



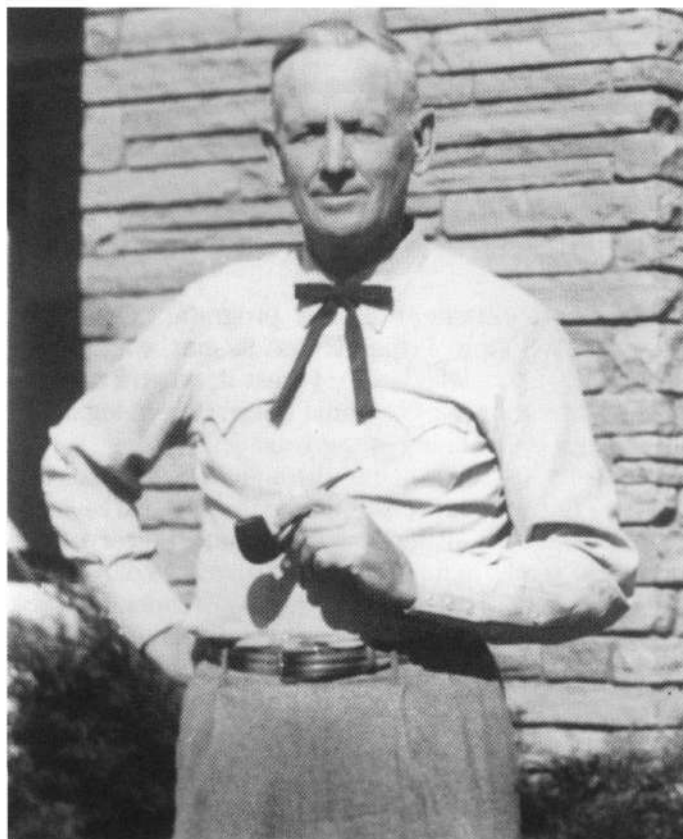
The UW Turf Legacy

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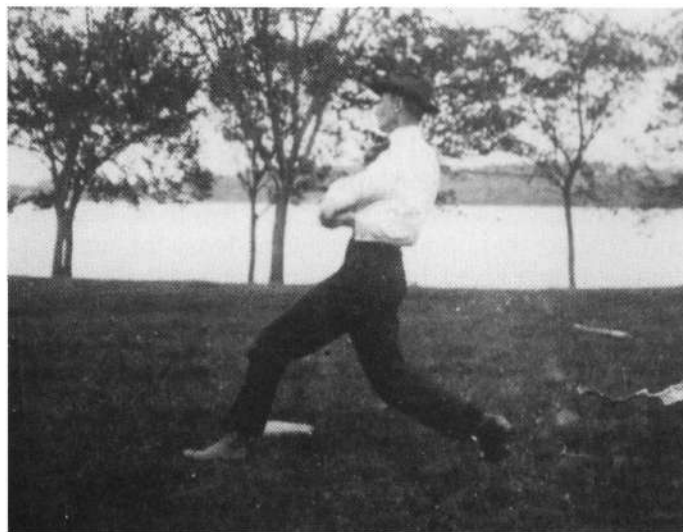
At this juncture in history, we continue to evolve from passive observers of the mysteries of turfgrass into masters of controlling turfgrass. Today we are on the cusp of being able to create and manipulate new turfgrass selections that will eventually reshape the turfworld around us. The turf researchers and teachers at the University of Wisconsin-Madison are playing an important role in this revolution. Research being conducted today at the UW is a culmination of a huge team effort, made both in the past as well as the present. An effort not from one individual, but from a whole program that includes the leadership and guidance of the turfgrass industry. The turfs in Wisconsin and throughout the world have benefitted from the many efforts of turfgrass scientists at the University of Wisconsin-Madison. There are many researchers, teachers and administrators who have passionately devoted their energies to the advancement of turfgrass science. However, there are three early pioneers who stand head and shoulders above the rest. They are John Monteith Jr., Arnold Sixten Dahl and Oyvind Juul Noer. These three leaders left us a turf legacy that continues to serve as a foundation for a far-reaching revolution within the turfgrass scientific community.

The American Heritage dictionary defines legacy as something handed on from those who have come before.

John Monteith Jr. was born on December 24, 1893, in Chatham, New Jersey. He received a Bachelor of Science degree and a Masters of Science degree from Rutgers College in 1916 and 1917 respectively. He then worked for the federal Horticultural Board as an assistant in plant disinfestation before serving in the Army at the end of World War I from 1917 to 1919. After his service in the Army, he came to the Department of Plant Pathology at the UW for his Ph.D. His thesis was entitled, "Relation of soil temperature and soil moisture to infection by *Plasmodiophora brassicae*." In 1923, Mr. Monteith became Dr. Monteith and left to work for the newly created United States Golf Association's Green Section. This work kept him very busy, but he occasionally came back to Wisconsin for visits. On February 10-14, 1930, Monteith returned to Madison to speak at a Greenskeeper Short Course. There he lectured about turfgrass diseases and shared the spotlight with his friend, Arnold S. Dahl, who was finishing up his Ph.D. in the Department of Plant Pathology. This would not be the last time these two would work together.



John Monteith, Jr. with a cool tie and pipe. UW Plant Pathology, Ph.D. 1923.



John Monteith Jr. playing baseball at Plant Pathology Dept. picnic.



Arnold S. Dahl, Ph.D. Plant Pathology 1931, University of Wisconsin.

