Ex 9

Exhibit 10

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High-dose Chemotherapy Followed by Reinfusion of Selected CD34+ Peripheral Blood Cells in Patients with Poor Risk Breast Cancer: A Randomized Multicenter Study

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As of July 1995, 27 patients with metastatic breast cancer were included in a multicenter prospective randomized study looking at the safety and efficacy of the ISOLEX® 300 SA device to select CD34+ cells from aphereses for clinical transplantation. Peripheral blood (PB) progenitors were mobilized with chemotherapy (in most cases cyclophosphamide 3g/m^2 and doxorubicin 75 mg/m^2), and rhG-CSF (Neupogen®, Amgen, 300 µg/d or 5 µg/kg/d). Patients underwent apheresis when their PB CD34+ cell counts rose above 20/µl, and were then randomized to receive either unseparated PB cells (target number of cells to be collected = 2.5 x 10^6 CD34+ cells/kg), or selected CD34+ cells (target number of cells to be collected = 5 x 10^6 CD34+ cells/kg). Patients who were allocated to the study arm had an additional 1.5 x 10^6 CD34+ cells/kg collected as a backup. Out of the 27 patients who signed the informed consent, 6 did not achieve adequate mobilization, and were therefore off-study. 11 patients went into the control arm, and 10 went into the study arm. CD34+ cells were selected using the ISOLEX® 300 SA device, according to the manufacturer's recommendations. Patients in the study group had on average 1.8 separations. 2 out of 10 patients in the study group were simultaneously infused with the selected cells and the backup, because the numbers of selected CD34+ cells were 1.01 and 0.43 x 10^6/kg. An average number of 6.2 x 10^6 CD34+ cells/kg and 4.9 x 10^6 CD34+ cells/kg were cryopreserved and reinfused after completion of high-dose chemotherapy in the 11 control and 8 study patients respectively (not including the backup collection for the latter). Granulocyte and platelet recovery in the 8 patients who received only selected CD34+ cells was similar to hematopoietic recovery in the 11 patients in the control arm. None of these patients required reinfusion of the backup, and no side-effects were observed. We conclude that selected PB CD34+ cells support adequate hematopoietic recovery in breast cancer patients, although the use of this technology may be limited by poor mobilization in a proportion of candidates. Data on the detection of residual tumor cells and clinical outcome will be presented.

Transplantation in patients with solid tumors
Autologous PBSC transplantation
Transplantation: patients with breast cancer
Stem cell processing: CD34 cell selection

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