

# Clarence W. Spicer

By David L. Snyder  
Alfred University

## **An automobile that gets 80 miles per gallon?**

An Alfred University student—although not widely known--played a major role in getting American-made automobiles on the road a century ago. And now AU researchers are working to keep Americans on the road by assisting Detroit automakers in producing more fuel-efficient vehicles.

The Bush Administration “Freedomcar” project challenges American automakers, in an effort to make the United States less dependent on foreign oil, to produce vehicles that will travel 80 miles on a gallon of gas. Alfred University researchers are helping.

With increased use of magnesium alloy in the automotive industry, new developments for lightweight components such as the engine block and head, transmission case and chassis are attracting more interest. The lighter alloys, however, are prone to deformation under the stress at high temperatures, commonly known as creep.

Dr. Jinghong Fan, associate professor of mechanical engineering, AU School of Engineering, is overseeing research on cyclic creep of the lightweight magnesium alloy components. A related concern of automakers is load retention of bolted joints used to connect magnesium alloy components. AU researchers have developed a new type of testing assembly for the study of bolt load retention.

With this work, AU is offering a powerful tool for wide applications in designing reliable bolt load retention assembly and more accurately predicting bolt load retention behavior.

Among the automotive components affected by this research is the universal joint, which was invented a century ago by an Alfred University student, and which was partly responsible for the rapid acceleration of American auto manufacturing.

In 1902, an estimated 8,000 automobiles were produced by nearly 50 American automakers. Power transmission for these vehicles, however, became a complex engineering problem. Early cars used sprockets and chains much like bicycles. They were unsightly and noisy at high speeds. They also were difficult to lubricate and they broke frequently, no doubt caused by stones as there were only 144 miles of paved roads at the time.

Clarence W. Spicer’s invention—a major engineering breakthrough—replaced the awkward chain method of transferring power from the engine to the wheels of a motor vehicle. They were used to attach the engine and rear axle to a propeller shaft. They reduced noise, protected against dust and dirt, and were easy to lubricate.

With application of his patented universal joint, American automakers offered a more reliable vehicle and sales rocketed from about 125,000 in 1909 to 1,745,792 in 1917—and the rest is history. But who was this Clarence W. Spicer and how did an Illinois lad find his way to Alfred for college preparatory studies?

In order for one to understand the life of Clarence Winfred Spicer, one must be introduced to the family of Seventh Day Baptists in America. Numbering no more than 10,000 members at any one time in the United States, the Christian denomination distinguishes itself from other Baptists in upholding the Biblical seventh day Sabbath. Its greatest growth as a Christian body over its three centuries in America seems to have been of biological means—and as a result, most Seventh Day Baptists are related in one way or another.

With the first church founded in Newport, Rhode Island in 1671, they were a hardy lot who joined the pioneer western migration, settling in eastern New York (Berlin in Rensselaer County), then on to western New York where they settled in Alfred, eventually establishing the select school that is now Alfred University. The church at Alfred served as a “mother church,” giving birth to a number of nearby churches and other churches planted in the west. With the continued westward movement, churches were established in what was then the “Northwest,” now considered the “Midwest.”

Seventh Day Baptist Historian Donald A. Sanford wrote in his 1977 edition of A Free People in Search of a Free Land, “After 1842 when the migrations were largely to the trans-Appalachian regions of the mid and far West, the publication of the denominational weekly newspaper, The Sabbath Recorder extended the scope of information about a new frontier to a much larger circle of the church family. This type of correspondence tended to emphasize the desirability and need for those searching out new homes to locate among those holding similar convictions and practices. Thus for Seventh Day Baptists, the attractiveness of the region ahead was measured in social and religious rather than in economic values.”

Alfred became a hub of the Seventh Day Baptists with the establishment of the denomination’s school of theology at Alfred University in 1853. The Sabbath Recorder, a weekly publication that went into most Seventh Day Baptist households, was published first in Alfred, then later in Plainfield, New Jersey, home of one of the Eastern Association’s larger churches. Likewise, the denomination’s Board of Christian Education was headquartered as it is today, in Alfred. Denominational headquarters, now more centrally located in Janesville, Wisconsin, was at one time in Plainfield, NJ.

