

August 6, 2009

Dear Shareholders:

We have had an exciting and productive first half of 2009. The Company continued to make progress on the clinical development of our Aurora A/angiogenic kinase inhibitor, ENMD-2076, and since my last update, reached the maximum tolerated dose (MTD) in the Phase 1 study in patients with solid tumors. Our collaborators presented promising data for the Phase 1 study during both oral and poster presentations at the American Society of Clinical Oncology (ASCO) Annual Meeting, which was held in May. Results from the study demonstrated that ENMD-2076 administered orally in daily doses is associated with clinical benefit as determined by reductions in tumor volume, reductions in tumor markers, and improvement in cancer-related symptoms. These benefits were demonstrated in a variety of tumor types including renal cell, melanoma, ovarian and colorectal cancer. Encouraged by these results, we recently expanded the Phase 1 study in solid tumors to add additional cancer patients.

We further expanded the clinical development program for ENMD-2076 with the initiation of a Phase 1 study in patients with relapsed or refractory leukemia. The study is being conducted at Princess Margaret Hospital in Toronto and represents the first clinical trial with ENMD-2076 outside of the United States.

More recently, the Company's intellectual property position for ENMD-2076 was enhanced with the issuance of U.S. Patent No. 7,563,787, entitled "Substituted Pyrazole Compounds (ENMD-2076 Aurora Kinase Inhibitors)." The patent contains claims granted by the U.S. Patent Office covering composition of matter for ENMD-2076, as well as a family of related molecules.

We continue to be encouraged by the clinical results from studies of ENMD-2076 and believe that this program represents a significant Company asset. The team is actively engaged in partnering discussions for ENMD-2076 and is now able to provide potential development partners with clinical data to support our rationale for development. Our resources are focused on and committed to the clinical development of ENMD-2076. Our achievements with this program are a testimony to the commitment and dedication of the EntreMed team. While market conditions remain difficult, we have the financial resources and the executive team in place to weather the current economic crisis and to continue to move ENMD-2076 and the Company forward.



We ended the second quarter of 2009 with approximately \$15 million in cash and short-term investments. This, along with anticipated royalty revenues from Celgene's sales of Thalomid<sup>®</sup> in the third and fourth quarter, will allow us to execute on our clinical development strategy for ENMD-2076 and fund current and planned operations through the second quarter of 2010. We are on solid financial footing and believe we are on the appropriate path to creating value for you.

We will continue to monitor our compliance with NASDAQ \$1.00 minimum and other listing requirements and will be proactive in seeking and evaluating all available options to maintain a public listing of the Company's securities. With respect to the \$1.00 minimum bid price requirement, it was reinstated by NASDAQ on July 31, 2009. As a result of the reinstatement and absent any further suspensions, the Company will have until January 15, 2010 to become compliant with the requirement.

We welcome your comments and questions and encourage you to contact Ginny Dunn, our Associate Director, Corporate Communications and Investor Relations, at 240-864-2643 or at [ginnyd@entremed.com](mailto:ginnyd@entremed.com).

Thank you, our shareholders, for your continued support.

Sincerely,

A handwritten signature in black ink, reading "Michael M. Tarnow". The signature is written in a cursive style with a long, sweeping flourish at the end.

Michael M. Tarnow  
Executive Chairman of the Board