

2010 PASSIVE HOUSE CONFERENCE

Presentation Synopsis' and Presenter Biographies
November 5th & 6th

Group Session 1 - Building Energy and Climate Change by Jens Lausten



About Jens Lausten: Jens Lausten is a senior energy efficiency policy analyst at the International Energy Agency, specializing in buildings. He was responsible for the IEA recommendations on energy efficiency in buildings and other G8 related buildings work. His latest research finds that large amounts of energy can be saved in buildings and worldwide and highlights examples of best-practice policies. Jens is currently working on the development of a Sustainable Buildings Network as a part of the G8 Heiligendamm Process.

Group Session 2 - Bringin' It All Back Home: American and European Paths to Passive House by Robert Hastings



About Robert Hastings: Robert Hastings, Prof. Emeritus of the Donau University-Krems Austria is an energy consultant and architect. Mr. Hastings has led several programs of the International Energy Agency in the fields of sustainable buildings and is a former leader of the SolarArchitecture research and demonstration programme in Switzerland as a scientific adjunct on the ETH-Zürich. He has co-edited/authored books from publishers in London, New York and Heidelberg. It has been a pleasure for him to be a keynote speaker at congresses of EUROSUN; ISES, PLEA, OTTI, CISBAT and the PHI in Europe, China and North America. His greatest pleasure is sitting down with a client or students to review a building project regarding both energy and architectural aspects. He is a firm believer that the quality of life must be the key design criteria, be it for the design of a chair, house, office or school.

Also presenting Session E - Retrofits

Group Session 3 - Passive House: It's a Performance Standard and it's International by Dr Wolfgang Feist



About Dr Wolfgang Feist: Physicist Dr. Wolfgang Feist is the founder and director of the Passive House Institute in Darmstadt, Germany. He also currently teaches Building Construction, Building Physics and Building Technology at the University of Innsbruck. He is widely regarded as the pioneer of passive building energy standards.

Also presenting the Closing Plenary with Avery Lovins

Group Session 4 - The Passive House Alliance by Jonah Stanford



About Jonah Stanford: Jonah Stanford is the Principal of NEEDBASED Inc. located in Santa Fe, New Mexico. NEEDBASED provides architectural design and energy conservation consulting services to public and private clients who actively prioritize environmental efficiency. Jonah has managed projects for the National Trust of Historic Preservation, the U.S. Department of Energy, and many state and county municipalities. As a participant in the first Passive House Consultant training in North America and current Board President of PHIUS, Jonah is dedicated to the development of economically responsible Passive House projects throughout the United States.

Also presenting Session K - The Passive House Alliance with Tom DiGiovanni

Session A - The Rue Evans House by Blake Bilyeu

Synopsis: The building methods, techniques, costs, and initial performance of a custom Passive House in Salem, Oregon. Blake Bilyeu will share how the project's challenges were met and overcome using relatively conventional and available techniques and materials, resulting in a cost-effective custom Passive House. Presentation focuses will include structural aspects, insulation, mechanical systems, and air sealing details, as well as touching upon the homeowner's thoughts on living in this home.



About Blake Bilyeu: Blake Bilyeu is the co-owner of Bilyeu Homes, Inc., an Oregon based design-build company which focuses exclusively on high performance residential construction. Blake is a Certified Passive House Consultant, a Sustainable Homes Professional, and holds a bachelor's degree in environmental science. Blake is committed to maximizing the performance of new homes and reducing their ecological footprint both during and after construction.

Also panel member of Session M - Builder's Hootenanny



The Rue Evans House

Session A - Courtland Place Passive Project *by Dan Whitmore*

Synopsis: Scheduled for completion in mid-November, the Courtland Place Passive Project is to be the first residential Passive House in Washington state. The wood-framed, slab-on-grade building will be a 2-1/2 story, three-bedroom, single-family home with attached apartment. It's design and execution are attempts to integrate PH concepts within established regional building means and methods, potentially establishing an affordable and readily replicable model for the Pacific Northwest. The presentation will focus on the use of PHPP & THERM for design and cost maximization, the building method and lessons learned.



About Dan Whitmore: As owner, designer, builder and Certified Passive House Consultant, Dan Whitmore will be completing construction of the first Passive House Residence in Washington state by fall of 2010. With a focus on translating environmental and affordable design ideas into built reality, he specializes in hyper energy-efficient structures. Beginning as a carpenter in 1986, he has worked in various fields of construction and is now the owner of Seattle-based Blackbird Builders, llc. Dan is a founding member of Passive House Northwest and currently serves on its board of directors.

