

National Soaring Museum Historical Journal

Winter 2019

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Concept drawing of Harris Hill designed by Eliot Noyes

Back Cover: Eliot Noyes' living room

Peter Riedel

Peter Riedel (August 24, 1905 – November 6, 1998) was a German gliding champion, and was Air attaché for the Nazi government in Washington, D.C., before and during World War II. Between 1977 and 1985 he wrote and published the definitive history of the German gliding movement prior to the war.

Riedel was born in Dehlitz, Saxony. His father was a Lutheran pastor and his mother a professor of theology at the University of Halle. His father suffered bouts of mental illness, and his mother committed suicide, meaning that Riedel was raised for some time by an uncle.



photo courtesy of the "C.E.Daniel Collection"





In the photo at left, a young Peter Riedel is shown on the right wearing a military-style cap and jacket. Others in the photo are most likely his mother, siblings and grandparents. Photo was taken about 1912-1913.

In 1920, at the age of 15, Riedel attended the first gliding championship held at the Wasserkuppe, taking with him a half-built glider of his own design, which he completed and flew with the help of other attendees at the meet. From then on, he became a regular participant at the competitions. With the assistance of philanthropist, Karl Kotzenberg, who had taken an interest in the gliding movement, Riedel was able to attend the Darmstadt University of Technology, where he studied engineering. After graduation, he trained as a commercial pilot, but could not find work, and instead spent six years working under Walter Georgii at the *Deutsche Forschungsanstalt für Segelflug* (DFS - German Research Institute for Sailplane Flight). In the meantime, he continued competitive gliding, setting a world distance record of 229 km (142 mi) in 1933 and winning the Hindenburg Cup at the Wasserkuppe competition the same year.

Peter was one of the top soaring pilots in the world during the 1930s. He especially had a great influence on the development of thermal soaring techniques in the U.S. While he was a German Air Attaché during the pre-WWII years, assigned to Washington, he was able to attend and compete in our National Championships at Elmira during both 1937 and 1938. There he not only was the highest scoring pilot at both of those Championships, but he furthered the concept of tight circling in thermals and cross-country soaring to the U.S. pilots. At that time, in the U.S., working thermals was still largely a novelty, with a strong focus still on ridge soaring.



1938 German Soaring Pilot's License photo courtesy of the "C.E.Daniel Collection"

In 1934, he had accompanied Professor Georgii on a tour of Brazil and Argentina to help promote the sport in Latin America, along with Wolf Hirth and Heini Dittmar. While in Argentina, Riedel set a record for long-distance soaring. Hanna Reitsch also went, and the two became good friends. Later that year, Riedel finally found work as a commercial pilot, and flew for Deutsche Luft Hansa for two years. He then accepted a two-year contract with SCADTA, an airline from Colombia, not intending to return to Germany. In 1937, he competed in the Soaring Society of America's national competition. While in the U.S., he was approached by the German Military Attaché and offered a post in Washington, DC, which he accepted and took up in June 1938. His work involved gathering intelligence on U.S. air activities and reporting to Berlin. In time, he was made

Peter Riedel at Elmira with his Kranich in 1937, where he won the National Soaring Contest but could not be declared the winner because he was not a citizen.

D-4-630

photo courtesy of the "C.E.Daniel Collection"

a commissioned officer of the Luftwaffe and given the official position of air attaché.

In July 1938, during the 9th Annual American Soaring Contest, Riedel, flying a two-place German sailplane of German make, with Dr. Karl O. Lange, the contest director, as his passenger, landed in Mohawk Flats near Utica, NY, four hours after having taken off from Elmira, NY.

