Zhao's Impact on the Understanding of Chinese Geography in the U. S. A.

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My first encounter with Prof. Zhao Songqiao was in August 1978. I had arrived in Beijing as a member of a delegation of American desert experts, the first to visit the northwestern territories of China since 1949. The scientific mission was sponsored by the National Geographic Society in Washington DC, U. S. A. and the Institute of Geography of the Academia Sinica, Beijing, China.

I was the only geologist in the six-member delegation. Having emphasized the utilization of space photographs in the understanding of desert landforms, I took with me large prints of the Chinese deserts made from satellite images, particularly those of Landsat. During our first session to discuss details of the route of our month-long journey, I began to discuss the major features of the arid lands of northwestern China as illustrated in the Landsat multi-spectral images.

Prof. Zhao Songqiao was instantly inspired. I could see by his facial expressions and enthusiastic comments that he realized the value of the view from space, and the unique perspective that satellite images presented. As our first session ended, Prof. Zhao would suggest our cooperation in utilizing space photographs toward a better understanding of China's deserts. "You bring the pictures and interpret the geology"; he said, "and after I learn to study the pictures, I can add the knowledge of geography."

From that first encounter, I realized that Prof. Zhao Songqiao was a man of vision, with a compelling eagerness to expand his knowledge and the admirable self-confidence to learn unfamiliar things. This would be re-inforced from my association with him ever since.

On our train ride westward, I asked Prof. Zhao about the time of our reaching of the Gobi Desert. I was surprised by his response; "Of all people, I thought that you would know better!" He went on to explain that there is no such place name, and that in Chinese "gobi" means stony desert and "shamo" is sandy desert, and therefore, there are many gobi plains throughout the deserts of China. In his later writings, he would emphasize this fact to remedy the misconception that prevails in maps and publications.
in the West.

Prof. Zhao Songqiao has never forgotten that he greatly benefited from graduate study at Clark University in Worcester, Massachusetts. He kept in close touch with the Geography Department there, which he tried to visit on each of his return trips to the United States. If he was not able to do so, he would ask me to convey his regards to colleagues there.

One of his everlasting contributions was his willingness to lecture on the geography of China wherever he was able to find an academic audience. His lectures were always well illustrated by detailed maps and good photographs, and in later years by satellite images. A unique characteristic was his ability to interject historical or cultural anecdotes to illustrate a point, which made his lectures quite appealing.

His keen observational abilities allowed him to recognize the imprint of human activities on the arid and semi-arid lands of China and to separate these from the major environmental changes that are caused by natural climatic shifts. This was an important distinction, because at the time, the prevailing wisdom in the U. S. A. was that the desert was basically man-made. Over-emphasis on the loosely defined process of desertification even ascribed climatic shifts to human activities. Cases of well-thought-out distinctions that were discussed by Prof. Zhao helped to place that process in the right perspective.

Prof. Zhao Songqiao was a master at practicing something that he described as “very Chinese”, that of turning a bad thing into a good thing. During the Cultural Revolution, he was placed in a labor camp to cut forest trees and prepare them for wood production. He told me that he would do more than his share to build up his physical stamina and allow himself to do more field work at an advanced age.

Indeed, it was the case, I took pleasure in escorting him, Prof. Zhu Zhenda of the Desert Research Institute in Lanzhou and others throughout the deserts of the American Southwest. He kept up with the youngest of the team, climbing dunes and steep slopes to acquire a better view of what I wanted to show him.

While in Arizona together, we visited the Navajo Reservation. There we were to realize that the soil, being of hard clay and shale, was not suitable for agriculture. Only heaps of windblown sand could be utilized to raise a bit of corn and beans. Thus, the local American Indian population on the reservation tamed a menacing feature such as mobile dunes, stabilized them by spreading gravel and cobbles on top of their surfaces, and used them to raise crops. Prof. Zhao looked at me and said “very Chinese.” I smiled and completed the trend of his thoughts, “taking a bad thing and turning it into a good thing”.

Prof. Zhao was a prolific writer. Whatever observations he made, he always thought of ways to put them in print, first as papers in scientific journals and later grouped in a book. His books in particular have made a significant impact on our under-
standing of arid and semi-arid lands in general, and the Chinese deserts in particular. He always endeavored to write for the benefit of the specialist in professional journals, and for the non-specialist in his books. For this reason, his published works have lasting effects worldwide.

A distinguished characteristic of Zhao's writings is viewing geography intricately with the history of human habitation. He was keenly aware of the importance of geographic controls on civilization. In the meantime, he was also interested in the effects of human activities on the environment and the response of the land system to damaging practices by mankind. He gave numerous examples of the degradation of semi-arid lands in China through ill-conceived projects and practices, particularly before 1950. In so doing, he clearly illustrated that sustainable development must be initiated by a thorough understanding of the geographic characteristics of the terrain, a principle that only lately has received universal attention.

Through the strength of his personality, Prof. Zhao has affected his superiors, colleagues, and a new generation of young geographers. The impact of his mind will be felt for a long time, and his memory will linger through his numerous publications. Nonetheless, in his passing, geography has lost an inquisitive observer, and China has lost a great spokesman.