

NEW CROP INSULATOR DEVELOPED

Canadian scientists are completing tests on a foam compound that will insulate expensive crops against early and late season frost damage.

The Department of Agriculture and the Department of Industry, in co-operation with a private manufacturer, Laurentian Concentrates Ltd., have expressed optimism following field trials conducted over the past two years on foam compounds and mechanical foam-applicators developed by the company. Tests conducted to date indicate that the foam applicator, which is drawn by a tractor, is capable of producing and laying a foam blanket that will give 100 percent protection to even the most sensitive crops, at overnight temperatures as low as 20 degrees.

The history of the development of the foam and mechanical means of application is a good example of Federal Government and private industry co-operation.

Dr. David Siminovitch of the Cell Biology Research Institute, Department of Agriculture, had originally considered foam compounds as frost insulators in 1957 but active research did not begin until three years ago, and, in co-operation with Dr. W.L. Ball of the Department of National Health and Welfare and J.W. Butler, Research Director of Laurentian Concentrates Ltd., a special foam was formulated in early 1966, which provides the desired frost-protective qualities. The company recently developed a mechanical tractor-drawn applicator that has performed satisfactorily during this year's test programme.

WIDE AND KEEN INTEREST

Since the group published their first results two years ago, they have received inquiries from Europe, England, Israel, South America, Australia and Japan and have been literally swamped with mail from growers in Canada and the United States indicating widespread interest in their discovery and the need for a suitable means to prevent frost damage to crops.

While Dr. Siminovitch is satisfied that the foam will prevent frost injury to row crops, the research group is continuing the programme to devise means and methods of applying the foam to fruit trees, etc.

Field tests conducted at the Central Experimental Farm in Ottawa this year were based on the application, in early spring, of foam to strawberry plants as well the application of foam, in spring and autumn, to tomato plants, both mature and seedlings. Dr. Siminovitch is confident that foam can be used to protect any vegetable crop and his group is continuing their work towards this end.

Dr. Siminovitch suggests that his research to date includes the distinct possibility of earlier planting of crops. This could not be attempted before owing to the risk of early spring frost and subsequent crop damage. He also suggests that scientists are just beginning to discover the potential of foam compounds in the farming industry.

Foam compounds and mechanical applicators will be available commercially in Canada and the United States for use in early spring.

WORLD WEATHER WATCH

The Secretary of State for External Affairs, Mr. Mitchell Sharp, has announced that Canada will participate in the programme of the World Meteorological Organization (WMO) known as the World Weather Watch (WWW). The Canadian contribution to this programme will be \$500,000.

Although weather observation is already conducted on an international scale, and with considerable international collaboration, the system, which has evolved over the last century, still presents meteorologists with many problems. With the development of new technological tools such as artificial earth-orbiting satellites, automatic picture-transmission, and computers, it will be possible, for the first time, to observe the earth's atmosphere on a global scale, and to transmit data by way of a sophisticated world-wide telecommunications system. Through the WWW, regional and national meteorological centres will be established to collect and process the weather data.

Some parts of the world, particularly Africa, Asia and Latin America, lack the necessary resources to participate meaningfully in this world plan of action which can be said to mark a turning point in the

science of meteorology. Recognizing its importance for all nations the Canadian Government decided to take part and to contribute the sum announced above which will be spread over the next four years.

Canada's participation will assist many developing countries to contribute much more effectively to the World Weather Watch, from which the developing countries themselves will benefit. This contribution will be in addition to the usual Canadian bilateral programme as well as to Canada's national meteorological programme which makes a substantial contribution to the WWW through the provision of its operational data.

DIPLOMATIC APPOINTMENTS

The Secretary of State for External Affairs has announced that Mr. James A. Roberts, Deputy Secretary-General of the North Atlantic Treaty Organization in Brussels since June 1964, will be the Canadian Ambassador to Switzerland, resident in Berne, with current accreditation to Algeria. Mr. Roberts replaces Mr. René Garneau who was appointed Canadian Consul General in Bordeaux earlier this year.

Mr. J.C.G. Brown, now Canadian Ambassador to the two Congos, will be the High Commissioner to