Also panel member of Session M - Builder's Hootenanny

Session B - Cost Optimization of Passive House Projects with PHPP and Integrated Design *by Graham Irwin*

Synopsis: Using the Passive House Planning Package for sensitivity and cost-benefit analysis in conjunction with an Integrated Design Process including the Passive House Consultant, architect and builder is the topic of discussion. Graham will draw on experience with projects in the San Francisco Bay Area, including the first Certified Passive House in California, which is also the first Certified Passive House retrofit in the United States.



About Graham Irwin: Graham Irwin, CPBD, CGBP, LEED AP, Certified Passive House Consultant, is the principal of Essential Habitat, a Northern California design and consulting practice with an emphasis on Passive House methodology. A founding member of the Passive House Alliance and Passive House California, Graham also lectures regularly and trains Passive House Consultants for the Passive House Institute US (PHIUS).

Also moderator of Session D - Windows Roundtable / Round Windowstable



The Martha's Vineyard Passive House

Session B - The Passive House Dashboard

by *Randy Foster*

Synopsis: Randy will present a “colorful spreadsheet” that he uses when discussing Passive House and other approaches to energy efficiency. The spreadsheet contains a future value analysis of the costs and benefits of “going green.” The goal of the spreadsheet is to make comparing different approaches super simple and graphically compelling.



About Randy Foster: Randy is the founding owner of The Artisans Group, an award-winning design/build firm in Olympia, Wash. Passive House transformed the company when Randy realized the value of adding superior energy modeling to their project development process. “We are a strong team with a solid bridge between the specialties of design and construction. “When PH appeared, it seemed like the missing link to me. We focus exclusively on passive new construction projects now, and the timing seems perfect for our market.”

Session B - Passive House Economics

by *Katrin Klingenberg*



About Katrin Klingenberg: Katrin Klingenberg is the founder and director of the Ecological Construction Laboratory and co-founder of the Passive House Institute US, both based in Urbana, Ill. She is a licensed architect in Germany, holds a master’s in architecture from Ball State University, and has taught building science and design Studios at the University of Illinois in Chicago and at Urbana-Champaign. She’s studied and worked with Dr. Wolfgang Feist at the Passivhaus Institut in Darmstadt, Germany, and has delivered several presentations at the annual European Passivhaus conference. Katrin designed and built her Smith House, the first building in the US to meet the Passive House standard, in 2003. She designs, consults and teaches both locally and in various climates nationwide to promote the implementation of Passive House.

*Also moderator of Session G - The Mechanical Panel
and presenter of Session J - The Third Load: Dehumidification*

Session C - Apples to Apples

by *Prudence Ferreira*



About Prudence Ferreira: Prudence Ferreira is the principal of SF-based Integral Impact Inc, an energy consultancy with special focus on Passive House, Living Building Challenge and Zero Energy buildings. Prudence concurrently serves as President of Passive House California and USGBC-REC. Her credentials include LEED AP, LEED-Homes Rater, GreenPoint Rater, CEPE, HERS Rater, Living Building Challenge Ambassador and Certified Passive House Consultant.

Session C - The Passive House Certification Process

by *Ryan Abendroth*

Synopsis: This session will begin with an overview of the Passive House Certification process. Topics will include certification criteria, acceptable documentation, pre-certification, certification, acceptable climate data, and certification costs. The presentation will cover such questions as: *When should I submit? What type of feedback do I receive? What steps do I need to take to certify my project?* Any party looking to certify a building to the PH standard will benefit from the presentation.



About Ryan Abendroth: Ryan Abendroth is a Certified Passive House Consultant living in Kansas City, MO. He handles pre-certification and certification requests for PHIUS and generates climate data for use with the PHPP. Ryan has also recently started a design and consulting business that has just completed its first Passive House, helping the students of Studio 804 at Kansas University with their latest project.

Session C - EnerPHit

by *Dr Burkhard Schulze Darup*



About Dr Burkhard Schulze Darup: Dr. Burkhard Schulze Darup heads the architecture firm Schulze Darup & Partner in Nuremberg, Germany. He has been instrumental in forwarding Passive House retrofit efforts in a wide variety of German building types. His cost-effective solutions not only proved the concept, but have paved the way for widespread application.