When the United States entered the war, Riedel was interned along with the rest of the German embassy staff. He was returned to Germany as part of a diplomatic exchange. His wife, Helen Klug, a native of Terre Haute, Indiana, and a US citizen, agreed to join him. On his return, the Heinkel Company employed him as an engineer, but he soon took up another diplomatic post as air attaché to Sweden. There, he became aware of the atrocities of the Nazi regime from reports in both the US and Soviet press. He confronted his friend, Hanna Reitsch, who was a fanatical Nazi. Reitsch refused to believe the rumors of war camps and concentration camps and their friendship went cold. It was not until years later that Reitsch denounced the actions of the Nazis for their atrocities after learning the full extent of the war crimes committed. Horrified, Riedel began to deal directly with the US Office of Strategic Services but was betrayed by a friend and recalled to Berlin. Guessing what fate might have awaited him there, he instead went into hiding in Sweden. After the war, he was arrested as an illegal alien but escaped after some time in custody and fled to Venezuela, where Helen eventually joined him.

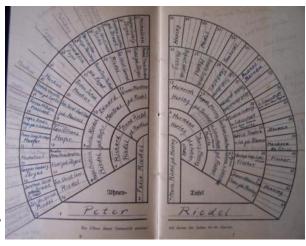


Dittmar, Reitsch & Riedel



The German Government issued a booklet to Peter and Helen, the Ahnennachweis (genealogical/ ancestor chart) booklet, which they filled out with ancesters dating back to the 1700s.

photos courtesy of the "C.E.Daniel Collection"







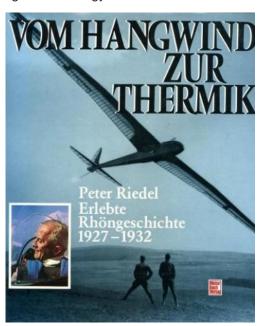
photos courtesy of the C.E. Daniel Collection

The photos at the left show Riedel's "Certificate of Aryan Descent". The booklet is not as complete as the booklet containing the ancestry chart, but it does contain a good bit of Riedel family history. Note that Riedel listed himself as "Ernst Peter Riedel"

Over the next few years, Peter and Helen lived and worked in Canada and South Africa until they could finally return to settle in the U.S., where Riedel flew for TWA and Pan Am. For a while, they resided in Terre Haute, where he worked for the Reich Manufacturing Company. After retirement, he was still active in gliding, and managed Southwest Soaring's operation at Rockwall, Texas during 1971.

In his retirement, Riedel wrote an extensive and detailed history of the German gliding movement between 1911 and 1937, titled *Erlebte Rhöngeschichte* in three volumes. Shortly before his

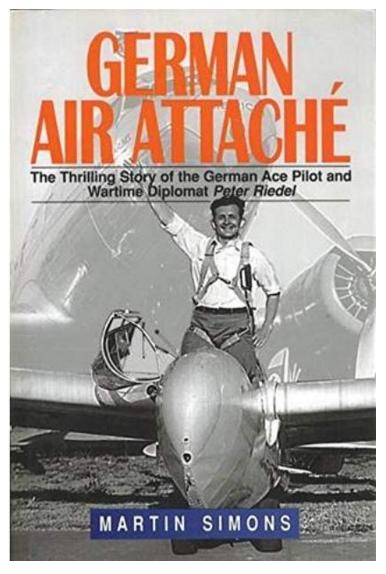
death, *German Air Attaché*, a biography, was published. Peter Riedel died on November 6, 1998 at age 93. A memorial service was held in Ardmore, Oklahoma, where he and Helen were living at the time. Jim and Simine Short and Paul Hannak gave the eulogy. Peter and Helen are interred at Calvary Cemetery in Terre Haute, Indiana.



Collector of WWII memorabilia, Clint Daniels, purchased a large collection of photos and memorabilia from the estate of Peter Riedel and has given permission for the publication of several photos in this article. See his website, www.danielsww2.com, for more.

References:

http://www.danielsww2.com/page14.html https://en.wikipedia.org/wiki/Peter Riedel



WALT CANNON and the SCHWEIZER 1-7 - Walter Cannon

The story of the Schweizer 1-7 as it relates to me started many years ago. At the Old Timers breakfast during the 1993 SSA Convention in Seattle, Bob Moore announced that his Schweizer 1-21 was languishing in a hangar in Richland, WA. It needed new ownership and someone who could restore it to flying condition. I immediately responded and said that I would buy it and restore it. I communicated with Paul Schweizer, who was delighted that I had the glider and encouraged me to get it ready for the upcoming International Vintage Sailplane Meet. Although I had known Paul for many years, this project revived a closer communication. At the IVSM 1995, Paul was delighted to see what I had achieved with the 1-21. Unknown to me, there was some serious talk with the owner of the Schweizer 1-7, an airline pilot from California, known to Bob Gaines. Soon thereafter the 1-7 was donated to the National Soaring Museum.

