**Behind the High Board Fence** by Helen Marley—Bibliography and Sources of Information

*Behind the High Board Fence* is a work of historical fiction. Marley provided the following bibliography:

- **This Was Home** *(About life in Salisbury)*
  Hope Summerel Chamberlain
  The University of North Carolina Press
  Chapel Hill
  1938

- **Breaking the Land: The Transformation of Cotton, Tobacco and Rice Cultures since 1880**
  Peete Daniel
  University of Illinois Press
  Urbana and Chicago
  1985

- **Quest for Progress: The Way We Lived in North Carolina 1870-1920**
  Sydney Nations
  The University of North Carolina Press
  Chapel Hill
  1983

- **Forsyth, A County On The March**
  Adelaide L. Fries
  The University of North Carolina Press
  Van Rees Press
  New York
  1949

**COOK’S SIDEBARS and SOURCES OF INFORMATION**

To understand better the forces shaping lives early in the 20th century, Sandra Cook, NC Press Foundation, NIE prepared background information or a “sidebar” for each chapter. Below you’ll find the sidebars. Much more could be written. Cook also provided links to the websites and text references she used in preparing the sidebars. She accessed the sites May/June 2010.

Four sources identified below deserve special credit: Former Winston-Salem journalist Frank Tursi’s articles and history on Winston-Salem, lessons provided by LEARNNC, Winston-Salem public library’s “Digital Forsyth” which provides numerous photos and explanations on the history of the area and histories provided by Walter Turner, historian for the NC Transportation Museum.

Make connections with current events. Look in recent newspapers for related stories. SEARCH YOUR NEWSPAPER’S website and/or e-Edition using keywords, such as quarantine, trains and prosthetics.
Chapter One

Winston and Salem become ‘twin city’ and open schools

Winston, founded in 1849, takes its name from Joseph Winston, a local hero of the Revolutionary War and first cousin of Virginia statesman and governor, Patrick Henry. Shortly after its founding, Winston and its “twin city” Salem were incorporated into Forsyth County which was carved from the southern part of Stokes County. Winston became the county seat, and, because leaders expected the merger of the two cities, the courthouse was located near Salem. The hyphenated name, Winston-Salem, became official in 1913.

In 1884, Winston established its first public school, West End Graded School, the first such school in North Carolina. Its founder Calvin Wiley became superintendent of schools for the state of North Carolina.

Public schools in North Carolina were segregated at the time. The first public school for black students, Depot Street School, opened in 1887. Simon Green Atkins, its principal, would later found Slater Industrial Academy for blacks. Slater is now Winston-Salem State University.

Chapter Two

Winston and Salem develop newspapers

The Winston-Salem Journal serves as the city’s major daily. Its current owner, Media General company, purchased the newspaper from the Gray family (Gray Avenue, Gray Street, Graylyn). Two members of the Gray family served as the city’s mayor, and others were prominent business and political leaders. The late Gordon Gray, the former owner of the Journal, was Secretary of the Army and national security advisor for President Dwight Eisenhower.

Frank Tursi’s history, The Winston-Salem Journal: Magnolia Trees and Pulitzer Prizes offers this and other newspaper timelines:

1885 Twin-City Daily, forerunner of the Twin City Sentinel began publication.

1897 Winston-Salem Journal begins publication.

1927 Winston-Salem Journal and Twin City Sentinel merge.

1974 Winston-Salem Chronicle serving black residents begins publication.

1985 Twin City Sentinel was dropped from the newspaper’s logo when it was absorbed into the morning paper.

Currently, like many daily newspapers, the Winston-Salem Journal delivers news on several platforms, in print, on the Web and in replica or e-editions.
Chapter Three

Wright Brothers take flight in N.C.

