

NHA Public Affairs Packet



NHA Board Meeting, April 25, 2010

Table of Contents

This packet contains NHA press releases as well as a representative sampling of articles related to conventional hydropower, pumped storage, and hydrokinetic technologies that have appeared in the press since the last board meeting. NHA press releases appear first followed by articles in chronological order.

NHA Press Releases

American Rivers and NHA Pleased to Host Workshop on Climate Change and Hydropower

NHA Welcomes New Leadership and Board Members

NHA Congratulates Olympics on Going Green with Hydropower

NHA Applauds Napolitano and McClintock Comments about Hydro

NHA applauds DOE-DOI-Army Corps plan to promote hydropower

News Articles

Jan. 25	New York Times (Pages 1-2)	Conventional	NHA Members Cited
Feb. 3	The Examiner, AZ (Pg. 3-5)	All	NHA Cited
Feb. 4	American Rivers Blog (Pg. 6)	Conventional	NHA Cited
Feb. 4	Intl. Waterpower & Dam Magazine (P. 7-10)	All	NHA/Members Cited
Feb. 10	Renewable Energy World (Pg. 11-13)	All	NHA Cited
Feb. 16	The Huffington Post (Pg. 14-15)	Conventional	
Feb. 17	USA Today (Pg. 16-17)	Tidal/Wave	
Feb. 18	Seacoastonline.com, NH/ME (Pg. 18-19)	Conventional	NHA Members Cited
Feb. 19	USA Today (Pg. 20-21)	All	NHA Cited
Feb. 26	LA Times, CA (Pg. 22-24)	Conventional	
Mar. 1	Penn State News, PA (Pg. 25)	Conventional	
Mar. 13	Rutland Herald, VT (Pg. 26-27)	Conventional	NHA Member Cited
Mar. 14	Capital Press, Western US (Pg. 28-29)	Small/Conv.	NHA Cited
Mar. 16	Go Upstate, SC (Pg. 30-31)	Small Hydro	NHA Member Cited
Mar. 18	The Seattle Times, WA (Pg. 32-33)	Conventional	
Mar. 24	R & D Magazine (Pg. 34-35)	All	
Mar. 24	Reuters (Pg. 36-37)	All	
Mar. 28	Boston Globe, MA (Pg. 38-40)	Dams	
Apr. 6	Columbia Basin Herald, WA (Pg. 41-43)	Conventional	NHA Member Cited
Apr. 6	Rochester Business Journal, NY (Pg. 44)	Conventional	



PRESS RELEASE

25 Massachusetts Avenue, N.W. · Suite 450 · Washington, D.C., 20001-202/682-1700 · www.hydro.org

Contact: Kristen Nelson
301/654-2003 · kristen@hydro.org

For Immediate Release

American Rivers and NHA Pleased to Host Workshop on Climate Change and Hydropower

Scientists, industry, conservationists, and regulators share views on the future

Washington, D.C. (January 28, 2010) – American Rivers and the National Hydropower Association (NHA) are pleased to host today's joint workshop, "Climate Change and Hydropower Management: Is Existing Science Useful Yet?"

The event features representatives from scientific organizations, conservation groups, industry, academics, and regulators. Topics include:

- An Overview of Science and Regional Impacts
- Models and Approaches
- Using Climate Projections in Decision-Making, and Dealing with Uncertainty
- Climate Change Science and Hydropower Management: Starting the Dialogue

The two organizations expressed their support for building a dialogue and exploring these issues further. Identifying ways to better utilize hydropower resources to address climate change and preserving our natural resources is a high priority for both American Rivers and NHA.

American Rivers' Senior Vice President for Conservation Andrew Fahlund said, "American Rivers is committed to helping communities build resilience to climate change by protecting and restoring rivers. By grounding our solutions in science and working with NHA and other interests, we will craft a productive path forward."

NHA Executive Director Linda Church Ciocci agreed. "The potential impacts of climate change on water resources in the United States may affect their many uses from power generation to irrigation to aquatic species protection and more. That's a concern that conservation groups like American Rivers and industry groups like NHA share. I'm pleased that we have the opportunity to work together and offer an inclusive process as we build the scientific knowledge base on climate change and hydropower management."

Fahlund and Church Ciocci also thanked Brookfield Renewable Power and the Cox Family Foundation for acting as leadership sponsors of this event.

For more details about the workshop, visit www.hydro.org and www.americanrivers.org.

###



PRESS RELEASE

25 Massachusetts Avenue, N.W. · Suite 450 · Washington, D.C., 20001 · 202/682-1700 · www.hydro.org

Contact: Kristen Nelson
301/654-2003 · kristen@hydro.org

For Immediate Release

NHA Welcomes New Leadership and Board Members

Grant PUD's Munro Re-elected as NHA's 2010-2011 President

Washington, D.C. (February 3, 2010) –The National Hydropower Association is pleased to announce its 2010-2011 member president, officers, and advisory board members.

“This is an exciting time for the U.S. hydropower industry,” said NHA Executive Director Linda Church Ciocci. “Having a strong board that recognizes the opportunities that lay before us will be integral to our success this year. I’m pleased to welcome the new board members and officers onto our team.”

At its January 2010 meeting, the NHA Board elected the following officers for a term of one year:

President – Andrew Munro, Director of External Affairs, Grant County Public Utility District
Vice President – David Moller, Director, Hydro Licensing, Pacific Gas & Electric Company
Treasurer – Jim Thrasher, Energy Production Supervisor, American Electric Power
Secretary – Ed Schild, Director, Hydroelectric Resources, Puget Sound Energy

Munro, who was recently re-elected to the board, was re-elected to the presidency for a second term. Moller, who had been NHA’s treasurer, also remains on the executive committee in his new position as vice president. Thrasher and Schild have worked on NHA committees and projects for many years.

“I am very excited to serve the National Hydropower Association as president for another year,” said Munro. “With hydropower’s potential to create 700,000 new direct and indirect jobs while adding over 60,000 megawatts of new renewable energy to our country’s electricity supply, the future role for hydropower has never been greater.”

Munro says he intends to continue with an aggressive agenda for NHA over the next year, challenging the industry to reach its potential to double domestic hydropower capacity and the number of industry jobs by 2025, continue to work collaboratively with the environmental community and support smarter regulations.

“It’s an ambitious agenda, but well within the industry’s potential,” Munro said. “The hydropower industry is a strong, thriving sector that has tremendous untapped potential to support our nation’s energy, environmental and economic goals. We have the momentum to carry us forward.”

NHA is also welcoming five recently-elected members to its Board of Directors. They are:

Dan Adamson, Davis Wright Tremain LLP
David Moller, Pacific Gas & Electric Company
Andrew Munro, Grant County Public Utility District
Rich Riazzi, Chelan County Public Utility District

###

Mark Stover, Hydro Green Energy, LLC

In addition, five members will join the Advisory Board:

Kirby Gilbert, MWH

Jessica Matlock, Snohomish County Public Utility District

Cherise Oram, Stoel Rives LLP

Rennie M. Singletary, Santee Cooper

Eric Van Deuren, Mead & Hunt

“We have a great board in place,” Church Ciocci said. “I’m looking forward to working with them and continuing in our efforts to support the growth and development of America’s largest renewable energy resource.”

###



STATEMENT

25 Massachusetts Avenue, N.W. · Suite 450 · Washington, D.C., 20001 · 202/682-1700 · www.hydro.org

Media Contact: Kristen Nelson
301/654-2003 · kristen@hydro.org

For Immediate Release

NHA Congratulates Olympics on Going Green with Hydropower

Washington, D.C. (February 26, 2010) – As the 21st Winter Olympic Games come to a close this weekend, the National Hydropower Association applauds the Vancouver Organizing Committee for hosting the first Games in history to achieve a "carbon neutral" status – doing so, in part, by relying on renewable hydropower for 90 percent of its electricity.

“As our neighbors in Canada have showcased during the Olympics, hydropower has a tremendous role to play in meeting renewable energy and environmental goals here in the U.S. as well”, said Linda Church Ciocci, NHA executive director. “The hydropower industry is poised to double its current capacity, provide reliable electricity for American families, and create thousands of new jobs as it helps steer the United States toward energy security and a clean, renewable energy future.”

###



STATEMENT

25 Massachusetts Avenue, N.W. · Suite 450 · Washington, D.C., 20001-202/682-1700 · www.hydro.org

Contact: Kristen Nelson
301/654-2003 · kristen@hydro.org

For Immediate Release

NHA Applauds Napolitano and McClintock Comments about Hydro *Water and Power Subcommittee members recognize hydropower's contributions*

Washington, D.C. (March 8, 2010) – The National Hydropower Association applauds the recent comments from House Water and Power Subcommittee Chairwoman Grace Napolitano (D-CA) and Ranking Member Tom McClintock (R-CA) regarding the need for hydropower.

"We were pleased to see both Chairwoman Napolitano and Ranking Member McClintock raise several important issues regarding the future of hydropower," said NHA Executive Director Linda Church Ciocci. "Their comments show a strong understanding of the issues affecting our industry, especially on the federal side, as well as a clear vision for a future where hydropower continues to play its strong role in serving our country."

In her opening remarks, Chairwoman Napolitano said, "We need hydropower because it is the cleanest, cheapest energy we have." She described the kind of public policy that could support the hydropower industry as having "effective leadership, strong vision, and the proper amount of funding."

Ranking Member McClintock echoed these sentiments. He noted, "We need to get back to the basics, protecting and developing the original green power: hydropower."

Church Ciocci said that both statements reflected the strong support hydropower has as a way to address the country's energy, environmental, and economic needs. "I applaud and thank them both for their leadership. NHA stands ready to work with them -- and all members of Congress -- to ensure that all Americans will continue to enjoy the benefits of the country's largest domestic renewable resource."

