Clean Hulls Without Poisons: Devising and Testing Nontoxic Marine Coatings

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There is an old curse: “May you live in interesting times.” Joseph J. Mattiello lived in interesting times, and so do we. Joe Mattiello was faced with opportunities that offered uncertainty, risk, and reward, and so are we. Among the many virtues he demonstrated during his regrettably short life, there are three that particularly speak to me. I want to draw special attention to them, for I consider these attributes to be enduring values, as indispensable today as they were 50 years ago.

Joe Mattiello was a patriot and a leader. Leadership is always difficult, unrewarding, and subject to misinterpretation, but none of that deterred Dr. Mattiello. He stepped forward when his country needed him, and he responded to the national and international paint communities when they needed him. In each case he paid an enormous price, but the benefits were enormous as well. This Lecture, and the technical organizations he founded, led, and supported, endure some 50 years after his passing. But more than that, his devotion to something bigger than one’s self and his spirit of selfless service to his country and to our industry illuminate and motivate us today.

Joe Mattiello was thoroughly convinced that research and development play a fundamental and indispensable role in the coatings industry. I think Joe Mattiello would be genuinely disappointed to find the lack of emphasis on research that pervades the coatings industry today. I think he would believe that the industry has defaulted on its responsibilities for research, leaving this role largely to the universities. Now don’t get me wrong—universities have a fundamental role in giving students the broadest possible education and preparing them for productive work in the coatings industry, and for performing the pre-competitive research that underlies, supports, and advances our technical knowledge, and they do a fine job of this. But universities don’t know our plants, don’t know our customers, and don’t own the proprietary knowledge base that has come to each company at great cost and is one of its most important intangible assets. Bringing aboard graduates to enlarge and deepen this knowledge, and to invent and validate new products is the lifeblood of our industry, the source of new products, and the mainspring of executive talent. If Joe Mattiello were at the helm of Hilo Varnish Corporation today, you can bet he would devote an important part of their resources to the creation and diffusion of new knowledge and new coatings, and to the development of the leaders our industry will certainly need in the 21st century. And you can bet he would exhort his contemporaries to do the same. He would organize meetings...
Joseph J. Mattiello
1900-1948

This year we celebrate a landmark in the history of the Mattiello Memorial Lecture. Fifty years ago the first Mattiello Memorial Lecture was presented to the Federation at its meeting in Atlantic City, NJ. Thus it is fitting to spend a few moments recalling the man in whose honor we meet. Regrettably, there are few remaining among us who knew this remarkable person, and his reputation and his accomplishments are in danger of fading from our view.

Joseph J. Mattiello was born in New York City on February 28, 1900 and orphaned before he was 12 years old. He enlisted in the New York National Guard at the age of 16 and served on the Mexican border. He fought in World War I from October 1917 until March 1919, serving as an infantry sergeant with the American Expeditionary Forces in France, and he fought in the battles of Champagne-Marne and Aisne-Marne. On October 17, 1918, he was wounded in both legs and his right arm, and suffered the loss of his right leg. He was awarded the Regimental Citation and the Order of the Purple Heart.

Returning to the United States, he earned Bachelor's and Master's Degrees from the Polytechnic Institute of Brooklyn (now Polytechnic University) in 1925 and 1931, and a doctorate from Columbia University in 1936. In 1925 he joined the Hilo Varnish Corporation, where he became noted for his research and publications in all of the areas that were consequential at that time, especially linseed oil, fatty acids, pigments, fish oils, resins, and performance properties of organic coatings. Ultimately he attained the position of Vice President, Technical Director, and member of the Board of Directors at Hilo Varnish Corporation. Dr. Mattiello was a member of the New York Society, serving as Technical Committee Chairman in 1936, Secretary-Treasurer in 1937, Vice President in 1938, and President in 1939. He was President of the Federation for one year beginning in 1943.

During the Second World War, Dr. Mattiello served as a civilian chemical expert assigned to the U.S. Army Quartermaster Corps. He led a committee which prepared military specifications for the rapid and economical procurement of a host of specialized paints, lacquers, and coatings for the Armed Services. He also conducted fundamental studies of the infrared properties of paints and pigments, and used this information in the design of camouflage paints, for it is the infrared properties of these coatings that give them their special usefulness. At Hilo Varnish Corporation, he developed and manufactured special coatings required by the Allied Forces. The War Department presented him the Meritorious Civilian Service Award for his efforts. All of this work added to his international stature.

Dr. Mattiello had a fine sense of humor. He once remarked to his specification-writing colleagues that “we are sticking our necks out on some of these specs.” He also suggested that “all of us who are sticking out our necks band together for mutual fun and protection and form a club.” This was the birth, in 1943, of the Gallows Birds. Dr. Mattiello was immediately chosen the Permanent Most High Gallows Bird, an office that he held until his death and has held posthumously ever since. To quote from their constitution, the membership is restricted to “those misguided beings who, thinking to benefit the human race, have laid themselves open to and have received public and private denunciation by instigating and abetting federal government specifications for paints, varnish and protective coatings, thereby bringing themselves under the shadow of the gallows and making themselves the most miserable of men.” The first official “hanging” took place on May 8, 1943 in Cincinnati during a symposium sponsored by the Federation.

Dr. Mattiello represented the Federation in Paris at the first International Congress of Paint Technologists in 1947, and at that meeting, representatives of France, Great Britain, and North America (Canada and the United States) formed the “Tri-Alliance,” with Dr. Mattiello taking a leading role. While in France for this conference, the French government presented him with the Legion of Honor in recognition of his outstanding services in both World Wars. Dr. Mattiello had traveled to France against the advice of his doctors, who had told him to curtail his activities. Henry Payne, in his Mattiello Memorial Lecture of 1960, recalled that he asked Dr. Mattiello before the journey “if he considered the results to be accomplished would be worth the price. With hardly a moment’s hesitation, Joe replied, ‘Henry, I’m going.’” The exertion of the journey proved to be overwhelming, and he died of a heart attack at his home in Brooklyn on May 16, 1948.

Some years earlier, as Chairman of the Federation’s Technical Program Committee, Dr. Mattiello had started the practice of having a special speaker address each Annual Meeting. After his death, the New York Society recommended to the Federation that this address be named the Joseph J. Mattiello Memorial Lecture, to commemorate his memory and his contributions to the Federation and to the science of paint technology. The suggestion was embraced immediately, and the first Mattiello Lecture was given in October 1949, 18 months after his death.

Earlier in 1949 the Federation of Paint Technical Societies of Western Europe was organized, modeled after our Federation. Before his death, Dr. Mattiello had encouraged his many European friends to create such an organization. They were very explicit that it was his encouragement that led this concept to fruition.

—Robert F. Brady, Jr.