On December 17, 1903, at Kitty Hawk, North Carolina, Wilbur and Orville Wright completed the “first flight,” traveling airborne 120 feet in twelve seconds. They owned and operated a bicycle shop in Dayton, Ohio where they developed their mechanical skills repairing and building bicycles. Their success allowed time enough for other projects, such as their work on airplanes. They needed “constant wind” for their experimental flights. The National Weather Service in Washington, D.C. recommended Kitty Hawk.

Chapter Four

Diphtheria took toll

Because she was desperate for help to keep Cal breathing, Mother called the family doctor. Diphtheria derives its name from the Greek word for leather, “diphthera,” and refers to the suffocating sheath-like membrane that forms on the tonsils and in the nose and throat of those infected by the more serious form of the disease. It spreads person-to-person from direct contact and/or breathing secretions. A lesser form presents as skin lesions transmitted by physical contact or contact with items soiled by the lesions. Generally, the more toxic form leads to symptoms that include fatigue, fever, mild sore throat and problems with swallowing, and it may increase heart rate. Children may suffer from nausea, vomiting, higher fever and chills. Between 1900 and 1925, diphtheria infected about 200,000 people every year and killed 5% to 10%, mostly very young and very old.

Chapter Five

Doctors treat diphtheria patients

In the 1880s, after much experimentation, New York physician Joseph O’Dwyer designed and inserted tubes to relieve the suffocating effects of diphtheria, as an alternative to the surgical tracheotomies. Even though further research on treatment of diphtheria led to the development of an antitoxin in the 1890s and a vaccine in 1923 that was improved after World War II, communities without immunization programs continued to use O’Dwyer’s tubes until the mid 20th century.

In the United States, the very young and old suffered most from the suffocating effects of the disease. The mortality rate for diphtheria declined after the 1890s and dropped to nearly zero by 1950. In all, six cases were reported in the United States between 2000 and 2003, according to a Health Guide published online by the New York Times. Today, by 18 months of age, children receive four doses of DPT to combat diphtheria, whooping cough or pertussis and tetanus, and later, they receive boosters.
Chapter Six

Laundry consumed time, energy

Why was laundry called a “dreaded” household chore for women? Do you agree with the accounts that claim automatic washing machines liberated women more than any other invention? Electricity was not widely available until the 1930s, and, in the 1930s, the first automatic washing machines appeared.

Before the washing machine, large amounts of water had to be drawn to soak, wash and rinse the clothes. Clothes were gathered and soaked overnight in washtubs or wash pots. In the morning, women scrubbed the clothes by hand or with washboards, often using lye soap, which was harsh on hands. Scrubbed clothes were boiled in hot water while those tending the clothes stirred them with sticks. The clothes, heavy when wet, had to be wrung out and hung outside to dry. A heated brimstone or sulfur could be used in the drying process. In this story, heated brimstone was used to cleanse the air and prevent the spread of diphtheria.

Chapter Seven

Civic leaders support area hospitals

In the late nineteenth and early twentieth centuries, doctors made house calls. Hospitals served those who could not afford health care in their home. In Winston, a group of civic-minded women led by Aurelia Bowman Gray formed the Twin-City Hospital Association to support efforts to establish a local hospital. The mayor of Winston from 1887-1888, Martin Grogan, opened his home to ten patients who could be treated for $5 a week, but service there ended after three years for lack of funds. The women in the association persisted, raising $5000, and, in 1895, opened the Twin-City Hospital that served 19 patients. Twin-City Hospital closed in 1914, when City Memorial Hospital, a modern, fire-proof hospital, opened. Slater Hospital for African-Americans operated from 1902 until 1912. Simon Green Atkins led fundraising efforts for the hospital. To learn more about Winston-Salem’s early hospitals, visit http://www.digitalforsyth.org/photos/stories/early-hospitals.

