

NTRD Program Disclaimers

1. Disclaimer of Endorsement:

The posting herein of progress reports and final reports provided to TCEQ by its NTRD Grant Agreement recipients does not necessarily constitute or imply an endorsement, recommendation, or favoring by TCEQ or the State of Texas. The views and opinions expressed in said reports do not necessarily state or reflect those of TCEQ or the State of Texas, and shall not be used for advertising or product endorsement purposes.

2. Disclaimer of Liability:

The posting herein of progress reports and final reports provided to TCEQ by its NTRD Grant Agreement recipients does not constitute by TCEQ or the State of Texas the making of any warranty, express or implied, including the warranties of merchantability and fitness for a particular purpose, and such entities do not assume any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represent that its use would not infringe privately owned rights.

**Texas Commission on Environmental Quality
New Technology Research & Development (NTRD) Program
Monthly Project Status Report
GTI Project #20485**

Contract Number: 582-5-70807-0018

Grantee: Gas Technology Institute

Date Submitted: August 10, 2006

Report for the Monthly period: July 2006

Starting Date: July 1, 2006

Ending Date: July 31, 2006

Section I. Accomplishments *(Please provide a bulleted list of project accomplishments as well as a description of their importance to the project.)*

| Accomplishment | Importance to the Project |
|---|---|
| Refrigerant mix is being adjusted to maximize system efficiency | The unit is a mixed refrigerant liquefier and the mix is being "tweaked" to maximize total system efficiency. |
| See Interim Reports completed and submitted in June | |
| | |
| | |

Indicate which part of the Grant Activities as defined in the grant agreement, the above accomplishments are related to:

| Accomplishment | Grant Activity |
|-----------------------------------|-----------------------|
| Engine component replacements | Tasks 1-6 |
| Demonstration site identification | Tasks 5 |
| Engine Controller Installation | Tasks 1 & 4 |
| Refrigerant Charging | Task 4 |

Section II: Problems/Solutions

| | |
|---|--|
| <p>Problem(s) Identified</p> <p><i>(Please report anticipated or unanticipated problem(s) encountered and its effect on the progress of the project)</i></p> | <p>No changes from previous month's report</p> <ol style="list-style-type: none">1) GTI is waiting for component parts that are on order.2) Locating an alternate field test site has taken significantly greater time and expense than initially estimated |
| <p>Proposed Solution(s)</p> <p><i>(Please report any possible solution(s) to the problem(s) that were considered/encountered)</i></p> | <p>No changes from previous month's report</p> <ol style="list-style-type: none">1. The project timeline has slipped while awaiting component parts from one of our suppliers.2. In order to prevent additional scheduling delays, GTI has identified an alternate field test site that will be proposed to TCEQ in a separate document. |

Action(s) Conducted and Results

(Please describe the action(s) taken to resolve the problem(s) and its effect)

No changes from previous month's report

1. GTI has requested interim project report time extensions.
2. Other contract modifications have been requested that will not change the project goals and objectives.

Section III. **Goals and Issues for Succeeding Period:** *(Please provide a brief description of the goal(s) you hope to realize in the coming period and identify any notable challenges that can be foreseen)*

- Continue systems refinement, efficiency enhancements, and system optimization activities that were initiated during October.
- Reach agreement on deployment location and begin on-site permitting, gas supply, and operating groundwork. This item will most likely continue for the next reporting period.



Date: 8-10-06

Authorized Project Representative's Signature

**J. Brian Weeks, Associate Director
Hydrogen Energy Systems
Gas Technology Institute**

NOTE: *Please attach any additional information that you feel should be a part of your report or that may be required to meet the deliverable requirements for tasks completed during this reporting period.*