



The Charles Lee wick lamp with stick attachment.

Such were a few of the oil wick lamps I found at the Smithsonian Institution's Museum of American History, and there were dozens more. If you visit, formulate some plan, try to limit the scope of your visit, arrange an appointment with Mr. Francis Gadson, and be prepared for a rare experience. I never did find the candlesticks but I plan to go back again.

References

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3. U.S. Patent 217,791, July 22, 1879 issued to John H. Gable, Shamokin, PA for "Improvements in Miner's Lamps."
4. U.S. Patent 115,143, May 23, 1871 to W.C. Winfield, and U.S. Patent 126, 606, May 7, 1872 to Wm. C. Winfield, John R. Winfield, and Thomas A. Winfield of Hubbard, Ohio for "Improvement in Miner's Lamps."
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Montreal Mine

by Dave Johnson

A few miles to the west of the former iron mining boom town of Hurley, Wisconsin, along State Highway 77, you will find the remains of the Montreal Iron Mine. Once the largest underground iron mine in the world, the mine operated for more than 75 years.

The Gogebic Iron Range was explored in the late 1870's and mining began by the early 1880's. The Montreal Mine, a subsidiary of Ogleby, Norton & Co. of Cleveland began operation after six smaller operations were acquired and consolidated in 1884. These six properties were the Moore, Section 33, Trimble, Jupiter, Bourne, and Ottawa Mines.

THE MONTREAL MINING COMPANY CAGE SIGNALS	
ALL MEN ARE FORBIDDEN TO RIDE ON SHIPS DURING REGULAR OPERATION. WHEN NECESSARY TO RIDE ON SHIPS FOR SHAFT INSPECTION OR IN SPECIAL CASES OF EXTREME EMERGENCY, CALL THE SKIP HOIST OPERATOR ON THE TELEPHONE. THEN RING 7 LONG BELLS FOLLOWED BY THE PROPER SIGNAL SHOWN BELOW	
NO. 6 SHAFT	
STOP	1 BELL
LOWER SLOW	2 BELLS
HOIST SLOW	4 BELLS
SURFACE	5 BELLS
4 TH LEVEL	4 SHORT 1 LONG
6 TH LEVEL	6 BELLS
8 TH LEVEL	8 BELLS
11 TH LEVEL	1 LONG 1 SHORT
12 TH LEVEL	1 LONG 2 SHORT
13 TH LEVEL	1 LONG 3 SHORT
14 TH LEVEL	1 LONG 4 SHORT
15 TH LEVEL	1 LONG 5 SHORT
17 TH LEVEL	1 LONG 7 SHORT
19 TH LEVEL	1 LONG 9 SHORT
21 ST LEVEL	2 LONG 1 SHORT
27 TH LEVEL	2 LONG 7 SHORT
29 TH LEVEL	2 LONG 9 SHORT
31 ST LEVEL	3 LONG 1 SHORT
33 RD LEVEL	3 LONG 3 SHORT
34 TH LEVEL	3 LONG 4 SHORT
35 TH LEVEL	3 LONG 5 SHORT

By 1886 the new Montreal Mine was shipping 57,000 tons of ore annually. Between 1886 and 1945 the mine produced 27 million tons of iron ore. Production over the entire working life of the mine was 45,747,708 tons of ore. For many years annual ore production exceeded one million tons. At the height of its operation the Montreal Mine employed 700 men above and below ground.

The Montreal Mine was a deep mine. The #5 shaft was 4337 vertical feet. An auxiliary hoist on the 31st level (2443 feet) raised ore from the 42nd level to the 33rd level: one 10 ton skip every 2 minutes. The #6 shaft bell signal sign pictured here is deep blue with white lettering. The sign measures 14" X 28".