New building system rivals solar heating method

Ontario fireman Bill Craig is building his family a two-storey house using a thermal system which incorporates such high-performance materials as steel and thermal-resistant polystyrene, all pre-assembled for one-day construction.

Galvanized tubular frames, chemically welded to precut rigid polystyrene sheets, produce the strongest structure possible with the highest resistance to corrosion. All structural joints are within the walls so there is no transmission point for heat loss to the outside.

Inventor Jack Slater claims that this wholly-Canadian building system, called Cano, has one of the lowest thermal conductivity ratings of any substance used today.

"There is no need to go solar when you use such a tight system as Cano," he said. With 15-centimetre (six-inch) walls of polystyrene the heat saving is excellent.

The ease with which the frame was erected will appeal to builders. Placed on a conventional foundation, the Cano workmen used only a hacksaw, electric drill (for self-tapping screws), a level and adhesive.

Along with the foundation, the house has conventional roofing and flooring and, according to Cano-Set president John Vanderwal, distributor of the system, cost of materials in module form is highly competitive. Cano can also accommodate a modular floor, roof and basement.

Summer benefit

Builders in Ecuador have already made use of the system. "In hot climates the insulation factors of Cano help moderate the indoor temperature. This is an important point also for the Canadian summer," says Mr. Slater.

Cano also has commercial applications. "It is adaptable for any size structure, through the variance of the tubular steel and insulation thickness. We are building everything from restaurants to cottages and the agriculture industry is also showing strong interest in our product," he said

Finishing the inside and exterior surface of the structure is open to a number of various methods. The exterior facings usually consist of a fibre reinforced cement-like mixture called Cano-Kote, which bonds the polystyrene core and the



Owner Bill Craig (right) and carpenter Ed Van Alstine discuss the carpentry needs.

steel tubing. For brick or siding there is no need to use the coating. For roof panel construction the exterior facing can consist of plywood and be built up with tar and gravel roofing or shingles.

Interior facings consist of gypsum wallboard, which provides both fire pro-

tection and a finished surface for painting.

Finally, polystyrene doesn't decay, support bacterial growth or appeal to termites.

(Excerpts from an article by Nigel Atkin, for Housing Ontario, November/ December 1978.)

Fisheries and Oceans - new department of Federal Government

Legislation to establish a new Department of Fisheries and Oceans and to carry out several other changes in government organization was introduced in the House of Commons last month.

The bill sets out the duties, powers and functions of the Minister of Fisheries and Oceans, which include coastal and inland fisheries, fishing and recreational harbours, hydrography and marine sciences and also co-ordination of federal policies and programs involving oceans.

The bill also establishes the Fisheries and Oceans Research Advisory Council, a 25-member body which would include representatives of the fishing and other industries with special interests in marine sciences, representatives from relevant departments and agencies of government, universities and the general public. The Council is the successor to the Fisheries Research Board.

Other changes

• The legislation amends the Department of the Environment Act to emphasize the department's responsibility to preserve and enhance the quality of the natural environment and to strengthen

the minister's powers to co-ordinate federal activities in this area. The minister also will be empowered to enter into agreements with the provinces for the administration of the department's programs, underlining the Government's intent to reduce federal-provincial duplication and rely to the maximum extent possible on the provinces for the administration of environmental programs.

• The bill will repeal the Representation Commissioner Act and transfer to the Chief Electoral Officer the duties of the Representation Commissioner in overseeing decennial electoral boundary readjustments. This will merge the two independent government institutions responsible for managing the processes for elections to the House of Commons and for adjustment of the boundaries of federal constituencies.

The change is being brought about on the occasion of the retirement of Nelson J. Castonguay, who has been Representation Commissioner since the position was first established in 1963, and who was Chief Electoral Officer of Canada from 1949 to 1966, holding both offices from 1963 to 1966.