Young Clarence Spicer was an inventive Seventh Day Baptist who, thanks to his mechanical inclinations, maintained the equipment of the prize-winning creamery at his father’s West Hallock (now Edelstein), IL dairy farm. Reared in a Sabbath-keeping home in the small railroad settlement in the fertile Illinois River Valley, he was baptized when he was nine years of age and became a member of the West Hallock Seventh Day Baptist Church. There, he was active in The Young People’s Society of Christian Endeavor.

No doubt his parents, John G. and Cornelia (Babcock) Spicer, like most Seventh Day Baptists, read the *Sabbath Recorder* religiously. At that time, the publication enlisted local agents, with Truman Saunders so designated in West Hallock. By reading the *Sabbath Recorder*, the couple could keep up with the news of family and friends back East. John, after all, had ten siblings residing near S.D.B. congregations in Hopkinton and Westerly, RI, Adams Center, NY and Plainfield, NJ, while Cornelia had Babcock cousins almost anywhere there was a S.D.B. church.

The publication featured news from the denomination's approximately 100 churches, Bible readings, vital statistics and reports from the denominational agencies such as the Missionary Society, Memorial Board and Board of Christian Education. It included promotional material for Alfred Academy and Alfred College and the denomination's School of Theology—and it published train schedules!

Passenger trains were the way to travel. And Seventh Day Baptists were accustomed to traveling. A Seventh Day Baptist General Conference, which conducted the business of the denomination, was held annually at various locations and attended by delegates from all of the churches.

So, given the educational limitations of West Hallock, Clarence Spicer's parents in fall 1887 sent his older sister Minnie on an Atchison, Topeka & Santa Fe train to Chicago where she'd make the transfer to the next eastbound Erie(?) train, which stopped in Alfred Station a couple miles from Alfred Academy. Meantime, Clarence, then 12 years old, helped his father on the farm, which included the first creamery in Peoria County that produced an average of 175 pounds of butter weekly.

But a few years later, it was Clarence's turn to board the eastbound train to Alfred. He enrolled in Alfred Academy in 1891. While taking college preparatory courses, at Alfred, there was little distinction between prep and college courses. In fact, until 1895 at the insistence of the New York State Board of Regents, Alfred professors taught both college and preparatory classes.

At Alfred, Clarence had acquaintances (and probably relatives) whom he had met at S.D.B. General Conference sessions. And while he left behind the fertile farmland of Peoria County, Illinois, in Alfred he could continue growing in his Seventh Day Baptist faith while his mechanical mind was being nurtured and encouraged in a stimulating learning environment.

At Alfred, he was no doubt influenced by the likes of Boothe Colwell Davis, who both as pastor, then as president of Alfred University, was a guiding member of the Young People's Society for Christian Endeavor. Clarence, right at home, continued his association with the organization while in Alfred. A classmate destined to become his wife, Anna Olive Burdick, was also involved in the group.

In 1889, when Anna was 14 and her brother Willis Reed 12 her family moved from DeRuyter in central New York to Alfred where the children could enjoy the educational benefits of Alfred College and its preparatory school (Alfred Academy). Anna's father, a druggist by trade, went into business in Alfred (residing at 11 Church Street), then moved to Alfred Station in 1902 where he operated a store. An *Alfred Sun* ad stated: "Pure Drugs, Medicines, Perfumery, Toilet & Fancy Articles, Confectionery, Stationery and a full line of Groceries, of best quality at bottom price for cash, at J.R. BURDICK'S, Alfred, N.Y." His obituary stated that "at the time of the baptism of their children, Brother Burdick and his wife united by letter with them, into membership with the S.D.B. Church at Alfred, of which he continued a member until death."

