

Information Sheet

R **St. Joseph Lead Company.**
393 *Lead Mining in Southeast Missouri, ca. 1940.*
 One videocassette.

This collection is available at The State Historical Society of Missouri. If you would like more information, please contact us at shsresearch@umsystem.edu.

This is a film about the lead industry in St. Francois County, Missouri. Co-produced by the U.S. Bureau of Mines, the film features segments on the geological and historical record, underground mining methods, the milling process, and development of the mining communities. The film has been reproduced on ½" videotape (VHS).

Lead Mining in Southeast Missouri presents an overview of the mining industry during the period of peak production in the Old Lead Belt. Most of the film concerns activity in St. Francois County although earlier operations at Mine La Motte in Madison County are noted in the historical section. Recreations of hand mining and Scotch hearth smelting are included, but modern, mechanized methods receive the most attention. There is an animated sequence showing the development of a mine, followed by underground footage showing pneumatic drilling, blasting, mechanized loading of ore, mine trains, machine shops, and safety theaters. The milling process is also examined with views of ore crushers at surface mills, lead concentrates, and waste rock piles. The film concludes with a brief segment featuring safety training conducted by the U.S. Bureau of Mines, and social development programs sponsored by the mining companies. Running time of the film is approximately thirty minutes.

r451

7 August 1989

George W. Showalter

Gift

Shelf List

This is a film about the lead industry in St. Francois County, Missouri. Co-produced by the U.S. Bureau of Mines the film features segments on the geological and historical record, underground mining methods, the milling process, and development of the mining communities. The film has been reproduced on ½" videotape (VHS).

1. Historical and geological overview:
 - Mine La Motte
 - Geology of foothills of the Ozarks, St. Francois County
 - Chat piles on surface mark locations of mineral areas
 - Geological cross section
 - Lead sulfide, 3.5% galena in ore
 - Recreation of 1818 mining
 - Windlass and bucket--pocket mines
 - Hand dressing of ore
 - Hand jigging and washing
 - Scotch hearth furnace smelting
2. Modern mining methods:
 - Diamond drilling, 350'-700' in depth
 - Underground mining, drills and mule carts
 - Typical day of miners
 - Loading in cage for descent
 - Hoisting engineer
 - Mine train and cars, 24" gauge
 - Room and pillars, ventilation

- Animated sequence showing development of mine
 - Pneumatic drilling, wet method
 - Blasting process
 - Mechanized loader
 - Mine locomotives
 - Sump pumps
 - Electric generating plant
 - Underground machine shops
 - Safety theaters and films
 - Blasting
 - Roof trimming
 - Loading machines
 - Drag scrapers
 - Chamber and pillar mining
 - Safety
 - Weighing of ore trains
 - Ore terminal
 - Modern Mining Methods:
 - Rotary drills
 - Ore sampling and assay
 - Skip Pockets and loading
3. Milling of Ore:
 - Ore to crushers at mills
 - Gyratory crushers
 - Concentrates to lead
4. Community Development:
 - Crushed limestone waste
 - Safety training in cooperation with Bureau of Mines
 - Social development programs
 - Establishment of dairy herds

r451

August 1989

George W. Showalter

Gift

Index Cards

Lead industry and trade—Missouri—Saint Francois County.
Lead mines and mining—Missouri—Saint Francois County.
Mines and mineral resources—Missouri—Saint Francois County.
Mining machinery.
Saint Francois County (Mo.).
St. Joseph Lead Company.
United States. Bureau of Mines.