Also presenting Session H - Carbon Neutral Initiatives

Session D - Windows Roundtable / Round Windowstable

Moderator: *Graham Irwin*

Panel Members: *Stephen Thwaites, Bronwyn Barry, Stephan Tanner, Brad Begin*



About Stephen Thwaites: Stephen is a professional engineer and is Managing Director of Thermotech Fiberglass Fenestration, a manufacturer of high-performance windows. He is a member of the energy sub-committee for the Canadian Window Standard. Stephen has a good and growing understanding of the energy flows through and around windows - and how they can interact with those of the rest of the house.

Session D - Windows Roundtable / Round Windowstable (continued)



About Stephan Tanner: Stephan has led the project development, planning and design for a variety of small to large scale high-performance real estate developments in the US, Europe, China and Korea. He was the architect of the 1st Passive House in the US certified by the Passivhaus Institut.



About Bronwyn Barry: Bronwyn Barry is a Certified Passive House Consultant, Certified Green Building Professional, building designer and window specialist. Her training in architecture led to her interest in window design and performance. Prior to working for Quantum Builders, she worked at various architecture firms in the San Francisco area before starting her own residential design practice. She ran Urban Structure for eight years and specialized in green buildings. Two of her projects were featured on the very first Build It Green Home Tour in 2005. She is now thrilled to be able to use the PHPP to show clients, builders and architects exactly why a cheaper product is not necessarily the most cost-effective solution. Bronwyn is an active member of Passive House California where she serves on the board as vice president. She recently illustrated a book on urban farming, which will be published by Penguin early next year.



About Brad Begin: Brad Begin is Serious Materials' Senior Director and focused with the Serious Window Division. Previously, Mr. Begin was the CEO of Alpen Energy Group, which was acquired by Serious Materials in 2008. He is an avid student of high performance fenestration systems and is committed to the objective of accelerating the penetration of Passive House fenestration building products in North America.

Session E - The O'Neill House - The First PH-Certified Retrofit in the United States by Rick Milburn

Synopsis: Introduction will feature a brief bio of the homeowner, description of the original structure and why the Passive House Standard was selected for the retrofit. Rick will discuss the techniques and various products used, as well as challenges encountered during the construction and ways that they were dealt with including building codes and city officials, product availability, actual vs. proposed methods, working with subcontractors, etc.



About Rick Milburn: Following years of mentoring by seasoned building professionals and later apprenticeships, he had the privilege to serve in the U.S. Marine Corp. With the support of his parents, the G.I. Bill and a hammer to earn his way, he graduated from the University of California, Davis. In 1996, he moved to the Napa Valley and started his own company. He's been building in Northern California ever since with one goal in mind - "Better Buildings".

Also panel member of Session M - Builder's Hootenanny

Session E - Passive House Remodeling of our Timber Frame Home
by Marko Spiegel

Synopsis: Our 21-year-old timber frame home 40 miles west of Chicago was in need of new windows and siding. As a specialist in energy efficient buildings, I decided to “walk the talk” and turn our home into a Passive House. We added an average of six inches of insulation around the thermal shell, imported windows from Germany and used the opportunity for other improvements. The presentation will include our reasoning, technical detail, PHPP calculations, and discuss challenges and broader opportunities of our passive house renovation.



About Marko Spiegel: Marko is an engineer and entrepreneur born and educated in Germany. Since 2005, after a career in the electronic component industry, he has built and consulted for ultra energy efficient buildings in Illinois and Indiana. Both of his businesses, Conservation Technology International, Inc. and Onewatt Construction LLC, offer a broad scope of services for owners of existing and new buildings. Marko promotes Passive House and energy efficient building concepts both locally and nationally.

Session E - The Everhart Home
by Tad Everhart

Synopsis: Tad will discuss the renovation of his 2,100 square foot Portland home to meet the Passive House Standard.

About Tad Everhart: Tad Everhart is a Certified Passive House Consultant and a lawyer at the Community Development Law Center, and has been the Clackamas Community Land Trust's legal representative since 2000. Tad's family is also currently in the process of "futurefitting" their SE Portland home to the passive house standard.



The Everhart Home

Session F - Waldorf School

by John Semmelhack



About John Semmelhack: John Semmelhack is the owner of Think Little, an energy efficiency and green building consulting firm based in Charlottesville, VA. Think Little is currently consulting on two Passive House projects in Charlottesville that will be some of the first certified Passive House projects in the Mid-Atlantic.

Session F - Planting the CEED

by Adam Cohen

Synopsis: Join us for a look at the construction of the Center for Energy Efficient Design, the first Passive House project for a U.S. public K-12 school. This project combines the Passive House approach with a LEED Platinum rating. We will discuss the design intent and then follow the year long building process with descriptions of lessons learned, milestones achieved and things not to do again.