Clarence probably returned to assist with the dairy farm back home in Illinois after classes ended in late June 1894. An early farming injury had limited his father's work on the farm and, compounded by the death of his uncle, William Spicer, who

Alfred hosted the Seventh Day Baptist General Conference during the summer of 1896 and, On Tuesday, Dec. 1, 1896, one day after his twenty-first birthday and seven days prior to hers, the two were united in marriage in the Alfred home of her parents, Mr. and Mrs. James Reed Burdick, with President Boothe Colwell Davis performing the ceremony.

The couple took up residence near the Spicer Family Farm in Illinois, but a few years later, in 1899 returned to Alfred. The Dec. 13, 1899 *Alfred Sun* reported, "Mr. and Mrs. Clarence W. Spicer and little son Harold, arrived in Alfred Thursday from Edelstein, Ill. Mr. Spicer has entered the University for studies preparatory to a course in Mechanical and Electrical Engineering at Cornell. They will occupy the upright part of the Eaton house, opposite Firemens Hall, during their stay here."

At Cornell, in choosing among three assignments, he chose to design and build a motor car. With the encouragement and advice of his mentor, Dean Robert H. Thurston, Clarence filed a patent application for his universal joint on Sept. 2, 1902 and was issued the patent on May 19, 1903.

Issuance of the patent was cause for celebration in an otherwise dark year for Clarence Spicer. His father, John Green Spicer, died on Feb. 8, 1903. That was followed by the death of Dean Thurston on Oct. 25, 1903. With no mentor for his final semester at Cornell, Clarence decided to leave college to engage in the manufacture of his universal joint.

While Clarence was no fool, he began manufacturing his universal joints on April 1, 1904 in a corner of the Potter Printing Press Company in Plainfield, NJ. Spicer Universal Joint Manufacturing Company grew rapidly but with the growth came the need for additional capital. Thus entered, in early 1914, his association with Charles A. Dana. Dana reorganized and refinanced the Spicer Manufacturing Corporation and Clarence was free to concentrate on product improvement and invention of new products and improved methods of manufacturing.

Spicer was selected as one of the several experts called upon by the United States Army to design the Class B Liberty Truck for Army use in World War I.

With the gradual move of the automakers from the Northeast to Michigan, a new Spicer manufacturing plant was built in Toledo, Ohio in 1928, thus facilitating closer ties to the automakers.

All the while, Clarence maintained ties with Alfred University, where he was named a trustee in 1917, a position he held until his death in November 1939.

Two of his three sons, Robert Thurston Spicer and John Reed Spicer, were graduated from Alfred University. Son John Reed Spicer, who married Virginia Bond (daughter of Dean A.J.C. Bond) taught and served as an administrative assistant at Alfred University from 1935 through 1945.

Alfred University awarded Clarence W. Spicer the degree of Doctor of Science, *honoris causa*, in 1935. In introducing the degree candidate, Professor Clifford M. Potter said of Spicer, "After studying here for some time, he entered Cornell and pursued a course in mechanical engineering. He is the inventor and manufacturer of the famous Spicer Universal Joint which is known to engineers the world over. He also perfected broaches for cutting squares and splined holes. Both of these mechanisms are very important to the automotive industry. He has done a vast amount of research on other engineering problems encountered in the manufacture of motor cars..."

In awarding the degree, President Norwood said, "Student of science in Alfred and Cornell, master scientific searcher into the mysteries of mechanics, inventor, and manufacturer, whose name and product go wherever motor vehicles travel, business executive, valued trustee, and friend of your Alma Mater, Alfred welcomes you back to the scenes of your earlier days and gladly presents you with this token of your success and of her approval..."

Throughout his career, Clarence was in trade associations with some twenty-nine years of membership in the Society of Automotive Engineers, Inc. for which he served both as treasurer and president. He was also a member of the American Society of Mechanical Engineers, the American Institute of Mining and Metallurgical Engineers, the American Society for Metals, the American Society for Testing Materials, the Association of Railway Electrical Engineers and the Engineers Society of Detroit. He was inducted into the Automotive Hall of Fame in 1995.

Today, his company and his patented products live on. Now known as the Dana Corporation, with headquarters in Toledo, Ohio and worldwide sales approaching \$10 billion per year, Clarence Spicer's universal joint manufacturing venture celebrates its centennial in April 2004.

