



Northwest Arctic Regional Energy Summit

Our Crisis

Our Reality

Our Solutions



July 29 - 31, 2008 • Kotzebue, Alaska

TABLE OF CONTENTS



	Page
Executive Summary	1
Introduction	4
Summit Planning	6
Summit - July 29, 2008	8
Energy and Industry Presentations	9
Summit – July 30 - 31, 2008	11
Resource Breakout Sessions	11
Sub-regional Breakout Sessions	12
Sub-region Goals and Recommendations	14
Closing Remarks	15
Conclusion	17
Post Summit	18
Acknowledgement	19

Attachments:

- A** NWARES Summit Agenda
- B** NANA Energy Survey Results
- C** Jay Hermanson, NANA Pacific, LLC & Douglas Vaught, V3 Energy, LLC Energy Options – Presentation
- D** Eugene Smith, Manilaq & Noel Janda, Comtec Enterprises, Dark Fiber - Presentation
- E** Mike Harper, Alaska Energy Authority, Alaska’s Energy Plan – Presentation
- F** Rich Seifert, University of Alaska Fairbanks, Weatherization/Retrofit Program – Presentation
- G** Brad Blackstone, Alaska Native Tribal Health Consortium, Water & Sewer Impacts/Plans – Presentation
- H** Martin Shroyer, Kotzebue Electric Association, Electrical Energy Update & Plans – Presentation
- I** Meera Kohler, Alaska Village Electric Cooperative, Electrical Energy Update & Plans – Presentation
- J** Sandy Huss, Husky Enterprises, Energy Efficiency & Conservation Awareness – Presentation
- K** Sub-regional Breakout Goals and Recommendations
- L** Contact Information of Presenters and Resources Listing

Northwest Arctic Regional Energy Summit

July 29, 30, 31, 2008 – Kotzebue, Alaska



“Our lives will change dramatically, no matter what we do to help ourselves. Information sharing, information gathering and planning are important for our future, for our lives and equally important, our lifestyles.” - Summit Leader

EXECUTIVE SUMMARY

BACKGROUND

The Northwest Arctic Regional Energy Summit (NWARES) was held on July 29, 30 and 31, 2008 in the region’s hub community of Kotzebue, Alaska. The NWARES sponsors include the NANA Regional Corporation (NRC), Northwest Arctic Borough (NWAB), and Maniilaq Association. In late 2006/early 2007, NRC initiated an assessment of the impending energy crisis and the potential impact to the NWAB communities. This action resulted in grant support from US Department of Energy Tribal Programs for research and feasibility studies and addressing next steps for informing the residents of the NWAB. Strategies and planning for a regional summit commenced in January 2008.

The purpose of the Summit was for residents of the NWAB communities to become knowledgeable of the current energy crisis and what it means to their communities, share and discuss ideas, produce goals and recommendations, and to work collectively to find immediate and long term solutions for affordable and reliable energy resources.

The summit general session, and round robin resource and sub-regional breakouts were effective methods of information delivery, sharing and networking. The agenda provided a balance of topic discussions and presentations on effects of the energy crisis relating to:

- Current status of the energy crisis within the region
- Conservation, energy efficiency, and weatherization
- Options for alternative and renewable energy resources
- Community, sub-regional and regional scale planning
- Funding resources and options

FINDINGS

The cost of living in rural Alaska in 'normal' times is elevated. In the midst of this energy crisis, the NWAB communities face excessively high electrical, fuel, transportation, and costs of living which continue to rapidly increase with no foreseeable relief in sight. At the writing of this report, the highest recorded price for gas in the NWAB region was \$9.29 per gallon.

Many families live in government subsidy homes built over 30 years ago that were poorly constructed and insufficiently insulated at the time of construction. Inadequate water and sewer infrastructures, seasonal fuel delivery limitations, and fewer transportation services all contribute to the high costs of living in rural Alaska.

The high cost of fuel has had a negative impact on the lifestyle of residents of the NWAB. Many residents move to urban areas in an attempt to resolve their energy issues. The fuel shortage and cost of available fuel decreases hunting and fishing activities for the remote communities that depend on subsistence food gathering.

