

You are Invited to take advantage of TROPEC's Laboratory-Based Performance Testing Capabilities

“A fast-track ability to carry forward promising expeditionary energy technologies to field demonstration in the tropical PACOM AOR”

TROPEC is a program aimed at reducing operational energy consumption in tropical environments while maintaining or improving warfighter capability. By combining Department of Energy's expertise in energy efficiency & demand reduction with PACOM and MEC's expertise in operations in tropical environments and through a process of technology identification, review and assessment, provide strategy and acquisition professionals with insight and information on material and non-material solutions.

Tropical Outdoor Lab-Based Testing capabilities:

- 1) Structures: Performance testing of rigid, semi-rigid, and tent structural components (walls, roofs, floors, etc.) and entire structures
- 2) Equipment/Systems: Fully instrumented climate chambers enabling performance testing of ECUs, air conditioners, space and water heating systems, refrigeration systems, and other equipment. Ability to test electrical/electronic systems (lighting systems, data center equipment, other electronics)
- 3) Materials: Testing of material properties (insulating value, permeability, reflectance, emissivity, compatibility, etc.)

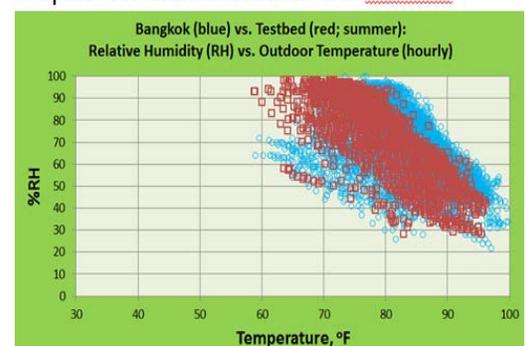
TROPEC's outdoor testbed at Oak Ridge National Laboratory
(technologies validated here go to demonstration in PACOM's tropical AOR)



Tropical Outdoor Lab-Based Testing features and results:

- 1) Located in Tennessee, providing an outdoor test bed that maps climates in tropical locations from June - September
- 2) Space available for testing structures and base support systems
- 3) Focus on short-term testing for quicker turnarounds and affordability
- 4) Broad expertise and test capabilities to identify technology improvement opportunities
- 5) Energy performance modeling
- 6) Benchmarking systems against existing performance standards

Tropical conditions occur at the testbed



How to take advantage of the TROPEC Laboratory-based Outdoor Test Bed

- 1) Log onto the Innovations Network via www.tropec.net
- 2) Enter the technology you would like to have assessed in the test bed
- 3) In parallel, reach out to Terry Sharp, Deputy Director of TROPEC and ORNL representative, by emailing sharptr@ornl.gov
- 4) Work with our team at ORNL to determine scope of the assessment and associated cost structure between TROPEC and the sponsoring US Government entity.

Did you miss the summer months? Don't worry – you can enter technology applications for lab and field based assessments year round via Innovations Network at www.tropec.net.