**[The writer is editor and publisher of the *Alfred Sun*, a weekly community newspaper, and is a library assistant in the Access Services and Special Collections Departments at Herrick Memorial Library.]**

**George H. Babcock...**

From 1885 to 1893 he was a non-resident lecturer at Cornell in the Sibley College courses in mechanical engineering. His papers on steam were very important.

He was president of the board of trustees of Alfred University for some time; hence Alfred's interest in him. His intense interest in Physics led him to donate Babcock Hall of Physics to the University. The Hall was donated in 1897 and in 1929 was destroyed by fire.

**Updated 7/30/03 DLS**

**ROLLING BIOGRAPHY OF  
CLARENCE WINFRED SPICER**

Based on research by David L. Snyder at Herrick Memorial Library, Alfred University

In order for one to understand the early life of Clarence Winfred Spicer, one must be introduced to the family of Seventh Day Baptists in America. Numbering no more than 10,000 members at any one time in the United States, the determined Christian denomination upholds the Biblical seventh day Sabbath. Its greatest growth as a Christian body over its three centuries in America seems to have been of biological means—and as a result, most Seventh Day Baptists are related in one way or another. With the first church founded in Newport, Rhode Island in 1671, they were a hardy lot who joined the pioneer western migration, settling in eastern New York (Berlin in Rensselaer County), then on to western New York where they established Alfred University. The church at Alfred served as a “mother church,” giving birth to a number of churches in Allegany County—and other churches planted in the west. With the continued westward movement, churches were established in what was then the “Northwest,” now considered the “Midwest.”

Alfred became a hub of the Seventh Day Baptists with the establishment of the denomination’s school of theology at Alfred University in 1853. The Sabbath Recorder, a weekly publication that went into most Seventh Day Baptist households, was published first in Alfred, then later in Plainfield, New Jersey, home of one of the Eastern Association’s larger churches. Likewise, the denomination’s Board of Christian Education was headquartered as it is today, in Alfred. The denominational “headquarters,” at one time in Plainfield, NJ, today is more central to the nation, located in Janesville, Wisconsin near probably its largest church in Milton, WI, home of the former Milton College, founded by Seventh Day Baptists, but closed in 1982.

There were Spicers among the settlers of the Alfred area, with Gideon Spicer listed as one of the original founders. There was a large family of Spicers in nearby

Whitesville, in the Town of Independence, about 20 miles south of Alfred, but I have not delved into their genealogy.

At the time of Clarence Winfred Spicer's birth in 1875, the Seventh Day Baptists had associations of churches primarily in the eastern portion of the nation. They included:

Southeastern and Eastern Associations—New Salem, WV, Lost Creek, WV, Ritchie, WV, Middle Island, WV, Green Brier, WV, West Fork, WV and Newport, RI, New Market, NJ, First Hopkinton, RI, Shiloh, NJ, Berlin, NY, Waterford, CT, Marlborough, NJ, 2<sup>nd</sup> Hopkinton, RI, Rockville, RI, 1<sup>st</sup> Westerly, RI, Plainfield, NJ, Pawcatuck (Westerly), RI, New York City, Greenmanville, CT, 2<sup>nd</sup> Westerly in Niantic, RI, Rosenhayn, NJ.

Central Association—First Brookfield, DeRuyter, Scott, Hounsfield, 1<sup>st</sup> Verona, Adams, 2<sup>nd</sup> Brookfield, West Edmeston, Cuyler, Watson, Lincklaen, Preston, Otselic, 2<sup>nd</sup> Verona, all in New York, and Clifford, PA.

Western Association—1<sup>st</sup> Alfred, 2<sup>nd</sup> Alfred, Cussewago, PA, Little Genesee, Portville, 3d Genesee, Friendship, Hebron, PA, Hartsville, Independence, Richburg, Scio, Jackson Centre, OH, Honeoye, Hebron Centre, PA, Andover, Port Allegany, PA and Oswayo, PA.