In addition:

- For monthly electric bills, families spend on average \$294.69 up to as much as \$900.00 (NANA Survey)
- Long-term energy solutions can take 3 years or more to develop (NANA Survey)
- Rural energy costs are approximately 50% higher than urban areas (AEA)
- Northwest Alaska water and sewer infrastructure costs are increasing due to aging facilities, and maintenance and new construction of treatment plants, sewage lift stations, and water storage tanks (ANTHC)
- Construction season is short and construction costs are higher (ANTHC)
- Funding constraints (ANTHC)
- Remote location and a climate where two-thirds of the year (247 days) are below freezing (ANTHC)
- Potential threats to PCE continue

The advantages of living in rural Alaska were also highlighted (Seifert):

- Local food sources from hunting, fishing, and gathering activities for berries and plants
- Experience in and known methods of food preservation
- Available renewable energy resources, particularly wind and wood, depending on location
- Local residents' knowledge of local natural resources
- Long standing tribal, village, and regional organizations
- Experiences of various rural entities, such as the Kotzebue Electric Association (wind power); Alaska Village Electric Cooperative (electrical infrastructure); Housing Authorities (housing technologies, comfort, energy conservation)

RECOMMENDATIONS/CONCLUSION

The NWAB communities recognize that the alternative and renewable resources their lands provide could potentially address and sustain energy needs. Research in the Northwest Arctic region has shown that these potential alternative and renewable resources include: combined heat and power systems (cogeneration), wind energy, hydroelectric, solar, geothermal, tie-lines/intertie, district energy distribution systems, and natural gas and fuel cell technology.

Participants were reminded of a number of studies conducted in the 1970's by NRC and Chevron and that the information is available for review. Strong support to establish a Northwest Energy Authority or Cooperative was evident. Participants also stressed the need for an energy disaster declaration, less dependency on fossil fuels, building roads between communities, training energy raters, educating students in schools and parents at home to make energy conservation a lifestyle, and returning to self-sufficiency by gathering firewood.

Summit participants expressed their willingness to become informed and to take ownership and responsibility to bring this knowledge back to their local communities and governing bodies to take action. A commitment was made by the leading organizations to follow up with an appropriate gathering as well as ongoing discussion in the local communities on what action steps are taken to address the crisis at hand and long term sustainable energy. It is apparent; the need for action is *now*.



"...when we come to consensus, it is powerful... I recognize the strength we have when we put our minds together and work as one, I think we all know this, and, after all, we are all in this temporary crisis together and we must make this our soon to be reality, one that promotes our culture and subsistence lifestyle, even if that means we have to turn off computers and televisions and use energy efficient light bulbs. Reality cannot set in fast enough." - Summit Leader

Kobuk homes are built high off the ground due to seasonal flooding. Concerns were raised at the Summit about the structure of a high foundation and heat loss and how to best address these situations.



Kobuk, AK Spring 2008 - Photo courtesy of L. Schuerch, Jr.

INTRODUCTION



"I don't know which I should worry about more, getting flooded out of my home or if I'm going to be able to heat it." - Elder Summit Participant

In the late fall of 2006 and early 2007, NANA Regional Corporation initiated an assessment of the impending energy crisis and how it would impact the Northwest Arctic region and NRC Shareholders. Priorities identified at this early planning stage included:

- Collaboration with regional leadership, local, borough, state and federal representatives
- Involvement of local communities within the NWAB region in energy decision making
- Coordination of a regional energy summit
- Development of a regional energy plan and policy
- Development of appropriate energy sources for the socio-economic well-being of regional communities
- Improved understanding of energy sources available to the communities in the region

In collaboration with the Northwest Arctic Leadership Team (NWALT), NRC sought support for strategic energy planning primarily from the Northwest Arctic Borough, Maniilaq Association, Kotzebue Electric Association, Northwest Inupiat Housing Authority and Alaska Village Electric Cooperative as well as other entities. In September, 2007, NRC

was awarded three grants from the Department of Energy Tribal Program for strategic energy planning, energy options analysis, and feasibility studies. Project activities began in October, 2007.

In January 2008, NRC, NWAB and Maniilaq Association, the regional nonprofit health and social services organization, partnered to begin the planning for hosting the Northwest Arctic Regional Energy Summit (NWARES) in the region’s hub community of Kotzebue, Alaska.

