BRIEF TO THE:

CANADA TRANSPORTATION ACT REVIEW PANEL

SUBMITTED BY:

CANADA'S CONSULTING ENGINEERING INDUSTRY

Ottawa, March 2001

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The Association of Consulting Engineers of Canada makes this submission on behalf of its 600 member firms and their 48,000 employees working in communities across Canada and in markets around the world. Our industry's business involves a vast array of engineering services related to the built and natural environment. Last year the consulting engineering industry generated $6.5 billion in revenues of which roughly 30% were earned internationally.

We make this submission to the Canada Transportation Act (CTA) Review Panel based on our concern for the safety of passengers and vehicles and the economic consequences of travelling along Canada's sub-standard National Highway System (NHS). As professional engineers obligated to protect the public's health and safety we must add our voice to those of many other concerned Canadians who over the years have alerted the federal government to the state of our National Highway System.

Having played a role in the planning, design and development of the NHS we feel that engineering firms are well placed to advise the government on its current state and the costs to society and to the Canadian economy of its degradation. The incidence of infrastructure failures and safety infractions increase when regular maintenance and repairs are not conducted and when the system is asked to perform beyond its original design requirements or life-cycle expectations.

In the course of your work to date you have received submissions from among others the Canadian Automobile Association (CAA), the Coalition to Renew Canada's Infrastructure (CRCI), the Canadian Trucking Alliance (CTA) and the Infrastructure Council of Manitoba (ICM). You might also be aware of the work of the Royal Commission on National Passenger Transportation (1992); the study of Transport Canada Policy Branch – Canada's National Highway System: Description; the work of the Council of Ministers Responsible for Transportation and Highway Safety (1987 and 1997); and the efforts of the Transportation Association of Canada. You will be aware therefore of the state of play within Canada's existing highway infrastructure and what many experts agree is required to fix the problems. All have underscored the need for dramatic improvements to the existing National Highway System through greater federal funding.

Despite these studies and representations their collective impact on federal decision making is so far limited to the $600 million committed to the National Highway System in the February, 2000 Budget. This relatively small amount is to be spent over four years beginning in 2002-2003. This level of funding is clearly and sadly inadequate given the need to spend $17.2 billion to address the required rehabilitation and redevelopment of the existing infrastructure.

We hope that the work of your review panel will not miss this opportunity to recommend substantive and structural changes to the way the National Highway System is managed, serviced and funded.

Role of the Federal Government

An important first step to this end is to recognize a formal role for the federal government with respect to the National Highway System in the Canada Transportation Act. It is remarkable that this critical transportation system, that carries 65% of Canada's merchandise export trade to the United States, and 70% of all internal domestic shipments of manufactured goods is not considered important enough to be included in the federal government's transportation legislation and regulations.

National leadership, through the development of a National Highway Policy embodied within the authority of the Canada Transportation Act, needs to include common highway technical and safety standards across the country. The current patchwork quilt of standards is neither manageable nor responsible. It also needs to include a provision to establish a permanently funded program in order to serve the long-term needs of commerce and the travelling public.

The greatest impediment to safer highways in Canada is the inability of government decision-makers to decide who is going to pay and by what means for the necessary capital, maintenance and operating costs. Toll roads are being used in some parts of the country but are not yet as publicly acceptable in Canada as they are in Europe. Public-private partnerships have begun to receive limited political favor in Canada but are clearly not the preferred option for most governments.

Traditional funding mechanisms are slowed and weakened by federal-provincial negotiations and by conflicting funding priorities of all levels of government in Canada. The current highway funding mechanisms are not working and continued support for them will only further jeopardize the state of the national system.

Economic Consequences of Inadequate Levels of Investment

Canada has designated roughly 25,000 kilometers of its 900,000 kilometers of road as the National Highway System. Of this, only 7,300 kilometers are multi-lane divided highways. Much of Canada's existing highway infrastructure was first built in the 1950's and 1960's for a population and an economy much smaller and much less demanding than today. No significant national highway redevelopment has taken place since the 1960's in Canada.