Chapter Eight

Sawtooth housed textiles

Winston-Salem’s Sawtooth building, named for its jagged roof, started as Shamrock Hosiery Mill but, today, serves as a visual arts center. Brothers John Wesley Hanes and Pleasant Hanes started textile companies in 1901 with money earned from the sale of their tobacco company to R.J. Reynolds. John Wesley Hanes built the Sawtooth Building in 1911, producing men’s and boys’ socks with 25 machines. The operation expanded rapidly. Shamrock became part of Hanes Hosiery Mills Co. in 1914. By 1920,
the mill operating out of the Sawtooth Building specialized in women’s hosiery, but, by 1926, it outgrew its space, and the operation relocated.

Pleasant Hanes and his sons specialized in knitted underwear and built a spinning mill along what is now Stratford Road. A “mill village” grew up nearby. Hanes Knitting and Hosiery Mills Co. merged in 1965 to form Hanes Corporation. Hanes Corporation became part of Sara Lee Corporation but, since 2006, has operated independently as Hanesbrands Inc.

Chapter Nine

Streetcars serve Winston and populous N.C. towns

Almost every city with 10,000 people or over acquired an electric streetcar system from the 1890s to the 1920s. According to Walter Turner, historian for North Carolina’s Transportation Museum, “More than a dozen cities and towns in North Carolina acquired streetcars, usually operated and owned by electric utility companies or their subsidiaries. In most of these cities, streetcars transported riders to work and play while greatly influencing the establishment of suburban neighborhoods and recreation/amusement parks.” Typical fare was five cents. Open cars were used in the summer; closed ones, during winter. Winston’s first streetcar ran in 1890 and its last in 1936. Gasoline-powered buses and cars displaced streetcars by providing travelers with more convenient ways to travel.

Chapter Ten

Streetcars led to parks

In Winston, by 1907, streetcars ran in every direction from the courthouse. The lines united Winston and Salem, led to the fairgrounds and to Nissen Park, the end of the south line to an area that is today called Waughtown. The 30-minute ride to Nissen Park encouraged family outings for fun and relaxation. The park opened in 1900 and offered picnics, games, rides on a miniature railroad and a bowling alley and later included a zoo and movies. The park closed in the 1920s when cars and buses replaced trolleys as the preferred mode of transportation.

The name “Nissen” comes from the family of John Phillip Nissen whose business continued to manufacture wagons southeast of Salem in the Waughtown area into the 20th century. Nissen wagons carried travelers westward and hauled tobacco to markets.
Chapter Eleven

Tobacco thrives in Winston and Salem

Tobacco has been grown, bought and sold and tobacco products manufactured all in Winston-Salem and elsewhere in North Carolina. This map shows the concentration of tobacco mills in the Winston-Salem and Greensboro areas in 1896: [www.learnnc.org/lp/multimedia/10442](http://www.learnnc.org/lp/multimedia/10442)

Why did the tobacco industry thrive in Winston? LEARN NC quotes the dominant tobacco business leader, R.J. Reynolds, as crediting “railroad facilities” and Winston’s location in an area that grows the “finest tobacco in the world.” R.J. Reynolds grew up on a farm in Virginia where he learned the tobacco business, moved to Winston in 1875 and started his own company.

Many farmers in Forsyth and neighboring counties grew tobacco. The first chewing tobacco plant opened in 1872, followed by tobacco warehouses where tobacco was bought and sold. By 1878, Winston was home to twenty-one tobacco businesses and more came later, many absorbed into larger companies. Though the use of tobacco proves a controversial topic, Winston and other towns in North Carolina may rightly be called “tobacco towns” for the impact tobacco had on their local economies.

Chapter Twelve

Textile mills employ family members

In North Carolina textile mills grew from two in 1820 to 177 cotton mills and 40 wool mills in 1900 when only four states ranked ahead of North Carolina in the number of mills. By 1923, only Massachusetts outranked North Carolina.

