

Highland Park News.

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NEW APPARATUS.

Ever since the ultimate success of the Chicago, Milwaukee Electric company's system became evident, that enterprising corporation has carefully planned extensions and improvements of the most permanent and approved character in every department. Their main power house at Fort Sheridan was so constructed that the additions required by increasing power capacity can be made at any time without the slightest interruption to the present operating plant.

The original power generating plant was hastily installed, with a view to replacing it at an early date with the most modern, complete and efficient types of electrical machinery, and the beginning of the new year finds their power house a scene of active transformation.

To meet the constantly increasing traffic demands, and having in view the extension of their lines to Evanston by July first, the company's engineers have worked out the full details of the power house plans and have now in successful operation one of the best generating and distributing systems of its kind in the world. Directly connected with the crank shaft of the big Corless tandem compound 400 H. P. engine is the new three-phase alternating generator of the General Electric Co's latest type. This immense machine will generate all the power required for the ordinary operations of the road, while the apparatus heretofore in use will be held in reserve for emergencies which may arise. The new generator stands on a foundation 30x40 feet which also supports the accompanying exciter, and the main

engine shaft. Below the generator upon the ground floor of the power-house, is situated the rotary transformer, a machine of wonderful efficiency, in operation which automatically converts the high tension alternating currents of the generator to the low pressure of 600 volts used upon the line.

A feature of more than passing interest is the six section switchboard, built of the finest Vermont marble and which contains all of the regulating, testing and indicating instruments and devices. The appearance and arrangement of the switchboard are strikingly artistic and beautiful, as well as being effective. To meet the economic conditions imposed upon the proper operation of a plant of this character the company is now constructing a model condensing plant which consists of the latest type Deane jet condensers.

Just east of the power-house a pond 100x60 feet will be constructed above which will be erected a cooling table of three leaves, each 84 ft. square upon which the water from the condensers will discharge. As soon as spring weather will permit the company propose to build a large addition to their car house, 210x50 feet in size, containing four tracks and providing capacity for thirty large cars. These tracks will be laid upon trestles instead of surmounting pits, which will give much better means of access to all parts of the cars as well as making it easier to transfer them from track to track. The new car house will have a less elevation than the present one in use, making unnecessary the objectionable up grade from the main line.

ROTARY SNOW PLOW.

Receiving its finishing touches at the power house of the Chicago and Milwaukee electric road is one of the most interesting and effective pieces of machinery demanded by the exigencies of street railway traffic. This Ruggles rotary snow plow weighs 20 tons and is guaranteed to effectually clear the track of any deposit of snow or ice. At either end of the car and operated by independent motors there are great fan shaped steel blades which cut the snow and ice with great rapidity. An endless belt elevator receives the frigid debris which by means of deflectors set at various angles will be discharged at any point within a radius of a hundred feet. The rotary can run either backward or forward and is equipped with three motors of 50-horse power each. The controlling and operating devices are accessibly placed, and the whole ponderous machine has a grim, substantial and effective look. The company is now prepared for any climatic emergency which may arise, and will have no difficulty in keeping their tracks open during the heaviest snow storms which may come. The superintendent, Mr. Ives, to whom the News is indebted for a view and explanation of this valuable device, is naturally anxious to make a thorough trial of the new rotary, but he will be equally well pleased if no occasion arises for its use.

The old Bethany church bell of this city, that for so many years has charmed our ears, has been sold and shipped to the United Evangelical Church at Gilman, Ill.

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