

## CALL FOR PAPERS

Papers are being sought for the annual International Conference “**ENERGY in BUILDINGS 2018**” to be held in Athens, Hellas on **Saturday November 3, 2018**.

The Conference is organized by the ASHRAE Hellenic Chapter in collaboration with the Technical Chamber of Greece (TEE).

### AN INTERNATIONAL EVENT

“ENERGY in BUILDINGS” is an International Conference that will take place for the seventh consecutive year. It brings together Engineers, Architects, Academics and Professionals of different disciplines and other stakeholders who contribute to and advance the state of art of the built environment. Information and videos from the previous conferences can be found at the Hellenic Chapter’s website ([www.ashrae.gr/events.php](http://www.ashrae.gr/events.php)). The Conference will host accepted papers and posters as well as presentations and workshops of invited speakers. There is no conference registration fee. The official language of the Conference is English.

### CALL FOR PAPERS

All interested authors are invited to submit papers to be considered for presentation in the International Conference “**ENERGY in BUILDINGS 2018**”. Submitted contributions should be original research papers, not submitted or considered for publication elsewhere.

Authors should submit an abstract of no more than 400 words by **July 9, 2018**.

If accepted, full papers will be due **August 6, 2018**. A typical manuscript is limited to 10 pages.

Submitted abstracts and papers will undergo peer-review by the Conference Scientific Committee.

Submittal information and templates for abstracts, full papers and posters can be found at <http://www.ashrae.gr/einb2018a.php>

Authors of accepted papers are responsible for their travel and accommodation. An author must register and present his paper during the Conference in person, one mandatory author registration per paper, in order to be included in the final program and the paper in the Conference Proceedings that will be published in an electronic media publication with open access (e-Proceedings book with an ISBN number).

### THE CONFERENCE TOPICS

The Conference will present the state of the art in building design, construction, commissioning, operation & maintenance as well as emerging new technologies & materials. The conference topics include, but are not limited to:

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| ✓ Nearly or Net Zero, and Net Positive Energy Buildings | ✓ Advances in Refrigeration & Alternative Refrigerants |
| ✓ Data Centers Beyond Current Technologies              | ✓ Embodied Energy, Life Cycle Assessment               |
| ✓ Architectural Designs for High Performance Buildings  | ✓ Daylight & Artificial Lighting                       |
| ✓ Indoor Env. Quality (IEQ), Health & Comfort           | ✓ Advanced Materials and Applications                  |
| ✓ IoT for the Built Environment.                        | ✓ Renovation for Improved Energy Performance           |
| ✓ Renewable Energy in Buildings                         | ✓ Cogeneration & Energy Storage in Buildings           |
| ✓ Next Gen HVAC Simulations & Energy Management         | ✓ Sustainable Neighbourhoods, Cities and Regions       |

## CONFERENCE THEMES & SPECIAL SESSIONS

### Data Centers Beyond Current Technologies

This year the conference will place an emphasis on Data Centers. The presentations will cover optimization of resource and energy efficiency through cutting edge technologies for data center design and operation. Topics of interest include risk analysis and sustainable design, edge computing and facilities, impact of IoT and Big Data, predictive controls, direct air cooling, water and other liquid cooling solutions, and on-site generation and renewables

### Thermal Energy Storage Systems for Energy Efficient Buildings

This year the Conference will host the thematic TESSE<sup>2</sup>B conference in the field of energy storage targeted to Energy Efficient Buildings. This thematic event will present and discuss current innovation in the Energy Storage field targeted to Energy Efficiency & Built Environment, focusing on integrated solutions for residential building energy storage by solar and geothermal resources. Results will be presented from the ongoing European project, as well as results from other projects in the area of energy storage.

### Lighting

The Lighting thematic event will provide an opportunity to exchange views on key areas of light and lighting engineering, to present progress in technology and to discuss future challenges. Areas of interest include, but are not limited to: Lighting technology (lamps, luminaires, lighting controls, Lighting calculations and measurements; Energy efficiency and economics of lighting; Standards and legislation in lighting; Daylight design and control; Interior & exterior lighting; Architecture lighting; Lighting in antiquity, Illumination of archaeological sites, monuments and museums; Human aspects of lighting.