###



PRESS RELEASE

25 Massachusetts Avenue, N.W. · Suite 450 · Washington, D.C., 20001-202/682-1700 · www.hydro.org

Contact: Kristen Nelson
301/654-2003 · kristen@hydro.org

For Immediate Release

NHA applauds DOE-DOI-Army Corps plan to promote hydropower *Industry agrees with Secretary Chu: "I'm for hydropower, because I'm an environmentalist"*

Washington, D.C. (March 25, 2010) – The National Hydropower Association welcomed the announcement yesterday from the U.S. Department of Energy, the U.S. Department of the Interior, and the U.S. Army Corps of Engineers regarding a new memorandum of understanding designed to foster development of hydropower resources that will serve the country's energy, environmental, and economic goals.

"Today's announcement is welcome news to the U.S. hydropower industry," said NHA Executive Director Linda Church Ciocci. "Secretary Chu, Secretary Salazar, Assistant Secretary of the Army Darcy, and other officials involved in this effort are showing tremendous leadership by moving beyond the 'business as usual' approach to hydropower issues and seeking ways to expand hydropower's role in serving our country."

Church Ciocci was especially pleased to see the increased level of intergovernmental cooperation outlined in the MOU. NHA has long maintained that more robust cooperation among the many agencies involved in the hydropower licensing and permitting process is key to reducing costs and providing more certainty for developers.

"Both developers and investors want to see a more efficient process," she said. "Right now, our industry is looking at more than 100,000 megawatts of new capacity, so we're also interested in seeing federal incentives that align with the reality of licensing and permitting. We're optimistic that the plan outlined in the MOU will help set us on a course toward that goal."

NHA President Andrew Munro, Director of External Relations for Grant County (WA) PUD, added that he was also pleased to hear both Chu and Salazar stress hydropower's environmental benefits.

"Hearing Secretary Chu say, 'I'm for hydropower, because I'm an environmentalist,' resonated with me, as I'm sure it does with our entire industry," he said. "Current U.S. hydropower generation avoids 225 million metric tons of carbon dioxide annually. Installing highly efficient turbines -- as we've already started doing at Grant -- putting turbines on existing non-powered dams, and building other low-impact projects will increase that number, while reducing our overall footprint and enhancing environmental performance."

Munro also applauded the idea that the MOU focuses on an action-oriented approach that begins with data collection.

"Our industry is looking at opportunities to double our generating capacity, employ more than 700,000 Americans, and expand our already significant contribution to climate policy, so we certainly agree with Secretary Chu, Secretary Salazar, and Assistant Secretary Darcy that developing hydropower generation is a national imperative," Munro said. "Now is the time to explore our potential and act."

Both Church Ciocci and Munro added that NHA stands ready to work with the agencies and other stakeholders to build our hydropower resources.

###

January 25, 2010

Coalition Donates Hydro Plant in Bid to Save World Heritage Site

By DINA FINE MARON of [Greenwire](#)

A venture by an international coalition of power companies aims to shore up world-famous rice terraces in the northern Philippines and bring a sustainable source of electricity to an area that desperately needs it.

The group dubbed the "e8" -- a play on the Group of 8, or G-8, nations from which they hail -- donated a \$1 million hydroelectric facility to Ifugao province that was symbolically turned over to the Philippine government last week.

The initiative, which was spearheaded by the e8's Tokyo Electric Power Company (TEPCO), is expected to generate about 1,450 megawatts hour (MWh) of new energy a year for Ifugao province, meet 18 percent of the area's electricity needs and raise \$70,000 in annual revenue for an effort to save the rice terraces.

The 4,000 square miles of terraces were added to UNESCO's list of World Heritage Sites in Danger in 2001 after years of bad weather and limited maintenance eroded sections of the ricefields' mud and stone walls.

The e8, a nonprofit formed after the U.N. climate meeting in Rio Janeiro in the early 1990s, says it wants to influence the international energy debate. "One of the e8 missions is to promote sustainable development and use of energy through the member companies jointly implementing concrete pilot projects -- in particular in developing countries," said Yoshihiro Hatano, TEPCO's general manager of international exchange and cooperation.

The other e8 companies are: American Electric Power Co. Inc., Duke Energy Corp., Hydro-Québec, Ontario Power Generation, Électricité de France, Italy-based ENEL SpA, Germany-based RWE AG, Russia-based JSC "RusHydro", and Japan's Kansai Electric Power Co. Inc.

TEPCO, which operates more than 100 hydropower stations in Japan, was already familiar with the Philippines terrain and decided to lead the Ifugao project as one of its e8 initiatives because it offered the opportunity to "combine renewable development, regional revitalization and World Heritage preservation," Hatano said.

Though the expected revenue from the Ifugao hydroelectric facility falls far short of the estimated \$11.8 million needed to restore and maintain the terraces, TEPCO says the investment is an "important first step" and that it hopes this initiative will bring other donors to the cause.

The terraces are vital to Ifugao's economy, both in tourism revenue and because "heirloom rice" is a valuable export, said Ambassador Preciosa Soliven, secretary general of the UNESCO National Commission of the Philippines. It was TEPCO's idea to have the profits from the hydroelectric facility save rice terraces, she said.

E8 chooses its project sites upon the recommendation of its member companies or U.N. organizations, said Johane Meagher, e8's executive director.

The group has completed six renewable energy projects, including a grid-connected solar power system that partially powers Tuvalu's capital city and a wind project in the Galapagos Islands.

For the Philippines hydro project, UNESCO provided guidelines on the conservation of the World Heritage site. Soliven said she hopes restoring the terraces will bring young people back to the community to work on their families' rice terraces. About a third of the terraces are abandoned.

More than 180 local people, trained by TEPCO, worked on the site's new hydroelectric facility, and e8 anticipates that the site will also be maintained by local workers.

"When we develop a project, we do it so the local people can keep it alive," Meagher said. "We will monitor the site for two years to see if they need more training to maintain it."

Copyright 2010 E&E Publishing. All Rights Reserved.

For more news on energy and the environment, visit www.greenwire.com.

Hydropower rides wave of clean energy Stimulus

February 3, 12:24 PM · [Phoenix Green Business Examiner](#) · Brian Coppa



Conventional hydropower generation plant.
www.odcc.ca

Hydropower is the long-forgotten and under-appreciated sibling of the renewable energy family. It does not garner a fraction of the media attention of solar, and many people do not even realize it is a renewable energy source. Moreover, it was a challenge to have it incorporated into clean energy stimulus programs. According to 2008 U.S. Department of Energy (DOE) statistics, renewable energy was responsible for only 7 percent of America's power supply, and 34 percent of that amount was derived from hydropower and while only 1 percent was from solar.

However, as important as hydropower has been in the past, it has many more limitations in terms of land development due to **environmental and sustainability issues** than solar, as the country shifts towards a higher degree of clean energy. Furthermore, hydropower is a low priority renewable energy source in desert regions of the country such as the Valley of the Sun, where water is a premium and in limited supply.

Beyond the use of conventional hydropower technology, there is increasing government interest in developing new power generation derived from the ocean and in-stream kinetic energy potential; also known as wave power. Since pumped-storage hydropower is the only large-scale

storage option available at this time, the National Hydropower Association (NHA) argues that a large-scale increase in wind and other variable renewable generation technologies requires building additional pumped storage, as a stable back-up energy source, in addition to a [smart grid infrastructure](#). According to the [Energy Information Administration](#), there is 20,000 MW of operating pumped-storage capacity in the U.S.; developers have proposed constructing another 23,000 MW. Moreover, current U.S. hydropower generation avoids approximately 225 million metric tons of carbon emissions from entering the atmosphere each year.

Growing interest in non-hydro renewables such as solar, wind, biomass and geothermal is also increasing funding emphasis on the hydropower industry. DOE has stated that to integrate the wind resources needed to generate 20 percent of U.S. electricity by 2030, which is an unofficial national goal, the U.S. will need an additional 50,000 MW of peaking or storage capacity. This point enabled the NHA to successfully lobby for including additional tax incentives for hydropower in national economic stimulus programs. The Recovery Act extends the placed-in-service date through December 31, 2013, for small irrigation hydro, incremental hydropower from additions to existing hydro plants, hydropower development at existing non-powered dams, ocean energy and in-stream hydrokinetic technologies projects. This funding requires that developers of these projects complete the work in five years, as is the case for many clean energy stimulus projects.

The Recovery Act clean energy stimulus also allows hydropower projects to claim a 30 percent [investment tax credit](#) (ITC) in lieu of a production tax credit (PTC), both of which have been extended through 2013. The ITC is aimed at opening up more financing for renewables projects in lieu of the tightened credit markets in the past year. Another incentive available to a hydropower facility, if the facility refuses the PTC and the ITC, is a grant issued from the Secretary of the Treasury worth 30 percent of the cost of the project.

This same legislation also authorizes \$1.6 billion of new clean renewable energy bonds (CREBs), which is an option for public power providers to the PTC. It allows them to finance development of facilities that generate electricity from renewables such as hydropower. Furthermore, this stimulus program also created an advanced energy investment tax credit for companies that invest in clean energy technology manufacturing facilities. Hydropower equipment manufacturers are eligible to participate in the [30 percent credit](#) if they upgrade, expand, or re-establish a facility to manufacture “property” for producing energy from the sun, wind, geothermal or hydro sources. The original provision provided the tax credits only for wind, solar and geothermal; however, the NHA staff successfully lobbied to ensure that the definition was expanded to include “other renewable resources;” thus, encompassing traditional hydropower and advanced hydrokinetics associated with ocean and river currents.