About Adam Cohen: Adam Cohen is a principal partner in Structures Design/Build, LLC. He holds a degree in architecture from the University of Maryland, holds designation as a Certified Passive House Consultant, LEED AP and Certified Green Professional. Mr. Cohen is a current board member of the Roanoke City Clean and Green Committee, the Roanoke Clean Valley Council, the Green Schools Committee of the USGBC of SWVA and the Renewable Energy and Electric Vehicle Association.

Also panel member of Session M - Builder's Hootenanny

Session F - Big ERV's

by Jason Morosko



About Jason Morosko: Jason is a Certified Passive House Consultant, designer, and educator of leading technology air to air heat exchangers. He is a ten-year veteran in the field of ventilation, low energy buildings, in addition to holding a bachelors and masters degree in heat transfer engineering. Jason started construction of his first Passive House in June 2010.

Also panel member of Session G - The Mechanical Panel

Session G - The Mechanical Panel

Moderator: *Katrin Klingenberg*

Presenter: *Marc Rosenbaum*

Panel Members: *Manfred Brausem, Gary Nelson, Jason Morosko*

Synopsis: Marc will present and guide the 'Mechanical Panel' along with Manfred Brausem and Jason Morosko. Katrin Klingenberg will be acting as moderator for what is sure to be an enlightening panel discussion.



About Marc Rosenbaum: Marc Rosenbaum, P.E. is the principal and founder of Energysmiths, and currently also works with South Mountain Company on Martha's Vineyard. He is a 29-year veteran of high-performing building design, with an impressive command of an environmentally sound, integrated systems approach. His work has been recognized nationally by ASHRAE, AIA, EEBA, and NESEA.



About Gary Nelson: Gary Nelson is president of The Energy Conservatory. He developed many of the standard procedures used by building performance technicians to diagnose and measure house and duct leakage Gary has made measurements and diagnosed problems in hundreds of buildings. He serves on RESNET's Technical Committee.

Session H - Baltimore County High Performance Homes Bill

by *Michael Hindle*

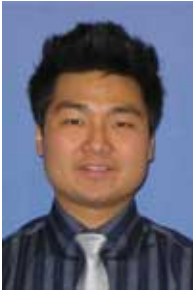
Synopsis: Michael will discuss the origin and objectives of the Baltimore County High Performance Homes Bill, which he co-authored with Baltimore County Councilman Vince Gardina. The bill awards significant property tax incentives for energy performance for both new construction and retrofit projects, and includes Passive House as an approved mechanism for achieving the highest levels of tax incentive. His talk will address the challenges of crafting legislation to achieve meaningful reductions in environmental impacts and determining appropriate performance metrics while trying to achieve inclusion of various green building performance standards. He will also describe the opposition and support for the bill from various parties, and the negotiated compromise that led to its passage. Discussion of potential alternative approaches to legislation to encourage the construction of high performance homes will follow.



About Michael Hindle: Michael Hindle is the co-founder of the sustainable architecture firm, INDRAlogic. He became a Certified Passive House Consultant in May 2010. Michael has been active in Baltimore's Sustainability Commission and has lobbied at the federal, state and local level on behalf of climate change and efficiency legislation. Most recently he co-authored Baltimore County's High Performance Homes Bill.

Session H - What's the "Utility" in Your Utility? by Andrew Yang

Synopsis: Discussion around how and why your local utility would be interested in the construction of your Passive House. How are utilities beginning to reposition themselves as the market moves toward lower energy intensity? Insight into the inner workings of efficiency programs: how they come about and how you might find yourself on the front end of the program development.



About Andrew Yang: Andrew works as part of the Business Development Group at Enbridge Gas Distribution, the local gas utility for Southwestern Ontario. He has been working in the group since he joined Enbridge in 2006. He has extensive experience in the evaluation, development, and market introduction of new technologies related to energy efficiency. Recently, he has worked at developing a business model for utility scale deployment of solar thermal hot water systems. Previously, he worked in the alternative fuel industry developing high pressure electrolysers, and hydrogen fueling stations. Andrew earned his BAsC in Mechanical Engineering from the University of Waterloo.