Millhands who moved to the city to work in the textile mills left behind life on the farm. Factory work required that they rise early and usually work for ten to twelve hours, six days a week. White men received the best-paying jobs, followed by white women and black men; children performed the lowest paying jobs. Controversies centered on poor conditions, such as working long hours, earning low pay, breathing in dust from the machines, risking injury from working with machines and reliance on child labor. Many compared children’s work in factories to their work on farms. Children had worked with their families on the farm and, when all family members worked in the farms or factories, they remained together. Who would care for children if they were left alone while their parents worked?

[http://www.historync.org/textiles.htm](http://www.historync.org/textiles.htm)

[www.ibiblio.org/sohp/laf/factory.html](http://www.ibiblio.org/sohp/laf/factory.html)
Chapter Thirteen

Religious freedom and unity move Moravians

The Moravian Church, a Protestant Christian denomination, grew in Bohemia in the 15th century. Seeking religious freedom, members moved from Europe to what became Bethlehem, Pennsylvania in 1733. In 1753, twelve single brothers left Pennsylvania and settled in North Carolina on land called Wachau or Wachovia, after an estate held by the church’s patron and protector, Count Zinzendorf. Bethabara, Bethania and Salem became North Carolina’s first Moravian settlements.

Early Moravians ate, studied and worshipped in communal living groups, organized around age, gender and marital status. Little boys and girls under 12 and older boys and girls over 12, single “sisters” and “brethren” over 19 and married people made up separate groups or “choirs.”

One custom of Moravian Church is the celebration of a “love-fest” on Christmas Eve. The celebration involves singing songs, sharing food, drink and fellowship and the lighting of candles. The women of the church dress in white and serve sweet buns, and the men serve hot drinks. The service ends with the lighting and lifting of candles, the singing of a song of praise and a blessing from the bishop. Each person is challenged to serve God and help one another in the coming year.


Chapter Fourteen

South consolidated its rail system

Walter Turner, historian at North Carolina’s Transportation Museum located in Spencer near Salisbury in Rowan County, explains how the town of Spencer acquired its name and distinction. The town honors Samuel Spencer, the first president of Southern Railway. Spencer served in the Confederate army, and, after the war, he left his native Georgia and his father’s cotton business to study engineering at the University of Virginia. He understood that a unified rail system would allow for the efficient transport of people and products and speed the South’s recovery from war.

Spencer learned about the business by holding a variety of posts with different railroad companies. He agreed to serve as president of Southern Railways after J.P. Morgan, a wealthy New York banker, agreed to fund its creation. Washington, D.C. served as the company’s headquarters. “Spencer Shops” was established on the rail line halfway between the District of Columbia and Atlanta as a place for the company to maintain and repair its steam locomotives and rail cars. The nearby town for white workers and their families became Spencer, and a separate area for black workers and their families became East Spencer. By 1960, “Spencer Shops” was downsized because it could not adequately service diesel locomotives, which had replaced steam. The railroad gave the site to the State of North Carolina for use as a transportation museum.
Chapter Fifteen

Prosthetics shift from metal and wood to high tech

Dictionaries explain that the word “prosthetics” derives from the Greek word for “addition” and define prosthetics as the replacement of body parts that includes the making and fitting of limbs. In their name, associations that promote the science involved with prosthetics include “orthotics” which is the support or supplement of weakened or abnormal joints and limbs. Lower extremity prosthetics refers to replacement of limbs located at or below the hip, often differentiated as above the knee (AK) or below the knee (BK).

The earliest known artificial leg, made of iron and bronze with a wooden core, dates to 300 B.C. Frenchman Ambroise Pare became known as the father of modern for engineering devices that allowed the limbs to move and function. Returning home after having his leg amputated, Confederate soldier James Hanger developed a wooden leg with a hinged knee and foot and established a business with his sons to serve other Civil War veterans. John Sabolich advanced the science in the 1980s with the development of a socket that allows step-over-step walking. Today’s devices depend on lighter materials such as plastic and aluminum and the use of microprocessors, computer chips and robotics.