The Schweizer 1-7 was built in 1937 and was apparently bought by the Harvard glider club. It was used as a trainer,

At North Conway, NH, in the 1940s - photo by Eliot Noves

primarily with ground tows, and eventually limited to straight-ahead flights. The club eventually bought a Schweizer 2-22 (which incidentally is now on display in the NSM) and sold the 1-7 to the editor of Soaring magazine, Lloyd Licher. He moved it to Southern California, where it was acquired by the Burr family and eventually by an airline pilot who intended to restore it to flying condition, which never happened. Paul Schweizer and Bob Gaines were able to persuade the owner to donate the glider to the NSM, which he did.

Unfortunately, or perhaps fortunately, it was stored in a dilapidated trailer in the

very dry Mojave Desert. Soon after the glider was donated, Paul Schweizer, remembering my 1-21 restoration, called, asking whether I would be interested in restoring the 1-7. I was not only honored but also very thrilled for the opportunity to do the job.

The restoration was actually quite easy. All of the fabric was removed. The fuselage was bead-blasted and primed. No areas of significant rust were encountered in the fuselage, struts, or tail surfaces. The aluminum wings were in very good condition, but the trailing edges had to be replaced.





Teaching at North Conway - photo by Eliot Noyes

The entire aircraft was covered with ceconite and painted with nitrate and butyrate dope. Paul made sure that the paint scheme was the same as the original, as he remembered it.

It was finished just in time for IVSM 2000. The 1-7 did not have a trailer, so the problem of transporting this ship, plus the 1-21, from California to Elmira had to be solved. Fortunately, I had purchased the Schweizer 1-24 trailer for the 1-21 from Howard Burr, which was a covered trailer.







Ernie and Paul Schweizer with Walt Cannon at IVSM 2000.

We were able to put the tail surfaces of both gliders into my Suburban. The 1-21 and 1-7 fuselages and the 1-21 wings fit into the trailer and the 1-7 wings were bolted to the top of the trailer. Amazingly, we made it to Elmira without any problems. The glider was enthusiastically received by the Schweizer family and the NSM. It now hangs prominently in the Schweizer Gallery.





Walt with his SGU 1-7 which now hangs in the Schweizer Gallery at NSM

One story (unrelated to the saga of the 1-7) happened during a ground operation at the airport in North Conway, NH, in the early 1940s. A student let the glider get up too high before he released and was unable to land and stop before he hit an airport boundary fence. He did not have a shoulder harness on and unfortunately, hit his face hard on the

instrument panel with consequent lacerations and fractures. He was a doctor's son and his father wanted an experienced plastic surgeon to do the repair. The student was transferred to the Massachusetts General Hospital emergency room in

Boston. Interestingly, the plastic surgeon on call at the hospital on that day was my father, Dr. Bradford Cannon, who repaired the student pilot's injuries.

You can imagine how my father felt years later when I, a 14-year-old, told him that I wanted to learn to fly gliders. He said to me, "Well if you want to do it, you have to do it right." Eventually my mother found Bertha Ryan at MIT who referred us to the Schweizer Soaring School.

The rest is history.

- Article first published in The Bungee Cord - Fall 2018



Ralph Barnaby's Rare, Cased Pocket Aneroid Barograph Altimeter by Richard Freres of Paris

Another fascinating artifact has been discovered in the archives while preparing our now-completed Ralph Barnaby exhibit in the Blossom Gallery. Ralph Barnaby originally purchased this circa 1915 barograph from a seller of scientific instruments in 1938 for \$10. This pocket instrument was designed as an altigraph, for use by mountaineers or airmen. The chart is printed to give heights up to 6000 metres. The pen, controlled by clockwork, makes a continuous trace.