Session I - Mini-B: The Littlest Passive House by Joe Giampetro

Synopsis: With Seattle's passage of the Backyard Cottage ordinance two years ago, Joe imagined a small pre-fabricated dwelling to take the place of a one car garage. Urban, affordable and personal, the idea quickly morphed into a Passive House upon hearing Katrin's presentation at the Green Lake Library. Ergo the Mini-B (mini-bungalow). This 300-sq. ft. dwelling has overcome the design challenge of a large surface area to floor area ratio (5.7) and the air infiltration challenge it presents. This presentation shines a light on the small and the big of a Mini-B.



About Joseph Giampietro: Joseph Giampietro, registered Architect & Landscape Architect. Graduate of the University of Pennsylvania and Catholic University of America. Experience in architecture, land use planning, real estate development, construction and cabinetry. City of Seattle - NW Design Review Board Member. Certified Passive House Consultant. Director of Housing at Johnson Braund Design Group, Inc. Emphasis on affordable, urban, mixed-use, urban and low-income housing.



The Stanton Residence

Session I - Making the Complicated Simple by Chris Senior and Casey Shaw

Synopsis: Chris Senior, a Passive House homebuilder in Chapel Hill, North Carolina, will discuss his experience with low and net-zero-energy homes while focusing on a concrete PH in central North Carolina.



About Chris Senior: Chris Senior is a Passive House homebuilder in Chapel Hill, N.C. He founded AnchorageBuildingCorp.com in North Carolina in '93 and built low or net-zero-energy customs. Now he loves building Usonian-style Passive Houses. He had previous careers in archaeology, then as a stockbroker. Executive boards: North Carolina Sustainable Energy Association, Town of Chapel Hill Sustainability Committee.

Also panel member of Session M - Builder's Hootenanny



About Casey Shaw: Casey is the developer of the Passive House in North Carolina. During and after working on his graduate degree, Casey developed fruitful relationships with non-profits. At The Green Standard.org he coached manufacturers of built environments on developing sustainable practices and utilizing life cycle assessment. Casey started a building materials supply company in '09 with the following mission: "Whatever is exceptional in design and energy efficiency must be offered to 21st century consumers."

Session I - The Freeman Residence (Maine Passive House) by Laura Briggs and Jonathan Knowles

Synopsis: The project is an addition to an 1830 farmhouse, built with the regional practice of aggregated volumes to protect against the cold of central Maine. A fire took the barn in the late 20th century, leaving only the house. Separated by 200 years and 6 feet, the Freeman addition is an exercise in opposites. The addition follows the vernacular tradition but sets up a dialog between past and present, thick and thin, transparent and opaque, and passive and active. The addition is the twin of the original – asymmetrically conjoined with recognizable features but different personalities.



About Laura Briggs: BriggsKnowles Architecture + Design is a New York City based practice recognized for its use of light, color and ecological strategies. Projects range from speculative work on the city and research into the integration of photovoltaic and interactive energy technologies within building surfaces. The work of the firm has been published in several venues including *The New York Times*, *Dwell*, *Domus*, and *Metropolis Magazine* and has been featured on *Fine Living HGTV*.



About Jonathan Knowles: BriggsKnowles Architecture + Design is a New York City based practice recognized for its use of light, color and ecological strategies. Projects range from speculative work on the city and research into the integration of photovoltaic and interactive energy technologies within building surfaces. The work of the firm has been published in several venues including *The New York Times*, *Dwell*, *Domus*, and *Metropolis Magazine* and has been featured on *Fine Living HGTV*.

Session P - Future-Fitting of Public Buildings to Passive House Standards *by Ludwig Rongen*

Synopsis: This session will cover examples from the Baesweiler energy efficient community with a case study of the high school. Special focus will be paid to the study and cost benefit analysis of all public buildings in the community to be retrofitted optimally into high performance buildings. Examples will draw from the first completed portion of the high school retrofit (originally built in 1971 with currently 1000 students, meeting the new building standard of Passive Houses). Plus, other examples of completed Passive House School buildings in Europe and basic principles for school building design and execution.



About Ludwig Rongen: Ludwig Rongen is a German architect, planner, professor and author solidly focused on energy efficient buildings. Since 1992, he has taught design and rehabilitation of old buildings at the University of Applied Sciences FH, Erfurt which has started the first internationally-focused Passive House Masters program. Ludwig is a member of IG Passive House, Darmstadt (Germany) and is very active on the PHI steering and research committee clusters.

Session J – The Third Load: Dehumidification *Presenters: Henry Gifford, Corey Saft and Katrin Klingenberg*



About Henry Gifford: Henry Gifford designs and fixes mechanical systems for energy efficient buildings. He's a big believer in measurements, including having done the world's first study on how much electricity elevators use, and is known for his advocacy of rating building energy efficiency by building energy use.



