

The Lewiston end of the line is in close proximity to the dock of the Niagara Navigation Company, where boats are taken for Toronto and down the St. Lawrence, and also adjoining the New York Central depot, where trains are taken for all points. From this point the road runs up into the village of Lewiston and when about 40 rods back from the river turns toward Youngstown, passing through many fine farms and beautiful orchards, as will be seen by the illustrations in connection with this article. Approaching Youngstown, the road is again diverted toward the river and runs through the prin-



TROLLEY ROAD THROUGH A NIAGARA APPLE ORCHARD.

cipal street of the village close to the river bank, affording occasional beautiful glimpses of the scene where river and lake meet.

The contractors who built the road were Messrs Crage & Trench, while the electrical equipment was furnished by the F. W. Oliver Company, of Niagara Falls, their electrical superintendent being Mr. W. L. Adams. In both the villages mentioned the overhead construction is of span work, and on the line of the road through the country bracket construction is used. The trolley wire is 00, and was furnished by the Crefeld Electrical Works of Rhode Island. The power for the operation of the line is purchased of the Niagara Falls Hydraulic Power and Manufacturing Company, whose generating plant is on the canal basin in the city of Niagara Falls. To supply this power a 500,000 cm. cable is run down through the gorge on the poles of the Niagara Falls and Lewiston Railroad to the terminus of the line at Lewiston.

THE LEWISTON TROLLEY ROAD.

BY ORRIN E. DUNLAP.

NOW that the Lewiston and Youngstown Frontier Railroad is in operation, one can board a trolley car on the shore of Lake Erie, in Buffalo, and travel over electric lines from lake to lake, or, in other words, from Lake Erie to Lake Ontario. The three electric lines that make this really delightful trip possible are the Buffalo and Niagara Falls Electric Railway, the Niagara Falls and Lewiston Railway and the Lewiston and Youngstown Railway.

The Lewiston and Youngstown Frontier Railway connects the two pretty villages whose names have been incorporated in its title, but it is quite likely that the road will become better known as the "Old Fort Route," owing to the fact that it runs in close proximity to old Fort Niagara, the historic military post at the mouth of the Niagara River. In length this new road is seven and one-half miles, but an additional mile is to be built next spring to connect the road with a magnificent grove of white oak timber owned by the railway company on the shore of Lake Ontario adjoining the military reserve on the east, which is to be devoted to pleasure resort purposes. The road is a single track line, a 68-pound rail being used in its construction. From end to end the road is rock ballasted, the company owning the right of way, which is 30 feet wide.



ROAD TERMINUS AT MOUTH OF NIAGARA GORGE.

and from this point a 0000 feeder runs 2,400 feet down the road toward Youngstown. Beyond this toward Youngstown the trolley acts as the feeder, the distance being about three miles. This makes about seven miles of the 500,000 cm. cable and about the same amount of the 00 wire. Thus it will be seen that the Youngstown end of the line is about fifteen miles from the plant which generates the motive power. The generator used was made by the General Electric Company, and is 90 kilowatt. To improve the service a second generator, which works in series with the first generator, is used as a "booster." This "booster" makes 750 revolutions per minute, and is found of great assistance in the matter of voltage. The voltage at the generator is 550, which the "booster" raises up so that the voltage at Lewiston is 580. Between the first generator and Lewiston the loss in voltage is about 250. The voltage at

Youngstown, about 15 miles from the generating plant, is 507. Mr. Frank G. Lott, the new superintendent of the Buffalo and Niagara Falls Electric Light and Power Company, is also in charge of the power plant of the Niagara Falls Hydraulic



FAMOUS OLD FORT NIAGARA ON THE LEWISTON TROLLEY ROAD.

Power and Manufacturing Company, which, as stated, furnishes the power for this road.

The president of the Lewiston and Youngstown Frontier Railway Company is Mr. L. D. Rumsey, of Buffalo, who has a beautiful summer home on the Niagara midway between Lewiston and Youngstown, and Mr. R. B. Goodman is superintendent.