

Lawson Tower: a View with a Thrill

SCITUATE, MASSACHUSETTS

CASE STUDY: February 2013

Historical Background

The town of Scituate, Massachusetts, is nestled on the East Coast, between Boston and Plymouth. One of its most famous residents of the late 19th - early 20th Century was self-made millionaire, the renowned "copper king" **Thomas W. Lawson**. Sailing enthusiasts might recall the famous seven-masted schooner the "Thomas W. Lawson", built in 1902 to transport coal and oil. The famous schooner was the only seven-masted schooner ever built, and was only one of the businessman's many projects. Lawson also dabbled in mining stocks, champion thoroughbreds, bulldogs and chrysanthemums.

In the late 19th Century, Lawson bought over 300 acres from various owners in Scituate and set about constructing his extravagant "Dreamwold" estate. His intent was to construct both residential and farm buildings to the highest quality standard possible. Buildings included the fancy main estate mansion, horse barns, a dog kennel and gatehouse. Cedar shingles were prominent on all the building designs. His wife, **Jeannie Lawson**, was thrilled with the progress being made until in 1901 when the Scituate Water Co. decided to build a 276,000 gallon water tank in the town center. She saw this as quite the garish monstrosity, and urged her husband to do something about the ugly structure now obscuring her pastoral view.



Thomas W. Lawson

Photos courtesy
of Scituate
Historical Society



Lawson's famous seven-masted schooner



Len Taylor Jr., of Taylor Forest Products, Certigrade® shingle retail distributor
Photo: Tony Bonura

Lawson, a clever businessman, wasted no time in getting to work. From his own pocket, he commissioned an architect to research European tower structures. And this was not some simplistic library research. In fact, Lawson actually sent his architect to Europe. The Rhine River proved to be fruitful territory, and the architect presented a handsome sketch of a 15th Century watch tower for the Lawsons' approval. In 1902, the Lawson Tower was constructed, funded entirely by Thomas Lawson. The Lawson Tower enclosed the water tank, thus providing his wife with a much improved view of her estate! Scituate was settled in the 17th Century and formally incorporated in 1636. The first settlers were the *Men of Kent*, English immigrants renowned for their "loyalty, gallantry and courtly manners." (Courtesy **Old Scituate**, D.A.R., 1921, page 3). These refined gentlemen were part of the best class of their day, famed for their elegance, higher education and considerable fortunes. Due to their influence, Scituate soon became the largest and wealthiest town in Plymouth County.



Photo: Scituate Historical Society

The town was particularly noted for shipbuilding on the North River; skilled craftsmen were responsible for building more than 1,000 wooden ships. One of the ships was named The Columbia, the vessel which actually lent its name to the famous Oregon River. These talented shipbuilders may have lent their expertise to the Lawson Tower project, as demonstrated by the freestanding tower's beautiful joinery and truss work. One can still see the rope surrounds on local homes' front doors, a testament to Scituate's connection to the sea.

