

MAJOR GENERAL JOSEPH O. MAUBORGNE

US Army, Retired (Deceased)



Born 26 February 1881 in New York, Joseph Mauborgne went to the Army Signal School in 1910. In 1911, while an Instructor at the school, Mauborgne solved an 814-letter Playfair cipher and described his methods in a 19-page pamphlet, the first published solution of that cipher.

In the early fall of 1912, he was sent to Fort Riley, Kansas, to conduct the first air-to-ground radio communications for control of artillery fire. In 1914, he was reassigned to the Philippines and put in charge of the Corregidor Signal Corps Radio Station. He introduced the first audio detector used in the Philippines, as well as the first two-stage audio frequency amplifier which he designed and had built. While still on Corregidor he built an entire radio transmitter and receiver for trial on the only

Army plane in the Philippine Islands.

In 1916, Mauborgne returned to the Signal School at Fort Leavenworth to supervise the instruction of radio operators who went directly to World War I assignments. During this assignment, he devised the 25 highly scrambled and almost completely non-repetitive alphabets later adopted for use in the M-94 Cipher device issued for Army and Navy use shortly after the 1918 Armistice. The M-94 continued to be used by both services until 1943.

In 1917, Mauborgne was appointed Chief of the Electrical Engineering Division, which later became part of the Engineering and Research Division of the Office of the Chief Signal Officer. When he transferred to the Signal Corps in 1920, he was already regarded as the best research and development man in the Army.

In 1921, Mauborgne became the officer-in-charge of the Signal Corps Laboratory, US Bureau of Standards. He served as the Signal Officer, Panama Canal Zone, from 1927-1930 and then attended the Army War College. In 1932, he was Signal Officer of



the Ninth Corps Area, and in 1936, he became the Director of the Signal Corps Aircraft Radio Laboratory at Wright Field, Dayton, Ohio.

Beginning in October 1937, as the Department of Army's Chief Signal Officer, Mauborgne was responsible for signal security and intelligence worldwide. He was credited with organizing and training the team that later cracked the Japanese military codes during World War II. On 1 January 1939, he organized the 2nd Signal Service Company at Fort Monmouth, New Jersey, with 101 enlisted men and one officer. The company headquarters was soon moved next to the Signal Intelligence Service in Washington, D.C. In 1940 he developed the Signal Company Aircraft Warning, which set up anti-aircraft nets in Panama, Hawaii, and Alaska.

In 1941, MG Mauborgne retired from active military service after 38 years of Army service. He had been awarded the Distinguished Service Medal and the Marconi Memorial Medal of Service. He passed away in June 1971 and Mauborgne Hall on Fort Huachuca was named in his honor the same year.

MG Mauborgne was inducted into the MI Hall of Fame in 1988.



GEN George O. Squier, Chief Signal Officer, with LTC Joseph O. Mauborgne, Signal Corps, and unnamed man operate a radio, 1922, likely Washington, DC. (Photo from US Army Communications-Electronics Command Historical Office website)