Even U.S. legislation has treated hydropower as an afterthought and oversight while developing policy for the clean energy stimulus, not including it in the initial mix for renewable energy funding. Part of that issue has been due to significantly less media attention and support from the top of the Obama Administration for hydropower in rebuilding the U.S. economy. Hydropower has a more limited [supply chain](#) than other renewables such as solar; therefore, it is less stimulative economically while it also has less [exportation potential](#) when compared to wind and [solar components](#).

The DOE budget for [hydropower](#) underwent severe reductions under the Bush Administration, which was hardly supportive of any renewable sources, in general. However, hydropower will ride the wave of increased support for clean energy in President Obama's recently announced budget proposal, which includes \$6 billion for related technologies, along with an increase of fees and elimination of tax breaks for oil and gas companies. However, solar and biomass will be higher priority energy sources for desert states such as [Arizona](#) with renewable energy portfolio standards.

***For more info:** In order to anonymously receive FREE email alerts on future green technology and business articles, please subscribe on my [homepage](#) and/or follow me on [Twitter](#). If one is interested in a consultation on this or another green business topic, please click on the "[Request a Consultation with this Author](#)" link located toward the bottom of this GLG network site.*



Climate change to have dramatic impact on hydropower

Posted on February 4, 2010 | Filed Under: [Dams & Dam Removal](#), [Global Warming](#), [Restoring Rivers](#)

[Amy Souers Kober](#)

National Communications Director

Since our founding, American Rivers has been the leading voice protecting rivers from the adverse impacts of hydropower dams. We have spearheaded historic agreements to improve the operations of dams on rivers like the Deschutes, and we brought the idea of removing outdated dams into the mainstream.

So it comes as no surprise that we haven't always seen eye to eye with the National Hydropower Association (NHA). But we recently partnered with NHA to host a [Climate Change Workshop](#) in Washington, DC because no matter what you think about state of the science, one thing is certain – climate change is going to have a big impact on hydropower dams and they way they affect our rivers.

Scientists from the National Center for Atmospheric Research, the Scripps Institute for Oceanography, the Rand Corporation, UC Davis, and the Stockholm Environment Institute showed that [we can expect climate change to dramatically alter air temperatures and the timing, amount, and intensity of rain and snowfall](#). These changes will affect hydropower operations and the health of our rivers significantly.

The presenters also provided case studies demonstrating how various tools had been applied to long term decisions across the US, and how decision-makers can make valuable use of climate projections and manage the uncertainty of data.

Conservation groups and hydropower industry representatives agreed that it is time to consider climate change science in hydropower dam management decisions and committed to explore how in the near future.

Hydropower dams will continue to play a role in our nation's energy portfolio. But it will take all interests to determine how best to respond to the climate changes coming our way to protect the invaluable river benefits we all rely on.



Feature

Hydro set to ease economic woes

05 February 2010

A recent study in the US is urging the government to support hydro power to help it steer the country back to economic recovery through the creation of thousands of new jobs

The hydro power industry led the US out of the Great Depression of the 1930s and, according to the [National Hydropower Association \(NHA\)](#), it has the capabilities to play a key role in economic growth and expansion over 80 years later. Hydro industry development will not only help steer the country towards energy security, but it will also create thousands of new jobs.

The above findings of a recently commissioned NHA study outline how the industry can expand its contribution to energy, environmental and economic goals over the next 15 years. Energy Secretary Stephen Chu believes that such development of the US' lowest cost energy option is an 'incredible opportunity'. An opportunity, the NHA believes, for the environment, the US economy and its people.

Growth potential

Early in 2009 NHA commissioned Navigant Consulting to conduct a study examining the hydro power industry's job creation and capacity growth potential. Information gathered from industry members and government officials demonstrated the industry's true potential: the creation of 700,000 new jobs and the addition of 60GW of hydro power by 2025. The study examined the industry's potential under two different scenarios. Both scenarios assume that hydro power continues to provide about 7% of total US electricity, and that electricity demand grows by 2% annually. The scenarios are: Business as usual – where renewables generate 10% of total US generation; Accelerated case – where national policies mandate 25% renewable generation.

Industry supporters welcomed the report but promoted more action in its wake. Pennsylvania Governor Edward Rendell urged policy makers to support the development of hydro in the US. "It's time to invest in renewable energy resources that generate electricity in this country and that provide jobs for Americans," he said. "Hydro power presents elected

officials across the country with an opportunity to bring thousands of long term, family wage jobs to our states.”

Voith Hydro CEO Mark Garner agrees. “This study confirms what our experience at Voith Hydro has already shown – investments in hydro lead directly to good paying, long lasting American jobs.”

The US hydro industry currently employs over 300,000 people but the creation of additional jobs means that over one million could be working in the industry by 2025. According to James Kautar, international representative for the International Association of Machinists and Aerospace Workers, hydro power is already an important source of good paying, high quality jobs for workers across the country. ‘A national investment in hydro power will help grow American jobs for decades to come,’ he added.

Key areas which will experience new job creation include:

- Environmental sciences – the US hydro industry is already one of the largest natural resource stewards in the country and employs hundreds of people in the management of fish, wildlife, forest land and other ecosystems. Additional jobs will include biologists, foresters and environmental scientists.
- Engineering – The addition of 60GW of hydro power will create new opportunities for those working in electrical, mechanical, marine, civil, hydrological and systems engineering.
- Manufacturing and construction – Extensive support will be required from manufacturers, construction workers and skilled labourers to build new equipment and facilities. Both permanent and recurring jobs will be created in all regions of the US.
- Financial services
- Public policy – Expanding hydro power resources requires public policies that encourage development and investment. Policy analysts, biologists, environmental scientists and regulatory specialists will be key workers involved in this.
- Outreach and education – Educators, public relations specialists, writers, designers and artists will be required to provide communications support for such hydro power expansion.
- Historic preservation – The US hydro industry operates some of the oldest historic facilities in the energy industry. Maintaining the historic

integrity of these sites, while ensuring that they operate to the most efficient modern standards, will require historians and preservation experts amongst others.

- Management – Co-ordinating the efforts of over one million employees will require the concerted effort of good management teams. They will oversee a huge array of organisations from small, entrepreneurial companies to larger multinational corporations.

In order for the above expansion to take place, the NHA says that the government must act now to support renewable power. It should implement the following policies:

Adopt a federal renewable energy standard that:

- Recognises hydro power and hydrokinetics as qualified renewable energy resources.
- Backs existing hydro power out of a retailer's base, acknowledging the benefits of existing hydro power.
- Set 1988 as the in-service data for incremental hydropower and hydro at non-powered dams.

Pass the following tax incentives that:

- Make hydro power production tax credits equal to those of other renewables.
- Provide an investment tax credit for pumped storage and other energy storage options.
- Provide at least US\$5B in funding for the clean renewables energy bonds programme.

Enact climate policy that:

- Recognises hydro power's clean air benefits, including the 225Mt of carbon dioxide it helps avoid each year.
- Provides allowance value to hydro power resources under a cap and trade programme.
- Includes support for incremental hydro power, development at non-powered dams, and ocean, tidal and instream hydrokinetic resources in all

climate measures.

Bolster federal research and development programmes into waterpower resources:

- To provide US\$500M for the US Department of Energy's waterpower R&D programme to support new technology advancements, environmental studies, and additional resource assessments for hydro power, pumped storage and hydrokinetic technologies.

'Hydro power must play a critical role in our national energy, environmental and economic policy, says NHA Executive Director Linda Church Ciocci. 'The NHA stands ready to work with all policymakers who pursue the development of the US' critical hydro power resources.'

Related Companies/People

[National Hydropower Association](#)

International Water Power and Dam Construction ©2010
Published by Global Trade Media, a trading division of Progressive Media Group Ltd.



Posted on February 10, 2010 by [Graham Jesmer, Staff Writer](#)

Renewable Energy Trade Associations Call for Federal Action on RES, Hope for Big 2010

Washington, D.C., United States [RenewableEnergyWorld.com]

On Tuesday, executives from the leading renewable energy trade associations emphasized the need for Congress to swiftly enact key policies to continue accelerated growth across the entire sector in order to add jobs and boost economic growth in 2010.

A major new study released last week by Navigant Consulting Inc. reveals that a 25% by 2025 national RES would result in 274,000 more renewable energy jobs than a no-national RES policy scenario.

Executives from the American Wind Energy Association (AWEA), National Hydropower Association (NHA), Biomass Power Association (BPA), Geothermal Energy Association (GEA) and Solar Energy Industries Association (SEIA) stressed that if these policies are not enacted, the renewable energy sector could face a downturn in investment and jobs in 2010.

The renewable energy leaders called for Congress to pass a strong national renewable energy standard (RES) with clear near- and long-term goals, along with expansion and extension of credit incentives, and comprehensive legislation.

A major new study released last week by [Navigant Consulting Inc.](#) reveals that a 25% by 2025 national RES would result in 274,000 more renewable energy jobs than a no-national RES policy scenario.

The wind industry enjoyed a particularly good 2009, defying the expectations of many analysts to be one of the top two energy generation technologies installed in the U.S. last year. The industry has, however, seen a drop in manufacturing investment that while slowly returning would greatly benefit from strong national RES.

"The RES is the best way to provide the certainty that companies need to expand wind manufacturing nationwide," said Denise Bode, CEO of [AWEA](#). "The importance of building a strong renewable energy manufacturing base in the U.S. cannot be overstated. The U.S. has a historic opportunity to fortify the clean energy economy but is committing unilateral economic disarmament by not giving itself the policy tools to do so."

The biomass industry is in dire straits in the current economy. Bioenergy projects, even more so than wind and solar, require long lead times and are capital intensive, like other central station generation technologies. Lack of tax equity financing and a general slowdown in the capital markets in the last 18 months, combined with Congressional inaction when it came time to extend bioenergy tax credits have left the industry in a difficult position.

