A Central Heating Plant

By M. D. CADWELL, Supt. of Utilities, North Battleford, Sask.

The Central Steam Heating was first introduced into commercial circles in North Battleford in the summer of 1916, when the steam main was laid from the power plant to the new Public Library on Main Street, 750 feet distant. The service was so successful that it was decided to extend the system to serve the business section of the city after the close of the war, provided ways and means could be arranged to finance the initial cost of the installa-

A very comprehensive research was conducted by the Superintendent of Utilities for a period covering nearly four years, relative to the merits of central heating and its adaption to local conditions prevailing in North Battleford.

Finally, in the summer of 1920, it was decided that the proposed installation would prove advantageous and profitable to the community and the City Council signified its willingness to proceed at once with the installation, provided the patrons would finance its cost. An advance deposit, representing the fixed figure on a unit basis, and proportional to the requirements of each consumer, was agreed upon, and tenders were called for the supply of necessary material.

A portion of the installation was made in the fall of 1920, but, due to the lateness of the season, less than ten consumers received service during the

season of 1920-21.

Meanwhile, materials were received from time to time, and in the spring of last year, practically all supplies requisite for the completion of the system were on the ground prior to the date on which excavation could be commenced.

By the end of September last, thirty consumers were receiving steam service and the installation of

the distribution system was completed.

The popularity of the service and the ever increasing demand for steam necessitated the installation of a new and larger steam main to supplement the original one to a point opposite the Library, from which point the main distribution system was commenced in the fall of 1920. installation has been operating since November 26th last.

The complete installation now comprises over

5,000 lineal feet of piping.

Practically all under-ground piping is of genuine wrought iron, a considerable portion of which was imported, as it is not made in Canada above certain sizes.

All piping is thoroughly insulated and enclosed in circular casing manufactured in the City of North Battleford, every foot has been graded with an engineer's level, and all lines were set with the transit.

Complete and perfect drainage has been provided for all piping placed below the ground level.

estimated life of the plant is 50 years.

The total cost of the system as installed approximates \$35,000, and it has been financed by the patrons of the plant, in addition to certain lines of credit which were arranged with two of the firms who submitted the lowest tender for a considerable quantity of the materials required.

The complete system was designed by the writer

and was installed by the employees of the Utilities Department under his personal supervision.

There are now upwards of 40 consumers, and this

figure will exceed fifty in the near future.

During the inclement winter weather, upwards of seventy-five tons, or 150,000 lbs. of steam were delivered to the patrons every twenty-four hours.

Exhaust steam from the generating units at the

power plant is used as the source of heat.
While the City of North Battleford now owns and operates a comprehensive and ideal central heating plant—the first municipally-owned plant in Canada to date—it has not cost the rate-payers a single farthing and is greatly augmenting the revenue from the utilities.

Meanwhile, the operation of this new utility is being watched by engineers and other interested municipal officials from coast to coast, and it is sincerely hoped that the example set by this municipality will in the near future result in similar installations elsewhere, and that the comfort and convenience now being enjoyed by the patrons of the North Battleford Heating plant may soon become the privilege of many in other urban centres.

MORTGAGE ASSOCIATION

The Dominion Mortgage & Investments Association held its sixth annual meeting in Montreal last month, the management of the Sun Life Assurance Company kindly allowing the use of the board room.

Reports from committees were read and discussed, the one of special interest to our readers being that of the Municipal Finances Committee, presented by Messrs. E. M. Saunders and T. Taggart Smyth,

which is summarized as follows:

"During the year the provinces as a whole have exercised increased vigilance with respect to care of municipal obligations, and there has been some improvement in the collection of municipal revenues. Only in Alberta and Saskatchewan are there municipalities where trouble exists of so serious a nature as to call for the attention of your committee.

"In Alberta principal amounting to \$2,083,847 and arrears to \$159,856 were involved in trouble. This is slightly in excess of sums involved the prior However, through the efforts of your committee, acting in conjunction with committees of debenture holders, only \$357,800 of principal and \$59,-214 of arrears remain to be adjusted of the total municipal debt of the two provinces that unadjusted amounts to \$2,872,799 principal and \$430,876 arrears, of which the proportions attributable to Alberta are 12.4 and 13.7 per cent., respectively.

"In Saskatchewan there has been no increase in the principal debt involved except as to arrears, increase of which has been substantial. It may be noted that one of a debt involved aggregating at the close of 1921, \$3,448,197 of principal, no less than \$2,514,999 remains to be adjusted, or 87 per cent. of the aggregate unadjusted debt with which your committee has had to deal. The arrears at December 31, in Saskatchewan amounted to \$371,662, as compared with \$192,538 at the end of the prior year."

The members enjoyed a great treat in being taken all over the splendid building of the Sun Life, probably the most perfectly planned and equipped one in Canada, under the personal guidance of the President, Mr. T. B. Macaulay.