TCP on Energy in Buildings and Communities (EBC TCP)

The EBC TCP, created in 1977, carries out research and development efforts towards near-zero energy and carbon emissions in the built environment. Activities under the EBC TCP focus on the integration of energy-efficient and sustainable technologies into healthy buildings and communities.

Main areas of work

- Integrated planning and building design
- Building energy systems
- Building envelope
- Community-scale methods
- Real building energy use

Key activities and accomplishments (2017-2018)

- **Deep energy retrofit of public buildings**
- **Ventilative cooling**
- **Occupant behaviour in buildings**
- **Energy strategies in communities**
- **Exergy performance of energy supply systems**
- **Performance of super-insulating materials**
- **Energy flexible buildings**
- **Thermal comfort in low energy buildings**

Priorities and projects (2019 – 2020)

- **Air Infiltration and Ventilation Center**
- **Indoor air quality in low energy residential buildings**
- **Building energy epidemiology: analysis of real building energy use**
- **Building energy performance assessment based on in-situ measurements**
- **Assessing environmental impacts caused by buildings**
- **Towards net zero energy communities**
- **Cost-effective building renovation with energy efficiency and renewables**
- **Deep renovation of historic buildings towards low energy and emissions**
- **Integrated solutions for daylighting and electric lighting**
- **Energy impacts of supplementing ventilation with gas-phase air cleaning**
- **Occupant-Centric Building Design and Operation**
- **Resilient Cooling**

**ENERPOS, a net zero energy building in Reunion Island, a tropical climate. (Photo courtesy of Francois Garde)**
Why should your organisation become a member of the EBC TCP?

The EBC TCP is an international energy research and innovation programme in the buildings and communities field. It enables collaborative R&D projects leading to high quality scientific reports and summary information for policy makers. EBC TCP guidance, methodologies and tools have, over time, led to step-changes in support for practitioners, researchers and policy makers.

**TCP Chair:** Takao Sawachi, Japan ([tsawachi@kenken.go.jp](mailto:tsawachi@kenken.go.jp))

**TCP primary contact:** Malcolm Ome ([malcolm.ome@aecom.com](mailto:malcolm.ome@aecom.com))

**IEA contact:** buildings@iea.org

**www.iea-ebc.org**

The EBC TCP is organised under the auspices of the International Energy Agency (IEA) but is functionally and legally autonomous. Views, findings and publications of the EBC TCP do not necessarily represent the views or policies of the IEA Secretariat or its individual member countries.