

THE COAL INTERESTS.

The Coal Deposits of the Territory—The Output for the Year.

Interesting Facts Concerning This Great Industry.

Description of Some of the Regions by Supt Tibbey of the Farrott.

The following information regarding the coal interests of Montana has been furnished THE MINER by F. F. Chisholm, agent of the United States Geological Survey for the Rocky Mountains:

While a large portion of the Territory of Montana is underlain by seams of coal of workable thickness, yet but very little of the coal area has been opened. The coal field of Eastern Montana is a part of the Wyoming and Dakota field. The coal is generally a lignite of poor quality, occurring in seams of considerable thickness. Its quality is very poor, and after several years experience in burning it, the Northern Pacific Railway Company abandoned their mines on the Yellowstone. Further west the quality of the coal grows better. In the Bull Mountains there is an extensive bed of fair coal which has only been prospected by the Northern Pacific Coal Company.

At present it is beyond reach of transportation. North of the Bull Mountains on both sides of the Judith river, are thick seams of excellent lignite. These seams are still untouched. South of the Bull Mountains, in the Crow reservation, is found the best coal in Montana. The field is not very large but the veins are from six to eight feet in thickness. This field is also out of the reach of transportation and must remain undeveloped until some legal authority is obtained for entering the reservation. The coal here is a bituminous coking coal of superior quality, but in its undeveloped condition, little is known of its physical characteristics. The Gardiner field, on the Upper Yellowstone, is an extension, probably, of the same coal. The coal area here is small and it has been opened to some extent by Horr brothers, and, in 1885 by the Northern Pacific. Some portions of this coal coke fairly, but the general run of the coal is unavailable for this purpose. The National Park branch of the Northern Pacific run to the coal banks. Some coal was shipped during 1885, but the quantity was small. The width of the vein is about five feet.

Northwest of Gardiner is the Bozeman field, on the divide between the Gallatin and Yellowstone rivers. This is the best opened coal field in the Territory, and the only one regularly worked. There are four distinct mines—the Timberline, owned by the Northern Pacific; the Maxey, owned by the Union Pacific; the Bozeman owned by the Union Pacific and private parties, and the Trail Creek mines owned by private parties. The Timberline mines are worked steadily and the product is consumed by freight locomotives of the Northern Pacific. The product of these mines has been:

In 1884.....55,664 tons
" 1885.....83,156 "

The Trail Creek mine has produced in 1885, 609 tons and were closed for lack of cheap transportation. From the Bozeman mine only 100 tons were taken in 1885, and none from the Maxey. The coal occurs in vertical seams from six to fifteen feet wide, the average of clean coal being generally seven feet. There are three principal veins. In quality the coal is a good lignite, but its value is greatly diminished by the occurrence of small sandstone masses throughout the coal. Its fixed carbon will average about forty-seven per cent. For domestic use some of the coal is sold at Bozeman and Helena, but the larger proportion is used by the railway company.

North of Helena, on the Sun river and other tributaries of the Missouri, extensive fields of coal are known to exist. The only important opening has been made by the Great Falls Coal Company. Only a small quantity of coal has been produced, supplying the wants of Great Falls and Fort Benton.

Running through the town of Anaconda and toward the Mullan tunnel of the Northern Pacific there is an outcrop of excellent coal, but the seams are so narrow, not generally exceeding two inches, that it is unprofitable to work them. This coal cokes well.

South from Red Rock station, on the Utah and Northern Railway, at the head of Medicine Lodge creek, there is a coal field some fifteen square miles. Some small quantities of coal have been taken out and sold in Dillon, but the distance of the mine (sixteen miles) from the railway has prevented its development. The coal is a fair lignite and good for domestic or steam purposes. The width of the principal vein is about six feet. There are three other veins known. This field is owned by the Union Pacific.

There are many valuable coal fields in Montana, but until the internal railways of the Territory are extended they will generally be unavailable, economically.

Three veins have been developed, showing respectively two and a half, three, and four feet thickness of coal. This is the best coal yet found in the Territory, and some of the best in the country for coking purposes.

