that had been progressing for the four months prior to entry into the study, there was no further progression for over eight months while being treated with TPI 287.

“Because TPI 287 is a taxane, we anticipated that peripheral neuropathy would be a toxicity associated with this compound. What we were surprised to see was the anti-tumor activity of TPI 287 without evidence of extensive myelosuppression.” observed Dr. Silberman. “In addition, other approved taxanes have not demonstrated activity in pancreatic cancer. This suggests that we may have a taxane which has broader single agent activity and furthermore, may be able to be combined quite differently with other chemotherapeutic agents,” she added.

Phase II Program

Last month, Tapestry announced it will open three Phase II clinical trials for TPI 287 by the end of this year. The first Phase II trial, in hormone refractory prostate cancer has already begun and is accruing patients. The second Phase II trial, which will begin in the second half of this year will be an open label exploratory trial for patients with glioblastoma multiforme, a primary cancer of the central nervous system that has progressed after primary surgery, radiation and chemotherapy. The third Phase II trial will be in pancreatic cancer, after failure of first line therapy in advanced disease. In all of these studies, TPI 287 will be administered as an intravenous dosage form. In addition to these Phase II studies, the Company will be initiating a Phase Ib/2 study evaluating the safety of the combination of TPI 287 and temozolomide in primary brain cancer patients. Exploratory Phase II trials in other tumor types may be initiated as well, based on preclinical and clinical data.

On a parallel track, Tapestry is developing an oral formulation of TPI 287. Data presented at this year's AACR demonstrated the oral bioavailability and concurrent activity in pre-clinical rodent xenograft models and suggested that TPI 287 may also be orally bioavailable in man. Therefore, the Company plans to initiate a Phase I pharmacokinetic trial of TPI 287 beginning in the summer of 2007 to evaluate the drug's oral bioavailability in humans. No other taxane is currently approved for oral administration.

“TPI 287 appears to be a unique taxane, with a different side effect profile, showing activity in tumors both sensitive to other taxanes as well as in tumors not currently treated with taxanes. In addition, TPI 287's chemical structure may also allow for oral administration. We are looking forward to exploring many of the distinctive characteristics and expanded potential of this next generation taxane in upcoming clinical trials,” concluded Dr Silberman.

About TPI 287

TPI 287 is a proprietary next-generation taxane being studied for the treatment of multiple cancer indications. In preclinical *in vitro* tests, TPI 287 has exhibited activity across multiple cell lines, including cell lines that either have developed resistance to taxane therapy or are innately resistant to taxane therapy. In addition, in preclinical *in vivo* animal xenograft models, TPI 287 has exhibited greater tumor growth inhibition activity compared to standard comparative agents in taxane sensitive and taxane resistant tumor cell lines, including cell lines derived from breast and colon cancers and neuroblastoma tumors.

TPI 287 is currently in clinical studies in the United States. Tapestry plans to initiate multiple Phase II trials for TPI 287 in 2007.

About Tapestry Pharmaceuticals, Inc.

Tapestry Pharmaceuticals, Inc. is a biopharmaceutical company focused on the development of proprietary therapies for the treatment of cancer. For more information about Tapestry and its technologies, visit Tapestry's web site at www.tapestrypharma.com.

Forward-Looking Statements

Statements in this press release that are not historical facts are "forward-looking statements" that involve risks and uncertainties. Forward-looking statements can be identified by the use of words such as "opportunities," "trends," "potential," "estimates," "may," "will," "should," "anticipates," "expects," "hopes" or comparable terminology or by discussions of strategy. Such forward-looking statements include the statements that the Company plans to initiate multiple Phase II trials for TPI 287 in 2007, that TPI 287 may exhibit anti-tumor activity, and that TPI 287 may be active in combination with other chemotherapeutic drugs. Such statements involve known and unknown risks, uncertainties and other factors that may cause our actual results, performance or achievements to be materially different from the results, performance or achievements expressed or implied by such forward-looking statements. Such risks, uncertainties and other factors include risks that clinical trials for TPI 287 will be delayed due to institutional approvals, patient recruitment, formulation and manufacturing difficulties, delays in finalizing and receiving approval of Phase II protocols, negotiations with regulatory agencies, or other factors; that human clinical trials may show that TPI 287 is unsafe and/or ineffective in treating cancer in humans. General implementation risks associated with development of TPI 287 include those that we are blocked or limited in the development of TPI 287 because of the intellectual property rights of third parties; that we are limited in our ability to obtain, maintain and enforce our own intellectual property; that development of TPI 287 is delayed or terminated because the costs of further development exceed its value; and that the Company's resources will be insufficient to continue development. Additional risks, uncertainties and other factors are identified under the captions "Risk Factors" and "Special Note Regarding Forward-Looking Statements" in the Company's reports filed from time to time with the Securities and Exchange Commission (the "SEC"), including its Annual Report on Form 10-K for the year ended December 27, 2006 filed with the SEC on March 7, 2007 as well as an amendment thereto on Form 10-K/A filed with the SEC on April 26, 2007. The Company disclaims any intention or

obligation to update publicly or revise any forward-looking statements, whether as a result of new or additional information, future events or otherwise.