TRIBAL ENERGY PROGRAM

FY2003 Program and Project Review Meeting
November 17, 2003
Lizana Pierce
DOE, Golden Field Office
Department of Energy

Advancing Energy and National Security through Science, Technology and Environmental Stewardship

DOE Budget of $23.4 Billion

- NNSA (37.8%)
- Energy (10.5%)
- Science (14.2%)
- Environment (34.4%)
- Corporate Management (3.1%)

Energy ($2.45 Billion) includes:
- Energy Efficiency and Renewable Energy ($1.3)
- Fossil Energy ($0.75)
- Nuclear Energy, Science and Technology ($0.38)
EERE’s Mission

The EERE’s mission is to strengthen America's energy security, environmental quality, and economic vitality in public-private partnerships that:

- Enhance energy efficiency and productivity;
- Bring clean, reliable and affordable energy technologies to the marketplace; and
- Make a difference in the everyday lives of Americans by enhancing their energy choices and their quality of life.
DOE’s Office of Energy Efficiency and Renewable Energy

$1.3 Billion Total EERE Budget Request (FY2004)

Energy & Water Development Request $444.2 Million

Tribal Energy Requested
FY2004 Budget: $6 Million
Renewable Energy Resources
Renewable Energy Technologies
DOE’s Tribal Energy Program

Tribal Energy Program

Promote tribal energy self-sufficiency and foster employment and economic development on tribal lands through the use of renewable energy

Authority

DOE’s Tribal Energy Program

Tribal Energy Program

“Indian land comprises 5% of the land area of the United States, but contains an estimated 10% of all energy resources in the United States”

“Wind resources in the Great Plains could meet 75% of the electricity demand in the contiguous 48 states.” (Native American Energy Development and Self-Determination Act of 2003)
“Indian households on reservations are disproportionately without electricity. A total of 14.2% of Indian households have no access to electricity, as compared to only 1.4% of all U.S. households.” Navajo accounts for 75% of the households without electricity (2000 EIA Report)
DOE’s Tribal Energy Program

Tribal Energy Program

Assist Tribes Meet Their Energy Goals

Developing in Cooperation with Tribes
- Peer Review (November 2001)
- Strategy Session (December 2001)
- Collaborative activities with Tribal and Inter-Tribal Groups

Providing Funding Opportunities
- Competitive Solicitations

Supporting Government-to-Government Relations
- Cooperative agreements between DOE and the Tribes
DOE’s Tribal Energy Program

Tribal Energy Program

Providing Information and Technical Assistance

Technical Assistance
- Expert Advise
- Models and Tools
- Resource Maps

Information and Support
- Regional Workshops
- Program Brochure
- Tribal Energy Website
- Guide for Tribal Energy Development (Under development)
DOE’s Tribal Energy Program

Funding Opportunities

First Steps Toward Developing Renewable Energy and Energy Efficiency

- Strategic planning
- Energy options analysis
- Capacity building
- Organizational development

Renewable Energy Development on Tribal Lands

- Feasibility studies
- Development projects (cost shared)

Chairman Tex Hall, Three Affiliated Tribes
Ground Breaking for Wind Turbine on the Fort Berthold Reservation
DOE’s Tribal Energy Program

Tribal Energy Program Organization

Program Management through DOE Headquarters, implementation through the DOE Golden Field Office, and technical support through the DOE’s Laboratories.

Program Management

Field Implementation

Technical Assistance

**Thomas Sacco**
Weatherization and Intergovernmental Program
Office of Energy Efficiency and Renewable Energy (EERE)
Department of Energy, HQ

**DOE Golden Field Office**
Project Manager, Tribal Energy Program
**Lizana Pierce**
(303) 275-4727

**Sandia National Laboratories, Albuquerque**
**Sandra Begay-Cambell**
(505) 844-5818

**National Renewable Energy Laboratory**
**Roger Taylor**
(303) 384-7389
Tribal Energy Program History

BETWEEN FY1994 AND FY2001, DOE FUNDED 51 PROJECTS TOTALING OVER $9.5 MILLION

Title XXVI Projects (Funded FY1994)
- 35 Projects in 13 States ($6.5 million)

Remote Applications Projects (Funded FY99)
- 8 Projects in 5 States ($1.9 million)

Tribal Colleges and Universities (Funded FY00-01)
- 7 Feasibility Studies in 6 States ($700,000)
- 1 Project in New Mexico ($431,000)

Solar Installation on Navajo Nation
Tribal Energy Program History

BETWEEN FY 1994 AND FY 2001, DOE FUNDED 51 PROJECTS TOTALING OVER $9.5 MILLION

- ■ = FY1994-98 Title XXVI Projects
- ▶ = FY1999 Remote Applications Projects
- ▸ = FY2000-01 Colleges & Universities Projects
Renewable Energy Projects on Tribal Lands

- Blackfeet Tribe Small-Scale Utility Grade Wind Turbine Project
- Nez Perce Tribe Biodiesel Pilot Project
- Ute Mountain Indian Reservation PV Water Pumping
- Turtle Mountain Band of Chippewa Tribe Wind Resource Assessment
Renewable Energy Projects on Tribal Lands

Pueblo of Laguna (Majors Ranch)
Solar and Wind Installations

Navajo Nation (Dilkon/Teesto Chapters)
PV Arrays on Navajo Homes

Jicarilla Apache Reservation PV Array on Dulce High School
Renewable Energy Projects on Tribal Lands

Utility Scale Wind Turbine
Rosebud Sioux Indian Reservation

Oneida Tribe of Indians of Wisconsin Solar Project
DOE’s Office of Energy Efficiency and Renewable Energy

