

SMART-ENERGY

SUSTAINABLE MOBILE ALTERNATIVE RENEWABLE TECHNOLOGIES





MEET THE GROUP

We look forward to solving your toughest power and energy concerns

ARA'S SMART-ENERGY GROUP is dedicated to developing sustainable and scalable energy technologies. We continually push beyond the boundaries of typical research and development to provide real-world energy-saving solutions for our clients. Our focus on expeditionary forces and austere locations has brought rapid and flexible energy security innovations to our service men and women in operations throughout the world.

The SMART-Energy group's extensive skillset stems from a synergistic combination of experience in mechanical, electrical, and chemical engineering as well as computational science. We are also able to draw on knowledge company-wide from ARA's diverse subject matter experts to provide across-the-board satisfaction to our clients.

To achieve success in this fast-paced and ever-changing technological environment, ARA's SMART-Energy team forms a cohesive group that effectively evaluates clients' needs and develops immediate and cost effective solutions.



We address operational energy challenges and advance solutions that increase efficiency, reduce fuel consumption, increase reliability and ensure ease-of-use through a combination of approaches:

- » Prototype Development, Design and Fabrication
- » Testing and Demonstrating
- » Operational Data Analysis
- » Cost-Benefit Analysis

THANK YOU AGAIN FOR THE GREAT WORK ... I REALLY APPRECIATE ALL THE EFFORT THAT HAS GONE INTO THESE PROJECTS, AND I'M LOOKING FORWARD TO SEEING THE FINAL RESULTS.

**Systems Support Division, U.S. Air Force Research Laboratory
Environment and Energy Program Office**

CAPABILITIES



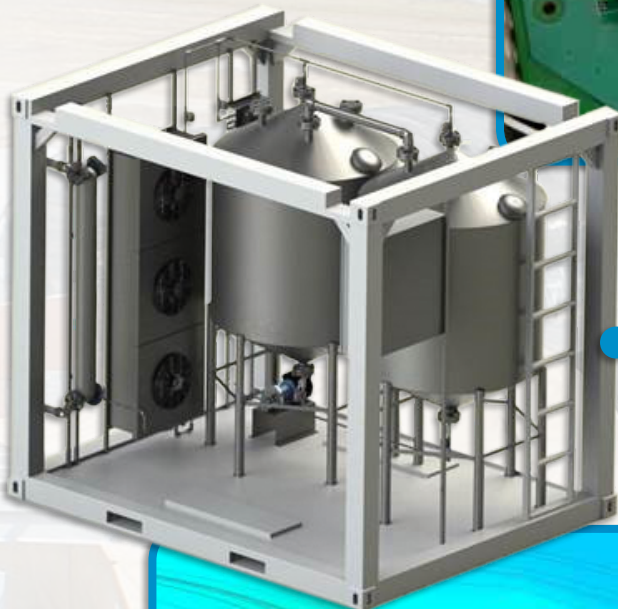
MECHANICAL

- » Energy Efficiency
- » Waste-to-Energy
- » Desalination
- » Energy Harvesting
- » Energy Storage
- » HVAC
- » Design for Manufacture
- » Rapid Prototyping
- » Machining
- » Manufacture Outsourcing
- » Design of Experiments
- » Experimental Facilities
- » Statistics
- » Data Analysis
- » AutoCAD
- » Solidworks



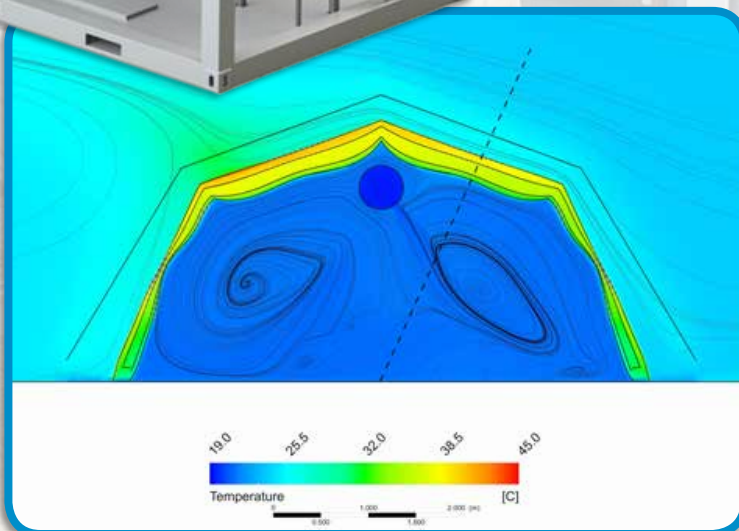
ELECTRICAL

- » Smart Systems
- » Photovoltaics
- » Software/Programming
- » Circuits
- » Controls
- » Embedded Systems & Firmware
- » LabView
- » Instrumentation
- » Signal Processing