The purpose of the summit was to create awareness, strategize and generate localized solutions to the energy crisis and discuss long term energy solutions by bringing in residents from each of the eleven (11) communities of the Northwest Arctic Borough including one (1) community of the North Slope Borough (Point Hope). An underlying goal was for the NWAB communities to share common concerns and work together to seek solutions.

As one of the most remote areas in the state, the NWAB continually faces serious problems of sustaining basic infrastructure a cost of living which has been compounded by the looming energy crisis. NANA Pacific research indicated fuel prices increased by 65% during the 2007-2008 winter. Diesel fuel has been the main source of energy to the infrastructure in the region for heat and power generation.

Table 1 represents fuel costs in the communities in the region taken by phone poll on August 7, 2008. *Prices shown in the noted communities reflect the cost prior to the delivery of fuel for the summer/fall 2008 season delivery, at which time there will be another increase in cost per gallon:

<i>NWAB Community</i>	<i>Cost per gallon</i>	
	<i>Stove Oil</i>	<i>Gas</i>
*Ambler	\$7.85	\$8.24
Buckland	\$7.00	\$7.00
Deering	\$7.75	\$7.59
*Kiana	\$6.45	\$7.00
*Kivalina	\$4.85	\$5.85
*Noatak	\$9.79	\$9.29
*Noorvik	\$5.20	\$5.10
*Selawik	\$6.03	\$6.23
*Shungnak	\$8.09	\$7.99
Kotzebue	\$7.15	\$7.15

Table 1

The price concerns are closely connected to other issues. These include poor quality housing, fragile electric, water and sewer infrastructures, dependence on air travel, and seasonal transportation with delivery limitations. The Northwest Arctic Borough communities recognize that the alternative and renewable resources their lands provide could potentially address and sustain this infrastructure. Research in the Northwest Arctic

region has shown that potential alternative and renewable resources include combined heat and power systems (cogeneration), wind energy, hydroelectric, solar, geothermal, tie-lines/intertie, district energy distribution systems, natural gas and fuel cell technology.



Kotzebue sub-region breakout session

SUMMIT PLANNING

Summit planning efforts launched into high gear in early May 2008 for the three day regional summit scheduled for the end of July for an estimated 200 registered participants from state, borough, tribal and local governments, industry representatives and local community members. The communities of the Northwest Arctic Borough included:

- Ambler
- Buckland
- Deering
- Kiana
- Kivalina
- Kobuk
- Kotzebue
- Noatak
- Noorvik
- Selawik
- Shungnak
- Pt. Hope (a North Slope Borough community served by Maniilaq Association)

FUNDRAISING

Fundraising was fundamental to the success of the summit. Local, regional and statewide energy related organizations contributed to the summit through financial and staff support to assist the Northwest Arctic Borough in planning and implementing the summit.

Contributing organizations include:

- Alaska Housing Finance Corporation (AHFC)
- Alaska Village Electric Cooperative (AVEC)
- Denali Commission
- Maniilaq Association
- NANA Regional Corporation
- Northwest Arctic Borough
- NOVA Gold
- Shell Exploration
- Teck Cominco
- U.S. Department of Agriculture (USDA)

Event and logistics planning included representation and collaboration from the following local, regional, and statewide organizations and agencies: AHFC, AVEC, Chukchi Campus/UAF, City of Deering, Deering-Ipnatchiaq Electric Company, Husky Enterprises, Kotzebue Electric Association, KOTZ Radio, Maniilaq Association, NANA Regional Corporation, NANA Pacific, Northwest Arctic Borough, Northwest Inupiat Housing Authority, Renewable Energy Alaska Program, and RurAL CAP. Members and staff from these organizations met seven times between May and the end of July to determine the content, speakers, format, and expected outcomes for the Summit.

COMMUNITY OPINIONS ON ENERGY - SURVEY

In July, 2008 a survey (Attachment A) was conducted in eight (8) of the eleven (11) Northwest Arctic Borough communities which included Ambler, Buckland, Deering, Kivalina, Kobuk, Noatak, Selawik and Shungnak. Survey data resulted in:

- A better understanding of the opinions of the community residents about alternative individual and community solutions to the increasing costs of energy
- Possibilities for short and long term energy solutions
- Support for possible funding opportunities related to renewable energy
- Integration of perceptions about energy options for all Northwest Arctic Borough communities

Survey results further yielded a snapshot of current energy use and exploration of ways to provide immediate relief to communities. Data reflected whether homes were heated with fuel or wood heat; the levels of electricity usage; ways of improving home energy efficiency; and transportation costs.

