

Training Workshop Explores Economic and Technical Aspects of Solar Cooling in Southern Africa

The IEA SHC Solar Academy and SOLTRAIN (Southern African Solar Thermal Training and Demonstration Initiative) hosted with the support of SACREEE and SANEDI a specialized course for professionals on Solar Cooling for Sunbelt Regions in November at Stellenbosch Institute for Advanced Study in South Africa. A total of 46 participants from 7 countries took part, with around 8 of them participating virtually.

Daniel Neyer, Manuel Ostheimer und Uli Jakob, all IEA SHC Task 65: Solar Cooling for the Sunbelt Regions experts, led the training over two days. Day I was dedicated to an overview of SHC Task 65's work, state-of-the-art and future trends of solar cooling, basic solar cooling functions, and finally, a look at several state-of-the-art products and systems, such as the HyCool technology.

On Day 2, the training turned to an economic and technical assessment of solar cooling systems, focusing on hybrid chillers for southern African applications. For the interactive portion, the trainers introduced in detail the tool T53E4 developed in IEA SHC Task 53: New Generation Solar Cooling & Heating and then put it to use to compare a hybrid solution to a standard vapor compression chiller solution. The case study relied on annual TRNSYS HVAC simulations with validated models. During this interactive session, the group discussed in detail the key technical and economic figures, load analyses, and specific design issues. The day then wrapped up with the compilation of a do's and don'ts list along with best practice examples.

As Uli Jakob, a course trainer and the SHC Task 65 Operating Agent, notes, "Another successful Solar Academy training by SHC Task 65 for the books." There was unanimous positive feedback from the participants who benefited immensely from the course and the in-depth discussions on hybrid chiller configurations for hot climates.



2022 WEBINARS

- Global Solar Certification March 2022
- **Solar Heating and Cooling Markets** and Industry **Trends June 2022**
- Task 65 Solar Cooling for the **Sunbelt Regions** October 2022
- Task 64 Solar **Process Heat** November 2022



You can watch all the past webinars on our SHC YouTube channel

click here