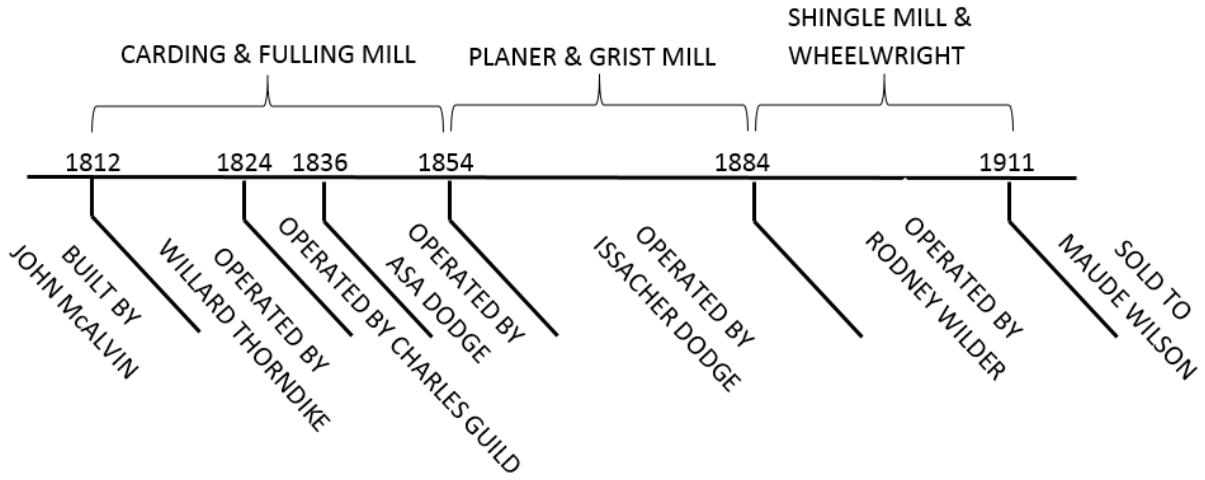
THE FRANCESTOWN HERITAGE MUSEUM

Newsletter **AUGUST 2019**

The Mills #2 - III

In this issue we will conclude the on-going review of the McAlvin Mill started in the June and July issues of this newsletter. This is Mill #2 on our map of Francestown Mills - The McAlvin Carding and Fulling Mill. While this was built as a carding and fulling **mill** it was converted to several other uses during its lifetime. This newsletter will focus on the mill's final conversion from a planer and grist mill to a shingle mill and wheelwright mill. This final conversion took place in 1884 when the mill was sold to Rodney Wilder who ran it until 1911 when it was sold for the final time and ceased operation – a 100 year run.



We have discussed the impact of the Industrial Revolution and the construction of the Manchester Amoskeag Mills as a factor in the decision to cease operating this McAlvin mill for carding and fulling of wool and repurpose the mill into a grist mill. But again in 1851, mechanization and better means of transportation (the train) made it possible to send harvested grain to larger, more central mills where it could be processed more economically than in local grist mills. So once again it became necessary to repurpose the mill for making shingles. This was due in part to life improving and better buildings being built so the need for shingles for the walls and roofs became more and more important. To convert a grist mill to a shingle mill it was only necessary to change the equipment in the mill as the entire water power assembly was also suitable for this new use as a shingle mill and to operate equipment for a wheelwright. While many are familiar with what takes place in a grist mill, a shingle mill was not as common.