About Corey Saft: Corey Saft is a registered Architect and certified LEED professional. Along with maintaining a small practice he is also an Associate Professor at the University of Louisiana at Lafayette where he is the Undergraduate coordinator. Early this year, he completed 204House, a single family residence that is the first Passive House in the South.

Session K - The Passive House Alliance
by Tom DiGiovanni, Jonah Stanford and Terrell Wong

Synopsis: Launching in conjunction with the 2010 Passive House conference, the Passive House Alliance is a nationwide 501c3 non-profit organization created to support the Passive House building energy standard through public outreach, education, support of industry professionals and advocacy. PHA will create a national voice for the Passive House standard and will offer its members significant benefits, including continuing education, marketing tools; networking; product discounts and automatic enrollment in the International Passive House Association. PHA will quickly become *the* place to find the latest information about Passive House and cutting edge building efficiency in North America.



About Tom DiGiovanni: Tom DiGiovanni is the acting Director of the Passive House Alliance. He comes to the PHA with more than 20 years of executive level experience in entrepreneurial and startup environments. Tom specializes in company growth strategies; development finance; affordable housing and sustainable buildings. He is a licensed CPA in Washington and Georgia, and over the past two years has been actively involved in more than \$2 billion in development finance deals.

About Terrell Wong: Stone's Throw Design Inc., a Toronto based firm, was founded by licensed architect, Terrell Wong in 1998. Sustainable design has been at the forefront of the practice since it began. She and her partners won the competition put forward by the Toronto Regional Conservation Authority and the Design Exchange to create an Archetype for Sustainable Housing - under the name Building Blocks it provides a model for the best in affordable, sustainable housing.



The Smith House

Session L - The Passive House in the Woods Project by Tim Eian

Synopsis: Gary and Christine Konkol commissioned Tim Eian, principal and owner of TE Studio, in late 2008 to design a carbon-neutral Passive House home for their family. After the unfortunate passing of Christine, the initial design work was modified to reflect Gary's personal vision of making a simple and durable structure that respects the land it occupies, and delivers world-class performance in terms of energy use, health and comfort. We pioneered super-insulated ICF construction, and combined local material and practices with high-performance product from Germany to create a precedent for a Passive House-compliant home in an extreme climate zone that makes more energy than it consumes. The Passive House in the Woods uses almost 30% less heating energy than Passive House guidelines prescribe and exceeds its air-tightness and source-energy requirements.



About Tim Eian: Growing up in Germany, Tim was exposed to strong environmental policy and practice from an early age. It is his conviction that protecting the earth is one of the key challenges of his generation. In 2008, Tim founded TE Studio; a residential building design firm dedicated to beautiful, durable, earth-friendly Passive House buildings that provide healthy environments and economy to meet his client's needs—both now and in the future.



Konkol Residence

Session L - Canadian Retrofit by Ross Elliot

About Ross Elliot: Ross Elliott heads Homesol Building Solutions whose goal of healthy, comfortable and sustainable buildings has always remained at the forefront of the business. Ross founded his first company in Ontario in the early '80s. He says "As a young Licensed Energy Auditor looking to make a living, it soon became apparent that the market for energy efficiency consulting services was virtually non-existent at that time in Canada's era of cheap, abundant, seemingly pollution-free energy (although south of the border, saving energy was their new patriotic duty in the face of the Arab oil embargo). So I packed up my blower door and picked up a hammer instead, becoming a Licensed Carpenter in 1983."

Session L - Extreme Cold: Fairbanks, Alaska
by Thorsten Chlupp



About Thorsten Chlupp: Thorsten Chlupp is the owner of REINA, LCC and has been building homes in interior Alaska since 1997. He works closely with the Cold Climate Housing Research Center and is current acting chair of the research advisory council for interior Alaska. With a great passion for building science his focus over the last years has been to develop high performing building systems with integrated renewable energy systems with a strong focus on solar and annual heat storage. He strongly believes that we need to develop truly sustainable buildings and communities now - today, whilst we have the time and resources to do so.

Also panel member of Session M - Builder's Hootenanny

Session M - Builder's Hootenanny

Panel Members: *Blake Bilyeu, Dan Whitmore, Rick Milburn, Thorsten Chlupp, Darcy Bean, Chris Senior, Adam Cohen and Alex Boetzel*



About Darcy Bean: After working for over 20 years in the construction business around East Central Illinois, Darcy founded Darcy Bean Custom Constuction in 1994 to provide customers with a "hands-on" approach to quality design, building and remodeling. He built the Stanton House in Urbana, IL and is currently under construction on two more of e-co lab's Passive Houses there.



