what they are doing

Some of the Fundamental Problems of Town Planning

B. Antrim Haldeman, Assistant Engineer, Bureau of Surveys, Philadelphia, Pa.

(Read at the Town-Planning Conference, Winnipeg, Man.) (Continued)

urban growth by establishing rectangular systems instead of radial ones.

The large importance of the street lies in the fact that the entire system of transportation throughout the city depends upon it, that it is a controlling element in the development of property and the making of the homes of the people and that it is the principal factor in encouraging and promoting the physical expression of civic

Transportation and the street are as inseparable as they are indispensable in the working out of a city's destiny. The dictionary defines transporatation as the "act of conveying;" very simple and very plain, but the ramifications involved in this definition are almost infinite; it embraces every act or agency by which any object of substance is conveyed from place to place; applied to the street it includes every means of conveyance under, upon or above the surface. Transportation is the great factor, as it is the great problem, in the growth of modern cities, and it is the mainspring of the industrialism upon which the prosperity of the modern state is erected. The wealthy growth of the city depends upon the facilities offered by the transportation systems for the economic conduct of trade throughout the city and between it and its sources of supply or its markets. The economy and efficiency of urban transportation depends upon the street system and must receive first consideration in any scheme of town planning.

The radial system of planning streets meets the requirements of transportation more successfully than any other method, as it supplies the shortest possible routes for the trunk lines of all kinds of public service, but the natural tendency in the application of this system is toward concentration in one great center. A new town, or the extension of an existing one, should be laid out with the view of encouraging the creation of a number of centers each with its scheme of radials and proper connections with other centers; this will naturally tend to encourage the spreading of business areas and the avoidance of concentration of population, business and traffic.

Concentration of business forces land values to rise and this in turn invites congestion of population in or near the business center. The best preventive of the evils of congestion of population is to so control the growth of the city by intelligent planning and wise building regulations, that the skyscraper, the tenement, and the apartment house will have little opportunity of getting a strong foothold. A single administrative and financial center may be necessary, and certain other forms of business directly concerned with those public activities will gather near it, but every effort should be made to secure a general distribution of the branches of trade to secure a general distribution of the propole come in trade with which the masses of the people come in direct and constant contact.

The first projection of a town plan, or a plan for street extension, might well be confined to such streets as will form an economic and efficient system of main

J. M. ROBERTSON, LIMITED

CONSULTING ENGINEERS

Mechanical, Electrical, Hydraulic, Steam Gas. Plans, Specifications, Estimates, Tests, Reports, and Supervision.

SUITE 101 BOARD OF TRADE BUILDING.

MONTREAL, QUE.

ALEXANDER POTTER, C.E.

SPECIALIST IN

HYDRAULIC AND SANITARY ENGINEERING
WATER SUPPLY AND PUBLICATION. SEWERAGE AND SEWAGE DISPOSAL.

WATER AND ELECTRIC POWER.

Special Facilities for the Sanitary Investigation and Analysis of Water Supplies for Municipal and Manufacturing Plants.—Plans, Estimates and Specifications.

50 CHURCH STREET. - -

NEW YORK CITY

R. YOUNG

B. A. Sc., A. M. CAN. Soc. C.E.

CONSULTING STRUCTURAL ENGINEER

Steel and Reinforced Concrete Bridges and Buildings, Foundations, Tanks, Towers and other Structures.

318 CONTINENTAL LIFE BUILDING

TELEPHONE, MAIN 3476

TORONTO

PHONE 5488

DUTCHER, MAXWELL & CO.

ENGINEERS AND SURVEYORS

319 Pender Street W.,

VANCOUVER, B. C.

BRANCH OFFICE : CALGARY, ALTA.

Telephone Main 2560

AIRD MURRAY

M. CAN. SOC. C. E.

Consulting Engineer to the Saskatchewan Government, and Municipal Consulting Engineer for Sewerage—Sewage Disposal—Water Supply and Purification.

303 LUMSDEN BLDG., TORONTO, CAN.

BOWRING & LOGAN

CONSULTING ENGINEERS MUNICIPAL POWER PLANTS

332 DONALD ST

WINNIPEG. MAN.

R. G. Austen

E. M. Chapdelaine, P.L.S

AUSTEN & CHAPDELAINE

ENGINEERS, CONTRACTORS & LAND SURVEYORS

Dams, Waterworks, Sewers, Roads, Surveys
——Subdivisions, Timber Limits, Etc.

New Birks' Building.

MONTREAL

MURPHY & UNDERWOOD

CONSULTING ENGINEERS SASKATOON, SASK.

"SPECIALISTS IN ALL MUNICIPAL WORK"

A. A MURPHY, B. SC. ELECTRICAL

MECHANICAL ENGINEER

J. E. UNDERWOOD, D.L.S.
A. M. CAN. SOC. C. E.
SASK. LAND SURVEYOR AND
CIVIL ENGINEER