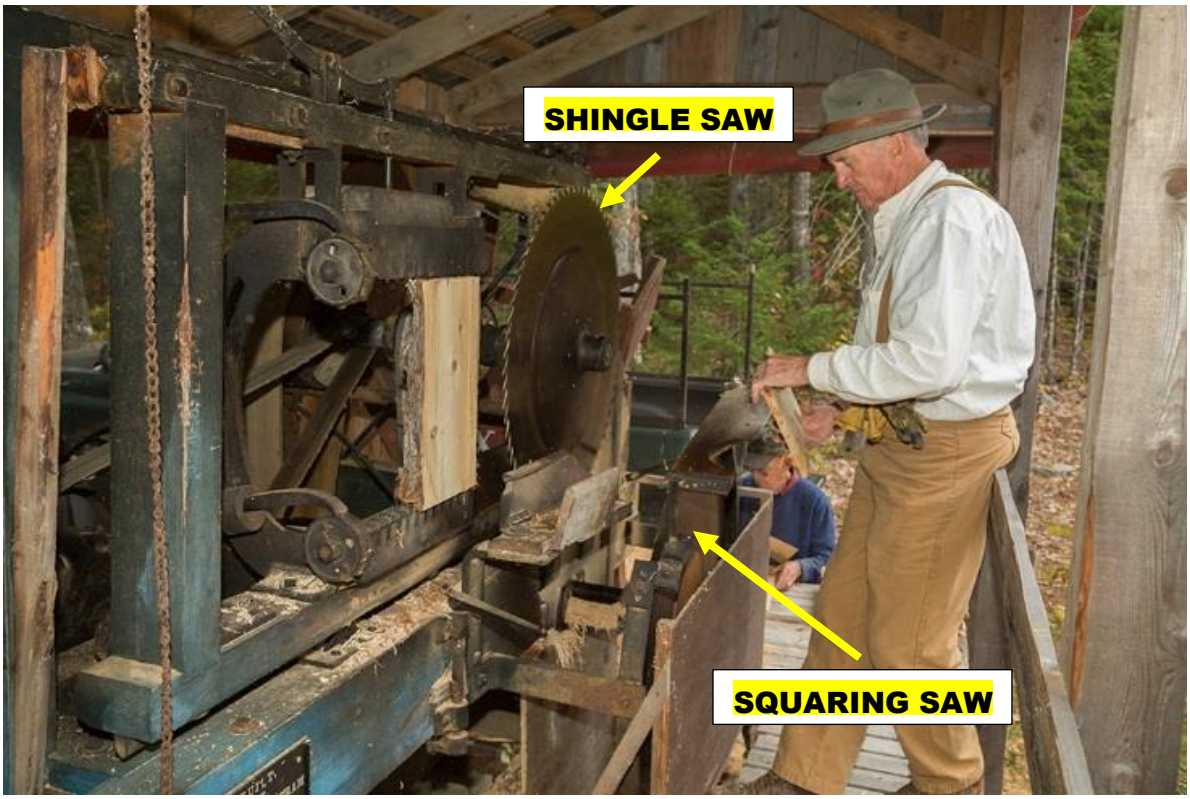
This and the past two newsletters have looked rather deeply into the actual workings of the mill which may not be especially interesting to many. The purpose was not to bore everyone to death but give all a better appreciation for how challenging life was for our ancestors and how they rose to these challenges. Take a loaf of bread; when our ancestors wanted bread they had to give thought to planting and harvesting the wheat. This in itself required owning, caring for and the ability to utilize a horse. The grain then had to be harvested and hauled to the grist mill (hitch up the horse again). We are assuming that in the interim they and their neighbors had the where-with-all to build and outfit a grist mill. Once the grist was ground they then had to haul the heavy bag of grain home (bless that horse – those bags were heavy). So now they could get around to actually baking the bread. So the women started on the bread dough while the men went out to chop some firewood for the stove oven and haul that back to the house (go get the horse again).

Let's see, we've got the grain flour so we'll add some eggs – oops, dear – you did raise the chickens and get us some eggs didn't you? Oh, and we'll also need some milk, dear – you did raise a cow and milk it didn't you? Finally, the loaf of bread is ready (it's only taken a year to get everything in place) so we'll just set it on the windowsill to cool and we'll churn some butter for it while we are waiting. They could already taste the fresh bread – hey, catch the darn dog, it just made off with the loaf.

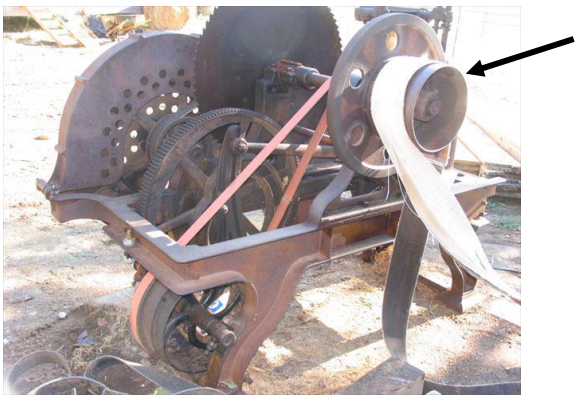
You, the reader, on the other hand have only to remember where you left the keys to your car so you can go to Delay's Harvester and choose what you want from a variety of loaves of bread. Ah, the good old days!