Questions were asked about the potential for alternative and renewable energy resources including: combined heat and power systems; wind energy systems; hydroelectric; solar; geothermal; interties and tielines; district energy distribution; and natural gas. Participants were also asked about the level of confidence they had in particular entities to lead the alternative energy effort. The entities discussed were federal, state, tribal, and city governments, the regional corporation, environmental groups, and a regional energy authority or cooperative.

John Long, Jr. of Pt. Hope expresses his concerns in general session.



Photo courtesy of R. McBride



“This is a temporary crisis and soon after this will just be our reality.”
- Professor Rich Seifert

SUMMIT - JULY 29

195 participants registered for the Summit. Many unregistered participants also attended the event held at the Kotzebue Middle/High School bringing estimates to well over 200 attendees. Representation included local community members, tribal, city, and borough members, local enterprises, university and state government officials as well as industry representation.

On opening day, Summit Coordinator Gia Hanna welcomed everyone in attendance and those listening via KOTZ radio and the internet. Following an invocation by David Miller, opening remarks were provided by regional and state leaders:

- Clement Richards, President, Northwest Arctic Borough
- Representative Reggie Joule, Alaska State Legislature
- Senator Donny Olson, Alaska State Legislature
- Ian Erlich, President, Maniilaq Association
- Siikauraq Martha Whiting, Mayor, Northwest Arctic Borough and,
- Don Sheldon, Board Chair, NANA Regional Corporation.

The speakers set the stage for an exciting and challenging three days of interacting, networking and partnering to create ideas and generate solutions for short and long term needs for the Northwest Arctic residents. Mayor Siikauraq Whiting challenged participants to use this time of crisis as an opportunity to impact positive change.

Summit Moderator, Sarah Scanlan, Deputy Director of RurAL CAP, reviewed the agenda and expected outcomes. The agenda provided for dissemination of research and data from recognized experts in the field during general sessions; smaller breakout sessions targeting specific programs and resources; sub-regional breakouts as well as opportunities throughout the conference for question and answer periods for participants.

Clyde Ramoth of Selawik shares his concerns in a general session question and answer period.



Photo courtesy of R. McBride

ENERGY AND INDUSTRY PRESENTATIONS

Dr. Brian Saylor presented the results (Attachment A) of the *NANA Energy Survey* conducted in July on consumption attitudes, behaviors, and levels of awareness regarding renewable energy options available in each community in the NWAB.

Following the survey results, the first panel reported on '*Sustainable Alternative/Renewable Energy Resources in Northwest Arctic*':

- Jay Hermanson, Program Manager of NANA Pacific, LLC discussed various alternative and renewable energy options and their potential in the Northwest Arctic including biomass, geothermal, and hydroelectric (Attachment B);
- Douglas Vaught, P.E. of V3 Energy, LLC, presented on the wind power technologies being used or planned in the Northwest Arctic (Attachment B);
- Eugene Smith, Chief Information Officer of Maniilaq Association and Noel Janda, President of Comtec Enterprises, Ltd. discussed the *Dark Fiber* project which

could create a low cost permanent power grid and modern fiber telecommunications infrastructure combined with development of the region's natural gas reserves (Attachment C).

Mike Harper, Deputy Director, Rural Energy, Alaska Energy Authority (AEA) provided an update on *Alaska's Energy Plan, Power Cost Equalization, Denali Commission/AEA programs and AEA's Bulk Fuel Loan Program* (Attachment D).

Professor Rich Seifert, University of Alaska Fairbanks, Energy and Housing Specialist, spoke on the *Weatherization/Retrofit Program*. Professor Seifert addressed cold and marine climate homebuilding techniques and renewable energy use for prospective homeowners (Attachment E).

