Development of Distance Learning Vocational Training Material for the Promotion of Best Practice Ventilation Energy Performance in Buildings

VENT DISCOURSE

Modern methods of education can play a vital role in increasing energy-efficiency in new buildings. Vent DisCourse adopted the distance learning method and applied it to ventilation - a core area of the energy performance of buildings. It targeted building professionals in an effort to stimulate the use of best practices in ventilation and addressed non-technological and cultural barriers via pilot training courses and awareness raising.

Results

- A 500-page textbook on state-of-the-art sustainable building ventilation, as reviewed by European experts, is available.
- An on-line version using distance learning software has been developed. Trainee assessment exercises are included.
- Modules are available on: principles of energy-efficient building ventilation; natural and hybrid ventilation; ventilation for urban buildings; energy-efficient mechanical ventilation; and the assessment of building ventilation.
- 60 post-graduate students from six universities tested the training material which has been incorporated into an M.Sc. course at Brunel University. This distance-learning degree had an intake of 43 students for the 2007/08 academic year.
- Self-training modules were published in the REHVA journal and translated into three languages. The printed journal reaches 5 000 HVAC engineers and the e-journal 100 000, worldwide.

Lesson learned

- There is a great demand for distance learning training material suitable for industrial and educational training in relation to emerging issues in energy and buildings.
- The benefits of an international group of experts preparing the text are great. This is an important way to promote good technologies over between European countries.
- Textbook (print version) is the preferred method of learning for university students and industrial trainees alike. The web-based facility is preferred for selective release items such as question answers or assignments and for interactive contact with other students and/or trainer.
Partners and coordinator

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<tr>
<th>Institution</th>
<th>Country</th>
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<td>Brunel University</td>
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<td>Ecole Nationale TPE, Laboratoire Sciences de L'Habitat - CNRS-DGCB</td>
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<td>National and Kapodistrian University of Athens</td>
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<td>Federation of European Heating and Air-conditioning Associations</td>
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Budget

Overall budget: 641.750,00 € (EU contribution: 50,00 %)

Key documents

- Best Practice in Ventilation: Vocational Courses [6]
  PDF 2.13 MB

In brief

Sector: Buildings

Duration: 01/01/2005 to 31/12/2006

Contract number: EISAV/EIE/04/022/2004

Website: http://www.ventdiscourse.eu

Tags:

building
Related projects

- **EPLABEL** [77] A programme to deliver energy certificates for display in public buildings...
- **AVASH** [8] Advanced Ventilation Approaches for Social Housing
- **ENPER EXIST** [9] Applying the EPBD to improve the ENergy PErformance Requirements to...
- **ASIEPI** [10] Assessment and improvement of the EPBD Impact (for new buildings and...
- **BESTFACADE** [11] Best Practice for Double Skin Facades
- **BUILDING ADVENT** [12] Building Advanced Ventilation Technological examples to demonstrate...
- **CHECK IT OUT!** [14] Check and improve the energy performance of schools and disseminate best...
- **DATAMINE** [15] Collecting data from energy certification to monitor performance...
- **COMMONCENSE** [16] Comfort monitoring for CEN Standard EN15251 linked to EPBD
- **CYBER DISPLAY** [17] Communicate Your Buildings Energy Rating
- **CA EPBD II** [18] Concerted Action supporting transposition and implementation of Directive...
- **CONSTRUCTION21** [19] CONSTRUCTION21- A EUROPEAN GREEN BUILDING EXCHANGE
- **CERTuS** [20] Cost Efficient Options and Financing Mechanisms for nearly Zero Energy...
- **AFTER** [21] Cost Optimum and Standard Solutions for Maintenance and Management of the...
- **ROSH** [22] Development and marketing of integrated concepts for energy efficient and...
- **EEBD** [23] Development of an interactive vocational Web training tool for the take-...
- **COOLREGION** [25] Energy efficient Cooling in regions of North and Central Europe
- **ECOLISH** [26] Energy Exploitation and Performance Contracting for Low Income and Social...
- **EI-EDUCATION** [27] Energy Intelligent Education for Retrofitting of Social Houses
- **EPI-CREM** [29] Energy Performance Integration in Corporate Public Real Estate Management
- **EPI-SOHO** [30] Energy Performance Integration in Social Housing, a strategic approach for...
- **ENSLIC BUILDING** [31] Energy Saving through promotion of Life Cycle analysis in Building
- **INTELLIGENT METERING** [32] Energy Savings from Intelligent Metering and Behavioural Change
- **ESAM** [33] Energy Strategic Asset Management in Social Housing Operators in Europe
- **E-TOOL** [34] Energy-toolset for improving the energy performance of existing buildings
- **EDUCATE** [35] Environmental Design in University Curricula and Architectural Training in...
- **EPEE** [37] European fuel Poverty and Energy Efficiency
- **EULEB** [38] European High Quality and Low Energy Architecture
- **ENFORCE** [39] European Network for the Energy Performance Certification of Buildings
- **E-SEAP** [40] European Sustainable Energy Award for Prisons
- **AUDITAC** [41] Field benchmarking and Market development for Audit methods in Air...
- **GREENBUILDING** [42] GREENBUILDING
- **HARMONAC** [43] Harmonizing air-conditioning inspection and audit procedures in the...
- **IMPLEMENT** [44] IMPLEMENT - The EPBD in Action
- **IMPACT** [45] Improving energy Performance Assessments and Certification schemes by Tests
- **ISEES** [46] Improving the Social Dialogue for Energy Efficient Social Housing
- [ILETE] Initiative for Low Energy Training in Europe
- [INOFIN] Innovative Financing of Social Housing Refurbishment in Enlarged Europe
- [CENSE] Leading the CEN standards on energy performance of buildings to practice....
- [GREENBUILDINGPLUS] Leveraging the GreenBuilding Programme (GBP) to promote energy-efficiency...
- [LCC-DATA] Life-Cycle-Cost in the Planning Process. Constructing Energy Efficient...
- [ENERGY TROPHY+] Magnify success: Extension of the European Energy Trophy competition to 18...
- [PASSIVE-ON] Marketable Passive Homes for Winter and Summer Comfort
- [IDES-EDU] Master and Post Graduate education and training in multidisciplinary teams...
- [NIRSEPES] New Integrated Renovation Strategy to improve Energy PEformance of Social...
- [NZB2021] NZB2021 ‘Doors Open Days’ – sharing experiences from low energy buildings...
- [FACTOR 4] Programme of actions Factor 4 in existing social housing in Europe
- [COOL ROOFS] Promotion of cool roofs in the EU
- [PEP] Promotion of European Passive Houses
- [NEZER] Promotion of smart and integrated NZEB renovation measures in the European...
- [NORTHPASS] Promotion of the Passive House Concept to the North European Building...
- [RE-CO] Re-Commissioning – Raising Energy Performance in Existing Non-Residential...
- [REPUBLIC_ZEB] Refurbishment of the Public building stock towards nZEB
- [REQUEST2ACTION] Removing barriers to low carbon retrofit by improving access to data and...
- [RESHAPE] Retrofitting Social Housing and Active Preparation for EPBD
- [SAVE@WORK4HOMES] SAVE@Work4Homes - Supporting European Housing Tenants in Optimising...
- [STABLE] Securing The Take-off of Building Energy Certification: Improving Market...
- [KEEPCOOL] Service Buildings Keep Cool: Promotion of "sustainable cooling"
- [SMART-E BUILDINGS] Smart-e buildings - yes we canEnable the building sector to contribute to...
- [SHARE] Social Housing Action to Reduce Energy Consumption
- [STEP-2-SPORT] STEP-by-STEP renovation towards nearly zero energy SPORT buildings
- [SAVE AGE] Strengthening Energy Efficiency Awareness Among Residential Homes for...
- [SENTRO] Sustainable Energy systems in New buildings- market inTROduction of...
- [SURE-FIT] Sustainable Roof Extension Retrofit for High-Rise Social Housing in Europe
- [TACKOBST] Tackling Obstacles in Social Housing
- [KEEP COOL II] Thermal comfort in buildings with low-energy cooling
- [BUILDING EQ] Tools and methods for linking EPDB and continuous commissioning
- [TOWARDS CLASS A] Towards Class A - Municipal Buildings as Shining Examples
- [TREES] Training for Renovated Energy Efficient Social housing
- [REE_TROFIT] Training on Renewable Energy solutions and energy Efficiency in...
- [KEEP COOL II] Transforming the market from "cooling" to "sustainable...
- [TABULA] Typology Approach for Building Stock Energy Assessment
- [USE EFFICIENCY] Universities and Students for Energy Efficiency