Because another example of this barograph was recently sold by Jason Clarke Antiques in England, we have an expert and detailed description:

"This fine and unusual meteorological instrument is incorporated into a leather covered hinged case measuring 12x8.5x3.5cms and has a glass viewing panel to the lid showing the small barograph recording paper and nib. The paper inside is secured by means of two rollers that are governed by an intricate and miniature clock-



work mechanism that is connected to two small aneroid capsules. The mechanism is enclosed within a metal housing secured by two nuts to the top and has a key slot for setting the correct pressure on the scale, a slide to lift the nib from the paper and dust slide which reveals the adjustment for slow & fast in relation to the clock movement. The centre of the housing is stamped with the Richard Freres trademark with Brevete SGDG. The word brevete means patented in French with the initials SGDG meaning Sans Garantie Du Governement (without governmental guarantee), a legal requirement of the French Government from 1844 until the mid-twentieth century. This mark was applied to all French goods that were manufactured for export during the period. There are some further serial numbers included to the top which are undecipherable except for "24H" which would presumably denote the length of time the movement would continue to run after being fully wound.

The instrument is still maintained within its original three sectioned mahogany box with the remaining two sections containing a number of spare papers, original key and original ink bottle with paper label written in French and the initials R.F. denoting Richard Freres. (Although Barnaby's barograph had the key with it, the ink bottle was missing.)

This fascinating piece of meteorological history was devised for use by surveyors, travelers, explorers and airmen. Its portability and size would certainly allude to those uses and its relative rarity would suggest that they were probably confined to that niche market. However, they were certainly retailed by



famous makers such as Negretti & Zambra and T. Cooke & Sons Ltd where they appeared in the latter's catalogues just prior to the First World War. The Brevete mark would also denote that this particular example was originally sold in the UK but no retailer's marks remain.

The maker of the instrument was the famous Jules Richard (1848 – 1930), the son of Felix Richard, Eugene Bourdon's (of barometer fame) original partner. It must also be assumed that Jules Richard was also its inventor as all other examples in existence are marked to his company. Having trained under his father, and numerous other scientific and clock manufacturers, Richard made his own name in the 1870's in the manufacturing of telegraph equipment, also working closely with the French scientist E. J. Marey on electrical and photographic recording techniques. Following the death of his father in 1876, he took over the family business and in 1882, he formed a partnership with his brother Max under the name of Richard Freres. This partnership was dissolved in 1891 but the company maintained its partnership name with Jules taking sole control of the business until 1921 when it was listed as a public company.

The British Science Museum has a similar and less well preserved example in its collection."

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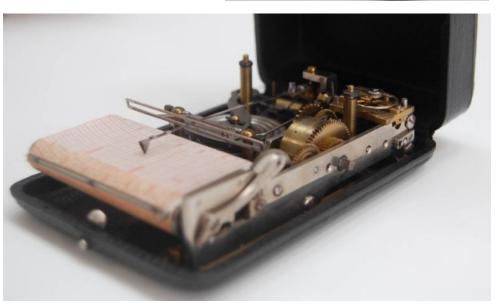








Ralph Barnaby's pocket barograph



Eliot Noyes and the National Soaring Museum

The renowned architect, Eliot Noyes, was born in Boston, Massachusetts. Shortly after his birth, Noyes moved to Colorado where he resided until age seven. At this point, Noyes and his family moved to Cambridge, Massachusetts. Noyes' father taught English at Harvard and his mother was an accomplished pianist. He was not always set on architecture. As a teen, he seriously contemplated becoming a painter; however by age 19 he had his mind set on architecture. He enrolled at Harvard University in 1932 to obtain a bachelor's degree in the Classics. Noyes studied archeology with Lewin Barringer while at Harvard, and Barringer taught Noyes how to fly gliders. Noyes was also a member of the Harvard soaring club and flew the club's new Schweizer SGU1-7 glider. The sale of the SGU 1-7 to the Harvard Soaring Club was Schweizers' first commercial glider sale.