Several analyses have been made, all showing but four per cent. ash, while most of the coke in the market contains from ten to sixteen per cent. This mine is particularly valuable on account of the large quantity of coal it contains and the high percentage of fixed carbon shown by the assays, and deserves the attention of capitalists on the strength of its excellence as an investment.

The lowest estimate made of its capacity gives three million tons, while by some it is placed at five millions. Many smaller coal fields have been found at various points in the Territory, but as they have been but slightly or imperfectly explored their value or extent is not known.

Estimating from those fields which have been developed there is not sufficient coal now explored to supply the market of Montana for many years to come. I remain sir, very truly yours,

BENJ. TIBBEY.
*Besides the three fields spoken of by Mr. Tibbey, there is another, the Lignite region a Miles City, which is described above by Mr. Chisholm.—THE EDITOR.

BUTTE CITY, December 7, 1885.
EDITOR BUTTE DAILY MINER.

In response to your request for some notes concerning the occurrence of coal in this Territory, I hand you below a concise statement of the three principal localities so far prospected or developed, and trust you will be able to adapt the information to your requirements.

Medicine Lodge, Beaverhead County.

This field is sixteen miles from Red Rock station, on the Utah and Northern Railway, and about one hundred and ten miles from Butte, and was discovered in 1880 by Jacob Clurstein and John Quick. The Clurstein claim consists of 640 acres of land, which is less than one-sixth of the entire field. In addition to this are other places where coal outcroppings are found, but have not been prospected. The coal occurs in a sandstone formation with an overlying stratum of soapstone, and is a very large field. It consists of three veins, two of which are three feet in thickness, and the other five feet. All good, marketable coal of a high grade, lignite in character.

These veins have been prospected for over a mile along these outcroppings at several points on each vein, the larger one being opened at fully a dozen places. The principal prospect is an incline on the vein, and has been sunk to a depth of 150 feet, with crosscuts of 200 feet. In this depth it has not varied at all from the first indications on the surface to the deepest portions opened.

The Medicine Lodge field is acknowledged to be as good a coal district for its grade as any west of the Missouri River. The coal can be mined and placed on the surface at a cost not exceeding \$1.25 per ton.

The Bozeman Field.

These mines are found in a gray sandstone formation on Trail Creek near Bozeman, and show well for a distance of ten miles. The veins run in thickness from four feet to eighteen in places.

Eight miles of this coal field have not been largely opened up; the greater part of the prospecting and working being in the vicinity of Bozeman, where several of the veins have been developed.

It is a fair quality of true coal, and makes an excellent variety of coke, which could be very much improved if properly dressed for the purpose.

The Gardiner Region.

This mine is at the foot of Cinnabar Mountain at Gardiner, on the Yellowstone branch of the Northern Pacific Railroad, fifty miles from Livingston and within six miles of the Park, and is owned by Henry R. Horr and brother. It consists of three hundred and sixty acres of which two hundred are coal lands proper, in a gray and white sandstone formation.

Jefferson, a small station on the Wickes branch of the Northern Pacific Railroad Co. The Pacific Co. do their business with the Utah and Northern Railroad Co. The business of these companies as closely calculated and approximated by their respective agents in this city amounts to:

PACKAGES RECEIVED.	
Wells, Fargo & Co. per day.....	20
Pacific Co. per day.....	110
Total.....	130

PACKAGES FORWARDED	
Wells, Fargo & Co., daily.....	10
Pacific Co., daily.....	45
Total.....	55
Total packages handled per day.....	190
per year.....	71,175

In addition to the above amount of business the Pacific Express Co. forwards upwards of 30,000 pounds of silver bullion per month.