A *Youth Energy Presentation* was made by Kotzebue High School students on their 2008 Science Fair Project: *'From Fryer to Furnace'*, a demonstration by Kelsey Maslen on used cooking oil; *'Investigating Anti-Bacterial Properties of Seal & Beluga Oil'* by Denali Whiting and; *'The Effects of Global Warming on Caribou Migration Patterns'* by Reid Magdanz.

Brad Blackstone, Alaska Native Tribal Health Consortium presented *'Water & Sewer Impacts/Plans'*, an update on the short and long term water and sewer installation and repair plans for the existing infrastructure in the Northwest Arctic (Attachment F).

The final presentation on day one was *'Electrical Energy Updates & Plans'*, a discussion on the current and forecasted costs for the next 6-18 months in the Northwest Arctic by Martin Shroyer, Manager, Kotzebue Electric Association (Attachment G) and Meera Kohler, President, AVEC (Attachment H).

The first day adjourned with participants having heard about the many potential long term alternatives for addressing the energy crisis, and what the near term plans were with electricity, water/sewer, along with fuel and gas. Participants were asked to think about this information and the impacts on their communities and to bring their feedback to the sub-regional breakouts the next day.

Buckland/Deering
sub-region
breakout session



SUMMIT – July 30 - 31

Following invocation by Norman Westdahl, Summit Moderator Sarah Scanlan briefly recapped activities of the first day. Day two of discussions began with the final panel of presenters on *'Fuel Distributors Updates & Plans'*, a discussion on current fuel costs and trends. Presenters included: Karl Potts, President, Kikiktagruk Inupiaq Corporation; Bob Cox, General Manager, Crowley Petroleum Distribution and Kirk Payne, President, Delta Western, Inc. As was the case with other question and answer periods following each of the previous day's panel presentations, this also was a lively exchange between the participants and fuel distributors. Residents expressed their concerns about how fuel prices are determined and what could be done to minimize increases.



"The summit was excellent ...I am hopeful that there will be follow up on moving our region to the next level of energy usage. It has become difficult for our residents to reside in a very expensive place to live." - Summit Participant



Noatak sub-region breakout discussion

RESOURCE BREAKOUT SESSIONS

At the conclusion of the morning's presentations in general session, the Summit broke out into concurrent round robin groups where participants rotated between three one-hour sessions on the following resource topics:

1. *Long Term Alternative Energy Options*
Jay Hermanson, Douglas Vaught, Ingemar Mathisson
Presenters provided detailed information and answered questions about the potential renewable energy options available for each community in the Northwest Arctic Borough.
2. *Weatherization Programs*
Guy Adams, Executive Director, Northwest Inupiat Housing Authority
Bob Brean, Director of Research & Rural Development, AHFC
Presenters described what the plans were for the increase in Weatherization funds, which communities and homes would be served, and what the regulations and application processes were for a community to receive services.
3. *Energy Efficiency & Conservation Awareness*
Lisa Michael, Energy Manager, RurAL CAP
Sandy Huss, Senior Project Manager, Husky Enterprises, LLC (Attachment I)
Professor Rich Seifert, University of Alaska Fairbanks
Presenters provided techniques and tools for participants that result in a reduction in energy costs and what programs are available.



Pt. Hope sub-region breakout discussion

SUB-REGIONAL BREAKOUT SESSIONS

The final activity on day two was the first of two '*Sub-regional Breakout Sessions*'. Participants broke out into five (5) facilitated discussion groups representing the sub-regions of the Northwest Arctic Borough and Pt. Hope to discuss recommendations for the respective communities in each sub-region. The intent of this format was to provide the

communities within each sub-region an opportunity to work collectively to produce a listing of their recommended workable short and long term goals, which entity the participants felt was responsible to carry out the top strategies, and the timeline for getting things done. The Northwest Arctic Borough sub-regions were broken down by the following neighboring communities:

1. Ambler, Kobuk, Shungnak
2. Kiana, Noorvik, Selawik
3. Buckland, Deering
4. Kivalina, Noatak, Pt. Hope
5. Kotzebue

On the third and final day of the summit, invocation was led by John Forrester and sub-regional breakout sessions reconvened. At the closing of the sessions, each sub-region selected representatives to present the results of their discussions to the general session summit floor, (Attachment K).



