

## Class of 1964 Making a Difference in Environmental Education

A summer travel fellowship established by the Yale College Class of 1964 enabled two Yale College architecture students last year to study how extreme climates affect the design of buildings in the Australian outback, Fiji and Iceland.

Kent Gould and Lisa Rothman, both seniors, were recipients in 2003 of the Class of 1964 Environmental Summer Fellowship. For the past three years the Class of 1964 has provided funding to sponsor summer travel fellowships for Yale College juniors who have an interest in exploring an environmental

*“The fellowship is important to the extent that it succeeds in adding to the pool of committed environmental leaders,” said Frank Basler, a member of the Class of 1964 who is in charge of the fellowship program.*

project or activity. The 2001 Class of 1964 fellow was Leah Zimmerman '02, who traveled to Lake Baikal, Russia, and Abi Sud '03 studied urban agriculture in Bangladore in the summer of 2002. The fellowship is administered by the School of Forestry & Environmental Studies (F&ES).

Recognizing the importance of environmental education at Yale and in honor of classmate F&ES Dean Gus Speth, the Class

of 1964 has been instrumental in contributing to the successful training of the next generation of environmental leaders and citizens. The Class of 1964 has also created the Class of 1964 Environmental Initiative, which provides financial assistance to F&ES students, as well as funds that supplement F&ES teaching in the Yale College major in environmental studies.

Gould and Rothman used the fellowship to complement their academic study of architectural design in extreme climates and the work of Finnish architect Alvar Aalto. Their examination of the ways that arctic, desert and rain forest climates affect the architectural design of buildings and homes resulted in a report titled “Environmental Design in Extreme Climates,” and presented to the Class of 1964 class council on Feb. 7.

Gould and Rothman observed that in Reykjavik, Iceland, many of the city's structures are designed to deal with long periods of little or no sunlight. Buildings are not tightly spaced, to allow light into as many openings as possible. On the country's south coast, mud, grass and stone are the primary building materials, as well as insulators, for old turf huts embedded into the earth and roofed with sod. Lumber is in short supply because the country's terrain is hostile to trees. In humid Fiji, homes sit on stilts or cement pillars above ground to take advantage of breezes. Wind shafts, created by arranging corridors as uninterrupted linear paths, encourage ventilation and circulation. If architectural design in tropical Fiji places buildings above ground, desert architecture takes the opposite approach. In the Australian town of Coober Pedy, many homes are built into the desert rock, which keeps interiors cool during the day and warm during the evenings. The homes are ventilated by air shafts, sometimes 99 feet in length.

While architectural design is a result of practical necessity in locales with extreme weather conditions, “green” design, according to Gould and Rothman, has become more popular in temperate zones due to notions of land conservation, bio-degradability, environmental efficiency, energy efficiency, air quality and the desire to save money.