"Thousands of jobs in the biomass power industry could be lost if Congress fails to extend the production tax credit for biomass power that recently expired late last year. These tax credits are literally the life-line to many biomass power facilities that provide long-term high paying jobs in rural areas currently facing unemployment levels as high as 15 percent," said Robert Cleaves, president of the [BPA](#). "Congress should support all American sources of renewable energy by renewing the production tax credit for biomass power and passing an aggressive national renewable electricity standard."

On the other hand, the geothermal industry had a good 2009 in spite of the economy, enjoying renewed funding from the federal government and increased interest from the utility and private sector in the face of pending carbon legislation. According to [GEA's](#) executive director Karl Gawell, the industry's performance in 2009 was a testament to the actions of the federal government.

"This year Congress enacted stimulus legislation with a historic group of incentives supporting geothermal and other renewable technologies. Now in its 2011 budget, the Administration proposed additional measures, including ramping up incentives for the domestic manufacturing capacity needed to supply a growing geothermal power industry. The keys to sustain this growth will be adopting longer-term measures to support an increase in both new projects and the manufacturing and supply infrastructure. That means extending the stimulus bill's tax incentives through 2016, adopting a strong renewable electricity standard, and other measures to keep the U.S. a leader in geothermal energy," said Karl Gawell, Executive Director, GEA.

For the solar industry, 2010 will be all about keeping the momentum going. With tax credits for solar extended through 2016 and more and more domestic manufacturing capacity coming on line every month, 2010 could be the year that the U.S. hits 1 gigawatt of solar photovoltaics installed and sees a big jump in solar thermal capacity installed as well.

"One of the fastest ways to create jobs in America is to invest in clean energy," said Rhone Resch, president and CEO of [SEIA](#). "These are quality jobs and they can't be outsourced. From plumbers to electricians to construction workers, the solar industry created nearly 20,000 jobs last year with the support of the stimulus bill. We proved that we can create much-needed job growth now with the right policies in place. But we can only keep up that momentum if Congress enacts a jobs bill that promotes deployment of solar and other clean energy technologies."

With the possibility of carbon cap and trade legislation looming, hydropower has also seen increased interest as base-load renewable energy technology. In 2009 hydropower stations across the U.S. were upgraded and rehabilitated. [NHA's](#) Linda Church Ciocci said that strong federal RES policy will only help grow the industry even more.

"Policy matters in tapping hydropower's tremendous growth potential in every state, which will lead to the creation of well-paying, family-supporting jobs," said Linda Church Ciocci, Executive Director, NHA. "We need a strong RES, tax incentives and other support policy if we are to double hydropower's contribution to America's energy portfolio."

[The Huffington Post](#) April 7, 2010

[Michael Northrop](#)

Program Director, Rockefeller Brothers Fund

Posted: February 16, 2010 09:50 PM

[The Clean Energy Gold Rush](#)

Read More: [Clean Energy](#) , [Climate Change](#) , [Economic Development](#) , [Economy](#) , [Energy Policy](#) , [Jobs](#) , [Green News](#)

Of the 10 largest wind power companies in the world, the United States has one -- General Electric. Of the world's 10 largest solar companies, we have two -- First Solar and SunPower - but almost all their manufacturing is in Asia. Hydropower and geothermal companies are also located in the Far East. The U.S., with no national goal or policy framework for clean energy, simply hasn't found a way to create a stable marketplace where large, renewable energy companies can thrive.

For a nation that consumes 25 percent of the world's energy, our failure to compete is ominous, and all the more troubling because a veritable "clean energy gold rush" has begun.

Multinational bank HSBC reports that this sector's value already tops \$500 billion a year, larger than the global aerospace and defense industries combined. What's more, the bank says the clean energy market will be worth \$2 trillion in 10 years -- the biggest economic development opportunity ever quantified -- and it's up for grabs.

Those who will cash in, Deutsche Bank concluded in a report that followed HSBC's, will be countries with smart policies.

China, for one, is sprinting ahead. It has moved swiftly to create goals and policies to capture market share, announcing recently that it will generate 15 percent of its energy from renewable sources by 2020, and that it intends to become the world's largest exporter of clean energy technologies.

China is also mobilizing hundreds of billions of dollars using pricing policy to seize control of these markets. It's working. Five years ago China essentially had no presence in wind or solar manufacturing. Today, China is the largest maker of wind turbines and solar panels. Determination and policy are creating a juggernaut.

Even with growing unemployment, America seems incapable of recognizing a golden opportunity. With no goal or effective policy framework, not only are we shipping oil dollars to the Middle East, we are watching our solar, wind, and other renewable energy dollars begin flowing to Asia.

In the 40 years since the first oil shock, U.S. economic orthodoxy has allowed roller coaster fossil fuel prices to thwart the development of domestic clean energy manufacturing. When oil and gas prices decline, demand for renewable energy products collapses. If we don't correct this problem, the U.S. will lose its ability to capture a meaningful share of the booming clean energy market, despite having invented these technologies at Energy Department laboratories.

We need to change -- quickly. The U.S. must create policies that support long-term, stable demand for clean energy production to encourage companies to invest and create jobs.

Tax credits, the policy Washington has long favored, do not create such demand alone. Legislated requirements for minimum generation of renewable energy, currently employed by some states, are useful but insufficient for providing certainty to banks and investors about customer demand.

A price on carbon, through a cap and trade mechanism or a tax, would definitely help, as it does in Europe.

Another proven policy tool used by our competitors in Europe, Japan and China -- long-term, guaranteed purchase contracts -- would provide an enormous boost and could be implemented quickly by states and cities. These contracts guarantee steady demand and competitive prices for manufacturers so they can confidently build factories and create jobs.

Without the economic security of guaranteed purchase contracts, companies will keep relocating overseas. Evergreen Solar, an up-and-coming solar manufacturer in Massachusetts, recently disclosed all of its manufacturing will be based in China.

In a sign of hope, the state of Vermont and city of Gainesville, Florida, legislated guaranteed purchase contracts last year. Gainesville's mayor reports the transformation in her city's energy market has been swift, with jobs and companies now flocking to take advantage of the guaranteed market. By itself, with just 115,000 inhabitants, Gainesville will triple Florida's installed solar energy generating capacity in the first year of its program. A similar multiplier is expected in Vermont, where 50 megawatts of clean energy generation will be installed this year thanks to guaranteed purchase contracts.

The U.S. needs to decide rapidly whether it wants to own this future or pay for it. With proven ways to move forward, it isn't too late. A \$2 trillion gold rush in clean energy can and should focus the minds of policymakers.



Oregon is first U.S. site for a wave-power farm

Some still uncertain that the ocean holds source of clean energy

By Tracy Loew
USA TODAY

The search for clean, renewable energy is turning toward the ocean, but not without some waves of skepticism.

Construction has begun off Oregon on what would be the nation's first commercial wave-energy farm, said Sean O'Neill, president of the Ocean Renewable Energy Coalition, a Maryland-based trade association that promotes marine energy. It is planned to supply energy to about 400 homes.

"On a national perspective, it's great news. They're making tremendous progress," he said.

Wave power draws from the energy of ocean surface waves, according to Phil Pellegrino, spokesman for New Jersey-based developer Ocean Power Technologies, which is developing the project.

A float on a buoy rises and falls with the waves, driving a plunger up and down, he explained. The plunger is connected to a hydraulic pump that converts the vertical movement into rotary motion, driving an electrical generator. Electricity produced is sent to shore over a submerged cable, he said.

The first buoy will measure 150 feet tall by 40 feet wide, weigh 200 tons and cost \$4 million, Pellegrino said.

Nine more buoys are planned to deploy at a site in Reedsport, Ore., by 2012, at a total cost of \$60 million, he said.

Some don't believe wave energy can work, said Onno Husing, director of the Oregon Coastal Zone Management Association.

"A lot of people who are very experienced with the ocean harbor a lot of doubt that anyone can in a cost-effective way put buoys in the water, harvest the energy, and not have them end up on the beach," he said.

The world's first commercial wave farm opened in 2008 off the coast of Portugal, at the Aguçadoura Wave Park, Husing said. It ran into financial difficulties last year and was suspended indefinitely, according to a statement from Pelamis Wave Power of Scotland, part owner of the project.

A wave-power device from another company, Finavera Renewables of Canada, sank off Oregon's coast two years ago, Pellegrino said.

Other projects are under development in Spain, Scotland, Western Australia and off the coast of Cornwall, England, he said.

Capturing that power is a challenge. The size of waves can fluctuate widely.

"If they're too big they overwhelm the equipment and can damage it," Pellegrino said. "If they're too small, it's not going to be cost-effective."

There's also controversy about impact on the marine environment. Oregon fishers and crabbers worry the project will hurt their livelihoods.

"What wave energy will do for the first time is render an area of the ocean closed off. There will be no-fish zones," said Nick Furman, executive director of the Oregon Dungeness Crab Commission. Crabbers must keep their pots away from underwater transmission lines, Furman said.

Ocean Power Technologies, the state of Oregon, conservation groups, coastal residents and fishers and crabbers have been working for more than three years to reach an agreement on how the ocean will be shared, said Paul Klarin, marine affairs coordinator for the Oregon Department of Land Conservation and Development.

The Oregon project is being funded by Ocean Power, the U.S. Department of Energy, Oregon tax credits and money from the Pacific Northwest Generating Cooperative, which has the right to purchase some of the power for local customers, according to Democratic Gov. Ted Kulongoski's office.

Because the technology is still being developed, wave power costs five or six times as much as wind power, said Marianne Boust, senior analyst for Emerging Energy Research, an alternative energy advisory firm in Cambridge, Mass.

Boust said she believes that wave power eventually will be competitive with other alternative power sources, because waves are more predictable than either wind or sun.

