## **CULTURES OF ENERGY:**

## Societal Transformations in the Service of Sustainable Systems Sarah Strauss and Carrick Eggleston

What energy means to us and how we deal with it is significantly determined by our perception, values, and behavioral patterns—that is, by our cultures. For some, the concern is energy poverty, and for others, energy gluttony. The problem is known—accelerating anthropogenic climate change combined with limited fossil fuel resources and growing population means that sustainable energy resources and technologies must be developed and implemented quickly. Also known are the multiple synergistic benefits to such an energy transition: in terms of human, environmental, and economic health.

The hard question is: How can we engage the global community to consider these benefits and turn collective attention to developing and implementing solutions at all scales? What does culturally appropriate capacity building look like? These cultural-technical-economic feedback systems are poorly understood. Our collaboration brings scientific, technical, and cultural perspectives together to produce a new set of strategies to rethink global problems, their local manifestations, and personal actions that can change the global trajectory.

Germany, for example, has been touted as a "best case" scenario: the German *Energiewende* demonstrates a concerted effort to transform the "energyscape," but even this is not a "done deal"—the turn is not complete. Two different "worst case" scenarios can be found in the United States and India; the first, both the largest emitter of greenhouse gases and among the most resistant to shifting from a fossil fuel economy, and the second, the second largest global population with the third largest emissions and the greatest percentage of people (40 percent) living in energy poverty. Strategies for sustainable change must be different in each of these places.

This project offers a unique interdisciplinary collaboration: a

sociocultural anthropologist whose research on climate change, energy, and health includes field experience in India, Switzerland, and the USA, and an environmental geochemist with expertise in renewable energy technologies (and professional experience in Europe/India). Strauss has a book currently under contract, presenting an argument about the relationships between climate change and the future of energy in a rapidly changing world. This volume, *The Yoga of Change: Tales of Energy, Climate, and Culture in the Anthropocene*, shows how an anthropological perspective on these "wicked" problems helps people both inside the academy and out to consider their own relationship with this planet's limited resources under conditions of global environmental change. Eggleston is working on a textbook (*Earth System in the Anthropocene*) that brings human cultures more directly into the physical Earth Systems perspective.

In addition to our primary book projects, we are working to create differentiated media and interactive experiences that can engage people coming from urban and rural environments, who might include CEOs and farmworkers, and everyone in between. Recent RCC publications highlight the history of energy in the German and global contexts, as well as the opportunities for re-visioning our world afforded by our entry into the Anthropocene. This project picks up threads from that body of work and addresses the question of what we can do to build transformative media and educational content to create a sense of urgency that "we must (and can!) act now." Action is achieved by lowering barriers (of substance and perception) at all scales, from individual to community, national, and global levels. Achieving this goal will require not only an understanding of culture and culture change, but also of the science of climate change and the realities of energy physics, resources, utilization, and policies, along with public interfacing. These content areas must be articulated in creative and fresh ways that can catch, hold, and transform the attention and practices of stakeholders across a wide swath of socioeconomic, geographic, and cultural domains.