

## VALLEY OF THE GIANTS



AUGUST F. FOERSTE 1862 – 1936

Physics was what he taught. And Physics was what most of his students learned. But those who followed the clear and forceful reasoning of this man learned much more than that. They learned respect for the flinty stubbornness of a fact, respect for their own great potential as thinking, reasoning scholars. Respect for timeless values – family, profession, community.

As he taught at Steele High School from 1893 to 1936, Dr. August F. Foerste ("First — ee") taught more than Science and Respect. There was self-discipline — making the best use of every minute of each hour. He was the ultimate role model for his students and for others who taught. He used ten-minute intervals between classes to examine and classify additional materials. He

had no time for nonsense. A student remembered: "When one of us made him look up from his microscope to reprimand us for talking, we felt we were impeding the progress of science."

"Dr. Foerste taught with a strong, booming voice. There never was any reason for misunderstanding him," added Charles O. Adams of the Engineers' Club. "I doubt I ever would have gone to the University of Cincinnati and become an Electrical Engineer if it were not for the Physics classes that Dr. Foerste taught at Steele, his strong ties to the faculty in Cincinnati and his personal encouragement."

His love of science, his respect for his students and the resulting impact that he had on our Miami Valley would probably qualify Dr. Foerste as a Giant in this Valley of Giants, but there is much more to his story. His teaching was his chosen mode of support as he spent an even larger part of his life in the then-emerging branch of Geology called Paleontology.

Paleontology is the study of the earth as it is disclosed to us through the fossil remains of plants and animals. It lets us look with X-ray eyes for the mineral treasures of the earth. It enables us to understand what life on earth was like five and six million years in the past. Knowledge gained through Paleontology is applied in Civil Engineering, Mining, Agriculture and Ecological studies.

As the memorial to Dr. Foerste said: "When one considers that Paleontology was his pastime and not his vocation, his printed record is almost incredible." At the Smithsonian museum, the typed index of his writing fills forty pages. This includes 135 scientific papers, 5500 pages on Geology and Paleontology and 650 pages of scientific photographs.

Dr. Foerste spent his life establishing, verifying or correcting facts; facts that are dependable and are useful to earth scientists. He was recognized internationally for the abundance of his records and the accuracy and completeness of his articles. Several fossils were named for him by Japanese scientists. His biography has been published in the Japanese language. In Esthonia, a mountain was named for him as a tribute to the painstaking work he did there.

Here in Dayton, his book, "The Geology of Dayton and Vicinity" is a treasure of local libraries. In it, he described the glacial history of the gravel ridge area South of Dayton where he roamed as a boy. "His dream that this area might be preserved as a public park has been realized through the private generosity of several Dayton business friends who made possible 'the Hills and Dales' and 'Moraine Park'..." (memorial in the proceedings of the Geological Society of America).

His local work continues to be useful to geologists. Five of his papers were cited as references in a 1992 guidebook on Caesar Creek fossils. Three of his papers were used by Dr. Michael R. Sandy of the University of Dayton when he prepared a self-guided tour of Woodland Cemetery for a national meeting of geologists.

The Dayton Society of Natural History refers to him several times in their September/October 1993 newsletter. The Foerste Award is presented at the annual meeting of the society. Copper plates of his scientific photographs are a carefully-preserved treasure of the museum.

In the last thirty years of his life, he focused on one fossil—the Cephalopod. By studying the variations in the growth of this early relative of the squid and the octopus, he was able to arrive at the invaluable "facts of life" of 425 to 450 million years ago.

On his retirement from Steele at age 70, Professor Foerste was offered the Chair in Paleontology at the University of Chicago. He chose, however, to join the Smithsonian museum in Washington where his collection of Cephalopods was displayed.

Although he was unswerving Continued on Page 5

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in his study of early earth history, he had many other interests and placed a high value on friendship and good humor. He enjoyed being greeted at a meeting of the Pick and Hammer Club in Washington

"Cephalopods haven't a chance To resist by systematic advance;

I've sawed 'em and split 'em, Disemboweled 'em and refit 'em, And nothing escapes from my glance!"

