

*Des Lacs Valley Coal Company*, Township 156, Range. 84, Section 31.—This mine, operated by Mr. T. J. Lloyd, lies one-half mile up from the mouth of a coulee and about two miles north of Des Lacs. The entry to the mine is twenty feet above the creek on the north side of the coulee. At this level the mine is easily drained, all water being siphoned out from a sump situated back from the entry. The seam measures ten feet, and has been

worked for 700 feet back into the hill.		INCHES
The section at this point shows :		1
1 Boulder clay, roof .....	FEET	4
2 Lignite .....		1
3 Clay seam .....		4
4 Lignite(solid) .....		2
5 Clay seam, to bottom of mine .....	7	6
6 Lignite .....		6
7 Clay .....		1
		6

The seam is not worked below the clay level, number 3, for the lower sixteen inches of lignite is of value in preventing the heaving of the floor from below.

LIGNITE DEPOSITS OF WARD COUNTY 117

It will be noticed that the lower clay seam corresponds in position with the one in the Mouse River Lignite Coal Company's mine. The presence of the boulder clay, not only as a roof but filling a "cutout" in the seam, is a peculiarity in this mine. A dried sample from the mine shows the following analysis :

	PER CENT
Volatile matter .....	33.13
Fixed carbon .....	58.23
Ash .....	8.64
Total .....	<hr/> 100.00

This mine has been in operation for several years with a total output estimated at 20,000 tons. The output at present is fifteen tons a day in summer and seventy-five tons a day in winter. Mr. Lloyd expects that the output this year will reach 10,000 tons. The value of the machinery used in operating this mine is \$1,000. Seven men are employed in the summer and twenty-five in winter. Wages run at \$1 a ton for entry and 70 cents per ton for room work. Ventilation in the mine is accomplished by means of an air shaft and fire. Much of the supply from the mine is shipped to Grand Forks and Minneapolis. Local trade is good, the fuel selling at the mine for \$1.50 per ton.