G. E. Mauls & Co., Wholesale and Retail Grocers.

This firm is entering upon the second year of its career in the city of Butte under the most flattering circumstances and with the brightest prospects, having during the past year by their energy, business thrift and unswerving course of honest and fair dealing, built up an extensive and lucrative patronage in both the wholesale and retail departments. Their store on West Park street, opposite the Amphitheatre, is a model of neatness, and is complete in every particular. Their stock of staple and fancy groceries, wines, liquors and cigars, is large and well assorted, having been purchased with special regard for the demands of the trade in this city and section. The amount of their business is so great that purchasers can never obtain any but the freshest and finest of goods. The establishment may be truthfully called the depot and headquarters for good butter and eggs in the County of Silver Bow. They keep at all times a large stock of Minnesota creamery butter and fresh ranch butter and eggs, which they guarantee will be found pure and fresh. They are prepared to do a jobbing trade to meet all demands. They receive staples by the carload and are in shape to furnish the same to customers in any quantities. They respectfully ask the country and city dealers to consult their prices before purchasing elsewhere. Of the retail trade they simply assure that they can do as well or better by their patrons than any other merchants in the city.

J. C. Singer, Funeral Director.

Mr. Singer has had an experience of twenty years in the undertaking business, and, therefore, knows exactly what should be done in cases where his services are required. His establishment, located on the south side of West Park street, is fully equipped with all the modern appliances; and from his large and complete stock of coffins, burial robes, etc., he is prepared at a moment's notice to furnish coffins and burial caskets of any size or design, and all other necessary materials. He employs the most improved methods of embalming, in which process he has met with great success. Appreciating fully the completeness of his stock, he has been appointed by the authorities City and County Undertaker.

The Butte Scammas.

Speaking of a recent visit to Butte, Mr. W. W. Alderson, the editor of the Bozeman Assent Courier, says: "During a recent visit to Butte we were more than ever impressed with the importance, prosperity and evident stability of the camp. The growth of the city is simply phenomenal, and the mines, which today are more extensive and productive than any other in the world, give promise of greater continuance than any heretofore discovered, not excepting those of Leadville, Col, Virginia City, Nev., or in the States of Sonora and Chihuahua, Mexico. Explored and successfully worked to a depth of 600 to 800 feet, [now to 1,000 feet] the mines of Butte appear to be richer and more productive than they were 250 feet below the surface; and what is still more surprising is the fact that new and rich veins of both silver and copper ore are constantly being developed; some of which will doubtless prove as rich in precious metals and as permanent in mineral wealth as those which have already made Butte the most important and prosperous mining camp in the world. In spite of the possible demonetization of silver and the overproduction of copper, which may result in a somewhat serious depression in the market on both metals, Butte is destined to be a lively and prosperous camp, at least during the present century; while, under favorable and fostering circumstances, there is no reason why it should not enjoy uninterrupted prosperity during the next succeeding century."

Express Companies—Statement of Business Transacted.

There are two express companies doing business in the City of Butte, viz: Wells, Fargo & Co. and the Pacific Express Co. The former does all its forwarding and receiving by Gilmore, Salisbury & Co.'s stages running between this city and

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STAGING LINES

Early Staging in Montana—The Different Lines in Operation.

The palmy days of staging in Montana have passed, that mode of public conveyance in a great measure having been forced to give way to railroads. The building of the Utah & Northern Railroad caused the retirement of the greater part of staging in and about the city of Butte, and abolished forever the old time stages over the trail to Corriane and the line to Deer Lodge. At present there are three stage lines running to and from the city as follows:

Boulder Stages.

This line runs between Butte and Jefferson, a small station on the Wickes branch of the Northern Pacific Railroad, via of Boulder. Stages leave the Centennial Hotel daily, Sunday included, at 5 o'clock A. M., carrying passengers, U. S. mail and Wells, Fargo & Company's express. The entire line is about fifty miles in length and is owned and operated by Gilmore, Salisbury & Co.

Butte and Silver Star.

Coaches on this route leave this city for Silver Star tri-weekly and connect with the stage from Boulder to Virginia City in Madison County. Messrs. Burnett & McCall have control and operate this line.

Butte and Pipe Stone Springs.

A semi-weekly coach runs between the above-named points, under the charge of John Hall, owner of the line. The distance between this city and the springs is twenty-two miles.