Career

After graduating with his masters in architecture in 1938, Noyes joined Walter Gropius and Marcel Breuer's firm in Cambridge, MA. 1939-1946 Noyes was employed by the Museum of Modern Art (MoMA) in New York City as director of industrial design. In 1941 Noyes organized a competition for the Museum to discover imaginative designers for contemporary living. Prizes were awarded to Charles Eames and Eero Saarinen for chairs and storage pieces. Designs of the competition were exhibited by the Museum as Organic Design in Home Furnishings. Noyes defined "Organic" as "an harmonious organization of the parts within the whole, according to structure, material and purpose."

Noyes served as a major in the Air Force from 1942-1945 during WWII. Taking a leave from the MoMA to set up a program to

explore the potential uses for gliders by the Army Air Force. He later served as an industrial designer for Norman Bel Geddes and Co. When Bel Geddes' office closed in 1947, Noyes opened his own office and completed a Model A typewriter design for IBM started by Bel Geddes. It was introduced in 1948, and Thomas J. Watson, Jr. of IBM, a glider pilot friend of Noyes, retained him for product design. In 1954 Noyes was assigned to design an IBM display facility in New York City to compete with Olivetti's on Fifth Avenue.

In 1956, Watson retained Noyes to develop a unique IBM corporate style similar to Olivetti's to improve the visual quality of IBM products, graphics, exhibitions, interiors, packaging and architecture. He did so with help from Paul Rand, Marcel Breuer, and Charles Eames. these influential efforts have been referred to as the first comprehensive design program in American business. In 1957 IBM introduced the Ramac 305 business computer, designed under the direction of Noyes and R.W. Figgens, U.J. Pepin and H.F. Weber of Sundberg-Ferar. It featured a distinguished architectural quality that integrated with contemporary office decor.



In 1960, Noyes was retained by Westinghouse to dramatize their image, to build their meager share of consumer products markets against giants GE and Whirlpool. Noyes engaged Paul Rand and recommended strengthening of the internal design organizations. The W on the Westinghouse logo is a particularly clever design. It mimics the symbols used to draw electrical diagrams and circuit boards. This emphasizes the

company's innovations in the field of electrical power, and it gives the logo a modern and technological look.

In 1961 IBM introduced a revolutionary Selectric I electric typewriter, replacing the standard type bars with a moving, interchangeable spherical "golf ball" printing element, while the carriage remains fixed. Noyes designed the sculptured housing starting in 1959. By 1975 it accounted for about 75 percent of the US electric typewriter market.









Noyes was commissioned regularly by IBM to design various products as well as buildings for the corporation. His most famous and well known of these buildings are the IBM building in Garden City, NY (1966), the IBM Aerospace Building in Los Angeles, CA (1964), The IBM Pavilion Hemisfair in San Antonio, TX (1968) and the IBM Management Development Center in Armonk, NY (1980). Noyes also selected other notable architects such as Mies van der Rohe, Eero Saarinen, Marco Zanuso and Marcel Breuer to design IBM buildings around the world. Noyes also redesigned the standard look for all Mobil gasoline stations during the 1960s (and hired the graphic design firm Chermayeff & Geismar to redesign the Mobil logo). His New Canaan, CT, residence is regarded as an important piece of Modernist architecture.







Design philosophy

Noyes was notable among architects of the 20th century modern period in American architectural history. (1910-1997) He was a member of the Harvard Five, a group of modern architects who practiced in New Canaan, CT. Noyes began his career working for Walter Gropius, and in the 1940s was instrumental in promoting the early work of Charles Eames and Eero Saarinen as curator of industrial design at the Museum of Modern Art in New York. An instance of this was the MoMA competition Organic Design in Home Furnishings, which was published in a book by the museum.