Today the NHS is carrying 72 billion Vehicle-kilometers per year. Studies have shown that 38% of the NHS is below minimum geometric design standard or below the 90 km/h minimum operating speed standard. Weight, speed, and road design standards vary across the country from one jurisdiction to another because there is no universal national highway standard. Over 20% of the NHS's 3,500 bridges require major strengthening or rehabilitation.

In spite of these recognized deficiencies in the quality and capacity of the NHS, the Federal government's announced investment of $600 million over four years is the equivalent of $5 per capita per year. Compare this commitment to that of the United States. Their designated National Highway System comprises some 255,000 kilometers. The U.S. Federal Government is currently investing USD$171 billion in the nation's highways over 6 years, or about USD$110 per capita per year (**over 20 times the rate of investment by the Government of Canada)**

For our highway transportation infrastructure to be competitive with the U.S., Canada will have to do better or risk losing commercial and tourist traffic to the safer more efficient southern routes.

We ask the Review Panel to recommend that the federal government allocate a level of financial support to the maintenance, operation and improvement of the National Highway System including the Trans Canada Highway comparable to what is being invested in the United States. This would equate to CDN$3 billion per year. We recommend that these monies should come from the $4.7 billion gasoline excise tax currently collected by the federal government. This will bring Canada's rate of capital investment in highways into the same range as that of other OECD members.

You will have noted in their submission to this Review the Government of the Province of Nova Scotia states that between 1988 and 1996 the federal government contributed nothing of the $8.1 billion invested in highway capital expenditures by provincial and territorial governments. Today, the federal government is investing about 5% of the total amount of money invested annually in the National Highway System. Compare this to other OECD countries where national or federal governments are investing between 31% and 100% of total investments in their respective National Highway Systems.

Studies predict that through a long-term program committed to eliminating the current $17.2 billion deficit there will be an annual operating cost savings of up to $4.4 billion to the traveling public.

Better Roads means Better Safety

While significant advances have been made over the past 30 years in improving highway safety in Canada, we still have 3,000 fatalities per year and 220,000 injuries on our roads. This progress has been largely made, through driver education, the enforcement of alcohol and seat belt legislation, and improved crash-resistant vehicles. Seat belt utilization in Canada now stands at 92%, suggesting that Canada is likely fast approaching the point where further safety improvements cannot be made solely through driver-behavioral modifications. Canada's consulting engineering industry believes that it is time to consider the significant safety benefits to be achieved by building safer roads and highways, and by employing proven and emerging technologies - Intelligent Transportation Systems (ITS) - in our vehicles and on our roadways.

Statistics compiled by OECD show that four lane divided highways have a far lower incidence rate for fatal accidents than do two lane highways. In the USA in 1997, for example, only 12% of the fatalities occurred on the four lane divided interstate and freeway system, which carried about 40% of the total vehicle-miles traveled. Other roads and highways had a fatality incident rate 4 times higher than the four lane divided highways.

The 1997 Study by Canada's Council of Ministers Responsible for Transportation and Highway Safety concluded that 247 lives could be saved and thousands of injuries avoided each year in Canada by carrying out the recommended $17.2 billion improvement program for the National Highway System. They also estimated benefits of up to $30 billion would accrue if the improvement program were implemented.