Northwestern Association—Milton, WI, Albion, WI, Walworth, WI, Christiana, WI, Berlin, WI, **Southampton**, IL, Rock River, WI, Welton, IA, Wasioja&Ashland, MN, Trenton, MN, Carlestone, MN, Transit, MN, Carlton, IA, Farina, IL, Pardee, Kansas, Long Branch, NE, North Loup, NE, Brookfield, MO, Dow Creek, IL, Pleasant Hill, IL, Village Ridge, IL, Enon, IL, Stone Fort, IL, Harrisburg, IL, Harrisburg, IL, Raleigh, IL, Alden, MN, Alden, MN, Dakota, WI, Farmington, IL.

A “General Conference” was held annually with associations alternating as hosts. The sessions served as a “family reunion” as delegates representing the many churches were often relatives with prominent S.D.B. names of Babcock, Burdick, Crandall, Kenyon, Langworthy, Potter, Stillman and, yes, even Spicer.

Because of their Sabbath-keeping distinctive, they were apt to marry within their belief system, their denomination, if you will, so as to live harmoniously. So, it was only

natural that Clarence Winfred Spicer would choose to find a nice Seventh Day Baptist girl for his bride.

Proving this point, Anna Olive Burdick's mother did not need to change her surname when she married. Her mother, Sarah Anna Burdick, was born Nov. 6, 1851 in DeRuyter, NY, a Seventh Day Baptist town, the daughter of Kinyon W. and Olive A. (Ellis) Burdick of DeRuyter. Anna's father, James Reed Burdick, was born Jan. 12, 1847 down the road about 20 miles in Cuyler, New York, the son of James and Martha Maxson Burdick, also of a Seventh Day Baptist community. James Reed Burdick was baptized at the age of 17 and joined the Cuyler Hill Seventh Day Baptist Church. Ten years later, when he married Sarah Anna Burdick on Oct. 15, 1874 in DeRuyter, he removed his membership from Cuyler Hill to the DeRuyter Seventh Day Baptist Church. It was in DeRuyter, N.Y. that Anna Olive Burdick was born on Dec. 8, 1875.

When Anna was 14 and her brother Willis Reed 12 (born Nov. 12, 1877), the family moved in 1889 to Alfred where the children could enjoy the educational benefits of Alfred College and its preparatory school (Alfred Academy). Anna's father, a druggist by trade, went into business in Alfred (residing at 11 Church Street), then moved to Alfred Station in 1902 where he operated a store. His obituary stated that "At the time of the baptism of their children, Brother Burdick and his wife united by letter with them, into membership with the S.D.B. Church at Alfred, of which he continued a member until death."

Clarence Winfred Spicer's parents were both raised in the Seventh Day Baptist faith as well. John Green Spicer was born Jan. 14, 1839 in Hopkinton, Rhode Island, the son of Content (Potter) and Joseph Spicer. He attended a select school in the prominently Seventh Day Baptist community of Adams Center, New York near Watertown. There, he met his wife-to-be, Cornelia Babcock, who was born Jan. 18, 1844 in Adams, New York, the daughter of Almyra (Burdick) and Samuel Langworthy Babcock. Cornelia's parents were natives of Brookfield in Central New York, another community of predominately

Seventh Day Baptists, and were married there on April 5, 1831, at some point relocating in Adams.

John Green Spicer and Cornelia Babcock were married on June 29, 1863 in Adams Center, New York. This was after John had been rejected in his 1862 endeavor to enlist in the Union Army, on account of ill health.

