Arthur Edmund Seaman was born in 1858 in Casnovia, near Grand Rapids Michigan. He came to the Upper Peninsula and started work as a "land-looker"-a timberman, but developed a knowledge of rocks and minerals on the side. He was taken into the Michigan Geological Survey by C.E. Wright in 1885, after Wright died, Dr. Wadsworth of the geological survey and also the director at the Michigan Mining School, retained Seaman as a geological surveyor.

In 1892, the Geological Survey and the Michigan Mining School were separated and Wadsworth found that he could not spare Seaman, so Seaman continued with Wadsworth at Michigan Mining School. Seaman taught as an assistant from 1889 to 1893 and became as instructor even before he earned his B.S. degree in 1895, fulfilling his requirements a little at a time as he taught.

In 1897, the name of the school was changed to the Michigan College of Mines. In 1899, Seaman, now a full professor, was named head of the Department of Geology and Mineralogy. Professor Seaman skillfully organized the mineralogy and geology department's minerals with the help of the contributions of two great men, Dr. L.L. Hubbard and Dr. G.A. Koenig.