THE SHINGLE MILL

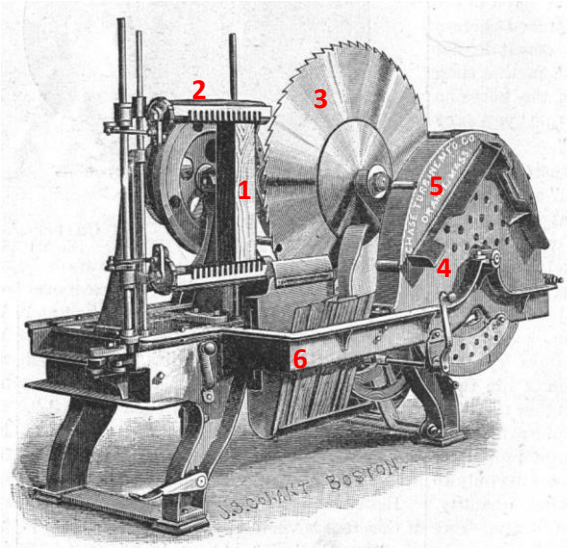
A more dangerous piece of equipment would be hard to imagine. Picture yourself standing directly in front of a spinning 36" saw blade while immediately next to your right arm was yet another spinning 36" saw blade. Both of which you must operate simultaneously. Don't forget, there was no OSHA in those days – guards, what guards? Missing in this photo is the mug of hard cider. But we digress.



As with all the previous uses of the mill, the shingle mill itself is driven by water power with a series of leather belts connecting the shingle mill to the main drive from the water wheel. In the photo at right, the large pulley and belt are what makes the actual connection between the shingle mill and the main drive from the water wheel. Other belts drive additional parts of the machine.



A cedar log (1) between 16” and 24” in length is inserted into the mill carriage assembly (2). This assembly moves back and forth along a rail carrying the log through the shingle saw (3). This carriage also cants the log slightly backward on one pass and they slightly forward on the next pass which is what gives the shingle the taper that you see. The operator then takes the shingle off the shingle saw with his left hand (often with the back of his knuckles against the spinning saw blade) and transferring it to his right hand places it on the shingle rest (4) and pushes it into the squaring saw blade (5) - hopefully stopping before his fingers reach the blade. He then flips the shingle over and reinserts it to square the other side. While completing this squaring, his left hand is again pulling the next shingle off the blade of the first saw so he can repeat the process. Please note that the above description uses the male gender as most women aren’t silly enough as to engage in an activity this dangerous. Also please remember that during this entire task the operator (he) is working on that mug of hard cider (or can of Budweiser these days) which is usually found sitting on the shingle holder (6). The photo on the right is the actual shingle mill at Sanborn Mills Farm in Loudon, NH – another good reason to visit that historic site and see this in operation http://www.sanbornmills.org