Ocean Power Technologies is also working on testing wave-power technology in a program with the U.S. Navy. This month, the company announced the successful deployment of one of its buoys at the Marine Corps Base at Kaneohe Bay on the island of Oahu, Hawaii, as part of that program.

Canadian power surge for N.H.?

PSNH president talks clean energy options

By [Adam Leech](#)

aleech@seacoastonline.com

February 18, 2010 2:00 AM

PORTSMOUTH — The most significant source of renewable energy that could be available to the state is to import hydro and wind energy from Canada, according to Gary Long, president of Public Service of New Hampshire, the state's largest electric utility.

Long was the keynote speaker at Wednesday's Greater Portsmouth Chamber of Commerce breakfast forum. Long was a member of the state Climate Change Task Force, which released the New Hampshire Climate Action Plan a year ago. The discussion focused on energy and climate strategies, as the chamber announced its own plans to work with Clean Air-Cool Planet to evaluate the city's carbon footprint.

One of the proposed actions in the plan is to build high-voltage transmission lines to import clean power from Canada, which Long said is currently producing far more energy than it needs. They are producing more, he said, with the hope of selling it here, but there are regulatory and infrastructure issues that stand in the way.

"It's not the easiest, but it's the most impactful as far as really trying have more renewable energy in New England," Long said.

Currently, only 8.8 percent of the state's energy consumption comes from renewable sources, with petroleum, nuclear, natural gas and coal among the most used. Meanwhile, Hydro-Quebec is a public utility company that supplies 97 percent of the power in the province with hydropower, whose residents use nearly double the amount of electricity as New Hampshire residents. While reducing emissions is important he said, addressing the supply of renewable source is of equal importance.

Biomass, wind, and solar power are all renewable options that Long said PSNH is considering as it attempts to increase its reliance on renewable sources, which is now 17 percent. He said he would like to see the company be at 40 percent in the not-so-distant future.

From an economic perspective, Long said it only makes sense to rely less on the vulnerable non-renewable energy sources generated in foreign countries. "Even if you don't believe in climate change, don't you think it'd be a good idea if we were less dependent on all these imported fuel sources?" Long said.

The state is part of the 10-state Regional Greenhouse Gas Initiative, which is a mutually agreed upon cap-and-trade system for carbon emissions from electrical generation only.



New energy entrepreneurs face hurdles with government, nature

Updated 2/19/2010 1:09 PM

By [Chuck Raasch](#), Gannett National Writer

WASHINGTON — Moinuddin Sarker has a patent and a dream.

He says he has developed a way to turn waste plastic into automobile fuel. He's seeking governments or companies to build incinerating plants, which he says any city with a recycling program can do near existing collection facilities. And in the process, he says, they'd create jobs, cut landfill demands, and make fuel.

Renewable energy is the "emerging technology" in America, said Sarker, a 43-year-old native of [Bangladesh](#) who works for a company called Natural State Research, Inc., of Stamford, Conn.

INDEX: [Read previous 'CommonGround' columns](#)

Sarker's big dreams are part of a much bigger story involving entrepreneurs, government and even nature itself.

Leaders in wind, geothermal, solar, biomass and hydropower this week called for the government to come up with long-term renewable energy standards and to renew or strengthen tax breaks to encourage growth.

While there was impressive growth in some sectors of the renewable field in 2009, in part from tax and other incentives in the nearly \$800 billion "stimulus" package, other renewable sectors are hurting. Robert Cleaves, president and CEO of the Biomass Power Association, said the expiration of a tax credit for existing biomass plants at the end of 2009 threatens half of his emerging industry.

Cleaves and his colleagues complained that year-to-year changes in tax codes and federal energy incentives make it difficult to form long-term business plans and attract investors. They said Europe and China have advantageous long-term renewable strategies.

"The importance of building a strong renewable energy manufacturing base in the U.S. cannot be overstated," said American Wind Energy Association CEO [Denise Bode](#). "The U.S. has a historic opportunity to fortify the clean energy economy, but is committing unilateral economic disarmament by not giving itself the power to do so."

But her industry also this week was hit a report by an investigative journalism team out of [American University](#) that an estimated 80% of the \$2 billion in stimulus spent on wind power went to foreign turbine producers. Bode said she invited foreign investment and that even in the recession, her industry had grown to employ 85,000 Americans.

Robert Wallace, director of the BioEnergy Bridge program at [Penn State University](#), said the economic downturn has created a tough two years for venture funding in the industry. His program is designed to get public, private and university researchers and entrepreneurs working together on a sustainable biomass industry. Asked about the state of the industry, he joked, "What day is it? What time of day? Who did I last talk to?"

Finances and government aren't the only challenges. Natural resource supplies and vagaries also can impede, and so can land-use policies.

There have been reports this winter that turbines in Minnesota, one of the top wind-power states, aren't turning in extremely cold weather.

In geothermal, which relies on resources deep inside the earth, earthquakes are a constant threat.

A recent Government Accountability Office study concluded there are many uncertainties about the impact of increased biofuel production on water supplies. Siting of biomass and hydropower plants is a critical national issue, said Linda Church Ciocci, executive director of the National Hydropower Association.

"All renewable technologies have a constant challenge to be as 'green' as the public wants them to be," said Karl Gawell, executive director of the Geothermal Energy Association. "To keep looking for their problems and addressing them effectively."

(Chuck Raasch writes from Washington for Gannett. Contact him at [craasch\(AT\)gannett.com](mailto:craasch(AT)gannett.com), follow him at <http://twitter.com/craasch> or join in the conversation at <http://www.facebook.com/raaschcolumn>)



Vancouver Olympics going for the green

Organizers used hydropower, green building standards and other measures to make the Games more earth-friendly, achieving 'carbon neutral' status for the first time.

By Kim Murphy

February 26, 2010

Reporting from Vancouver, Canada

As is normally the case for top city officials during the Olympics, Vancouver Mayor Gregor Robertson has a car and driver assigned to shepherd him through the whirl of the Winter Games.

But the 45-year-old former organic farmer, who earlier ran the Happy Planet juice company, has shown up for most Olympic events as he always does: on his battered but serviceable mountain bike, suit pants tucked into his socks.

Since he became mayor in December 2008, Robertson has doubled Vancouver's bicycle infrastructure budget, set landmark electric-vehicle-charging standards for new buildings, and expanded the city's "car-free" days.

It was probably a foregone conclusion that any city with Robertson at the handlebars was not only going to host a green Olympics, but would [try for the gold](#).

The [2010 Winter Games](#), the Vancouver Organizing Committee announced, will generate fewer greenhouse gases during the seven years it took to organize and put on than what was emitted in only a few weeks in the 2002 Salt Lake City Games and the 2006 Games in Turin, Italy.

The 2010 Games also will be the first in history to achieve a "carbon neutral" status for not only the Games, but also the travel of the 7,000 athletes, coaches and officials.

To do it, the city is relying on renewable hydropower for 90% of its electricity and the most ambitious set of green building standards ever achieved at Olympic venues, along with a fleet of hydrogen-powered SUVs and buses, heat from a curling rink's refrigeration plant to warm an aquatics pool and heavy dependence on mass transit -- there is no spectator parking at venues.

The Olympic torch is 90% recyclable and emits minimal greenhouse gases, and medals are made from recycled electronic waste. The [Olympic athletes' village](#) this month received the highest environmental certification in the world, Leadership in Energy and Environmental Design, or [LEED](#), "platinum." Powered by its own neighborhood energy utility that converts sewage to power, the residential complex for about 2,700 competitors features a "net zero" building that

produces as much energy as it consumes.

"We feel like we've raised the bar," Robertson said. "Some of [these technologies](#) will be a legacy for generations to come that will benefit cities all over the world."

Robertson's goal is not just to produce a green Games, but to use the Olympics to help develop a new clean-technology industry base in British Columbia. At least \$3 million in carbon offsets -- investments in clean-energy projects whose climate change benefits "offset" the greenhouse gases generated by the Games -- is being provided by a private sponsor. With it, city officials hope to see a direct injection of money into local clean-technology companies, giving the region a potential leg up on cities like Seattle and Portland that are also vying to become hubs of the new-energy economy.

"The big gains in our Games came from the fact that everybody associated -- all our venue partners -- adopted the green building standards," said Linda Coady, the Vancouver Organizing Committee's vice president for sustainability. "We made a business case for it early on, making the argument that yes, there's an incremental cost associated with building green buildings, but for the most part you could recoup those costs within the first five years."

Two other venues, the day lodge at Whistler Olympic Park, which features an on-site wastewater treatment plant, and the Whistler Sliding Center, where waste heat from the refrigeration plant helps heat buildings, have attained LEED gold certification.

How well the sites are actually performing is already apparent, via a sophisticated software system installed at each venue that tracks energy usage minute-by-minute and compares it with how the building did last week and last month.

The first five days' readings showed a savings of 112,700 kilowatt hours, or about 16%, compared with what venues built without energy-saving features would have used. Spectators and managers can click into the [energy tracker](#) on their mobile phones or at home for an instant readout.

For all the accomplishments, critics say the Vancouver Olympics missed an important opportunity to advance the Vancouver region's transition from automobiles to transit, toppling thousands of trees to make way for a new highway and cross-country skiing trails.

And while the organizing committee's sponsor is making investments in energy-saving projects around British Columbia to make up for the 118,000 metric tons of greenhouse gases generated by the Games, that represents just 44% of the Olympics' total footprint.

Organizers will not compensate for an additional 150,000 tons of emissions generated by sponsors and the 1.6 million spectators traveling to Vancouver for the Games. They have, however, agreed to assume these emissions as part of the Games' total, 268,000-ton carbon footprint.

The David Suzuki Foundation, which was invited to evaluate [the environmental record of the](#)

[2010 Games](#) and gave them a decent-but-not-great "bronze" medal, suggested that ticket prices could have been raised to pay for spectators' carbon emissions.