Search your newspapers’ Web pages using key words such as “amputate” and “prosthetics” to learn what causes individuals today to need prosthetic devices and what issues affect availability and effective use of the devices.

Chapter Sixteen

Urban areas receive electricity first

From a perch in her special tree, Helen admires Alan’s glowing lanterns operated by battery and reminds readers that electricity was not available to homes as it is today. Electricity arrived in Winston and Salem in 1887, but the distribution of electricity that allowed for industrial development took hold in 1897 when Winston’s Board of Commissioners awarded the franchise to Fries Manufacturing and Power Company. Henry E. Fries, mayor and commissioner of Salem and head of Fries Manufacturing and Power, built Idol’s Dam and Power Plant on the Yadkin River where a man named Idol had run a ferry. Early hydroelectric power gave Winston and Salem a competitive advantage over nearby cities.

While cities such as Winston developed power sources, rural North Carolina remained mostly dark. Nine out of ten rural homes lacked electricity until 1930s. To spread electricity, the Rural Electrification Act in 1935 passed as part of the New Deal and spawned the development of electric cooperatives.
SOURCES of INFORMATION/ Websites accessed May/June 2010

Winston-Salem history


http://twincitysentinel.com/content/view/36/60/ (timeline)

http://www.digitalforsyth.org/photos/2754 (Sawtooth bldg.)

http://www.cityofws.org/Home/DiscoverWinston-Salem/History/Articles/WinstonMayorsBiographies

Gray’s Graylyn: www.winstonsalemmonthly.com/index.php/previous-issues/features/grays-legacy/

http://extras.journalnow.com/lostempire/tob6b.htm

http://books.google.com/books?id=oQTmb8DBvIMC&printsec=frontcover&dq=Tursi+history&source=bl&ots=S3V69uWq5D&sig=YdRZs6QOdMjD_aftKLUHUSUePU&hl=en&ei=BR7rSaMLagIAeMu6WcBA&sa=X&oi=book_result&ct=result&resnum=2&ved=0CCAQ6AEwAQ#v=onepage&q&f=false (Frank Tursi’s history)


Moravians/ Salem history

http://aos-world.org/atsea/letters/lovestfest.pdf (lovefest or lovefeast)

Bethabara Park tells the story of Salem’s founding

http://www.learnnc.org/lp/multimedia/8245

http://www.learnnc.org/lp/editions/moravian-diary/?ref=search


http://www.learnnc.org/lp/multimedia/12084 (african american moravian churches)


http://www.moravian.org/history/

www.moravianmusic.org

God’s acre cemetery in Old Salem: http://www.learnnc.org/lp/multimedia/11459
Squab

A young, newly hatched, or unfledged pigeon. [http://www.answers.com/topic/squab]

Wright Brothers

[http://www.learnnc.org/lp/editions/nchist-newcentury/5089]

Diphtheria


Dr. Joseph O’Dwyer invented the tube that treated diphtheria patients:

[http://www.case.edu/artsci/dittrick/site2/museum/artifacts/group-b/b-3intubation.htm]

[http://www.springerlink.com/content/j3581q1843h58372/]

This website provides charts that show deaths by diphtheria in 1910, slightly over 200 deaths per 100,000 and also show that deaths declined as a result of treatments for the disease.


[http://www.drlera.com/bacterial_diseases/diphtheria_.htm]


[http://www.newadvent.org/cathen/11212d.htm]

[http://www.newworldencyclopedia.org/entry/Diphtheria]

Washing method

[http://www.montanaheritageproject.org/edheritage/1910/folkways/laundry.htm]

Sewing machine

http://wiki.answers.com/Q/Where_was_the_sewing_machine_invented


http://sewingmachine221sale.bizland.com/store/page19.html (treadle photo)

http://inventors.about.com/od/starinventions/a/sewing_machine_2.htm

http://www.singerco.com/company/history_pf.html

http://www.ismacs.net/sewing_machine_history.html

Brimstone

Online dictionaries simply define brimstone as sulphur. The word derives from Middle English brinston, probably from birnen to burn + stone.

