

## Volunteers Needed!!!

Homestead Players are in need of a "Willing and Able" volunteer to set up engagement dates for the upcoming season. Duties of this individual will include scheduling dates, times, locations, facilities, and possibly dinner theatre arrangements.

Homestead Players are also in need of a "Willing and Able" volunteer to act as general chairperson for a major fund raising event for fall of 1985. The fund raiser is necessary to continue to meet the operational expenses of this reader's theatre troupe. The publicity committee and transportation committee could also use extra helpers. If you are interested in "pitching-in" in any of these capacities please contact Jan at the museum 345-4154 or Betty Cords at 278-4128.

## Women's History Week Programs

We are pleased to be sponsoring a noon-hour program from 12:15-12:45 pm, Tuesday March 5, 1985, at Minnesota Valley Regional Library. Ms. Suzanne Bunkers, associate professor of English at MSU will speak on "19th Century Midwestern Women's Diaries: The Search For Self." Ms. Bunkers will focus in on the diary of Martha Smith Brewster, who's diary is part of our BECHS archives collection.

That evening, from 7:00-8:00 pm, at the Minnesota Regional Valley Library, we will offer two films on women from Minnesota. The films are entitled "Homeward Bound, Women in The Family in Minnesota History" and "Collagé, Minnesota Women in the Arts." Please come join us for these fine events.

## Valentine Party

On Monday, February 11, 1985, the BECHS staff will be hosting a "Create an Ole Time Valentine Party." Children grades 1-6 are invited to attend from 3:30-4:30 and must be accompanied by an adult. A brief history of Valentines will be presented and a display of Valentines from our collection will be on exhibit. Materials and refreshments will be offered at no cost to participants. Come join us!

## From the Director's Rolltop . . .

Denise Hudson

As I look back on 1984 and recall all the activity and accomplishments of the Society and the Museum I realize just how busy we were. The items that come to mind (not in chronological order) are probably not all that was done here.

1. Completion of the travelling exhibit -- "Harnessing the Power: Building of the Rapidan Dam" and sending it out to various towns.

2. Beginning the vast task of placing the textiles and small artifacts in special acid-free storage boxes and creating new storage areas plus insuring that all paperwork and files are complete on each item.

3. The exhibit "Changing Babies Clothes" was placed in the front parlor.

4. "When We Were Young" performed by the Homestead Players travelled to nine locations throughout the county. (The credit for the success of the production must go to Betty Cords for her energy, enthusiasm, and creativity; Marion Powers for her original idea; Susan Chambers and the entire cast.)

5. Successful events of the Harvest Festival, Bazaar, and exhibit at the County Fair, plus two bus trips in cooperation with other groups.

6. The creation of the position of Public Services Director under the grant from the George M. Palmer Foundation.

7. Converted three former exhibit rooms into much needed storage space for our ever growing collection.

8. Revised the tour for Kindergarteners to include various "hands-on" activities.

9. Instituted a committee structure of the Board to enable more work to be done outside of the monthly meetings.

It was a busy and productive year -- we have even bigger plans for 1985!!!

*Denise*

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# Blue Earth County Historical Society

## February 1985

### We're On The Move . . .

The staff of the Blue Earth County Historical Society is pleased to announce that the number of people visiting, requesting research materials, and making other inquiries was on the upswing in 1984. For comparison:

Walk-in Researchers	1983 - 173
	1984 - 226
Other Inquiries	1983 - 247
	1984 - 221

Totals for 1984:

Visitors	5,133
Guided Tours	108
Research and Other	447

Let us all continue to encourage people within the Blue Earth County area to utilize our museum facility, tour options, and research resources in 1985. We are excited to now offer a travelling exhibit such as the "Harnessing The Power-Building The Rapidan Dam, 1910." We are currently working on implementing slide/tape programs and more travelling exhibits.

## Calendar

Feb. 11	<b>"Create A Valentine Party"</b>
Feb. 18	<b>President's Day</b> (Museum closed)
Mar. 4-8	<b>Women's History Week</b>
Mar. 5	<b>Women's Diaries Program</b> (details in newsletter)
Mar. 5	<b>Minnesota Women's Films</b> (details in newsletter)

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## BURNING THE STONE

The massive limestone terrace that floors a large part of the Minnesota River valley from Mankato to Kasota, has been a source of building material for a long period of time. Quarrying and processing of structural and dimension stone, in the Blue Earth County part of the terrace, has gone on for about 130 years. However, the closely related activity of limemaking or "burning the stone" lasted only some 85 years and then completely disappeared. The only physical evidence of its existence today are two old limekilns; the last of eleven, which were once in operation at various times and located at different places on the rock formation in the city of Mankato and Lime Township.

Not all of the quarry operators became involved in limemaking, but those that did provided a much needed mortar material that was used by stone masons and bricklayers alike. The "burning of lime" went on from 1853 to about 1925, and again from 1930 to 1939. And over those years, it was an important segment of the limestone industry. Leo Jefferson, a pioneer quarryman and limemaker, summed it up this way, "some of us old-timers had a lot to do with providing the stone that was used to build much of this town, and we also made the lime mortar that held it together."

Although limemaking developed along with the building stone industry, it never rivaled the latter in scale of operations and generation of revenue. During the early years, a cord of limestone sold for several dollars while a barrel of lime was worth only fifty to seventy-five cents. And though this may seem to be a very low price, the income from lime sales was often needed by the quarry owner or manager to keep his business profitable.