But Coady said the committee already had built a day's worth of free transit ridership into every ticket and was under pressure to keep from adding more to the cost.

Further, imposing a carbon surcharge on the majority of ticket buyers who live within B.C. wouldn't have been fair, "particularly when you consider that British Columbia is the only jurisdiction in North America where local citizens are already paying a provincial carbon tax," she said.

The organizing committee instead is encouraging spectators to take responsibility for their emissions by buying their own offsets.

The Olympic offset sponsor, Offsetters Clean Technology of Vancouver, has a [Web calculator](#) for ticket-holders to add up their emissions. The company hopes to place staffers at the airport as the Games wind down to hawk additional credits to spectators as they fly home.

Half the proceeds from the voluntary offsets get invested [in British Columbia clean energy projects](#), such as a cement plant that burns construction debris, and a greenhouse heated with wood chips; the other half goes to offset endeavors around the world.

Though corporate sponsors have voluntarily offset about 75% of their share of carbon emissions, hardly anyone is expecting spectators to beat down the doors to buy credits.

"Will we take down the whole 150,000 tons?" Coady asked. "That would be a gold medal performance."

kim.murphy@latimes.com

Copyright © 2010, [The Los Angeles Times](#)

PENNSSTATE



Civil Engineering student receives dam safety scholarship

Monday, March 1, 2010

Vinoth Muthia, a senior in civil engineering and economics at Penn State, was awarded a \$2,500 scholarship from the New Jersey-Pennsylvania Council for Safe Dams. He received the scholarship for his work in global development and social entrepreneurship.

Muthia is president and founder of the Global Water Brigade at Penn State and has worked on dam rehabilitation and hydropower retrofit design projects in Kenya and Honduras. He is also designing a business model to develop water resources in underdeveloped countries by partnering with domestic firms, host universities and local governments to assist villages in organizing municipal water authorities.

Muthia interned with the Pennsylvania Department of Environmental Protection and presented at Dam Safety 2008, an annual conference of the Association of State Dam Safety Officials, on "Dam Risk Assessment in a Regulatory Environment."

He is an active member in the Association of State Dam Safety Officials (ASDSO), the United States Society on Dams and the American Society of Civil Engineers.

Muthia will receive a travel stipend to attend Dam Safety 2010 held Sept. 27 to Oct. 1, in Hollywood, Fla.

The ASDSO Scholarship Program was established to award excellence in the study of civil engineering and related fields, and to make students more aware of dam safety as a career opportunity.

Contact Mallory Jaroski news@engr.psu.edu 814-865-5544

Rutland Herald

Article published Mar 13, 2010

Powering up

The agreement between Vermont utilities and Hydro-Quebec on power purchases lasting for 26 years is a major step toward stability in Vermont's energy supply.

Vermont's two largest utilities have signed a memorandum of agreement with Hydro-Quebec and expect to complete negotiations on details of the contracts later this year. The deal will ensure that power from Hydro-Quebec will provide about a quarter of Vermont's power needs over the long term.

The deal is especially important because the utilities' present contracts with the provincial utility were set to expire by 2015. Also, another major source of power, Vermont Yankee, is in jeopardy. The Vermont Senate voted earlier this year not to extend Vermont Yankee's license beyond 2012, when it is due to expire, and it is questionable whether the owner of Vermont Yankee will be able to persuade a future Legislature to reverse course.

In securing their agreement with Hydro-Quebec, the Vermont utilities needed to overcome ill will created following the ice storm of 1998, which destroyed transmission lines in Quebec and interrupted delivery of power promised to Vermont. The Vermont utilities took Hydro-Quebec to court for failing to fulfill its contract, partly because at the time the price of power from Hydro-Quebec was relatively high and the utilities saw the lawsuit as a way to gain a better deal.

Officials in Quebec saw the suit as an attempt to take unwarranted advantage of a natural disaster. With the Vermont utilities' contracts nearing their end, Vermont officials knew they had to make peace with their northern neighbors. Thus, Gov. James Douglas and Lt. Gov. Brian Dubie undertook major outreach efforts toward Quebec during the past eight years, and they deserve credit for helping prepare the ground for the utilities' new deal.

In fact, Douglas's work earned him a rare honor, the National Order of Quebec, which has never before been given to an American politician. It puts Douglas in an elite company that includes former French President Jacques Chirac, former hockey star Mario Lemieux and singer Celine Dion.

The power deal includes a mechanism for constraining the price volatility that might affect Quebec power, smoothing out potential highs and lows. That ought to be a plus for Vermont as it enters an uncertain new energy era.

Vermont's relationship with Quebec is also important to Quebec because it has ambitions for additional sales to the United States. Quebec is a major producer of power in North America, and Vermont's small sliver of its electricity in itself may

not be that significant to Hydro-Quebec's business. But Hydro-Quebec wants Vermont to declare officially that its power counts as renewable power so that it can market renewable energy certificates on the open market.

As the premium for green electricity has grown over the years, one mechanism for encouraging renewable power is the sale of energy certificates. So far, no entity in the United States has certified that Hydro-Quebec's hydropower is renewable. Partly, that's because it is hydropower on an enormous scale and so is thought to have its own deleterious effects. But the Vermont Legislature is considering a measure that would declare Hydro-Quebec's power officially green. Quebec's vast supply of green energy is good for the globe, and the Legislature ought to state the obvious: that Quebec's renewable energy is renewable.

In reaching their agreement with Hydro-Quebec, Vermont's utilities have now put in place one major piece of the power puzzle. They are working on parallel tracks with regard to Vermont Yankee, which now provides about one-third of Vermont's electricity. They are lining up sources to take the place of Yankee power should Yankee cease operations in 2012, and they are also open to the possibility of Yankee's continued operation.

Power sources are abundant, and they will have no trouble replacing Yankee power. There will be a mix of natural gas, wind, wood, and even solar on the market if Yankee closes down. Hydro-Quebec itself is a major developer of wind power.

It is heartening to know that Quebec thinks of Vermont as a good neighbor. It is a relationship that ought to benefit people on both sides of Vermont's northern border.

Despite dam woes, hydropower grows

Updated: Sunday, March 14, 2010 12:09 AM

New low-impact technology allows efficient retrofits of existing structures

By [MATEUSZ PERKOWSKI](#)

Capital Press

Despite the controversy surrounding some existing energy-generating dams, the outlook for hydropower is generally optimistic.

The odds of major new hydroelectric dam construction are admittedly slim, said Jeff Leahey, senior manager of government and legal affairs for the National Hydropower Association.

However, the future of the hydropower industry doesn't depend on new dam structures -- there are plenty of them already, he said.

Of the 80,000 dams in the U.S., only about 3 percent are devoted to power generation, according to the Congressional Research Service. The rest were built for recreation, fire protection, flood control, irrigation and other purposes.

"There is great potential for building on this existing infrastructure," Leahey said.

Hydropower has a long history in the West, so the technology often isn't viewed with as much excitement as wind or solar development, he said.

"They just by default have gotten more of the attention," Leahey said.

New turbine designs can produce electricity more efficiently, and the technology can be retrofitted to smaller dams that don't hinder fish passage in "main stem" rivers -- a major source of controversy with older hydroelectric facilities.

Water-propelled facilities can complement other renewable energy sources when the wind isn't blowing and the sun isn't shining, Leahey said.

"Hydro is a good partner to match up with those technologies to make sure you have a reliable electricity grid," he said.

Karl Wirkus, deputy commissioner for operations at the Bureau of Reclamation, said he expects such innovation to drive more interest in hydroelectric facilities.

"I think there will be a renewed move to build those," Wirkus said.

Retrofitting smaller structures with turbines is unlikely to run into the same bureaucratic challenges as a traditional hydropower projects would face.

"It's going to be done with not near the impact that constructing a new dam will have," he said.

Projects with a minimal environmental impact are likely to meet with support from groups that have opposed larger facilities.

The National Wildlife Federation, which is involved in litigation over hydroelectric dams on the Columbia and Snake River, is interested in retrofitting existing dams, said Dan Siemann, senior environmental policy specialist for the group.

"Renewable energy is something we need to do, and hydro certainly plays a role in that. What we don't want to be doing is sacrificing one environmental need for another," he said. "We believe there are ways to have appropriate hydropower and salmon survival."

Wofford energy series looks at future role of hydro power

By [Gary Glancy](#)
gary.glancy@shj.com

Published: Tuesday, March 16, 2010 at 3:15 a.m.



Photo courtesy of Wofford College

Wofford College has been successful with its Goodall Environmental Studies Center in Glendale which includes this dam along Lawson's Fork Creek. The school will host a symposium about hydro water.

It's not often a school has the kind of direct access that Wofford College has to a place as historically rich and ecologically diverse as Lawson's Fork Creek, so the college has been busy the past year exploring ways to best preserve and utilize its natural treasure.

Wofford will take another step in that direction over the next two days when it hosts "The Dam Symposium: Small-Scale Dams & Hydro from Three Perspectives" as part of the Santee Cooper Lecture Series on Sustainability & Energy.

Last fall, Wofford opened its Goodall Environmental Studies Center in Glendale, which the college developed through a \$1.2 million renovation of the old mill office donated to the college by previous owner Glyn Morris, as well as three acres of surrounding property along the river.

Beginning today, three prominent speakers will lead a public discussion of the role of small-scale hydro in our energy future.

"Since we received the Santee Cooper grant for our Sustainability & Energy series, I've always had the idea of doing (one) event a year where we would take an issue in sustainability and energy and explore it from different perspectives," said John Lane, a Wofford English professor and director of the Goodall Center. "So it made sense to make the first one small dams, because there are bunches of them in Spartanburg County and we happen to own one. So I thought, why

not bring in a scientist, an activist and a writer who writes about such issues, and have them present their perspectives and then open the floor for questions."

