Dear alumni and friends of the Division,

Entanglement, qubits, quantum computing: these concepts have moved decisively from the realm of theoretical physics into the lab, and specifically to our labs in the Division of Engineering and Applied Science. EAS is the home of a new effort to advance qubits from the lab to real world applications. To understand what this means, turn to page 12, where you can learn where we are placing our efforts, and what quantum computing holds in store for the advancement of computing. As we go to press with ENGenius, it was announced that the Amazon Web Services’ AWS Center for Quantum Computing is being established at Caltech, led by Oskar Painter (MS ’95, PhD ’01), John G. Brown Professor of Applied Physics and Physics, and Fernando Brandão, Bren Professor of Theoretical Physics. This center brings together researchers and engineers from Amazon, Caltech, and other leading academic institutions to develop more powerful quantum computing hardware and identify novel quantum applications.

The recent, historic gift from Stewart and Lynda Resnick to Caltech is the largest ever for environmental sustainability research, the largest in Caltech’s history, and the second-largest gift to a U.S. academic institution. A multiplicity of fields—including solar science, climate science, energy, biofuels, water and environmental resources, and ecology and biosphere engineering—are supported by the Resnick’s $750 million commitment to Caltech. The Resnicks have transformed Caltech, and their extraordinary gift will reach generations of students who will pursue new approaches to sustain-