

covered and the average extra cost was in the neighbourhood of 1%. (cf.—Appendix).

When Owners consider the earlier entry into a market and/or the earlier return on their investment and reduced financing costs related to an earlier completion date for their construction project, the factors favouring winter work are usually very obvious.

There have been a number of cases when bids were called on the basis of a fall and a spring start. Usually the bids are the same. A contractor naturally prefers to keep his key personnel and work crews working year-round, rather than have to recruit a new work force during the spring. Overhead costs can be spread more evenly. In times of shortage, supplies are often easier to obtain during the winter. The need to pay costly premium wages for overtime work during the summer peak period is reduced. Some construction work is even easier to do in the winter.

These and other factors should encourage an Owner and his professional consultants not to be scared at the financial prospects of winter work. However, the specifications for winter-built projects should bear this in mind and competent firms should be engaged to execute the work. Under these circumstances, quality should not suffer either.

CONCLUSION

It is sometimes sobering to reflect that one of the Objectives of the Canadian Construction Association when it was formed in 1918 was to encourage Wintertime Construction. In Canada today the number employed in on-site construction work is still appreciably higher in August and September than in January and February, so we have yet to reach our goal. However, great gains have been made in the past decade and the acceptance of wintertime construction is now widely accepted. This in turn has been of great benefit to our overall economy.

Another quote that we sometimes use in an effort to encourage people to toss out prejudices against wintertime construction as being something new and dangerous is one from a Report of a study launched in the early 1920's by the late Herbert Hoover, while he was your Secretary of Commerce. This quote is:

"Summarizing the question of winter construction, it may be stated without fear of contradiction that both from an engineering and a quality standpoint any type of modern building construction can be accomplished fully as well, in the winter months as at other seasons, if the proper protection during the progress of certain parts of the work is provided."

APPENDIX

WINTER BUILDING WORTHWHILE FOR PROJECT OWNERS

The Canadian Construction Association has long contended that wintertime construction is both feasible and economical for a business considering a new building or addition. This contention is now backed up by the results of a survey concerning the extra costs included in general contractors' tenders for construction contracts directly related to wintertime conditions—e.g., for heat, shelters, snow removal, etc. In other words, the extra costs actually paid by the Owner.

Figures for 106 buildings valued at nearly \$50 million reflected an average extra cost of roughly 1% but these were offset more than two times over by the extra revenues received as a result of earlier occupancy due to not "waiting for spring" to commence construction. A copy of the Committee's report is attached.

The Association's Wintertime Construction Committee Chairman, W. G. Malcom of Winnipeg (a CCA Past President), stated that the survey results reflected the tremendous advances made in wintertime construction in recent years. While allowances should be made covering trade contractors' tenders and the possibility of a "sampling error", it was concluded that the results would still show a very strong case for having industrial and commercial projects commence or carried on during the winter months.

An extra incentive this winter favouring decisions against delayed starts is the scheduled doubling of the Federal sales tax rate on construction materials next April. In a number of centres, building costs would be increased next spring because of higher wages.