In the spring of 1865, John Green and Cornelia Babcock Spicer moved to Peoria County, Illinois to settle on a farm in West Hallock where a Seventh Day Baptist Church had been planted by settlers from the Berlin, NY church. Having been disabled by an accident, Spicer and his wife returned to her hometown of Adams and remained there until he recovered, then returned to Peoria County to engage in farming at Lawn Ridge. In the spring of 1871 he bought half of the homestead at Edelstein and engaged in the dairy business, in which he achieved a remarkable success and had one of the best equipped creameries extant. John Green Spicer was a pillar in the Southampton Seventh Day Baptist Church in West Hallock, IL where he served on the board of trustees and for many years was church clerk. He also was involved in civic affairs. He served as president of the Board of Directors of Edelstein School District No. 7, established in 1894, when a school house was constructed at a cost of \$1,000. Together with Berlin, NY Seventh Day Baptist transplant Daniel Hakes, he in c. 1901 penned a history of Hallock Township, (Within its borders, Hallock Township included villages and hamlets of Northampton, Lawn Ridge, Edelstein and West Hallock) which included this entry:

“J.G. Spicer & Son have, for many years, been operating a creamery about one mile southeast of the village (of Edelstein, IL). Of the quality of the butter produced by them it is only necessary to say that, at the Columbian Exposition of 1893, they secured the highest score on their four months’ exhibit, in token of which they have a valuable medal and a beautiful diploma—the highest award made to any exhibitor in his line. They have also carried off many first prizes at State Fairs and other exhibitions of like products. In 1900 they handled over 800,000 pounds of milk, for which they paid over \$8,000. Their butter is largely used on the tables of many of the leading families of

Peoria. In connection with the creamery they also have an artificial iceplant intended principally for their own use but from which they also supply the village and surrounding country with ice.”

The Township History of Hallock that Clarence’s father wrote also included the following entry regarding the Seventh Day Baptist Church in that township:

“The only church in the village of West Hallock is that of the Seventh Day Baptists. In the year 1845, Elder Anthony Hakes, of Berlin, New York, came to the Township, and was followed, some three years later, by his brother, Daniel Hakes, and John Simpson. In due time accessions were made to their number, and meetings were held from house to house until the erection of the Academy building, when it was made their place of worship. On the 3<sup>rd</sup> day of September, 1852, at the house of Elder Anthony Hakes, the church was organized by Elder Stillman Coon, with fourteen constituent members, Elder Coon being the first pastor. The society grew yearly in numbers, and, in 1871, it was found expedient to erect a larger and more comfortable building for their sole use. The present house was accordingly put up in the summer of that year, at a cost of \$5,500, the whole of which was pledged by the adherents and friends of the church before anything was done towards its construction. The building is a neat and substantial one, and can comfortably seat 250 people. Elder A. Hakes was the founder of the church, and for many years preached to the Baptists at Union and in the surrounding country. His ministrations at funerals of all sects and classes was especially popular. He was ordained to the gospel ministry in 1856 and had charge of the congregation for some years. Rev. R.B. Tolbert is the present pastor, who has been with them since November, 1899. A live Sabbath School and an enthusiastic Young People’s Society of Christian Endeavor are well maintained each Sabbath.”

Born to Cornelia (Babcock) and John G. Spicer were:

--in Lawn Ridge, a daughter, Minnie, May 22, 1869. Minnie was enrolled in the Preparatory School of Alfred University in fall and winter terms of 1887-1888 and fall and winter terms 1888-1889.

- in Edelstein, a daughter, Clara Almira, Sept. 25, 1873. She died Feb. 23, 1875.
- in Edelstein, a son, Clarence Winfred, Nov. 30, 1875. He died
- in Edelstein, a son, Ernest Samuel, June 27, 1877, died July 15, 1880 at age 3.

Clarence grew up on the family dairy farm in Edelstein, IL and was active in the Southampton Seventh Day Baptist Church in West Hallock, IL, its Sabbath School and Young People's Society of Christian Endeavor. At the time of his birth, the church was sizable, for an S.D.B. congregation, with 127 members in 1876 and "17 scholars in the Infant Class" of the Sabbath School in 1875.

Schooling in West Hallock was not as advanced, perhaps, as was available at Alfred Academy, which may have struggled in its early decades financially, but academically prospered. In *Fiat Lux: The Story of Alfred University*, author John Nelson Norwood wrote: "...So rapid was the Academy's development scholastically that an impressed onlooker declared that the course of instruction (1852) was quite equal to the average of college courses."

