

Maritime metallurgists get together

A problem of particular concern to steelmakers in Nova Scotia is the presence of sulfur in the coal they use. To coordinate research on this and other steelmaking problems, scientists in the Atlantic region have formed a society called AGRIM, the Atlantic Group for Research in Industrial Metallurgy.

Although steelmaking is one of man's oldest industries, scientists continue to take an active interest in improving steel manufacturing methods and in solving the problems peculiar to the various steelmaking regions. One of Canada's prominent steelmaking companies is SYSCO, the Sydney Steel Corporation of Sydney, Nova Scotia. With its 2300 employees, SYSCO is an important part of the economy of the Maritime provinces and is the biggest railmaker in Canada.

A problem of particular concern to steelmakers in Nova Scotia is sulfur, which dissolves into the iron from the coke used in blast furnaces. The sul-

fur, partly pyrite inclusions (FeS_2), and partly organic can be up to two per cent by weight of the Cape Breton coal from which the coke is made. Present as "sulfide inclusions", sulfur weakens steel by making it brittle at the high temperatures required to forge and roll it in the shaping process. As well, it aggravates the rusting problems in sheet metal made from the steel. To coordinate research efforts on this and other steelmaking problems, metallurgical scientists in the Atlantic region decided in late 1974 to form a society called AGRIM, the Atlantic Group for Research in Industrial Metallurgy. AGRIM was launched as a society of individuals rather than organizations and draws its membership from NRC's Atlantic Regional Laboratory, the Sydney Steel Corporation, the Nova Scotia Research Foundation, the Nova Scotia Technical College, the College of Cape Breton, and Dalhousie University. Its purpose is to provide a forum for discussion of metallurgical problems, to design and carry out co-

operative research programs and to encourage a free exchange of equipment, ideas and facilities.

Of course, salaries of the members and general maintenance of the co-operating research laboratories are borne by the members' organizations. Initial financing of the administrative costs of the Society itself was made possible by a grant from the Nova Scotia Technical College but financing a large research project seemed more difficult. Since AGRIM was composed of members from industry, govern-

A partial view of Sydney Steel's integrated steel mill at Sydney, Cape Breton Island. The Sydney Steel Corporation is an active member of AGRIM and performs pilot plant evaluation of new processes designed to alleviate the problem of sulfur in steel.

Vue à vol d'oiseau d'une partie de l'aciérie de la compagnie Sydney Steel à Sydney, Île du Cap Breton. Cette compagnie participe très activement aux travaux de recherche d'AGRIM et procède à une investigation en usine pilote de nouveaux procédés visant à atténuer le problème du soufre dans l'acier.



Sysco