

Studies are being made to determine what structures and what improved channels would be required to maintain those lakes within acceptable levels. It was just about a month ago on Lake Erie, which is now only at about average level, that tremendous damage was reported along its shores owing to high winds. If more water is added into the great lakes system and water in the capacities that Mr. Kierans proposes in his grand canal scheme, unless there are measures and there is the know-how to handle that additional water, there is going to be a great deal more damage during high water periods because of the difficulties of getting rid of these huge quantities of water when they accumulate in the lakes.

It does not take much to increase damage at highwater time, and the federal government is faced at the present time with this Duck Dam case on Lake Ontario where a dam which was placed in the St. Lawrence River back about 1904, according to international studies, raised the level of Lake Ontario between three and four inches. After a great deal of international discussions and what-not, the matter is going to arbitration for something in the order of \$11 million worth of damages. At one time the damages claimed were much greater than that.

To put the additional quantities of water that are spoken of into the great lakes system you very definitely have to have means of getting rid of it, so that you do not create even an inch or two of additional level on the lakes at times of high water. To get rid of that water, if you consider the outlet of Lake Huron, you have to provide channel capacity all the way down the St. Clair River through Lake St. Clair, through the Detroit River, and in doing that you get that excess water into Lake Erie, but Lake Erie cannot take the water. It is a much smaller lake than Lake Michigan or Huron, and you have got to provide channel capacity to get it out of Lake Erie and down the Niagara River, and then you get it into Lake Ontario.

Lake Ontario at the present time is under control, but the control and the channels have all been designed on the basis of the water that has been in that basin over the past hundred years. Channel excavation has been carried out to provide a velocity which navigation can accept. If additional water has to be disposed of, in order to prevent flooding conditions above, why the navigation channels or other channels have to be provided to get that water out of the lakes at a rate of flow that will not create velocities harmful to navigation. So it goes on all the way down the river. You have to protect against the damage to the foreshore interests and to the navigation interests and to all the interests that are involved. That is an essential part of any idea of bringing additional water into the Great Lakes system and that study is going forward.

Another study that is going forward is the combined study with Ontario on the waters on the northern slopes of the waters flowing into Hudson and James Bays. Ontario may find that it does not require all that water; even looking a hundred or two hundred years into the future, that it will not require all that water. It may be prepared to divert additional water as it has done with the Ogoki and Long Lake waters with 5,000 c.f.s. There may be other waters that can be diverted into the great lakes with a minimum of expenditure. This will be a decision for Ontario to make after that study is made. If there are