THE MACDONALD PHYSICS BUILDING and THE MONTREAL STREET RAILWAY

PROPOSED BRANCH ON UNIVERSITY STREET.

Memorandum to -

The Principal of McGill University, Sir Arthur Currie, K.C.M.G.

The Macdonald Physics Building is at present disturbed to a most undesirable extent by magnetic and electric effects, due to street railways and to the Canadian National Railway and their return currents. These effects do not constitute a nuisance so far as the teaching of elementary work of the First and Second Year students of the various faculties is concerned. They are, however, already serious in the case of Honour students and Fourth Year students who have to work with more refined apparatus such as galvanometers and magnetometers. In the case of research work by the professors or by students in the Graduate School, they have proved sufficiently serious to necessitate working, in some cases, only between the hours of midnight and 4 A.M. The proposal to run a street railway up University Street should therefore be strenuously resisted, insofar as the usefulness of the Macdonald Physics Building is concerned. The question of a-bandoning the Physics Building for research work would have to be considered, and the only available spot appears to be between the Redpath Library and the Joseph house, now called the McCord National Museum. It is an open question whether the Canadian National Railway under that section of the Campus would make such a site desirable.

It is desirable to be as explicit as possible with respect to the objections to the street railway. The evils to be considered are - (1) noise, (2) vibrations, (3) electrical disturbances, (4) magnetic disturbances. (1) All objections on account of noise are waived, as the internal noise of the building is already too great and the external noise would be but a trifling addition. (2) As regards vibration, we are rather fortunately situated and measurements with seismograph indicate that vibrations due to traffic on Sherbrooke Street are almost negligible; and there **is** a good reason to believe that the extra vibration due to street railways on University Street will not affect