Lane said that while the potential for the type of hydroelectric power generated from the Glendale site in the 19th century no longer feasibly exists, the college is considering a small alternative hydro on the dam as a demonstration project for Wofford students, local schools and visiting groups to learn about local history. One Wofford student is already working on interpretive signs for the Palmetto Conservation Foundation walking trail on the grounds, including one that explains past and possible future uses of the dam.

The three speakers for the symposium are John Seebach, chair of the Hydropower Reform Coalition who has spent recent years heavily involved in dam removal projects, Lane said; Ginger Strand, a New York City-based author whose book, "inventing Niagara," traces the course of natural wonder in America and illuminates what the falls tell us about our history, environment and ourselves; and Dave Hargett, principal and senior consultant with the Greer-based environmental consultancy HRI.

"What we're trying to do is open the thing wide open for talking about our dam and what its future will be," Lane said. "We still have a lot more education and study to do, but we take our responsibility as dam owners very seriously."

Thursday, March 18, 2010 - Page updated at 08:46 PM

State tax break entices tech firms to build data centers

By Sharon Pian Chan

Seattle Times technology reporter

To attract data centers to rural counties, Washington state will give tax breaks to tech companies that build them.

Supporters of the tax break hope the exemption will spur economic development and job creation in Eastern Washington. Both houses of the state Legislature passed the measure this week in Olympia.

"This isn't just a win for data centers, this is a win for Washington state and particularly small rural counties," said state Sen. Janéa Holmquist, R-Moses Lake. "This is going to bring investment back to Washington, put people back to work."

The measure passed as the Legislature works to close a \$2.8 billion budget shortfall. But Holmquist said she sees this as "a net win," not a loss of potential state revenue. The state will still collect sales taxes and business and occupation taxes from building construction, and the new buildings will lift property taxes, she said.

Legislators and businesses have been worried about losing new data centers to other states since Microsoft, citing the state's tax law, moved its cloud-computing platform Azure out of Washington to another U.S. data center. The news was distressing to the Grant County town of Quincy, where Yahoo, Microsoft and Intuit have built large server farms, drawn to the county's cheap and green hydropower.

Server farms send data and software across the Internet to users and to Web sites around the world. Microsoft continues to operate a data center in Quincy but chose last year not to expand Azure there. Running a server farm requires large amounts of energy and bandwidth.

Facebook and Amazon.com have also opted to build data centers in Oregon instead of Washington, said Patrick Boss, director of public affairs at the Port of Quincy, which has been marketing its hydropower and unused bandwidth capacity.

"Already in the past couple of days we've had a couple of companies inquiring" about building in Quincy, Boss said. "The passage has definitely stimulated interest. We're definitely excited about being on the level playing ground with other states, especially Oregon."

The new tax exemption applies to sales of server equipment that will be installed in a data center; labor and service charges for installing servers; sales of power infrastructure equipment; and labor and services for construction of power infrastructure.

To qualify for the exemption, data centers must create at least 35 family-wage jobs with health insurance. The centers must be at least 100,000 square feet and construction must begin between March 31, 2010, and July 1, 2011.

Holmquist said that when Yahoo built its data center, the project created 400 construction jobs over 18 months.

"This is clearly an economic boost to the area," said David Johnson, executive secretary of the Washington State Building and Construction Trades Council. "We're running at close to 50 percent unemployment in Eastern Washington for building trades."

The state Senate passed bill 6789 on Tuesday, by a 39-4 vote, and the House approved it by a 91-2 vote on Wednesday.

Sharon Pian Chan: 206-464-2958 or schan@seattletimes.com

Copyright © The Seattle Times Company



DOE, DOI and Army Corps of Engineers Sign Memorandum of Understanding on Hydropower

Posted In: [Energy](#)

By US Department of Energy

Wednesday, March 24, 2010

Washington, DC – US Department of Energy Secretary Steven Chu and US Department of Interior Secretary Ken Salazar announced today that the two agencies, along with the Army Corps of Engineers, will cooperate more closely and align priorities to support the development of environmentally sustainable hydropower. The Memorandum of Understanding represents a new approach to hydropower development – a strategy that can increase the production of clean, renewable power while avoiding or reducing environmental impacts and enhancing the viability of ecosystems. By signing a Memorandum of Understanding (MOU) the federal agencies agree to focus on increasing energy generation at federally-owned facilities and explore opportunities for new development of low-impact hydropower.

"While hydropower is the largest source of renewable electricity in the nation, hydropower capacity has not increased significantly in decades," said Energy Secretary Steven Chu. "As the single largest owner of hydropower generation in the United States, it is important for the federal government to tap this valuable asset so it can continue to contribute to our clean energy portfolio and energy security."

"As we build our clean energy economy here at home, we must explore and develop new technologies and new strategies for increasing hydropower generation in an environmentally sustainable manner," said Interior Secretary Ken Salazar. "With better coordination among federal agencies, a common-sense approach, and a focus on low-impact hydropower projects, we can supply more clean power for our economy."

The MOU between the Department of Energy, Department of the Interior, and Army Corps of Engineers aims to increase communication between federal agencies and strengthen the long-term relationship between them to prioritize the generation and development of sustainable hydropower.

Objectives of the MOU include:

- Identifying specific federal facilities that will be well-suited as sites for sustainable hydropower;
- Upgrading facilities and demonstrating new technologies at existing hydropower locations;
- Coordinating research and development on advanced hydropower technologies;

- Increasing hydropower generation through low-impact and environmentally sustainable approaches;
- Integrating policies at the federal level; and
- Collaborating to identify total incremental hydropower resources at federal facilities.

The memorandum is supported by detailed action items that the agencies have identified as areas of collaboration, including Technology Development and Deployment; Green Hydropower Certification; Federal Inland Hydropower Coordination; Renewable Energy Integration and Energy Storage; and Regulatory Process Facilitation.

Today's MOU provides an opportunity for DOE to connect its hydropower research and development efforts with the agencies who own, operate, and regulate federal water projects. The U.S. Army Corps of Engineers and the Department of the Interior's Bureau of Reclamation are the first and second largest hydropower owners in the United States, and their combined facilities represent approximately half of the country's hydropower capacity (close to 34,000 megawatts).

The Department of Energy undertakes research and development to advance the performance and efficiency of hydropower technologies and works to ensure that these technologies are deployed at U.S. hydropower facilities. To learn more about the Department's efforts, please visit the [Wind and Water Power Program website](#).

The Department of the Interior's Bureau of Reclamation serves almost 4 million households by annually generating over 40 billion kilowatt hours at 58 power plants and an additional 1,000 megawatts at 71 private power plants. To learn more about the Department's hydropower efforts, please visit the [Bureau of Reclamation Hydroelectric Power website](#).



U.S. agencies seek to boost hydropower supplies

Wed, Mar 24 2010

By Tom Doggett

WASHINGTON (Reuters) - The Obama administration said on Wednesday it wants to boost hydropower to generate more cleaner electricity supplies, but there is no plan to return to the era of big dams that often drew the scorn of environmentalists.

The Interior and Energy departments, along with the Army Corps of Engineers, signed an agreement to cooperate more closely on developing hydropower projects that won't harm the environment and would produce electricity without the greenhouse emissions that contribute to global warming such as coal-fired power plants.

"While hydropower is the largest source of renewable electricity in the nation, hydropower capacity has not increased significantly in decades," said Energy Secretary Steven Chu.

Hydropower accounted for 7 percent of U.S. electricity supplies last year, with almost half of that hydroelectric generation occurring in Washington, Oregon and New York, according to the Energy Department.

The Interior Department and the U.S. Army Corps of Engineers already operate federal water projects that represent about half of U.S. hydropower capacity, or close to 34,000 megawatts.

Up to 60,000 megawatts of additional electricity capacity could come from hydropower, Chu said.

"As the single largest owner of hydropower generation in the United States, it is important for the federal government to tap this valuable asset so it can continue to contribute to our clean energy portfolio and energy security," he said.

The three federal agencies will focus on increasing electricity generation at government-owned facilities.

For example, turbines could be installed at existing dams that don't produce power, while more energy-efficient turbines could replace ones that are decades old, resulting in bigger electricity output.

"This is not ushering in a 21st century new dam era. This is taking a look at existing facilities and taking look at low power hydro," said Interior Secretary Ken Salazar. "This is a broad examination of what we can do with hydropower that does not necessitate the building of new dams."

(Reporting by Tom Doggett; Editing by Lisa Shumaker)

Many of state's 'high hazard' dams go uninspected

As flood waters rise, repairs can't keep up with deteriorating structures

By Peter Schworm, Globe Staff | March 28, 2010

After a two-century-old timber dam nearly gave way to a storm-swollen river in the heart of Taunton five years ago, forcing the evacuation of 2,000 people, safety officials confessed that oversight of hundreds of dams had been lax, and political leaders vowed an overhaul, with regular inspections and repairs across the state.

But despite the promises, little appears to have changed.

A Globe review of state inspection records found that 60 "high hazard" dams, whose failure would cause serious property damage and potential loss of life, are in poor condition, with major structural deficiencies. Five more are deemed unsafe. More than half of the 60 have not been inspected in the past two years, as required by state law. Many have not had an official inspection since 2006.

The deluge of rain this month revived concerns, as rising waters threatened numerous dams in Eastern Massachusetts. Safety officials are facing renewed scrutiny over dam safety from critics who warn that the abundance of aging, ill-maintained structures poses a growing threat. Decades of half-measures and outright neglect, they say, have taken a dangerous toll.

"These structures are getting older and older, and it's just a matter of time until one of them fails," Brian Graber, regional director of river restoration at the conservation group American Rivers, said of Massachusetts dams. "It's like a time bomb waiting to go off."