Biblical references to brimstone generally refer to punishments: http://www.answers.com/topic/fire-and-brimstone

Growth of cities/industrialization in North Carolina

www.learnnc.org/lp/editions/nchist-newsouth/4708 (cities)

http://www.learnnc.org/lp/editions/nchist-newsouth/4745 (industrialization in NC)

Child labor

http://www.learnnc.org/lp/editions/child-labor/?ref=search

http://www.historync.org/textiles.htm

www.ibiblio.org/sohp/laf/factory.html

Textiles and Winston-Salem

http://www.historync.org/textiles.htm

www.ibiblio.org/sohp/laf/factory.html
Mill towns, map
www.waywelivednc.com/maps/historical/textile-mills.pdf

Tobacco
http://www.learnnc.org/lp/editions/nchist-newsouth/5505
http://www.learnnc.org/lp/editions/nchist-postwar/6300 (video on growing tobacco)
The map shows location of tobacco mills in 1896 with largest number in area around Winston and Salem
http://www.learnnc.org/lp/multimedia/10442

Trains
www.nctrans.org
http://www.newsobserver.com/2010/06/06/515189/all-the-live-long-days.html?storylink=mssearch
(story by staff writer, JOHN BORDSEN published in June 2010 about the NC Transportation Museum in Spencer)
http://www.ncmuseumofhistory.org/collateral/articles/s05.naming.nc.railroad.town.pdf
http://www.investors.com/NewsAndAnalysis/Article.aspx?id=509451

Streetcars
http://www.learnnc.org/lp/editions/nchist-newcentury/5086
http://www.cmhpf.org/development%20of%20streetcar%20systems.htm
See pages 16 and 18 for photos of trolleys and explanations about Nissen Park:
Nissen Park with trolleys in the background: http://www.digitalforsyth.org/photos/12140

The website below offers history about Washington Park Historic District which developed around a streetcar line and about Waughtown-Belview Historic District which included Nissen Wagon Works and Waughtown Cemetery. The southern part of Belview served the African-American community with a school, businesses and orphanage.

http://www.ci.winston-salem.nc.us/Home/Departments/Planning/HistoricResourcesCommission/Articles/HRCNationalRegisterDistricts


Early Hospitals

http://www.learnnc.org/lp/editions/nchist-newcentury/5784
http://www.digitalforsyth.org/photos/stories/early-hospitals


Prosthetics

http://en.wikipedia.org/wiki/Prosthesis
http://en.wikipedia.org/wiki/Artificial_limb
http://en.wikipedia.org/wiki/Prosthetist
http://csmt.uchicago.edu/glossary2004/prosthetics.htm
http://www.amputee-coalition.org/inmotion/nov_dec_07/history_prosthetics.html
http://www.nytimes.com/2008/07/02/sports/olympics/02cheetah.html?fta=y
Electricity

http://www.learnnc.org/lp/editions/nchist-newcentury/5739

New Bern’s electricity, reprinted from newspaper:

http://www.learnnc.org/lp/editions/nchist-newcentury/5085

Washington’s electricity

http://www.ci.washington.nc.us/electric_history.aspx

Raleigh

http://www.nps.gov/history/nr/travel/raleigh/earlyhistory.htm

Electricity was commonplace in cities by 1930s:

http://www.learnnc.org/lp/editions/nchist-worldwar/5832

As late as the mid-1930s, nine out of ten rural homes were without electric service. The Rural electrification Act in 1935 passed as part of New Deal.

http://www.wemc.com/history.aspx

NC Electric Cooperatives

http://www.ncelectriccooperatives.com/electricity/default.htm

Click on “About Electricity” and on “The Path of Electricity” for a science lesson on how electricity works.

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