Tribal Energy Projects

TOTAL OF 22 PROJECTS TOTALING $4.6 MILLION FUNDED FROM FY2002 SOLICITATION

Renewable Energy Projects (Funded FY2002)
- 12 Feasibility Studies in 12 States ($900,000)
- 2 Development Projects in 2 States ($2,200,000)

Renewable Energy Projects (Funded FY2003)
- 8 Feasibility Studies in 8 States ($1,500,000)

Rosebud Sioux Reservation,
July 4 Celebration
Tribal Energy Projects

TOTAL OF 22 PROJECTS TOTALING $4.6 MILLION FUNDED FROM FY2002 SOLICITATION

FY2002 Funded Projects:
- ● = 12 Feasibility Studies
- ◆ = 2 Developmental Projects

FY2003 Funded FY2002 Projects:
- ● = 8 Feasibility Studies
DOE’s Office of Energy Efficiency and Renewable Energy

FY2002 Tribal Energy Projects

Colville Confederate Tribes (WA)
Umatilla Indian Reservation (OR)
Confederate Tribes of Warm Springs (OR)
Kaw Nation of Oklahoma (OK)
Makah Tribe (WA)
Manzanita Band of Mission Indians (CA)
Mississippi Band of Choctaw Indians (MI)
Northern Cheyenne Nation (MT)
Sealaska Native Corporation (AK)
Pueblo of Jemez (NM)
**Ramona Band of Cahuilla Mission Indians (CA)**

Sault Ste. Marie Tribe (MI)
White Mountain Apache Tribe (AZ)
Yukon-Kuskokwim Health Corporation (AK)
Bristol Bay Native Corporation (AK)
Cherokee Nation (OK)
Lower Brule Sioux Tribe (SD)
Shoshone Paiute Tribes (NV)
St. Croix Tribal Government (WI)
Taos Pueblo (NM)
Tulalip Tribe (WA)
Viejas Tribal Government (CA)
FY2002 Renewable Energy Projects

Northern Cheyenne Nation
Wind Resource Assessment

Kaw Nation
Wind Resource Assessment

Colville Indian Power and Veneer Energy Substation
DOE Awarded $2.9 Million to 16 Tribal Clean Energy Projects

FY2003 PROJECTS:
◆ = 3 DEVELOPMENTAL PROJECTS
● = 4 FEASIBILITY STUDIES
■ = 9 FIRST STEPS STUDIES
FY2003 Tribal Energy Projects

Seven Projects in 6 States

Rosebud Sioux Tribe (SD)
Northern Cheyenne Tribe, Inc. (MT)
Assiniboine & Sioux Tribes of the Fort Peck Reservation (MT)
Native Village of Venetie (AK)
The Makah Indian Nation (WA)
Red Lake Band of Chippewa Indians (MN)
Fort Mojave Tribe (AZ)

Nine First Step Studies in 6 States

The Hopi Tribe (AZ)
Smith River Rancheria (CA)
Cabazon Band of Mission Indians (CA)
Seneca Nation of Indians (NY)
White Earth Reservation (MN)
Citizen Potawatomi Nation (OK)
Fort Sill Apache Tribe of Oklahoma (OK)
Yurok Tribe (CA)
Samish Indian Nation (WA)
Tribal Energy Program Funding

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Title XXVI</td>
<td>4,000</td>
<td>2,500</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Remote Power</td>
<td></td>
<td></td>
<td>1,900</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tribal Colleges</td>
<td></td>
<td></td>
<td></td>
<td>700</td>
<td>430</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FY 2002 Solicitation</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>3,000</td>
</tr>
<tr>
<td>FY2003 Program*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>5,000</td>
</tr>
</tbody>
</table>

* Congress appropriated $6,000 with $1,000 being non-discretionary
## DOE’s Tribal Energy Program Funding

<table>
<thead>
<tr>
<th>Fiscal Year</th>
<th>Enacted</th>
<th>Requested</th>
<th>Enacted</th>
<th>Requested</th>
</tr>
</thead>
<tbody>
<tr>
<td>FY2002</td>
<td>$3,000</td>
<td>$8,307</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FY2003</td>
<td></td>
<td></td>
<td>$6,000*</td>
<td></td>
</tr>
<tr>
<td>FY2003</td>
<td></td>
<td></td>
<td></td>
<td>$6,000</td>
</tr>
</tbody>
</table>

* Includes $1,000 for Council of Energy Resource Tribes (CERT)
Tribal Energy Program

- Features
- Current Events
- Funding Opportunities
- Projects on Tribal Lands
  - Project Overviews
  - Status and Reports
  - Contacts
- Information Resource
- Contacts

Tribal Energy Program  www.eere.energy.gov/tribalenergy
Tribal Energy Funding Opportunities

Announcements
Tribal Energy Program
www.eere.energy.gov/tribalenergy
Federal Grant Opportunities
www.fedgrants.gov/
Federal Funding Opportunities
www.fedbizopps.gov/

Electronic Application Submissions
http://e-center.doe.gov

Tribal Energy Program www.eere.energy.gov/tribalenergy
Web-Based Guide to Tribal Energy Development

- Framework for the planning and implementation of energy development strategies
- Tool for addressing energy needs and an aid in achieving energy vision

**Strategic Planning**
Where do you want to get to?

**Options Analysis**
Possible roads to the future.

**Institutional Structures**
The vehicles of change.

**Project Development**
Where the rubber meets the road.
Guide to Tribal Energy Development

Development Processes
- Strategic Planning
- Options Analysis
- Organizational Development
- Project Development

Resource Library
- Energy Resources
- Technologies
- Costs
- Risk Factors
- Legal Issues
- Financing Options
- Contacts
Questions

“Tribes Leading the Way to Renewable Energy”

American Indian Report
June 2002