## INTERNATIONAL SCIENTIFIC COMMITTEE

- Dimitris A. Charalambopoulos, M.Sc., BEAP  
*Mechanical Engineer, D.A. Charalambopoulos & Assocs, Engineering Consultants, Hellas.*
- Dr. Elena Dascalaki  
*Building Physicist, Senior Researcher, IERSD, National Observatory of Athens, Hellas*
- Dr. Ioanna B. Deligkiozi  
*Chemical Engineer, NTUA  
Senior Manager, Axia Innovation, München, Germany*
- Stelios Kiosses  
*Psychologist & Human Factor Ergonomic Consultant, UK*
- Prof. Dr. Essam Khalil  
*FASHRAE, FASME, FAIAA  
Faculty of Engineering, Cairo University, Egypt*
- Dr. Marianna Vallejo  
*Energy & Resource Optimization, Advanced Design & Simulation Group, Jacobs Engineering Group Inc, U.S.A.*
- Prof. Dr. Branislav Todorovic, FASHRAE  
*University of Belgrade, Serbia, Permanent Visiting professor, South-East University in Nanjing, China; Editor of Elsevier's Journal Energy & Buildings*
- Prof. Dr. Bratislav Blagojević  
*Head, Thermal Engineering Dpt., Faculty of Mechanical Engineering, University of Niš, Serbia*
- Prof. Dr. Michalis Gr. Vrachopoulos  
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- Prof. Dr. Luis Coelho  
*Dpt. of Mechanical Engineering, Instituto Politécnico de Setúbal, Portugal*
- Prof. Dr. Maria K. Koukou  
*Dpt. of Mechanical Engineering, Technological Education Institute of Sterea Ellada, Hellas*
- Prof. Dr. Vassilis Stathopoulos  
*Dpt. of Electrical Engineering, Technological Education Institute of Sterea Ellada, Hellas*
- Raul Simonetti  
*HVAC/R Corporate Business Manager  
CAREL Industries S.p.A., Italy*

### IMPORTANT DATES:

- July 9, 2018: Abstract Submission Deadline  
(Submit your abstract electronically to [EinB2018@ashrae.gr](mailto:EinB2018@ashrae.gr))
- July 16, 2018: Notification of abstract acceptance
- August 6, 2018: Paper Submission Deadline  
(Submit your paper electronically to [EinB2018@ashrae.gr](mailto:EinB2018@ashrae.gr))
- August 20, 2018: Notification of decision / comments for full papers
- September 10, 2018: Final Paper Submission Deadline  
(Submit your paper electronically to [EinB2018@ashrae.gr](mailto:EinB2018@ashrae.gr))
- September 24, 2018: Final Notification of decision
- October 1, 2018: Registration deadline for Authors (only registered speakers will be included in the final program, there is no registration fee)
- October 15, 2018: Final Program
- **November 3, 2018: "ENERGY in BUILDINGS 2018"**

### PUBLICATION

Accepted full papers will be published in an electronic media publication (e-Proceedings book with an ISBN number). Oral presentations will be videotaped and uploaded for free viewing on the Conference website. Only the papers presented during the Conference will be included in the e-Proceedings.

### Past e-Proceedings

Conference Proceedings of the 23 papers presented at "ENERGY in BUILDINGS 2016" are available online at <http://ashrae.gr/EinB2016.php> (note that the size of the file is 105MB).

Conference Proceedings of the 26 papers & posters presented at "ENERGY in BUILDINGS 2017" will be uploaded soon at <http://ashrae.gr/EinB2017.php>.

### ENQUIRIES

All enquiries should be directed to: [EinB2018@ashrae.gr](mailto:EinB2018@ashrae.gr)

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ASHRAE Hellenic Chapter Treasurer  
ASHRAE Region XIV - RMCR & Treasurer  
ASHRAE Conferences & Expositions Committee  
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