About Alex Boetzel: Working for over 20 years in Europe and the US, Alex has managed a diversity of complex and innovative projects, employing low impact design and construction strategies for both new homes and small remodels. He is the vice-president of Green Hammer in Portland, a Certified Passive House Consultant, and is passionate about helping to grow and strengthen passive house technologies that advance energy efficiency, carbon neutrality and look as good as they feel.

Session N - Kentucky Habitat Passive House by Ginger Watkins

Synopsis: The momentum to build Passive Houses is growing in Kentucky with a loose group of non-profits, for-profits and state agencies joining forces. The design strategies, costs and funding strategies used for the pilot projects are discussed.



About Ginger Watkins: Ginger Watkins is the Sustainable Building Specialist for Kentucky Habitat for Humanity. Her career has focused on green and energy-efficient building design in the commercial and residential sectors. She was integral to the development of the Kentucky High Performance Building Standards and historic Boone Tavern's attainment of LEED Gold. Ginger is passionate about collaborating to find innovative solutions to enable the development of affordable, super-efficient homes that act as a resource to families and, in turn, enable them to be a resource to their own communities. She is a HERS Rater, BPI Building Analyst, LEED AP and Certified Passive House Consultant.

Session N - Washington, D.C. Habitat Passive House by Kent Adcock & David Gano

Synopsis: In order to become successful you not only need to form the vision - you also must be able to fund the vision. That challenge is especially evident for non-profit developers. In order for Passive House to become the industry standard for affordable housing there needs to be an understanding on how to leverage its value, benefits and building design. In this session Kent and Dave will share how Habitat for Humanity of Washington, D.C., approaches stakeholders and partners to leverage Passive House. How you engage and 'message' potential stakeholders makes all the difference. The formation and development of their design team and their approach to specific city administration needs in a tight urban setting and their Passive House/Townhouse design will be shared. As a non-profit housing developer they will share some successes and pitfalls to increasing funding for Passive House. A simple case study of their urban model in Washington, D.C. will be shared that demonstrates how it does not have to be complex in order to be effective.



About Kent Adcock: Prior to joining Habitat for Humanity of Washington, D.C., Kent served as Director of Government and Community Relations for Habitat for Humanity of the Mississippi Gulf Coast. Previous to that Kent served with Habitat for Humanity's Operation Home Delivery as Associate Director of Field Operations assisting in Katrina recovery effort on the Mississippi Gulf Coast. Kent assumed his role of President & CEO of Habitat for Humanity of Washington, D.C. in April of 2009. Habitat, D.C. is an 'early adopter' of new model approaches to finding affordable solutions for families in need of housing in the nation's capital.



About David Gano: David Boyce Gano is Director of Construction for D.C. Habitat for Humanity, in Washington D.C. In the shadows of Washington's mighty monuments, on the streets of our nation's capital, thousands of families live in sub-standard housing and D.C. Habitat for Humanity has dedicated itself to providing many of them a decent house to come home to. David joined D.C. Habitat for Humanity in 1997. He has spent the last 12 years overseeing the construction of more than 70 independent Habitat houses, developing a 4-acre tract of land into a 53-house Habitat subdivision, and completing a 23-unit Habitat townhouse development. David says he loves his job because "Were else can you be painting interior walls with President Obama at 10:30 in the morning and participating in a home dedication

ceremony for a needy family at 2:00 that afternoon?"

Session N - Habitat Passive House in Vermont

by J.B. Clancy and Peter Schneider

Synopsis: This session will present a case study comparing a typical Habitat for Humanity (HfH) cape-style home and the first HfH Passive House. You'll gain an overview of the design, construction, cost analysis and post-occupancy evaluation of one of the first Passive Houses in New England, the first Habitat for Humanity Passive House and the first modular Passive House in North America.



About J.B. Clancy: J.B. Clancy is an architect and partner at Albert, Righter and Tittmann, Architects in Boston. J.B is currently designing a Passive House for Habitat for Humanity in Vermont and is a Passive House Consultant for the multi-unit Distillery project in South Boston.