Noyes believed that each region of the United States has buildings inspired by the climate. He was a strong advocate of functional Modernism and his work was firmly grounded in the tradition of Gropius, Breuer & Le Corbusier. He advocated simplicity of form and truth to the nature of materials which is seen particularly in

his houses. He was responsible for many residential and commercial archetypes alike. Likewise, Noyes' corporate design program philosophy was to ensure that design expressed the true leadership essence of the company and embodied technology in a new and appropriate way. His approach went far beyond a typical corporate identity project. Achieving harmony between design strategy and business strategy was the hallmark of Noyes' work with IBM, and other companies that followed. Noyes' residential and industrial designs established him as a leader in the fields of post-war American architecture and integrated industrial design.

Works

Noyes' first house built in New Canaan was the Tallman House, built in 1950, followed in the same year by the Bremer House. Residing in New Canaan for 30 years, He designed more residential buildings, including the Ault House (1951), the Weeks House (1953), and the Noyes House (1955). In 1953 he designed bubble houses which were built the next year in Hobe Sound, Florida. One of his most notable designs was the Wilton Library (1974) in the neighboring town of Wilton, CT.



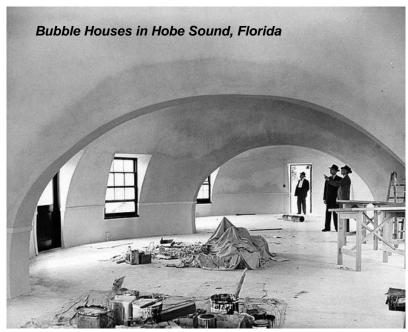


Weeks House - 1953
Built on the foundation of a previous house which was destroyed when hit by an airplane

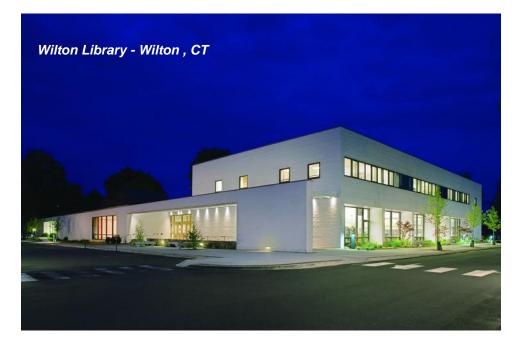
Brown House - 1951











And then there was Noyes' initial design for the new National Soaring Museum as seen on the cover and in the concept drawing graphic below. Although the design was fabulous, the fledgling museum just did not have the funds to even begin such an exotic building. It was decided to ask Noyes to design a simpler museum building that could be placed in the vicinity of where the old administration building had been.



The redesigned National Soaring Museum building did not receive mention in the list of Eliot Noyes' famous architectural designs, but it has been a very serviceable building, located with ample opportunity for expansion as future funding allows.



References:

https://www.idsa.org/content/eliot-fette-noyes-fidsa https://www.usmodernist.org/noyes.htm

Looking toward the main exhibit hall from the museum lobby



Living room of the house that Eliot Noyes had built for himself and his family. 1956 - The Eliot and Molly Noyes House, 210 Country Club Road, New Canaan CT. Commissioned in 1955. Built by Borgium and Meek.

Featured in LIFE and Time magazines. Won a 1957 AIA Merit Award. Deeded to the Noyes Family Partnership/Fred Noyes. Put under preservation easement in 2019 with the Connecticut Trust for Historic Preservation. Photo by Michael Biondo.

IBSN #0892-0516

The **NSM Historical Journal** is a publication of the National Soaring Museum Harris Hill, 51 Soaring Hill Drive, Elmira, NY 14903
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Anyone is invited to contribute article material and photographs with identification about historical soaring activities, renovation of old sailplanes, soaring pioneers, unusual uses of sailplanes, etc. Manuscripts are subject to whatever revisions, additions or deletions are necessary to make the material conform to the space limitations and standards of the NSM. Material that is to be returned must be accompanied by a self-addressed, stamped envelope. No compensation other than credit will be given. Materials sent by e-mail should go to: info@soaringmuseum.org. If we receive an overabundance of articles for the upcoming edition, your material will be saved for a future edition.

Publisher: National Soaring Museum Executive Director: Trafford L-M. Doherty Editor: Jean Doherty

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