DYNASTEE workshop on
Dynamic Methods for Building Energy Assessment
11 - 12 October, 2010 - Centre Borchette Brussels

PROGRAMME

Monday October 11, 2010
9.00 Opening of registration
9.30 Session 1: Context, challenges and opportunities
9:30 H. Bloem, EC – JRC Ispra
DYNASTEE Welcome, objectives of Dynastee and of this meeting
9:40 P. Wouters, INIVE EEIG, Belgium
INIVE Welcome, objectives of INIVE and link to this topic
9:55 L. Vandaele, BBRI, Belgium
History of PASLINK- DYNASTEE
10:20 T. Agami Reddy, Arizona State University, USA
Testing, verification and normalisation: a US perspective
10.45 Break

11.15 Session 2: Know how on data analysis and training
11:15 H. Madsen, DTU-IMM, Denmark
Mathematical and statistical approaches; Software tools
11:40 M.J. Jimenez, CIEMAT, Spain
System identification applied to modelling of building components and systems. Case studies: Opaque wall and ventilated PV system
12:05 H. Bloem, EC - JRC Ispra
System Identification Competition (training and case-studies)
12:30 T. Schnier; University of Birmingham
A dynamic thermal building model based on non-intrusive data collection
12:45 Lunch

14.00 Session 3: Data collection and experimental set-up
14:00 P. Baker, Glasgow Caledonian University, UK
Robin Robin Testing of Building Components using the PASLINK Test Facilities: Quality Assurance in Testing and Analysis
14:25 A. Erkoreka, University of the Basque Country, Spain
Upgrading and calibration of two PASLINK test cells. Evaluation through the "IQ-TEST" round-robin test
14:50 R. Pfluger, University of Innsbruck, Austria
Testing of a Window Device with Integrated Shading and Ventilation System with PAS-Test Cell and Coldbox
15:15 Short presentations about 4 new test sites
- G. Alcamo, University of Florence, Italy
- G. Nurzia, Hydro Building Systems Solar, Spain
- J. Cipriano, CIMNE, Lleida, Spain
- S. Jensen, DTI – ECD, Denmark

15.35 Break

16:00 Session 4: Application of results – simulation and prediction

16:00 P. Strachan, University of Strathclyde, UK
Dynamic Testing and Simulation for Assessing Building Performance Assessment

16:25 S. Jensen, DTI – ECD, Denmark
Calibration of models with MicroShades

16:50 Marinosci. Università di Bologna, Italy
Experimental benchmark of the modelling of a rain screen ventilated façade.

17:15 Y. Xing. University of Ulster, Ireland
Dynamic Modelling of Building Energy Demand, Supply and Storage.

17:25 P. Bacher DTU – IMM, Denmark
Statistical models describing the energy signature of Buildings

17:35 G. Masy, HEPL, Belgium
SISAL project: Free on line access to building dynamic simulation tools.

17.45 Conclusions and End of the first day around 18:00

19:00 Walking dinner in Brussels

Tuesday October 12, 2010

9.00 Session 5: Application areas in detail

9:00 L. Bourdeau, ECTP, France
***EU projects** : Overview of energy in buildings related FP7 projects*

9:30 H. De Bleecker. Permasteelisa, Belgium
***New buildings**. Dynamic Façade Systems & detailed assessment tools for energy-efficient buildings - Experiences and view of a facade manufacturer & contractor*

10:15 A. Androutsopoulos, CRES, Greece
***Test cells** : Testing the thermal performance of planted roofs by the use of Test Cells*

10:30 P. Delff. DTU – IMM, Denmark
***Test House**, Non-linear phenomena in greybox-modeling of heat dynamics in buildings.*

10:40 Break

11:00 Session 6: Energy performance and in-situ measurements

11:10 J. Wingfield : Leeds Metropolitan University
***Existing buildings** : In-situ Measurement of Whole House Heat Loss using Electric Coheating*

11:35 R. Enriquez, CIEMAT, Spain
***Existing buildings :** First steps towards thermal dynamics identification of existing buildings through general simulation model calibration.*

11:45 G. Zogla, A. Blumberga. RTU, Latvia
***Existing buildings** : In-situ heat flow measurements before and after energy efficiency measures in apartment buildings in Latvia*

11:55 J. Molina. *Numerical and Experimental Analysis o draught evaporative cooling in Seville*

12:05 H. Madsen. DTU – IMM, Denmark
***Intelligent metering** : ENFOR Analysis of energy consumption in single family houses in Denmark.*

12:30 Synthesis of challenges;
H. Bloem. Topics for follow-up event 2011
Test facilities for assessing advanced building components and nearly zero energy buildings
Whole building testing, analysis and modelling.
H. Madsen Summer school; Basic theory. Methods and tools. Dynamic analysis applied

13:30 End of the workshop