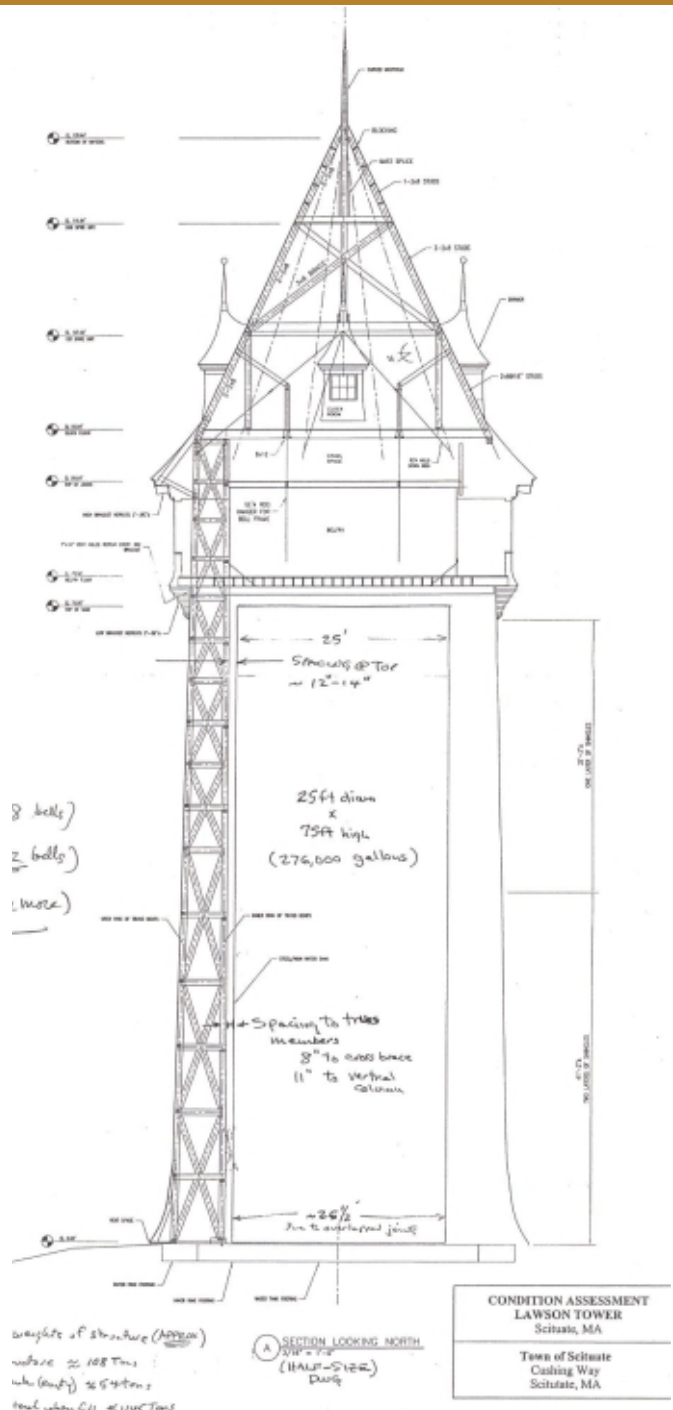


Photo: MacLeod Consulting

A full century has now passed since the tower was originally constructed, and many of the estate lands are now filled with houses. Nevertheless, Scituate has always had a certain 'tone' to it; residents are very keen on maintaining the town's historic identity and unfinished cedar shingle sidewall products are still a large part of the area's charm. **Dana Green, Clerk of the Works for the Town of Scituate**, managed the latest Lawson Tower restoration project. Green stated that "... wood is the catalyst to make an area look really nice. Some

may think that other things are more quick and easy, but they don't have the same character as cedar shingles." **Cedar Shake and Shingle Bureau ("CSSB")** members and representatives wholeheartedly agree.

An Amazing Architectural Achievement

It was on a sun-drenched day in 2012 when **CSSB District Manager Tony Bonura and Director of Operations Lynne Christensen** paid a visit to the magnificent Lawson Tower. On approaching the town of Scituate, the structure looms ahead, dwarfing everything in sight. Lawson Tower is a project that really defies the ordinary. 153 feet tall at the tip of the wind-vane pole, it has 123 narrow, winding stairs, 240 squares of **Certigrade® Western Red Cedar (WRC) shingles** and 108 years of history. What once shielded a wealthy woman from an eyesore, is now listed on the National Register of Historic Places. Lawson Tower is both a famous landmark and a tourist attraction, known simply as "the most beautiful, most photographed, and most expensive Water Tower in the United States" (Courtesy Scituate Historical Society).

Certigrade® Products Selected

CSSB member manufacturer **ML Cedar Company I** produced all the **Certigrade® shingles** used on the 2007 job.



*Delivering Certigrade® product to the job site
Photo: Taylor Forest Products*

CSSB Member **Len Taylor, Jr.** and his father **Len Taylor, Sr.'s** company **Taylor Forest Products** supplied all of the 16 inch (bell tower and conical shaped roof) and 18 inch (tower barrel section) untreated, naturally durable **WRC Certigrade® shingles**.

*Special Recognition is given to to the late **Nanne Taylor, Len Taylor, Sr.'s** wife and Len Taylor, Jr.'s mother, for spearheading the Taylor family's strong support for this historical project.*

Installation Challenge

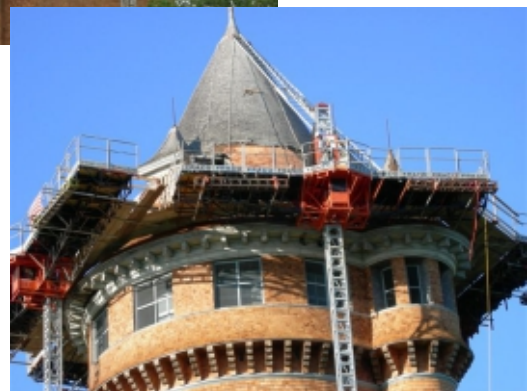
Lawson Tower was re-shingled in 1974 and is an architectural award winning structure.

MacLeod Consulting wrote a condition survey in November 2000 and urged several major repairs, including another re-shingling effort.

CBI Consulting Inc. provided Designer Services in 2005. All firms involved in the project urged top notch craftsmanship and care to maintain this treasured historical structure. The Town of Scituate is commended for preserving such a valuable historical landmark; Community Preservation Act ("CPA") monies funded the bell restoration. CPA is a state program where a town agrees to put two percent of its tax dollars into local historical and recreational structure/space maintenance. The State of Massachusetts then matches these funds. In addition, the recent six-figure cedar re-shingling project was financed with Massachusetts Bay Transport Authority Greenbush line [commuter rail] mitigation funds.



*Both photos:
Taylor Forest Products*



Safety scaffolding



Near the turrets



Dedicated crew members

All 3 photos: Campbell Construction Group, LLC



Detail work

Local **Campbell Construction Group, LLC**, owned by **David Campbell** of Peabody, MA, had a six-person roofing crew on site most days and received many accolades for keeping up the quality levels on the lengthy project. Safety was of utmost importance. **Fraco brand** scaffolding was bolted to the building and moved up in stages as work progressed. Guard rails were also part of the worker fall prevention system.