Recommendations

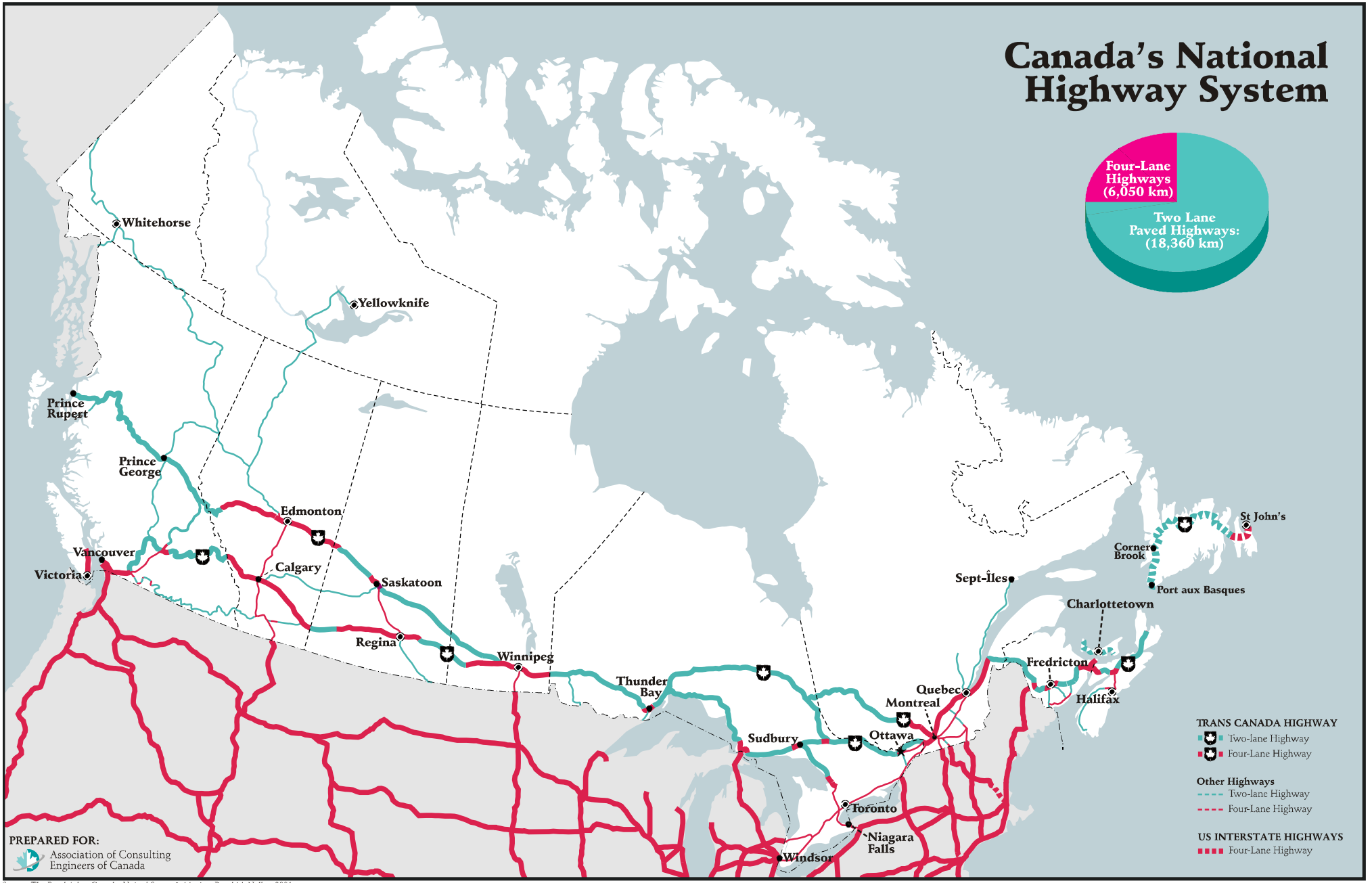
Canada's National Highway System is in a serious state of disrepair due in part to a lack of adequate capital investment by the federal government. Deterioration of the country's highway infrastructure in the face of rising use by Canada's exporters and the traveling public will put Canada at an economic disadvantage with respect to international and inter-provincial trade, and is exposing the traveling public to unnecessary risk. By continuing to ignore the warnings of numerous citizen groups and the recommendations of the Council of Transportation Ministers, the federal government is not fulfilling the mandate of the Canada Transport Act to provide a..."safe, economic, efficient and adequate network of viable and effective transportation services"... that..."meets the highest practicable safety standards".

We therefore recommend:

1) That the National Highway System be covered under the Canada Transportation Act;
2) That the federal government show leadership towards the National Highway System by developing a national highway policy to include mandated national technical and safety standards (in effect in every other OECD country except Canada);
3) That $3 billion per year be committed by the federal government for highway maintenance, repair and development to bring the existing system up to modern day standards;
4) That the requisite funding come from the gasoline excise tax collected by the federal government ($4.7 billion collected annually by the federal government); and,
5) That the federal government recognize the National Highway System as critical to Canada's economic competitiveness, national unity and quality of life.

Respectfully submitted

The Association of Consulting Engineers of Canada
March, 2001



Source: The Road Atlas: Canada, United States & Mexico, Rand McNalley, 2001.