"...The outputs greatly surpassed my expectations from over a year ago when this was first conceptualized. The people I spoke with all had positive reviews and commentary on the summit." -Summit Presenter



Ambler, Kobuk, Shungnak sub-region breakout session

SUB-REGION GOALS AND RECOMMENDATIONS

There were numerous commonalities of goals and recommendations across the sub-regions including:

- individuals and communities becoming self-sufficient
- addressing immediate Elder needs
- official declaration of energy disaster
- creating a regional energy authority with assurance of local community representation
- creating local community energy taskforce
- sub-regional bulk fuel partnerships for purchases
- gathering and accessibility of firewood, wood pallets
- less dependence on fossil fuels
- educating parents
- adopting educational curriculum in elementary, middle and high schools,
- supporting research and exploration of feasible alternative and renewable energy sources in the region
- funding for energy initiatives and projects
- training energy raters
- the need for experienced grant writers, grant managers, and financial planners
- updating community comprehensive plans
- housing weatherization projects and coordination of delivery between contractors
- building ice roads from the hub community that stores fuel
- building transportation structure and road access between sub-region communities as well as other communities outside of the region
- tracking energy use
- bulk fuel storage eligibility and purchasing issues; upgrades, compliance, insurance, maintenance and operating training
- bulk purchases of boilers, wood stoves
- knowledge sharing and communications, website internet, newsletter, email
- identify and help those in dire need
- lobby as a community/region/group
- work with local electric companies
- create a supplement 'PCE' (power cost equalization) for Kotzebue
- usage/recycling of cardboard, waste paper, waste oil
- deep water port
- educate and approach housing authorities and contractors
- utilize Red Dog port site for short term fuel storage fuel pipeline from port to community

Though the main topic of discussion was issues related to energy, participants expressed concern for maintaining and protecting the subsistence lifestyle by continued responsible stewardship of the lands, animals, waters, and natural resources.

Kiana, Noorvik, Selawik in
sub-region breakout session



The goals outlined in the sub-regions identified a variety of entities which should take the lead or responsibility to initiate the next steps as well as entities to approach as a resource for their energy activities. Some of those identified were: NWALT, NRC, NWAB, local tribal and/or city governments, newly created regional energy authority, energy industry, research and exploration entities, RurAL CAP, NIHA, AVEC, KEA, Maniilaq, State Department of Transportation, AEA, Arctic Slope Regional Corporation, AHFC, local subsistence committees, Alaska Industrial Development & Export Authority (AIDEA), and NANA Resource Specialists in each community.

Participants recognized the importance of taking individual and personal responsibility that position them to affect positive changes. The need to inform their local governments and share outcomes of the summit was emphasized. Many felt that the timeline for the majority of the goals and recommendations was immediate.

With local knowledge and input from participants at the regional energy summit and data and studies from experts in energy alternatives, participants collectively pursued immediate and long term solutions in response to the energy situation and crisis. Summit participants returned to their communities better informed about the energy issue and crisis and a desire to take action starting within their own local communities.

CLOSING REMARKS

In his closing remarks, Ian Erlich, Maniilaq President, reiterated comments by Mayor Whiting and Professor Seifert that a community comes together in a time of crisis and that the many issues regarding the energy situation 'would soon be our reality'. Ian stated that dramatic change is inevitable and that information gathering and sharing as well as planning is equally important for sustaining current lifestyles:



"Our lives will change dramatically, no matter what we do to help ourselves. Information sharing, information gathering and planning are important for our future, for our lives and equally important our lifestyles.

Clearly we need to make adjustments in our daily lives, whether we like it or not, we all will have to decide [to] keep the television on all night or struggle to turn it off before going to sleep. Should I keep my computer and monitor on all night or turn it off? I might not be able to ride around town just for fun much longer, it costs too much. We all will change our minds eventually, we cannot afford to take energy for granted, it's too expensive and I hate to admit it, even now, it is wasteful.

This summit has been a benefit to every one of us, I am certain of this. We can all take away information that we can use today. I hope we can get Sandy Huss' presentation published and distributed, it has so much practical information that will save anyone money, it really is just a matter of time, we all will eventually make those kinds of changes and improvements. Sandy, if I can get a copy of your presentation, Maniilaq will publish and mail to all in our bulk mailing list.