Limestone quarry progressed rather slowly from the 1850's to the late 1860's. At first, there were only three quarries being worked in the rock terrace area of Mankato. But at each of these there was a limekiln, further suggesting that lime was needed as much as building stone in the growing community and elsewhere.

By the 1880's and 1890's, railroad construction in this part of Minnesota and northern Iowa created a tremendous demand for bridge and culvert stone, and lime for mortar. Mankato became a major supply center for all of these items, and the limestone industry experienced an unprecedented business boom. The number of stone quarries increased to sixteen and there were ten

limekilns in operation. And the output of these kilns made Mankato the second most important lime producing community in the state. Red Wing ranked first, based on the statistics available, but it barely deserved that rating.

The boom was not destined to last. Between 1900 and 1910, development of concrete, utilizing Portland cement, brought about drastic changes in construction. The railroads were affected immediately and their demand for stone and lime decreased to almost nothing. The new materials were superior in many ways to limestone blocks and mortar made with ordinary lime. And in addition to that, Portland cement was not only preferred by stone masons on the railroad projects, but it was also widely accepted for use in home and commercial building construction.

Needless to say, the limestone building material business went into a deep slump. By 1915, economic conditions were very bad. Most of the quarries were closed, limemaking dropped off severely, and only the larger firms managed to stay open by reducing operations to a minimum.

Fortunately, the "stone depression" did not last very long. By 1919, the limestone industry was making a strong comeback. The building stone people became more innovative and developed new kinds of dimensional and decorative stone which were widely accepted by architects and builders. Within ten years, the stone business was back on its feet and doing as well or better than the heydays of the 1880's and 1890's.

But, lime production continued to decline. Portland cement was a much better mortar material than regular lime, and the new product supplanted the old one. Eventually, two of Mankato's largest limemaking operations were shut down. The T.R. Coughlan Company put out the fires in its limekiln for good in 1925. And Fowler and Pay, the dominant lime manufacturer in the region deactivated six kilns a short time later. Both firms remained in business, and continued to quarry and process stone, but their limemaking activities seemed to be over.

However, about five years later, in the early 1930's, these same two companies made an abortive attempt to revive limemaking. Some assets of both firms were combined, and the Mankato Lime Company was formed to make a new type of hydrated lime. A plant was built at Fowler and Pay's Second Avenue quarry and kiln site, and \$40,000 was spent on machinery. The venture was a failure; production costs were too high and the lime slacked too slowly. Edward Coughlan, another limestone industry pioneer, made this comment, "the plant was right but the stone was wrong." The company managed

to keep operating until 1939, when the business was closed.

Most of the limekilns were much alike. They resembled large, outdoor furnaces with chimneys that varied in size from approximately 20 feet square and 30 feet high, to possibly 30 feet square and 40 to 50 feet in height. One or two good-sized stone fireboxes (similar to a fireplace) were built into the bottom of the kiln and vented out the chimney, which was the kiln itself. Heat and smoke from wood fires passed upward through slabs of limestone that were dumped in from the top. Constant, high temperatures expelled carbon dioxide and other volatile substances from the limestone charge and reduced the rock to a coarse, lime powder. After the lime had passed through some iron grates and collected at the bottom of the kiln, it was shoveled out of an opening in the floor and put into wooden barrels.

Edward Coughlan stated that, "wood was used for fuel, because the kiln fire was easier to control. And the temperature had to be just right to properly burn the stone."

Quarrying stone for the kilns was, as recalled by Leo Jefferson, "plain hard work." He also remembered the hard labor days in the quarries as "back-breaking and filled with stone dust." Two-wheeled, horse-drawn, dump carts were filled by hand with relatively thin pieces of limestone. Most of the time, the cartmen merely picked up loose slabs of rock from the surface, although they often had to use sledge hammers and iron bars to free the stone before loading it.

The limekilns were operated from early spring to late fall. When the quarrying of building stone was stopped for winter, getting rock for the kilns ended as well. Occasionally, an unusual demand for lime would keep a kiln or two operating into the winter, but it was not a common occurrence. Winter was really the time for cutting wood in the woodlots and hauling it to the kiln for lime burning the following summer.

Hauling loaded carts of stone to the kilns was a slow process. Leo Jefferson referred to it, "as a time when conditions were harder for the horses than the men." "But, dumping rock into the kiln could sometimes be difficult for both." Backing a horse and cart across a ramp to the top edge of the kiln was ticklish business," Jefferson further declared. He also said that, "a gentle horse and a gentle hand on the bridle meant little trouble, but an ornery horse and a heavy hand yanking at the bit could cause a problem or two."

Methods for transporting lime rock improved slowly over the years. In some quarries small dump cars, that ran on narrow gauge tracks, were used for hauling, and were pulled by horse or by hand to the kiln. Later on, at a couple of limemaking operations, a small, steam engine moved the cars to and from the quarry. Impressive as these



Adam Jefferson limekiln

procedures for moving rocks might have been, they were also the only serious attempts made to modernize lime production. As a result, limemaking never became as mechanized as the quarrying and processing of building stone.

Today, the brown lime and the kilns that made it are things that belong to the past; remembered by only a very few, or not thought of at all. Nevertheless, limemaking and the people who were involved in it, occupy a small, but significant place in the history of Mankato and Blue Earth County.

Darell Aptiz

### SOURCES

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