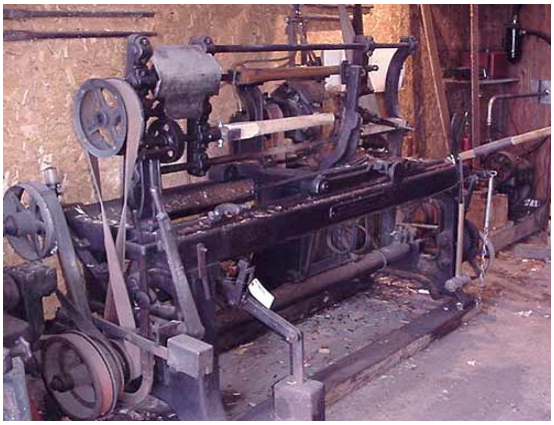


THE WHEELWRIGHT SHOP

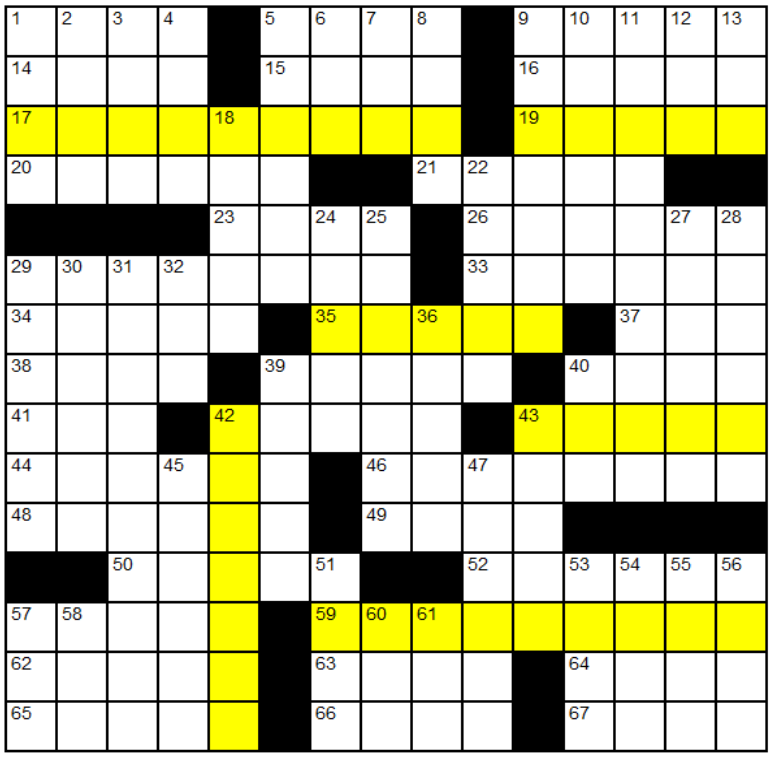
By now the readers of this monthly newsletter are probably getting pretty sick and tired of the McAlvin mill so we will limit the description of the Wheelwright shop and save that topic for some future newsletter.

Suffice it to say that in 1884 when this mill received what turned out to be its last repurposing and the shingle mill went into operation they also started to carry on the work of a wheelwright. A wheelwright shop manufactures and repairs the old wooden wheels found on the carts, wagons and carriages of those days. It is essentially a woodworking operation whose equipment was also operated by belts driven from the water power of the mill.

MILLWRIGHT WHEEL SPOKE LATHE



As in the past, this puzzle also contains theme words (in yellow blocks) taken from the text of the newsletter



Across

1. Offspring of a donkey and horse
5. Smooth talking
9. Tears down a building in London
14. Face-to-face exam
15. Abominable Snowman
16. Host
17. Adapt for a different use
19. Made by wheelwrights
20. Italian west coast port
21. Indy entrant
23. Expert
26. City on the Rio Grande
29. Person making a sharp, piercing sound
33. Naval Academy entrants
34. Enclosed yard
35. woodworking machine
37. Old English often
38. At hand
39. Large jib on a racing yacht
40. First King of Isreal
41. Spread or turn
42. 60's protest
43. Trigger, for one
44. Ages
46. Seperate pipes
48. Lively intelligence
49. Children's ___
50. Perfect, e.g.
52. Chronic airway disease
57. Con game
59. Perilous
62. Control ___
63. Alcoholic drink
64. "@#$%!," e.g.
65. Fish
66. Frightening: Var.
67. Deuce topper

Down

1. Between dawn and noon
2. Component of urine
3. Arctic native
4. Jewish calender month
5. Component of plaster
6. Fifth sign of the zodiac
7. "___ De-Lovely"
8. Coffin frame
9. Weigh again
10. Current amount
11. The Green Monster
12. "A rat!"
13. Decern visually
18. Fit for a monarch
22. Opposite of Omega
24. Found a new tenant for
25. Radioactive material
27. Render harmless
28. Horse handler
29. Member of the Sioux group
30. Heebie-jeebies
31. Take as one's own again
32. Home to a lobe
36. 1,000 kilograms
39. Substance of speeches
40. Costa del ___
42. Type of wooden siding
43. Put up
45. Space between merlons
47. Having sharp projections
51. Halftime lead, e.g.
53. Bring (out)
54. Frost
55. Quiet
56. Far from ruddy
57. Marienbad, for one
58. "The Joy Luck Club" author