Statement of Considerations

REQUEST BY UTC POWER, FOR AN ADVANCE WAIVER OF DOMESTIC AND FOREIGN RIGHTS IN SUBJECT INVENTIONS MADE IN THE COURSE OF OR UNDER A SUBTIER CONTRACT UNDER SUBCONTRACT NO. 4000009920 UNDER DOE PRIME CONTRACT NO. DE-AC05-000R22725; DOE WAIVER DOCKET W(A)-2004-035 [ORO-789]

Petitioner, UTC Power, has made a timely request for an advance waiver to worldwide rights in Subject Inventions made in the course of or under a subtier contract under UT-Battelle, LLC Subcontract No 4000009920 with Capstone Turbine Corporation (Capstone) under DOE Prime Contract No. DE-AC05-00OR22725. The scope of this project relates to the installation and testing of a distributed generation, combined heating, cooling, and power system for a building (BCHP). Under this subtier contract with Capstone, UTC Power will demonstrate a system with a 110 ton chiller/heater in combination with and powered by the waste heat from four Capstone 60kW micro-turbines. This work is sponsored by the Office of Distributed Energy Resources, Office of Power Technologies.

The total dollar amount of the subtier subcontract is \$655,465 over an approximately 14 month period of performance of which Petitioner is cost-sharing 58% or \$380,465. The period of performance is six months.

The Petitioner is a subsidiary of United Technologies Corporation (UTC) and can draw on the expertise and products of other UTC business units in the performance of BCHP tasks. UTC business units are manufacturers/developers of HVAC and power production equipment, and the integration of such equipment into BCHP solutions. Carrier Corporation, a subsidiary of UTC, is one of the world's largest manufacturers of HVAC equipment and is supplying the chiller for this project. UTRC, the central research arm of UTC, is performing contract research for DOE to extend the fuel to electric energy efficiency of the micro-turbines from 28% to near 40%, and has developed the technology to permit qualification and launch of the integrated microturbine, waste-heat driven absorption chiller product that will be demonstrated in a new application in the proposed project. UTC Power itself provides BCHP solutions through its microturbine/chiller system as well as fuel cell BCHP products. Thus, Petitioner's experience and expertise will contribute substantially to commercialization of the inventions made under the agreement.

UTC Power has a substantial financial investment directly related to the work to be performed under this agreement. UTC Power's budget for 2003 was about \$8.7 million, of which about \$1.7 million was allotted to its PureComfort[™] cooling, heating, and power system launched in 2003. In 2004, the projected budget for PureComfort[™] research and development is about \$3 million. UTRC receives approximately \$30 million annually from UTC for new technology and tool development, and about 25% of this amount has been aligned with new technologies of an advanced microturbine and BCHP systems. UTC contributed over \$5 million to a \$13.6 million project In collaboration with DOE for an advanced microturbine system. The prior BCHP collaboration for technologies to integrate a microturbine and an exhaust heat driven absorption chiller was valued at \$5.4 million, with UTC contributing about \$1.8 million.

Petitioner has agreed to the standard DOE waiver terms and conditions, including march-in rights, background patent and data provisions, retention by the government of a license, preference for U.S. industry and U.S. Competitiveness clauses.

Petitioner has agreed that any products embodying any waived invention or produced through the use of any waived invention will be manufactured substantially in the United States, unless the Petitioner can show to the satisfaction of DOE that it is not commercially feasible to do so. In the event DOE agrees to foreign manufacture, there will be a requirement that the Government's support of the technology be recognized in some appropriate manner, e.g., recoupment of the Government's investment, etc. The Petitioner has further agreed to make the above condition binding on any assignee or licensee or any entity otherwise acquiring rights to any waived invention, including subsequent assignees or licensees. Should the Petitioner or other such entity receiving rights in any waived invention undergo a change in ownership amounting to a controlling interest, then the waiver, assignment, license, or other transfer of rights in the waived invention is suspended until approved in writing by DOE.

Granting of the waiver should have little effect on competition since there are several competing technology options being applied to develop packaged BCHP systems.

Furthermore, grant of the requested waiver should serve as encouragement to other DOE contractors and subcontractors that significant cost sharing will be recognized as an acceptable consideration for granting greater rights in Subject Inventions.

In view of the substantial level of cost sharing by Petitioner and the objectives and considerations set forth in 10 CFR 784.4, all of which have been considered, it is recommended that the requested waiver for worldwide rights be granted.

Emily G. Schneider

Assistant Chief Counsel for Intellectual Property

Date: 8/12/04

Based on the foregoing Statement of Considerations and the representations in the attached Waiver Petition, it is determined that the interests of the United States and the general public will best be served by a waiver of U.S. and foreign patent rights, and therefore, the waiver is granted. This waiver shall not apply to a modification or extension of the cost-shared agreement where, through such a modification or extension, the purpose, scope or cost of the subtier subcontract has been substantially altered.

CONCURRENCE:

William P. Parks, Jr. Associate Deputy Assistant Secretary for Power Technologies

Date: 12/13/04

APPROVAL:

Paul A. Gottlieb Assistant General Counsel for Technology Transfer and Intellectual Property

Date: $\frac{2-15-EY}{2}$