# ALUMNI YOU SHOULD KNOW

### IRRIGATION ENGINEER

Munson J. Dowd graduated as a civil engineer in the War class of 1918. He was an energetic chap, largely working his way through Caltech. As an undergraduate he was a crack football player, and in his senior year was Captain of the team.

Married in his Junior year, he had a son who saw him graduate. This son, Munson W. Dowd, is now a senior in Civil Engineering at the Institute. Young Dowd is among the first sons of a C.I.T. (not Throop) graduate to return to C.I.T.

During the latter part of the War Mr. Dowd worked for the Pacific Southwest Shipbuilding Co. In 1919 he joined the U. S. Reclamation Service in Yakima Valley, Washington. In 1922 he left the Reclamation Service to join the Imperial Valley Irrigation District (largest in the world.)

Mr. Dowd was Water Master for two years, after which he became Maintenance Engineer on the main canals (U. S. and Mexico). He was General Superintendent for a year and in 1926 became General Superintendent and Chief Engineer, which position he still holds.

Two main points for which he has worked are now becoming a reality — the All-American Canal, and a civic owned Light and Power system for the Valley.

Mr. Dowd works long hours and takes no vacations, but due to the semi-political nature of his job travels to Washington, D. C., Mexico City and Sacramento frequently. He is well liked throughout the Valley, and is familiarly known as "Mike" Dowd.



Munson J. Dowd

#### SALES ENGINEER

In 1911 Caltech moved onto its present campus, and among the members of the first class to graduate from this new location was genial Harold C. Hill, who is well known to many alumni for his interest in Y.M.C.A. and Alumni affairs. At the present time he is a member of the Board of Directors of the Alumni Association and handles the Alumni share of the Placement Service.

From 1911 until 1917 Mr. Hill was in the Motor Sales Department of the General Electric Co. at Lynn, Mass. Naturally he did a lot of traveling during these years.

During the War period, from 1917 until 1919, Mr. Hill served as 1st Lieutenant in the Army, spending the majority of this period as an instructor in Electrical Engineering at Fort Munro, Virginia. On receiving his discharge from the Army, he returned to the General Electric Company and spent the next four years in the Foreign Sales Department at Schenectady.

In 1923 Mr. Hill was transferred to Los Angeles to the Industrial Sales Department of the General Electric Co., where at present he is in charge of the Petroleum Industrial Business.

Mr. Hill, who is married and has one daughter of High School age, is a member of the American Petroleum Institute and of the Electrical Maintenance Engineers.



HAROLD C. HILL

## ALUMNI YOU SHOULD KNOW

### STEEL PLANT ENGINEER

On graduating in 1925, Glen M. Schlegel signed up for a two and a half year apprenticeship with the McClintic-Marshall Corporation. Traveling east to Pittsburgh he entered on the morning of July 1, 1925, the Carnegie Works gate (not to be confused with Carnegie Steel Co.) with overalls and a pair of gloves under his arm. He had a job.

Promotion came easily and rapidly to Glen Schlegel and he progressed from shop, to drafting room, to assistant to the works manager, then into the engineering department, where he performed varied design and estimate work. In 1928 he became Assistant Works Manager of the Carnegie Works and in 1929 was transferred to the same position of the larger Leetsdale Works.

Depression hit the steel industry hard and as a result Schlegel did double duty as Shop Superintendent and Assistant Works Manager. In 1931 the McClintic-Marshall Corp. was absorbed and became a part of the Bethlehem Steel Corp. After being closed for part of the depression, the Leetsdale plant was reopened in 1937 and Mr. Schlegel was made Assistant General Superintendent in charge, which position he now holds.

Under his able supervision many interesting steel jobs have been performed, among which are 14,000 tons of structural steel for the Empire State building, the external structure for the Naval gas holder at Sunnyvale, California, two plate girders weighing 84 tons each, which were 12' 3" deep and 154' long, for the Maumee River Bridge in Toledo, Ohio, the approaches to the Huey Long bridge in Louisiana, and part of the flooring of the San Francisco-Oakland Bay bridge.



HAROLD W. LORD



GLEN M. SCHLEGEL

### VACUUM TUBE RESEARCH ENGINEER

After receiving his degree in Electrical Engineering from the California Institute in 1926, Harold W. Lord spent the next year on "test" at the Schenectady Works of the General Electric Company. In 1927 he was placed in the Vacuum Tube Engineering Department.

At first he was engaged on radio receiver tube development, later his work included development of new circuits for the industrial application of thyratrons and high vacuum tubes for power and control purposes. The principal achievement was the invention of the Thyraton Synchronous Timer for resistance welders. For this work he received a Coffin Award in 1933. Coffin Awards are made annually by the G. E. Co. to employees realizing outstanding achievements in their field of work and are considered a signal honor.

A more recent development of his is the half-cycle magnetizer with Thyraton control. This relatively inexpensive equipment, weighing about 100 pounds will magnetize magnets which in some instances formerly required a 10,000 amp. 50 kw. D.C. generator.

At the present time 18 patents have been granted Mr. Lord for various inventions.

In August of 1937 he was transferred to the Consulting Engineering Laboratory where he is currently engaged in the field of circuits for newly developed fluorescent and other light sources.

Mr. Lord, who was married in 1928, has one son and two daughters. His hobby is photography, in which he excells.