Officials at the state Department of Conservation and Recreation, whose dam safety office has oversight responsibility for dams across the state, say that since 2005 they have assembled an inventory of dams and their conditions, stepped up scrutiny of a number of poorly maintained public dams and made key repairs.

"In the past year or so, over 20 high-hazard dams have been repaired," said Richard Sullivan, the department's commissioner. "We're confident in their safety."

But, he said, the number of dams deemed to be in unsafe and poor condition has increased in recent years, possibly because improved record keeping has identified added problems. And in a time of austere budgets, it is hard to gain ground. The DCR dam safety group has a staff of five, far fewer than national standards dictate, and a bare-bones budget of \$770,000 to run the office and make repairs on the neediest dams, half the budget of just two years ago.

The diminished resources, and fading public attention, vexes some elected officials who vividly recall the rainstorms brought on the Taunton dam crisis in 2005.

“The facts speak for themselves,” said Marc Pacheco, a state senator from Taunton who chaired a Senate oversight committee that published a scathing 2006 report “Decades of Neglect” and continues to lobby for increased funding for dam repairs. “As soon as the rain stopped, the attention placed on this disappeared. We’re right back in the same situation.”

Pacheco said the state now has a far better handle on the condition of dams, and who owns them. But, he said, calls for more rigorous oversight, and the funding to support it, have gone unheeded.

“We just haven’t been able to get that type of action,” he said. “But if there’s a high-hazard dam and it’s listed in poor condition, you don’t want to be living downstream from it. Here we are several years later, and based on what these reports say, we should be concerned.”

Among the many problems state officials say they encounter in trying to shore up dams are cash-strapped communities with responsibility for inspecting and repairing dams inside their borders. With long lists of other spending priorities, many are deferring dam maintenance.

In Berkshire County, a municipal dam in Windsor was judged unsafe in 2006, and hasn’t been inspected since, according to the state inspection records. The Norton Reservoir Dam, deemed structurally unsound, has also gone uninspected since that time, as has an ailing state-owned dam in Quincy, the Blue Hills Reservoir Dam.

Sullivan said state inspectors will work with communities on plans to fortify weakened dams, but that upkeep is overwhelmingly a local responsibility.

Some privately owned dams, despite pressure from local and state officials, are all but ignored. In some cases, the owners, or their whereabouts, are unknown. In other cases, efforts to convince have been fruitless. For a number of private dams in unsafe or poor condition — from Pittsfield to Marlborough to Kingston — the state has no record at all of regulatory inspections.

Forge Pond Dam in Freetown stands as an extreme example, with its owner’s persistent refusal to repair the dam creating a serious safety hazard for the past three years. After heavy flooding this month, state officials decided to intervene, and the dam is slated to be breached next week.

In 2008, state officials made emergency repairs to a badly eroded and overgrown 28-foot-high dam in Chicopee. The dam had not been maintained for years, and remains in unsafe condition, according to the inspection records.

Sullivan said the safety office has referred six scofflaw owners to the attorney general’s office for prosecution, the first time the state has taken that step.

The widespread maintenance lapses have lent momentum to environmentalists' hopes for removing some dams, particularly industrial-age relics that have long since outlived their purpose.

“Where dams are no longer doing what they were built to do, let’s remove them, rather than fix them,” said Alison Bowden, who directs the freshwater program for The Nature Conservancy. “Sometimes, the real hazard is created because the dam is there.”

Bowden and other environmentalists support a bill, now before the Legislature, that would create a \$20 million revolving loan fund to help communities remove and repair dams.

In Gloucester, which has several dams in poor condition, officials acknowledge they can only afford incremental, short-term repairs.

“We can’t tackle them all at once,” said Carolyn Kirk, the city’s mayor. “Gloucester is living proof of what happens when you neglect infrastructure.”

One of the dams listed in poor condition holds back a reservoir with 177 million gallons of water near an elderly housing complex.

“People definitely worry about that,” she said.

Peter Schworm can be reached at schworm@globe.com.



Grant County officials react to parts plant news

*By Lynne Lynch
Herald staff writer*

SEATTLE — The announcement of a new BMW parts plant being built in Moses Lake was met with enthusiastic reactions from local officials Tuesday.

New manufacturing jobs, construction work and a more diversified economy are among the benefits of the joint venture between the SGL Group and the BMW Group, officials said.

The project's groundbreaking is set for June, according to the company.

"I'm very pleased," said Terry Brewer, executive director of the Grant County Economic Development Council (EDC), which started working on the project in July.

The new business will provide long-term growth for the area, he explained.

"Additional diversification is a good thing," Brewer commented.

He wasn't sure about the number of construction jobs created, but "we just know it's good for an economy. We know it's real and we don't try to quantify it."

Grant County Commissioner Carolann Swartz said the county worked closely with the EDC and the Port of Moses Lake, writing several letters of support for the project.

Grant County allocated \$265,000 to be used to connect the company to sewer and water through the Port of Moses Lake, she said.

"We're excited," Swartz said. "I think this is going to be terrific. It only means good things for Moses Lake and Grant County."

Moses Lake Mayor Jon Lane was also pleased with the news.

"We're just ecstatic," Lane said.

Lane mentioned the possibility of resulting growth from the new business, which could attract new retailers to rural Grant County.

“It helps us diversify the economy,” Lane said. “It’s a great thing for Moses Lake. It’s a great example of a lot of different government agencies working together.”

To help fund a new substation for the project, the port applied for and received \$2 million from the state Community Economic Revitalization Board, said Port of Moses Lake Executive Manager Craig Baldwin.

What also brought the joint venture to Grant County was affordable hydropower and the port’s foreign trade zone, Baldwin said.

Another benefit was the port’s wastewater facility, he said.

Kim Foster, corporate counsel with the ASPI Group, said the company has an expected agreement to sell 60 acres of land to the company for the new facility.

The land is located north of the City of Moses Lake’s firing range, between Grant County International Airport and Stratford Road.

“It’s a very exciting project for the county, city and whole community,” Foster said. “I think it will attract more automotive companies.”

Grant County PUD General Manager Tim Culbertson said the company is expected to use about 17 megawatts of power during its initial phase, growing into the 25-megawatt range.

“In discussions we had with them, it’s important they have a non-carbon-emitting resource,” he said, meaning hydropower.

“I think this is exciting for Grant County,” Culbertson said. “This is bringing quite a few jobs. It allows us to bring more of our project energy back to purchasers.”

Although serving more load growth presents future challenges, the PUD has the capacity to serve the project’s initial phase with the Randolph Substation.

A business inquiry, possibly resulting from news about the project, appears to be a prospective data center, dubbed “Project Roosevelt,” Culbertson said.

Grant PUD Commission President Bob Bernd said he is “excited for Grant County. This will bring some good family-wage jobs to our area and help diversify the economy.”

“We have a great resource in our hydropower and great benefits in our dams,” Bernd said.

Port of Moses Lake Commission President Mike Conley said the port participated in early project negotiations.

He called port project consultant David Bailey a “conduit” in their efforts.

Conley mentioned the benefits of the port's foreign trade zone (FTZ), which eliminates duty tax on products coming in from other countries.

The port's foreign trade zone is the only active one in Eastern Washington, he said.

"I think it was a county-wide effort to put this together," Conley said.

Moses Lake Chamber of Commerce President Michelle Price said the chamber is "very excited" to have the company come to the community.

Debbie Doran-Martinez, the chamber's executive director, said she expects to have discussions with the company during the third quarter of this year regarding skill sets needed for new jobs.

She's spoken to the company, which was seeking resources to assist with hiring, she said.

"The vast majority of all the employees will be local," she said. "I just think it's a great sign for our community."

Sen. Janéa Holmquist, R-Moses Lake, said she was "ecstatic" about the news.

"I'm thankful we have good hydropower," she added. "My goal is to make sure future phases (of the project) happen in Grant County."

Rep. Judy Warnick, R-Moses Lake, also shared enthusiasm for the new manufacturing facility.

"What's exciting for me is they chose to come here," Warnick said. "A lot was because of power and our labor force. This shows what happens when everyone steps up to the plate, government on down. Having the administration involved is key."

She spoke of the recent passage of House Bill 3014, which modified a sales and use tax deferral program, for investment projects in rural counties.

The bill was sponsored by Rep. Lynn Kessler, D-Hoquaim.

Video footage of the news conference will be posted on Wednesday at www.columbiabasinherald.com.

N.Y. ranks second in energy efficiency

By [THOMAS ADAMS](#) - 4/6/2010 3:56:07 PM

New York ranks as the fourth-largest consumer of energy among U.S. states and the second-most efficient energy consumer, the New York State Energy Research Development Authority states in a report released Tuesday.

New York's energy use dropped by 1.6 percent from 2007 to 2008, the last full year for which data is available, the report states. Use of in-state renewable resources such as hydropower, wind, solar and biomass increased as a percentage of energy consumption.

"In the years ahead, we will need to maximize the potential of our renewable resources while continuing to increase our energy efficiency, diversify the state's energy mix and support the growth of a clean energy economy," NYSERDA president and CEO Francis Murray said in a statement.

New York's consumption of natural gas decreased by 1 percent, and consumption of petroleum and coal each decreased by 7 percent, the report states. The use of hydropower increased by 7 percent and the use of nuclear power increased by 2 percent.

The total energy bill for state consumers was up 10 percent in 2008 compared with 2007, the report states.

Petroleum represents 37 percent of energy consumption among New Yorkers, compared with a national trend of 33 percent, the report states. Coal represents 6 percent in New York, compared with 25 percent nationally.

The state's dependence on imported petroleum was at 91 percent, compared with the U.S. average of 68 percent, the report states.

The full report is available at www.nyserda.org.

(c) 2010 Rochester Business Journal. To obtain permission to reprint this article, call 585-546-8303 or e-mail service@rbj.net.