

Canadian construction and manufacturing capability. Furthermore, the enhancement of spin-off sales in the future will require:

- the development of better linkages between Canadian consulting, construction and manufacturing industries;
- the formation of consortia capable of executing all phases of turnkey projects;
- the enhancement of mechanisms to provide project financing packages competitive with those offered by other project bidders.

It is generally agreed that the multiplier effect falls within the range of 2:1 to 10:1.

While Canadian consulting firms export all around the world, barriers to trade in services exist in varying degrees and differ between regions. The main concern of Canadian firms is in dealing with developing countries which offer the greatest export potential. The factors which are considered to be the most important in distorting competition relate to subsidies, financial assistance, and export tax credits provided to firms by their governments. Other difficulties arise from requirements and regulations pertaining to such factors as local content and administrative procedures.

The U.S. market is the largest single country market for Canadian firms. At the same time, the U.S. is by far the most significant source of imports into Canada. The current trend in the Canada-U.S. market is for firms to establish local entities in each country or enter into joint ventures. While the Canadian consulting industry overall is presently not as strong and diversified as that of the U.S., Canadian government policies provide for the strengthening of Canadian industry. Up to now the Canadian government approach, which is supported by industry, has been to achieve reciprocity in coping with cross border flow problems. /

EXEMPT  
15 (1)

#### (c) Technological Factors

The technological capability of Canadian firms is recognized in many fields. It is particularly internationally recognized in the hydro-electric power, forestry, mining, municipal, transportation and communication areas. With notable exceptions, the industry needs strengthening in manufacturing and process engineering.

The industry performs limited contract R&D. Own account R&D by consulting engineering firms is minimal because of the very limited ability to finance it internally, highly restricted access to government financial support programs for R&D and innovation, and the limited prospects for a ready market for the results owing to the bland investment outlook. Currently, most research activity done with the consultants' own funds are in areas relating to the firm's operations -- management information systems, computer-aided design and drafting, computer-based specifications and conditions of contract -- but there is scope for consultants to get involved in product, process or system development.

While consulting engineers often apply the technologies developed by others to produce practical solutions for specific projects, future competitiveness of the industry will depend to a significant extent on its ability to increase its overall participation in R&D and other elements of the innovation process to develop new services and products. In addition, it will need to participate in, or instigate, research activities with elements of the manufacturing and processing industries so as to be able to meet the competition from foreign EPC firms or industry-linked engineering firms. Not only will the results be valuable for increasing the penetration of export