About Peter Schneider: Peter Schneider works as a Senior Project Manager at the Vermont Energy Investment Corporation in Burlington, Vermont. He provides technical support to builders, architects, affordable housing agencies and homeowners participating in a number of different programs such as ENERGY STAR Homes, LEED & Passive House. Peter's goal is to help his clients build more energy-efficient, healthy, durable and sustainable buildings. Peter is a certified Energy Rater, Home Performance Technical Advisor, Passive House Consultant and LEED for Homes QAD.



Session 0 - A 26 Year-Old Passive House, A Retrofit and Lessons Learned
by James Brew

Synopsis: One of the most energy efficient buildings in the United States has undergone a state-of-the-art renovation designed to demonstrate how much more energy efficient homes can become - and that homes can truly be fossil-fuel free.

Completed in 1984 as the original headquarters of Rocky Mountain Institute and the private residence of Amory and Hunter Lovins, the home and office remains a showcase of efficiency ideas. More than twenty-five years later, and with over 100,000 visitors, the building is still one of the most efficient around.

Many of the basic architectural concepts used in this project in the early 1980's have become standard sustainable design principles, and many of the technologies used are more readily available today than they were over 25 years ago. This session will review the original design, which inspired Dr. Wolfgang Feist, founder of the Passivhaus Institute in Darmstadt, and it will review some of the lessons learned as the Passive House standard is being applied to current Passive House projects in the US.



About James Scott Brew: James Scott Brew is a Principal Architect with Rocky Mountain Institute where he specializes in creating sustainable homes, buildings, campuses, and communities. He has nearly three decades of design and construction experience and has completed hundreds of projects in historic preservation and healthy, high-performance, low-energy homes and buildings extending from the US to Asia and Europe.

Session O - The Boston Distillery Project
By Manfred Brausem



About Manfred Brausem: Manfred Brausem is an inventive architect, developer and the director of MB Planungs GmbH in Koln, Germany. He is among Germany's longest-standing and most experienced Passivhaus implementers and has been involved with the innovation of many of its new building components. Manfred built the first Passivhaus development in 1998 and has been active in advancing the standard worldwide.

*Also a panel member of Session G - The Mechanical Panel
and Thursday Advanced Workshop - Multifamily Buildings*

Session Q – Prefabricated Performance Walls
By Hans Porschitz



About Hans Porschitz: With an engineering degree in Wood Technology, Hans Porschitz worked as an R&D consultant for German prefabricated housing manufacturers before he joined Bensonwood in Walpole, N.H. in 2000. Hans is a project manager at Bensonwood and involved with development of new and improved systems and products for the construction industry.

Session Q - The GO Home *by Alan Gibson*

Synopsis: The GO Home is a 1500 square-foot, three-bedroom home in Belfast, Maine. Completed in 2010, it is the first certified Passive House in northern New England. By utilizing a basic timber frame, 2x4 exterior walls and pre-configured SIP's, the project was able to achieve the required performance with a simple and cost-effective shell. Details on wall sections, connection to foundation, air sealing and window and door installation will be illustrated by the builder.



About Alan Gibson: Alan Gibson is one-half of the design/build team of G O Logic, LLC along with architect Matthew O'Malia. Alan has been a builder in Maine since 1990, focusing on energy-efficient residential construction. He also dabbles in energy modeling, consulting on green building, and community development.

Session Q - The Hudson Passive Project *by Dennis Wedlick*

Synopsis: The Hudson Passive Project, located in the picturesque Hudson Valley, is on track to becoming the first certified passive house in New York State. This three bedroom, two bathroom home was designed by Dennis Wedlick Architect LLC., built by Bill Stratton Building Company with research provided by NYSERDA. Blending beautifully with its rural surroundings, this project has fit perfectly into our core goal: to design a high-performance home that was both beautiful and easy to build.



About Dennis Wedlick: Dennis Wedlick is the founder of Dennis Wedlick Architect LLC, a full-service architecture, master planning, landscape and interior design firm in Manhattan and Hudson, NY. The firm is known for sustainable, expressive projects that combine great design, technology and craft. Last year, the firm designed its first passive house, The Hudson Passive Project, which will be complete in the fall of 2010.

Closing Plenary *by Dr Wolfgang Feist and Amory Lovins*



About Amory Lovins: Physicist Amory Lovins, Hon. AIA, consultant to business and government leaders, is Chairman and Chief Scientist of Rocky Mountain Institute. He's written 29 books and received the Blue Planet, Volvo, Onassis, Nissan, Shingo, and Mitchell Prizes, MacArthur and Ashoka Fellowships, 11 honorary doctorates, and the Heinz, Lindbergh, Right Livelihood, National Design, and World Technology Awards.