Foerste was the son of John August and Louise Wilke Foerste. He was born in Dayton, attended Dayton schools and graduated from Central High in 1880. He taught for three years in a country school in Centerville, Ohio. In 1883, he entered Dennison University. After graduating from Dennison, he went on to Harvard for two additional degrees. His education was then capped with two years at Heidelburg and additional study at the College de France.

The path he chose in life began with a lecture at Central High School by Edward Orton. Orton was president of Antioch College, and later the Ohio State University. Because of the interest in nature that young Foerste demonstrated. Professor Orton sent him two volumes on "Paleontology in Ohio." From this, his life time interest in geology began.

In the depression of 1892, Dr. Foerste lost his job with the United States Geological Survey. In 1893, he began his work at Steele High School. In his early years, he taught science courses. One of his students remembered: "To many of us, the study of fossils would be a very dry subject, but to him they told a great story...which, when properly translated, would reveal the history of the earth, the sinking of vast land areas, and the rising of the bottom of the sea to become dry land."

He received many offers to teach geology from colleges and

universities. He refused, because he felt his position at Steele offered him the best opportunity to earn a living, be of service to others and to do the research he loved.

During his vacations from Steele, he did field work in Geology around the world. In addition to English, he spoke French, German, Spanish and Swedish. He read and wrote in Latin, Greek, Japanese and Chinese. A teacher at Steele said: "In his travels in Arabia, some knowledge of Arabic was a necessity. Hotels were not available, and often at night it was necessary to lodge in a caravansary. I loved to hear him quote in Arabic extracts from the Koran."

At the time of his death, a newspaper said: "The newspapers of Europe often gave accounts of his talks, writings and discoveries. The daily papers of Paris would at times give a whole page to his work; while in Dayton, he seldom received passing notice."

Lack of notice in Dayton was

not the fault of Daytonians. Dr. Foerste wrote an abundance of professional papers, but it was not his way to talk of his work to the general public. Mr. 0. Charles Adams said: "He was a quiet man, a modest man but a most congenial man. As a teacher, he had to be called a taskmaster, but at the same time, he was caring and friendly. One thing is certain, he had no interest in fame!"

Engi-The neers' Club recognized the many contributions of Dr. Foerste (see Charles H. Paul's letter). In February of 1926, the Club honored Orville Wright and August Frederick Foerste with Life Memberships. Mr. Wright was recognized "for his experiments in the skies." Dr. Foerste was cited "for his explorations in the earth below."

He died in 1936 on one of his many trips home from the Smithsonian. He had never married. He lived with his widowed sister, Mrs. Martha Dornbusch. Dr. Foerste took keen interest in helping her raise her children, Florence, Louise and Walter. He is buried with Martha, Florence and Louise in Dayton's Woodland Cemetery.

August Frederick Foerste was indeed, a Giant in our Valley of the Giants!

Note: The above story was provided by club member Rick Johnson, as was also, the following copy of a December 2, 1925 letter from club member Charles H. Paul (another Giant in our Valley of the Giants):

CHAS. H. PAUL December 2, 1925.

The Board of Governors. The Dayton Engineers' Club, Dayton, Ohio.

I wonder if me are making the most of our Honorary Membership classification?

That is something that should be used with discretion, but it seems that a Club of our size is entitled to more than the six or seven Honorary Members which we now have. It is not unusual for an organization of this sort to honor some of its outstanding local people. I have in mind, particularly, Mr. Orville Wright and Professor August Foerste.

I feel that the bare suggestion of Mr. Wright's name will carry with it all the arguments that may be needed concerning his qualifications for the honor.

is to Professor Foerste, I have felt for a long time that most of us fall far short of appreciating his standing and eminence in the soientific world. In more than one branch of soience he is an outstanding figure. He is well known nationally, and were it not for his extreme modesty he would be much more in the public eye at home. Particularly because of this modesty, I feel that it would be very appropriate for our Club to recognize Professor Foerste's accomplishments by conferring Honorary Membership upon him also.

Col. Deecs and Mr. Kettering, of course, have already been made Honorary Presidents.

Sincerely yours,

Chast Paul

CHP:T