Arnold Sixten Dahl was born on December 23, 1899 in Superior, Wisconsin. (It is interesting to note that Monteith and Dahl almost shared the same birthday.) Dahl received his B.S. in 1924, his M.S. in 1925 and his Ph.D. in 1931 from the Department of Plant Pathology at the UW. His Ph.D. thesis was entitled, "Snow mold of turf grasses." Before he actually received his degree, he left Wisconsin to work as a plant pathologist for the USGA Green Section under the direction of Monteith. Dahl also taught at Des Moines University and Kansas City University. A letter of recommendation from L. R. Jones describes Dahl's qualifications and his character: "He made a uniformly good record as an undergraduate and proved himself an excellent student as a candidate for his advanced degree last year. I am confident, therefore, that he is well prepared to meet the responsibilities of instructional work in your department of biological sciences. I am also pleased to bear witness to my full confidence in Dahl's high character and personal integrity as a Christian man. He would, I am sure, undertake to meet such duties as indicated by your position with conscientious devotion as well as scholarly ability. I may add also that Dahl is a fine modest young man of good physical appearance and pleasing personality, with those qualities which are sure to

make him liked by his faculty associates as well as in his relations with students."

While at the Green Section of the USGA, Monteith and Dahl teamed up to write many publications. By far, their best work was "Turf Diseases and Their Control." In Houston Couch's "Diseases of Turfgrasses" (1995) he describes this work as a classic. Couch writes, "The first comprehensive publication on the nature and control of turfgrass diseases was published in 1932. It was released as an entry in the Bulletin of the United States Golf Association under the title "Turf Diseases and Their Control." The authors, John Monteith Jr. and Arnold S. Dahl, were the principal researchers in the field of turfgrass pathology in the late 1920s and early 1930s. This publication stands as a classic, both for the thorough manner in which it integrates the principles and concepts of plant pathology with those of the practice of turfgrass culture, and the completeness of detail in its descriptions of the nature of many of the more important diseases of turfgrasses. It covered diseases incited by both biotic and abiotic entities. Control was approached from the standpoint of the use of resistant varieties, the use of cultural practices such as fertilization and irrigation, and the application of fungicides."

In my humble opinion, Monteith and Dahl's bulletin was the first publication that addressed disease management from an "integrated" point of view and should be considered the beginning of integrated disease management. At the back of the bulletin is a quote by Elbert Hubbard that sums up the intent of this literary effort: "If I supply you a thought you may remember it and you may not. But if I can make you think a thought for yourself, I have indeed added to your stature." Monteith and Dahl have indeed added to our stature.

The third great mind of the UW turf legacy is Oyvind Juul Noer. There are numerous accounts of the life and times of O. J. Noer. One such source of information can be found on the web at <http://www.lib.msu.edu/tgif/noer.htm>. This site tells O.J.'s story, "from his beginnings as a graduating soil scientist from the Department of Soil Science, University of Wisconsin-Madison, O. J. Noer went on to become the State Soil Chemist in 1914, and is credited with helping to establish the first soil testing laboratory in the country. During and after the First World War, he served overseas as captain in the Chemical Warfare Service. From 1922-24 he was in charge of all investigational and experimental work in conjunction with determining the agricultural value of Milorganite under a fellowship grant at the College of Agriculture, University of Wisconsin. Later, as head of the Milwaukee Sewerage Commission Turf Service Bureau from 1926-1960, O. J. Noer visited/inspected perhaps 80% of the golf courses in North America advising on turf maintenance problems. Noer made



Oyind Jүүл Noer inspecting grass roots. UW Soil Science Department.

many contributions to the diagnosis of turf problems, and wrote and spoke about turf at conferences almost continuously throughout that period. Before and after his death on July 12, 1966, O. J. Noer has been considered a true pioneer in the turfgrass industry." Another web site, (<http://www.milorganite.org/history.html#history>) tells O.J.'s Milorganite story.

One great mystery that remains unsolved is why the O. J. Noer library collection is at Michigan State University and not at the University of Wisconsin-Madison. I imagine some iniquitous administrator or uninformed lawyer somehow let this "Juul" slip through the cracks. As the Michigan State site tells it, "During his career, O.J. Noer accumulated many books, journals, and conference proceedings related to the science, culture, and maintenance of turfgrass." After his death, "It was soon voted to place this valuable collection into the hands of an accredited institution of higher learning so it would be universally available to turfgrass students. Michigan State University was selected" as the new home of the O. J. Collection. Oops! I guess we dropped the ball on that one. The bottom line is that it really doesn't matter where Noer's books are housed because he still is and always will be a Badger.

These three turf heroes have helped shape our turf-world. Badgers all over the world should be very proud of their contributions to the turfgrass revolution. There

are many others who have also contributed greatly to the Wisconsin turfgrass effort, including Gayle Worf, Bob Newman and J. R. Love. I am very grateful to have been a small part of the Badger turfgrass effort. Also, I am grateful to the University of Wisconsin-Madison and the Department of Plant Pathology for providing me with an opportunity to excel in the face of opposition and in the footsteps of my turf heroes. I have excelled with the help of everyone involved in the turfgrass effort, including Monteith, Dahl and Noer. These three have been my imaginary mentors throughout my last six years at the UW. I have their pictures hanging above my cubicle for inspiration. Frank Rossi gave me the picture of Noer and the ones of Monteith and Dahl were hidden in departmental files in a dusty old scrap book locked away in a safe at Russell Labs. Recently, when Jim Latham and Michael Kenna from the USGA visited for a progress report of my *Typhula* snow mold research, they noticed these pictures and were very excited about them. I thought I was the only one who would have such an appreciation for these valuable pictures. Later, I sent copies to the USGA for their archives so others may know how much these turf heroes mean to present and future turfgrass scientists and managers. Thank you Monteith, Dahl and Noer for having paved the way. Your legacy continues to grow. ♣