Alfred University in the 1890s developed its mechanical courses in an effort to provide training of young people for what was to become the nation's industrial revolution. Such courses were new to formal education but necessary as envisioned by Alfred University President Boothe Colwell Davis. [Rewrite with evidence from Davis' memoirs.]

These developments at Alfred may have been written about in the Seventh Day Baptist weekly organ, *The Sabbath Recorder*, read in most Seventh Day Baptist homes and published in Alfred. The publication advertised the educational institution founded by Seventh Day Baptists in Alfred that included Alfred Academy (preparatory) and Alfred College. With an astute interest in education for his children, John G. and Cornelia sent, no doubt by train, the young but curiously inventive Clarence to Alfred, New York to enroll in Alfred Academy, the preparatory school of Alfred University, at age 15, just as they had sent their daughter Minnie before him.

It was while studying at Alfred that he met the quiet but attractive Anna Olive Burdick, whose parents had moved to Alfred from DeRuyter in Central New York so that their two children would obtain a good education at the institution founded by their Seventh Day Baptist ancestors in 1836. Anna, born but eight days after Clarence, entered Alfred Academy at the same time...First Term 1891-92, when they were both 15 years of age. They probably were classmates during Third Term 1891-92 as both were enrolled in Elementary Algebra and Latin classes.

While Anna resided with her family, Clarence most likely took up residence either with a relative or other private family in what was then called Alfred Centre. An 1891 Information Catalog offered this description of Alfred University's location "at Alfred Centre, Allegany Co., N.Y., two miles from the Alfred station of the New York, Lake Erie and Western Railway, and twelve miles west from Hornellsville. The situation is retired and healthful, in a rural region, surrounded by delightful scenery.

"There has been no liquor license granted in the town for nearly half a century. As a home for students, it is comparatively free from the ordinary allurements of vice and dissipation, and the temptations often attending student life."

While Alfred was, at that time, "free from the ordinary allurements of vice and dissipation," the institution, coeducational from its inception in 1836, served as a fertile field for courtships, although always supervised.

On Tuesday, Dec. 1, 1896, one day after his twenty-first birthday and seven days prior to hers, Clarence W. Spicer and Anna Olive Burdick, were united in marriage, with the Rev. Boothe Colwell Davis, president of Alfred University, officiating. The *Alfred Sun* reported:

### **Spicer-Burdick.**

*On Tuesday afternoon at 2 o'clock a few of the friends of Mr. and Mrs. J. Reed Burdick gathered in their pleasant home to witness the marriage of their daughter, Anna Olive, to Mr. Clarence W. Spicer, of Edelstein, Ill. The ceremony was beautifully performed by President (Boothe Colwell) Davis, of the University, of which both the young people had been students. At the close of the ceremony a bountiful lunch was served in the prettily decorated dining room, after which the young couple left for Chicago. They will be at home to their many friends, at Edelstein, Ill., December 12th.*

*The bride is one of Alfred's most lovely daughters. She will be greatly missed, not only in her home, but in the church and the different societies of which she was a member. Mr. and Mrs. Spicer take with them to their new home, the best wishes of hosts of friends.*

*The out of town friends who were present were Mr. and Mrs. Willis Smith, of Lincklaen, N.Y., Mr. and Mrs. Dwight Taylor, of DeRuyter, N.Y., and Mr. and Mrs. Frank Gallup, of Cortland, N.Y.*

The couple assumedly took up residence on or near the Spicer Family Farm in Edelstein, IL.

Children of Clarence Winfred and Anna Olive Burdick Spicer:

--Harold Willis, born Oct. 12, 1897 in Edelstein, IL

--Robert Thurston, born Feb. 22, 1903 in Ithaca, NY

--John Reed, born\_1904?\_\_ in Plainfield, NJ?

--Wilfred Clarence, born 1915? in Plainfield, NJ?

## SOME WHO MAY HAVE HAD INFLUENCES ON CLARENCE W. SPICER

### George Herman Babcock

George Herman Babcock was born in Unadilla Forks, Cortland County, NY on June 17, 1832. At the age of 12, his parents moved to Westerly, RI. Here he attended school and finally went to the Institute of DeRuyter, N.Y.

