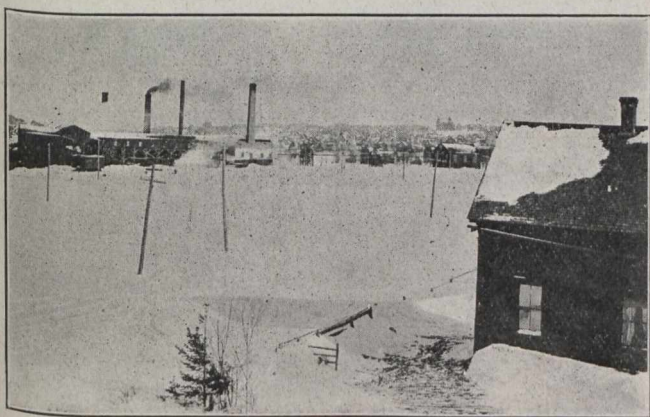


## SPRINGHILL AND ITS COLLIERIES.

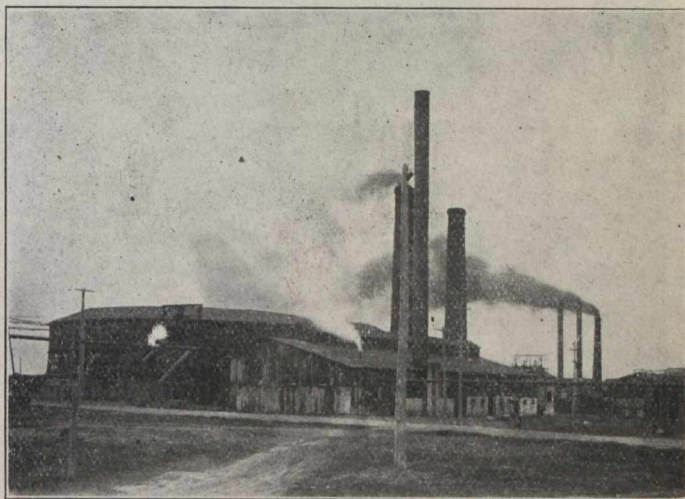
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Before entering upon a description of these collieries, it may not be out of place to give some idea of the lay of the coal seams at present being worked. There are three seams, viz., north, east and west, or as numbered, 3, 1 and 2. No. 3, the overlying seam of the series, is separated from No. 1 by 300 feet of intervening strata. No. 1 is separated from No. 2 by about 100 feet of rock, No. 1 coming in between 2 and 3. The seams run parallel, though differing greatly in places, as to dip, this difference running all the way from 20 degrees to 80 degrees. The Cumberland coal field is an extensive one. Coal has been found all over the country. It is generally conceded, however, that the Cumberland Railway & Coal Company has the best of it. Outside of their holdings it is doubtful if the remainder possess any great value. Just how many seams of economic value there are in the Springhill basin is a matter of conjecture. Exhaustive prospecting has been done over this section by some of Canada's best known engineers, surveyors and geologists, and much has been written, worthy of reading, about the

Levels are driven off slope at a distance of two hundred yards to the deep. The upper level is driven to the boundary, which in this case is recognized as the limit of haul. The back airway is then driven to connect with the return airway above. A pillar 30 yards thick is left to protect this air course. Then, by bord and pillar working back towards the slope, the whole lift is cleaned out, leaving but a worked-out goaf behind. This method has been very successful over some of the most difficult ground that ever confronted miners, or operators. The pitch of the seam ranges all the way from 45 degrees to vertical, with frequent faults and rolls throughout the entire section. While the upper lift is being drawn, the lower levels are being driven to the boundary. When this is reached the lift is worked back to the slope by the same system, so that there is always one or more lifts being worked back while the lower levels are being driven in. The following figures will some idea of the extent of



No. 2 Colliery—Town of Springhill in background.



No. 2. Slope.

Cumberland coal fields, but the findings, so far as the writer knows, have never been particularized. The Cumberland Railway & Coal Company is operating the three known largest seams from two slopes. No. 3 seam, 11 feet high to the west of the main slope, which is split by a local stone, gradually thickens towards the east from the main slope till in two thousand feet a tunnel one hundred and fifty feet is required to connect them. No. 1 seam is similarly split to the east. The height of this seam is identical with that of No. 3. No. 2 seam is more uniform in height, varying but two feet from east to west, embracing some three miles of workings across seam. The highest, 10 feet 6 inches, which includes two-thirds of the entire length of the level.

The north, or No. 3, the overlying seam of the three, is a very excellent seam of coal, except to the extreme west of the mine. The coal is hard, clear and bright, rich in carbon, carrying a low percentage of ash with an infinitesimal quantity of sulphur. To the west this seam maintains a height of 11 feet to the boundary, nine thousand feet west of the main slope. The east lines do not reach so far. The system adopted in working this seam is bord and pillar. There is a method pursued in this mine, and in the other in a measure, not usual in mining as a rule.

the workings in this mine. The present highest working level is 2,600 feet from the surface. It extends west 9,180 feet—seam 10 feet to 11 feet high. East levels, under seam, 2,745 feet. East level, top seam, 2,160 feet. The lift below 3,200 feet from surface level extending west 9,420 feet. East level under 2,280 feet, viz., 11 feet west and 4 feet 6 inches each of the east seams, or simply the west section of seam split by an intervening local stone.

The 3,800 foot level is practically untouched, except by the cutting of airways and haulage ways. The levels are now in over 6,000 feet. The upper level will be the main airway and drainage level. These levels are still driving. The slope in the meanwhile being sunk for a new and greater lift. It has now reached a depth of 4,500 feet, and 250 feet further is to be added before the levels are broken away. This will give a thousand foot lift. This lift with level driven to the limit of 9,500 feet gives 9,500 x 1,000 feet x 10 feet, or approximately three and a half million tons of coal in the west from the opposite or east section in this one lift.

The 2,600 and 3,200 levels west are operated by main and tailrope haulage. The haulage engines is located at 1,300 feet from the surface and steamed from the sur-