CHEMICAL

- » Electrochemistry
- » Process Development
- » Reforming
- » Reaction Design
- » Thermochemistry

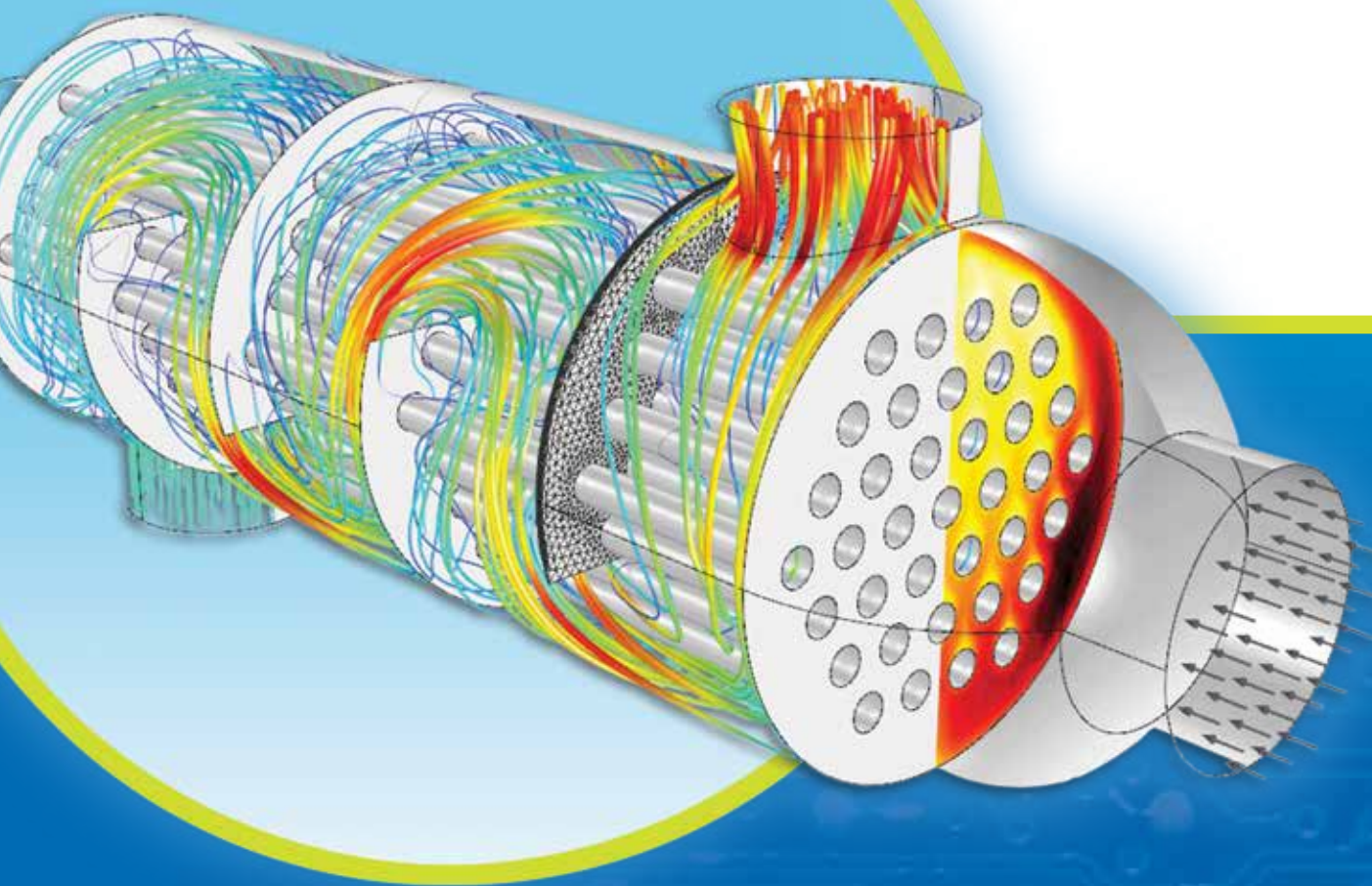


COMPUTATIONAL

- » CFD
- » FEA
- » Fortran
- » C++/C
- » Object Oriented Programming
- » Data-Driven Databases & Models
- » Ansys Fluent

MANAGEMENT

- » Cost/Benefit Optimization
- » Project Management
- » Technology Transition



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