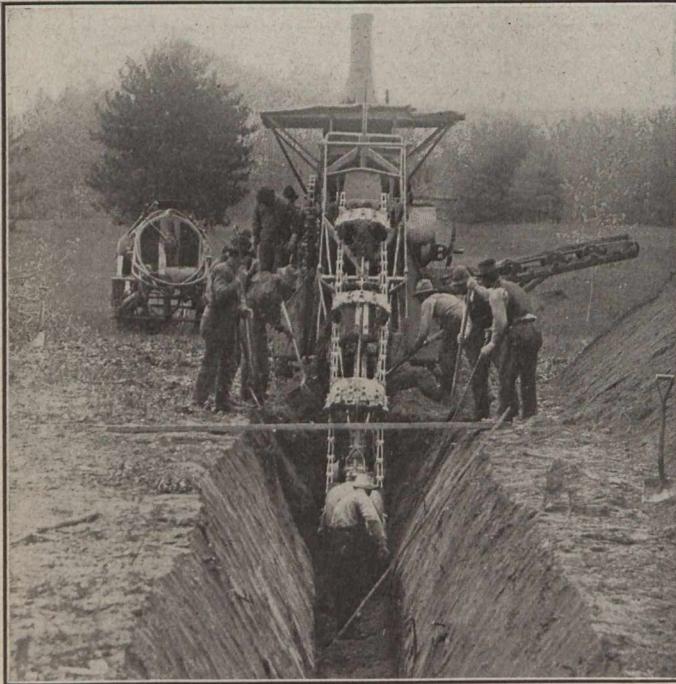


timber was cut to build another town of the size of Angus, Ont.

Water Supply.—The most important problem was to make sure of proper water supply. The Pine River, about 40 feet wide and 6 feet in depth, flows past the camp, but the water was not of good enough quality, nor was the



Ditching Machine Digging Trenches for Water Mains and Sewers.

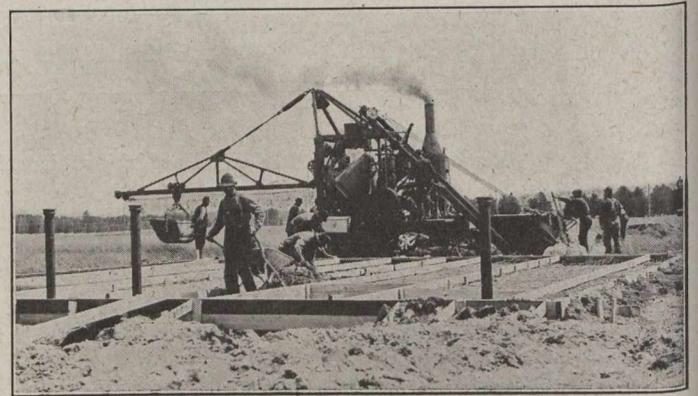
quantity of the supply sufficiently dependable, to warrant consideration of the river as the sole source of supply. This problem, together with other sanitary arrangements, including sewage disposal, was entrusted by Col. Lowe to the firm of Aird Murray and Lowes, consulting engineers, Toronto.

As the surrounding country is plentifully supplied from artesian wells, two drilling machines were placed at work about one mile apart on a high plateau overlooking the Pine River, and about 60 ft. above the river level. One of the test-holes was abandoned at a depth of 50 ft.

and the other at a depth of 180 ft. Although water had been obtained, it was not in any considerable quantity.

As it was known that water is obtained at Angus station at a depth of 200 ft., and as the previously mentioned plateau is 40 ft. higher than Angus, it was decided to move the drilling equipment down to the edge of the river.

There two wells (say, A and B) were drilled 1,500 ft. apart, each to a depth of 180 ft. Well A yielded 244 gallons per minute continuous flow. The next day 700 gallons per minute was obtained from well B, but the flow



Steam-driven Concrete Mixer, with Boom and Bucket, Working on Latrines.

from well B reduced that from well A by 40 per cent. As the locality around well A was most suitable for the pump station site, it was decided to abandon well B and bore other wells. One was started (well C) 300 ft. north of well A, and at a depth of 200 ft. it gave 800 gallons per minute continuous flow. Another well (D) was drilled 300 ft. south of well A and gave 500 gallons per minute. Wells A, C and D formed a triangle, and it was decided that this should be the source of supply.

Samples of the water were sent to Toronto for analyses and examinations. No pathogenic germs were found. The water contained three parts per million of chlorine.

Well A produced 166 gallons per minute, well C 800 gallons, and well D 500, or a total from all three of 2,111,040 gallons per 24 hours and all within an area of between two and three acres. The amount of water required for the camp was estimated at 20 gallons per



Austin Backfiller at Work on Sewer Trenches.