OPPORTUNITIES IN THE CONSTRUCTION PHASE OF THE INTERNATIONAL THERMONUCLEAR EXPERIMENTAL REACTOR

By

Stephen O. Dean, Fusion Power Associates
William R. Ellis, Raytheon Engineers and Constructors
Anthony Favale, Northrop Grumman
Harold Forsen, Bechtel Group, Inc. (Retired)
Chris Hamilton, General Atomics
Samuel D. Harkness, Westinghouse Electric Co.
Robert C. Iotti, Raytheon Engineers and Constructors
Stephen L. Rosen, Houston Lighting and Power

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U. S. INDUSTRY

U.S. INDUSTRY IS INTERESTED IN PERFORMING GOVERNMENT-FUNDED FUSION R&D AND IN THE MANUFACTURING OF COMPONENTS FOR FUSION DEVICES

HOWEVER, OPPORTUNITIES HAVE BEEN SCARCE

THE MOST RECENT OPPORTUNITIES FOR INDUSTRY WERE PARTICIPATION IN THE ITER DESIGN AND PROTOTYPING PRIOR TO US WITHDRAWAL FROM THE PROJECT

A SUMMARY “OPPORTUNITIES IN THE CONSTRUCTION PHASE OF THE INTERNATIONAL THERMONUCLEAR EXPERIMENTAL REACTOR” BASED ON A SURVEY OF 34 U.S. COMPANIES SHOWED THE FOLLOWING INTEREST AREAS:

- **MOST INTEREST**
  - Magnet System, including superconductor and cable
  - Divertor System and Plasma Facing Components
  - RF Systems and Power Supplies
  - Blanket and Limiter

- **SIGNIFICANT INTEREST**
  - Systems Integration
  - Electron Cyclotron Heating
  - Electrical Systems
  - Control Systems
  - Balance of Plant
  - Construction Management
  - Safety and Environmental Systems
  - Heat Transport Systems

- **NICHE INTEREST**
  - U. S. Home Team Management
  - Assembly
  - Cryostat
  - Cryogenic Systems
  - Remote Handling Systems
  - Vacuum Systems
  - Vacuum Vessel
  - Diagnostics
U. S. INDUSTRIES PARTICIPANTS IN ITER SURVEY
AND THEIR AREAS OF INTEREST

Bechtel Group, Inc., San Francisco, CA
   Joint Central Team Engineering and Management
   Construction Management

BIW Cable Systems, Inc., North Deighton, MA
   Magnet System

Boeing Rocketdyne, Canoga Park, CA
   Remote Maintenance, Electrical Systems, Systems Integration,
   Breeding Blanket Development, Blanket and Shield, Control Systems,
   Cryostat, Cryogenic Systems, Divertor System, Heat Transport
   System, Plasma Facing Components, Power Supplies and Systems,
   Safety and Environmental Systems, Vacuum Vessel.

Brush Wellman, Inc., Cleveland, OH
   Divertor System, Plasma Facing Components

Calabazas Creek Research, Saratoga, CA
   Current Drive Systems, RF Systems

Chicago Bridge & Iron, Plainfield, IL
   Cryostat, Cryogenic Systems, Vacuum System, Vacuum Vessel

Coleman Research, Springfield, VA
   Remote Handling Systems (Viewing and Metrology)

Continental Electronics, Dallas, TX
   RF Systems and Power Supplies

Composite Technology Development, Inc., Lafayette, CO
   Magnet System (Insulation Materials), Cryostat, Cryogenic Systems,

Cryogenic Materials, Inc., Boulder, CO
   Magnet System
Dielectric Communications, Raymond, ME  
   RF Systems

Everson Electric Company, Bethlehem, PA  
   Magnet System, Power Supply Systems

Fluor Daniel, Irvine, CA  

General Atomics, San Diego, CA  
   Divertor and Plasma Facing Components, Blanket and Shield, ECRF, Diagnostics, Control Systems, Systems Integration, Breeding Blanket Development, Physics.

InterScience, Inc., Troy, NY  
   Control Systems, Diagnostics, Physics.

Intermagnetics General Corporation, Tyngsborough, MA  

INCO Alloys International, Inc., Huntington, WV  

Lockheed Martin, San Diego, CA  
   Magnet System, Systems Integration

Lodestar, Boulder, CO  
   RF Systems, Physics

McDonnell Douglas, St. Louis, MO  
   Divertor System, Plasma Facing Components

Nooter Corporation, St. Louis, MO  
   Blanket and Shield, Assembly
OMG Americas (formerly SCM Metals Products), Research Triangle Park, NC
    Blanket and Shield, Divertor, RF Systems

Oxford Superconducting Technology, Carteret, NJ
    Magnet System

POLY-WELD, Inc., Fort Collins, CO
    Assembly, Magnet System, Vacuum Vessel, Fabrication, Welding

Raytheon Engineers and Constructors, New York, NY

SAIC, San Diego, CA
    Systems Integration, Support Services

Schwarzkopf Technologies Corporation, Franklin, MA
    Plasma Facing Components

Sciaky, Inc.
    Plasma Facing Components, Divertor System

Stone and Webster Engineering Corporation, Boston, MA

Supercon, Inc., Shrewsbury, MA
    Magnet Systems

Thermacore, Inc., Lancaster, PA

Wall Colmonoy Corporation, Dayton, OH
    Magnet System(Reaction Heat Treatment of CS Coil Conductor)

W. J. Schafer Associates, Livermore, CA
    Systems Integration

Westinghouse Electric Company, Pittsburgh, PA
    Magnet System