I can't wait for us to have a follow up meeting, if we can move forward on just one of the major issues raised here, it is gonna be cool. Whether it is a power grid sending energy through a combination of wind and hydro to offset diesel or energized single source with geothermal power or natural gas, I am certain we will get something going and we will do it while providing jobs.

We have a lot of work ahead, we will progress forward, this summit reminds me of when we used to gather for regional strategy meetings. Those meetings were so significant that even more than 10 years after the last one, legislative staffers in D.C. were still telling their colleagues that they are so impressed with Northwest Alaska because we still gather and come to consensus with regional strategy meetings. I was not about to ruin their impression, it shows that when we come to consensus, it is powerful.

We had great presenters and presentations from business and organizations both local and statewide, we thank you very much. It is nice to see so many of our people who have moved out of region, back to help, thank you very much.

Last but not least, thank you all, I recognize the strength we have when we put our minds together and work as one, I think we all know this, and, after all, we are all in this temporary crisis together and we must make this our soon to be reality, one that promotes our culture and subsistence lifestyle, even if that means we have to turn off computers and televisions and use energy efficient light bulbs. Reality cannot set in fast enough. May God be with you all and bless us as we turn this crisis into opportunity."

CONCLUSION

The Northwest Arctic Regional Energy Summit brought the people of the Northwest Arctic Borough communities together to become knowledgeable of the energy situation, share and discuss ideas and work together to find solutions to the energy crisis, discuss short and long term goals, and to discuss further who would be responsible for follow up and by when.

Significant to the success of meeting the objectives of the Summit was the level of response from the participants and their willingness to become informed, begin to take ownership and responsibility to do their part first by attending the summit and ultimately bringing this knowledge back to their local communities to take action. The reality of the energy crisis in Northwest Arctic Borough homes and daily lives was clearly conveyed by the energy industry presentations and survey data of the current energy trends and continually increasing cost of living and fuel prices in the Northwest Arctic communities.

Information on conserving energy, weatherization and long-term alternative and renewable energy resources added balance to the discussion of the energy crisis and what individuals, communities, or the region could do to make a positive impact now and in the future. Questions and concerns by the participants were genuinely expressed on how to respond in order to care for their families in the face of the energy crisis.

Participants indicated it was a very informative and productive summit, and expressed their interest in following through and taking action.

Additionally, the intent is to utilize the knowledge and networking gained at this summit, the information of resources and expert and industry presentations, and this final summit report as documentation for depicting the reality of the energy crisis in the Northwest Arctic communities.

The expectation is that this summit event and the resulting final report can become tools to aid in planning and development of projects, seeking donor and funding support and other activities related to addressing energy needs for NWAB communities. The hope is that all involved will do their part to take action from the highest government level, to regional leadership, local communities and each individual.

POST SUMMIT

Within the two week period following the Summit, leaders from the main sponsors of the NWARES 2008, NANA Regional Corporation, Maniilaq Association and the Northwest Arctic Borough, met to discuss next steps and agreed to the following:

- Each regional organization committed seed money to start up a regional energy cooperative/authority and,
- The regional organizations will work with individual communities in the region to identify the appropriate representative from each community for consideration to serve on the above referenced entity.

Each leading organization will continue their more immediate efforts:

- The Northwest Arctic Borough is working to help each community with small weatherization efforts, in coordination with NIHA
- Maniilaq is currently advertising for a Tribal Energy Specialist
- NANA is continuing their long term renewable alternative efforts in each of the communities based on the profiles that were done in February 2008
- NANA is currently facilitating discussions with Ambler, Kobuk and Shungnak on biomass assessments
- NANA is planning to hire a Village Economic Development Director by the end of August to assist with regional energy summit recommendations
- As of the end of August 2008, NANA completed the Community Opinions on Energy survey with ten of the eleven Northwest Arctic communities. NANA has committed to sharing the results of the survey with the respective communities

In closing, the Summit is a great start to moving forward with the many tasks ahead for resolving the energy issues facing the residents of the Northwest Arctic communities. The sponsoring organizations thank the many committed people for their interest and dedication to this effort and look forward to the work ahead.



"I really thought it was the most effective energy conference I have ever attended - the format, the topics, the presenters, the audience, the logistics, everything about it was terrific...I love working with such energized people!"