Stephen Wilcox was a mechanic at DeRuyter and the two met. Babcock's health was fast failing but was restored because of the iodine fumes given off in daguerreotyping, which Babcock took up for this reason. From then on, daguerreotyping was a sort of hobby to him.

In 1851, he was but 19, George H. Babcock established the first printing office in their immediate locality. The paper was called "The Literary Echo" – later "Westerly Weekly." This was continued for three years before he sold out. With his father in 1854, Babcock introduced a polychromatic press—one that would print three colors at the same time. Charles Potter Jr. took care of the manufacturing until the press had paid for itself and then they shared equally in the profits.

Babcock and Wilcox incorporated and operated the N.Y. Safety Steam Corporation until the expiration of the Corliss patent. In 1856 the B.&W. safety, or sectional tubular, steam boiler made its appearance. This boiler was of the non-explosionable type. Besides being famous the world over, it was used.

From these things Babcock reaped a lucrative income. Not being endowed with the Scotch characteristic of excessive frugality, he donated large sums to his Faith, the Seventh Day Baptists. Most of what remained went to educational purposes. From 1885 to 1893 he was a non-resident lecturer at Cornell in the Sibley College courses in mechanical engineering. His papers on steam were very important.

He was president of the board of trustees of Alfred University for some time; hence Alfred's interest in him. His intense interest in Physics led him to donate Babcock Hall of Physics to the University. The Hall was donated in 1897 and in 1929 was destroyed by fire.

His activity in community life showed itself when he had moved to Plainfield, NJ. Here he was president of the board of education and was deeply interested in the public library. As at Alfred, improvements were registered.

In 1893, Alfred, the Seventh Day Baptists, friends and friends by reputation bowed their heads as death overcame this religious and educational philanthropist.

SOME MORE ABOUT George H. Babcock: among his children was George Lauson Babcock, b. Jan. 7, 1885 in Plainfield, NJ, who married Ruth Stillman on Sept. 11, 1907 in Alfred, NY....Clarence Spicer served on the AU Board of Trustees from 1917 until his death in 1939, for many years alongside George L. Babcock of Plainfield, NJ

### **Boothe Colwell Davis**

Pastor of the Alfred Seventh Day Baptist Church when Clarence was enrolled at Alfred Academy, the Rev. Boothe C. Davis was a leader in the Young People's Society for Christian Endeavor, which Clarence was active in both in his home church in West Hallock and while studying at Alfred. Rev. Davis was pastor but for a couple years before being called to serve as president of Alfred University, where he was a catalyst for University development. He is credited with introducing the University to industrial training, no doubt inspired by George Herman Babcock, a University trustee who donated a building, the Babcock Hall of Physics. It was during Davis' administration that the NYS College of Ceramics was established at Alfred in 1900, and the School of Agriculture was initiated in 1908.

### **Robert Henry Thurston**

Robert Henry Thurston (1839-1903), first president of ASME (1880-82), established the first mechanical laboratory in 1875, at Stevens Institute of Technology, Hoboken, New Jersey, where he was professor of mechanical engineering (having first established the curriculum there in 1871). In 1875, he developed the three-coordinate solid diagram for testing iron, steel, and other metals. He was widely published in the areas of materials, thermodynamics, steam engines and boilers, friction and energetics. In 1885 he became director of Sibley College at Cornell University and reorganized it as a

college of mechanical engineering. He held two patents, one an autographic recording testing machine for material in torsion and the other a machine for testing lubricants. He was born Oct. 25, 1839, Providence, Rhode Island, and died Oct. 25, 1903, Ithaca, New York.

He showed much interest in the life of Robert Fulton, having a book, "Robert Fulton: His Life and its Results," published in 1891 about the inventor by Dodd, Mead, and Company Publishers of New York. Dodd, Mead and Company in the same year published Thurston's "Robert Fulton: Engineer and Artist." He also published "A History of Growth of the Steam Engine" in 1878 by D. Appleton and Company of New York.