

Summary

Alternative aggregate delivery systems should be assessed taking into account full life cycle costs: from source to job site. The economic, environmental and social implications must be recognized.

The Ministry of Natural Resources' "State of the Aggregate Resource in Ontario Study" (SAROS) found that there would be significant economic, environmental and social implications of replacing just a portion of the close to market supply with alternative long distance transportation modes such as marine or rail transport to deliver aggregate to the major market area in Ontario - the Greater Toronto Area (GTA).

The adjoining figure conceptually illustrates three alternative transportation modes delivering aggregate to the GTA including marine transport from Manitoulin Island, and long-haul rail and truck transport from North Bay.

In each alternative mode, significant distances must be travelled to arrive in the GTA. Unlike delivery from dispersed close to market pits and quarries, the alternative modes are generally unable to deliver aggregate directly to the final destination. Major redistribution terminals are required to unload. stockpile and reload for final delivery to the job site. These large- scale redistribution terminals located throughout the GTA would generate substantial truck traffic volumes and involve outdoor stockpiling and rehandling of large quantities of material.

Note;

Statistics and GHG emissions are based on a 30-year period transporting 35 million tonnes of aggregate per year. (Paper 2, State of the Aggregate Resource in Ontario Study, MNRF, 2010).