- Summit Presenter



Quyaana and thank you to conference presenters, participants, sponsors, volunteers, vendors, and donors for your contribution and efforts towards making the NWARES 2008 Summit a successful event with outcomes that lead to long-lasting results.

Summit Sponsors

- NANA Regional Corporation
- Northwest Arctic Borough
- Maniilaq Association

Major Financial Sponsors

- Alaska Housing Finance Corporation (AHFC)
- Alaska Village Electric Cooperative (AVEC)
- Denali Commission
- Maniilaq Association
- NANA Regional Corporation
- Northwest Arctic Borough
- NOVA Gold
- Shell Exploration
- Teck Cominco
- U.S. Department of Agriculture (USDA)

Presenters

- Guy Adams, Northwest Inupiat Housing Authority
- Bob Brean, Alaska Housing Finance Corporation
- Bob Cox, Crowley Petroleum Distribution
- Mike Harper, Alaska Energy Authority
- Jay Hermanson, NANA Pacific, LLC
- Sandy Huss, Husky Enterprises, LLC
- Noel Janda, Comtec Alaska
- Meera Kohler, Alaska Village Electric Cooperative
- Reid Magdanz, Kotzebue Middle/High School
- Kelsey Maslen, Kotzebue Middle/High School
- Lids Michael, RurAL CAP
- Kirk Payne, Delta Western, Inc.
- Karl Potts, Kikiktagruk Inupiat Corporation
- Brian Saylor, NANA Pacific, LLC
- Martin Shroyer, Kotzebue Electric Association
- Rich Seifert, University of Alaska Fairbanks
- Eugene Smith, Maniilaq Association
- Doug Vaught, V3 Energy, LLC
- Denali Whiting, Kotzebue Middle/ High School

Media/Logistics

- KOTZ Radio
- D'Anne Hamilton, Northwest Arctic Borough
- Pierre Lonewolf, KOTZ Radio
- Maija Lukin, NANA Regional Corporation
- Minnie Naylor, Northwest Arctic Borough
- Teri Naylor, Northwest Arctic Borough
- Clara McConnell, Northwest Arctic Borough
- Dean Westlake, KOTZ Radio
- Robyn Westlake, Maniilaq Association

Breakout Facilitators/Scribes

- Al Adams, NWAB & Maniilaq Association
- Helena Hildreth, Northwest Arctic Borough
- Jackie Hill, Maniilaq Association
- Jade Hill, Northwest Arctic Borough
- Linda Joule, Native Village of Kotzebue
- Angela Joule, Northwest Arctic Borough
- Janice Westlake-Reich, NANA Board Member
- Sarah Scanlan, RurAL CAP
- Cole Schaeffer, Native Village of Kotzebue
- Ann Sieh, OTZ Telephone
- Verna Westlake, Northwest Grant Resources

Planning Committee

- Sonny Adams, NANA Regional Corporation
- Guy Adams, Northwest Inupiat Housing Authority
- Matt Bergen, Maniilaq Association
- Gia Hanna, NANA Pacific
- D'Anne Hamilton, Northwest Arctic Borough
- Jay Hermanson, NANA Pacific
- Jackie Hill, Maniilaq Association
- Jade Hill, Northwest Arctic Borough
- Sandy Huss, Husky Enterprise
- Meera Kohler, Alaska Village Electric Cooperative
- Hannah Manser, REAP
- Ruth Moto-Hinsbergen, Ipnatchiaq Electric Co.
- Brad Reeve, Kotzebue Electric Association
- Chris Rose, REAP
- Lincoln Saito, UAF Chukchi Campus
- Bobby Schaeffer, Northwest Arctic Borough
- Pete Schaeffer, Community Leader
- Dean Westlake, KOTZ Radio

Host Facility

- Northwest Arctic Borough School District

Summit Logo & Cover Design

- Robyn Westlake, Maniilaq Association

Final Report & Layout

- Gia Hanna, NWARES Coordinator
- Sarah Scanlan, RurAL CAP
- Verna Westlake, Northwest Grant Resources

Summit Facilitation

- Coordinator – Gia Hanna
- Moderator – Sarah Scanlan, RurAL CAP