Mr. J. H. Kilmer, engineer of Coquitlam, opened the discussion, being familiar with both the projects and having at different times studied plans and specifications for the dam as well as much data dealing with the canal, having himself made one report on the latter. The canal, he said, was an historic enterprise, having first been broached by Col. Moody, over 40 years ago. The scheme was again resurrected some 20 years ago by Mr. David Oppenheimer and associates, a company was organized for the undertaking and full surveys made with complete details of construction. These unfortunately had been lost but sufficient data remained on which to base conclusions.

The canal could be constructed either with locks at either end or with the placing of a dam at the Second Narrows which would obviate the necessity of a lock at Port Moody. The completion of either or both would make available large areas suitable for industrial sites with rail and water shipping facilities.

Others took part in the discussion including Messrs. Cartwright, Cameron, Webster, Creer and Matheson. In references to the canal, excessive cost in relation to the benefits were spoken of, and also the danger of it filling up from silt from the Fraser. Cost, too, was a feature in the dam construction with added difficulty from the depth of water over a hundred feet in mid channel, and the debris swept down by the mountain torrent which the Seymour Creek becomes at times.

Its effect on the lower inlet was also regarded as an important feature. Opinion differed as to the effect the dam would have on the tides, but the preponderance of ideas seemed to favor the theory that the dam would lessen the scour of the outgoing tide through the First Narrows and consequently increase impediments to the channel there.

#### PAPER ON SUBSTRUCTURES.

On Thursday evening, 19th inst., John W. Doty, A.M.Can.Soc.C.E., M.Am.Soc.C.E., of the Foundation Company, New York, read a paper at a meeting of the general section in Montreal of the Canadian Society of Civil Engineers. The subject was "Building Structures, Built by the Pneumatic Method."

# ENGINEERING SOCIETY—UNIVERSITY OF MANITOBA.

At its regular meeting on the 9th inst., papers were read by Messrs. J. R. McColl and F. V. Woodman, members of the society. The latter spoke on "Elevator Construction at Fort William" and the former on "Construction of the Canadian Pacific Railway Red River Bridge." Both speakers are members of the second year in engineering, University of Manitoba.

## ORGANIZATION IN ROAD BUILDING.

The Sanitary and Highway Club of the University of Toronto, a club of fourth year men in these two courses in the Faculty of Applied Science and Engineering, were addressed at their semi-monthly meeting on the 21st inst., by W. A. McLean, C.E., Provincial Roadway Engineer and a member of the Ontario Public Roads and Highways Commission. Mr. McLean spoke on the essentials of organization in road building, outlining the duties of the various members of a road staff. Some time was taken up in discussion after the lecture. Mr. J. A. P. Marshall is president of the club

## THE DEFINITION OF "CIVIL ENGINEER."

A deputation representing the civil engineers of British Columbia waited on the provincial executive council a few weeks ago with a protest against that clause in the Municipal Act which practically gives the municipalities of the province the right of interpretation of the term "civil engineer."

They suggested that the definition of civil engineer should be one who is a member of the Canadian Society of Civil Engineers or of the sister organization in Great Britain, or some society for which the qualifications for admission to membership were recognized by these two parent societies. The Premier promised that the matter would receive the consideration of the executive council.

## COMING MEETINGS.

CANADIAN MINING INSTITUTE.—Sixteenth Annual Meeting to be held at Windsor Hotel, Montreal, March 4th, 5th and 6th, 1914. Secretary, H. Mortimer Lamb, Windsor Hotel, Montreal.

AMERICAN WATERWORKS ASSOCIATION.—Thirty-fourth Annual Meeting to be held in Philadelphia, Pa., May 11-15, 1914. Secretary, J. M. Deven, 47 Slate Street, Troy, N.Y.

CANADIAN AND INTERNATIONAL GOOD ROADS CONGRESS.—To be held in Montreal, May 18th to 23rd, 1914. Mr. G. A. McNamee, 909 New Birks Building, Montreal, General Secretary.

### PERSONAL.

H. G. HUNTER, resident engineer for Canada of the New York Continental Jewel Filtration Co., has been elected to full membership in the Canadian Society of Civil Engineers.

ANGUS McDONNELL, who has recently gone into large contracting work on the Pacific Coast has, according to announcements, secured from the Dominion Government the contract for the harbor works at Victoria, B.C.

J. C. DUFRESNE, M.Can. Soc. C.E., M.Can. Mining Institute, at present field engineer for Cummins and Agnew, Vernon, B.C., has resigned from the latter firm and is reestablishing his private practice at Penticton, B.C.

P. B. YATES. of Toronto, has been appointed engineer and manager of the Hydro-Electric Power System of St. Catharines, duties to commence on March 15th. Mr. Yates has been connected with the Hydro-Electric Power Commission of Ontario for the past five years, previous to which he was in the employ of the Gould Storage Battery, Chicago.

ARTHUR H. BLANCHARD, M.Am. Soc.C.E., Professor in Charge of the Graduate Course in Highway Engineering at Columbia University, on February 14, 1914, delivered illustrated lectures at the University of West Virginia on the subjects:—"Park Boulevards," "Bituminous Surfaces and Bituminous Pavements," "Wood Block and Stone Block Pavements" and "Modern Developments in Highway Engineering in Europe."

GEO. D. MACKIE, formerly city engineer of Swift Current, Sask., has secured the long-deferred appointment of City Engineer of Moose Jaw, Sask. Some 40 applications were received last fall and the work of selection has been slowly, but carefully, proceeded with. Mr. Mackie has had some 13 years' experience in municipal work. He was with the John Galt Engineering Co., at Winnipeg and Calgary before taking office at Swift Current. A greater part of his municipal training was acquired in Creiff and Clydebank.