The circular design of the structure presented some interesting challenges to the shingling crew. The tower is flared at the bottom and the roof is conical in shape, blending in to the wooden weather vane post at the top. A staircase tower of different diameter from the main structure sits to the right and is also flared at the bottom.

Access to the narrow stairwell is via a gothic-style door off to the side. Shingles were double coursed on all surfaces up 40 feet from the bottom flare. No shingles on the barrel section of the tower were steamed. This job benefitted from modern technology – laser sights, instead of water levels, were used to keep courses even.

At the top, craftsmen individually carved the pole in the shape of shingles for the last few turret courses; this took a great deal of skill and bravery so high up from the ground! Thankfully the weather cooperated for most of the two month project duration. Being so close to the ocean, there were some concerns about wind, however, the work was completed during the summertime and no major gusts were reported. A lovely garden surrounds the structure and is dedicated to the late **Paul Miles, Lawson Tower's dedicated Project Manager**, who oversaw the entire project from partial water tank removal to the re-shingling task.



123 stairs - a fitness challenge, Photo: Scituate Historical Society



Intricate curved gothic door leads to staircase. Both door and hand-forged hinges and strapping were made on the Dreamwold estate. Photo: Tony Bonura

Bells Heard Across Town

The **Meneely Company** of Troy, New York, cast the bells for Lawson Tower in the early 20th Century. Scituate owes a debt of gratitude to Eagle Scout candidate **Joe James III**. He chose to focus his badge earning service project on restoring the tower's console system that allowed for the bells to be played from the ground level console room via 10 wooden levers, connected to the top of the tower by chains and pulleys.

At the apex of the tower are the bells, accessible by circular staircase. Beneath the roof is the clock, for which the largest bell plays on the hour. The largest bell weighs 3,000 pounds and has a diameter of 52.5 inches. The collection of bells peal with 2 - 8 bells, chime with 9 - 22 bells and present a carillon when 23 or more bells play. Currently, someone goes up to the tower once a week to wind the bells so they play at the right time. Today the bells play a delightful medley on special occasions, further reinforcing Lawson Tower's reputation as an important landmark.

Interested in Visiting?

Inside the tower there is a walkway around the original water tower footprint. All that's left now of the original water tank is 10 feet or so of the metal shell, enough to maintain its place as an American Water Landmark. Look up, and one sees 80 - 100 feet of latticed truss work leading up to the bell deck.

An observation deck is many steps up the narrow staircase. It is often noted that one understands one's level of physical fitness when reaching the top!

Lawson Tower is open three Sundays and Heritage Days weekend each year. There must be a high number of fit people in Scituate as the line always snakes around the building on opening days.

Lawson Tower is also open for school groups, visiting foreign student groups, and other interested parties.



*Interior truss work - looking up to bell deck
Photo: Scituate Historical Society*



*Lawson Tower,
larger than life
Photo: Tony Bonura*



Photo: Tony Bonura

Conclusion

Lawson Tower has survived some remarkable periods in history, including the Great Depression, both World Wars, the Cold War, Kennedy's Camelot era and the Computer Age. The residents of Scituate have good reason to be proud of their town, resplendent in sidewall cedar shingles and brightly colored front doors. Wood is a lovely architectural element that brings both warmth and a classic look to this area; property values have increased as a result. Visitors are drawn to areas with unique histories and fascinating structures. Likewise, the **Cedar Shake and Shingle Bureau** actively seeks to profile unique, **Certi-label™ shake and shingle** projects, and Lawson Tower is a perfect

match. Mere words really cannot do justice to this massive, imposing and elegant structure. One simply must visit Scituate, hear the bells peal, and climb all 123 stairs in order to gain the full experience.

**** Special thanks to Dana Green of Green and Robinson, Inc. and Carol Miles, Archivist, Scituate Historical Society, for their kind assistance and sharing of project facts and history. Kind recognition is also offered to Tom Hall, keen case study project advocate from the very start.****



Written by:

Lynne Christensen is the CSSB's Director of Operations. She has worked for the CSSB since 1998 and is involved in a variety of departments with a focus on marketing. Christensen holds a Master of Business Administration degree as well as the Certified Association Executive credential. She resides in British Columbia.



Photos by:*

Tony Bonura is the CSSB's District Manager, Northeast. He has over 40 years sales, marketing and technical experience in the forest products industry and shares his immense knowledge with a wide range of marketplace participants. Bonura is the Past Chairman of the Joint Forest Products/Coatings Committee, headquartered at the Forest Products Laboratory in Madison, WI. He resides in New York State.

*Photos also credited to other sources throughout article

Do you have a Certi-label™ project that qualifies for a case study article?
Email Lynne Christensen, Director of Operations, with more details. While we can't promise to profile every project brought to our attention... we do try our absolute best!