

**Intergovernmental Fiscal Transfers, Investment Decisions and
Outcomes: The Case of the Gas Tax Fund in Ontario**

By

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ABSTRACT

Considering the importance of transfer payments to the Canadian fiscal policy framework, this dissertation seeks to identify under what conditions these instruments are chosen, and what drives the combination of design features that result in different transfer systems. Moreover, because policies are implemented to address a given problem, this research also seeks to explore how the chosen design and other potential intervening factors result in the successful attainment of the policy objectives or the failure to do so, as well as their relation to the policy outputs and outcomes. This dissertation explores those issues using as a case study the Gas Tax Fund transfer in Ontario.

The evidence gathered is analyzed through a policy design and implementation analytical framework and an intergovernmental fiscal transfer framework. The research uses both quantitative and qualitative research methods of inquiry.

The dissertation's empirical findings show a direct link between the federal, provincial, and municipal context and the creation of the Gas Tax Fund, as well as its distinctive design features. Furthermore, the evidence suggests that the program's governance structure and the administration, enforcement and accountability procedures influenced the success of the implementation. The AMO and the municipalities have all successfully implemented the policy without major complications and have been meeting their roles and responsibilities as outlined in the agreement. In terms of outcomes and impacts, the research shows that there were several factors that affected them both in positive and negative ways. The econometrics analysis suggests that the program has a considerable effect on infrastructure expenditures as a dollar of transfer generates \$1.27 of additional spending. Overall, municipalities have been able to make incremental investments in all the project categories that will result in new and improved infrastructure.

The dissertation's findings contribute to academic research and to the larger community concerned with public policy and fiscal federalism by addressing the

knowledge gap left in the existing academic research evaluating the establishment of current transfer payment arrangements in Canada and their impact. They illuminate the influence of contextual factors in policy development in general, the challenges of transfer payment implementation, and the relation between stated goals and actual outcomes.

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CHAPTER 1

INTRODUCTION

Intergovernmental transfers, those transfers of monetary assets to another level of government for which the government making the transfer does not: “(a) receive any goods or services directly in return, as would occur in a purchase/sale or other exchange transaction; (b) expect to be repaid in the future, as would be expected in a loan; or (c) expect a direct financial return, as would be expected in an investment,” have been historically a dominant feature of the highly decentralized Canadian fiscal framework (Public Sector Accounting Board, 2007, p. 1).¹ While their number, size, and nature have changed through the years since Confederation, these public financing instruments have been consistently used as a way of “facilitating the achievement of the advantages of decentralization while minimizing its adverse consequences for national objectives” (Boadway, 2007, p. 55). More specifically, they have been used to close the horizontal and vertical fiscal gap, address inter-jurisdictional spillover effects, address political

¹ For a discussion on fiscal federalism see Oates W. (1999), and for an introduction to Canada’s fiscal arrangements see Boadway R. (2006).

imperatives, further the federal Government's policy goals, and achieve coordination and efficiency.²

When implementing a transfer system every policy design choice should reflect, in theory, the rationale for the transfer's implementation. However, as Rao and Singh point out (1998, p. 17), while the "theoretical rationale helps to identify the objectives of transfers and provides broad guidance on their design, a number of judgments have to be made" that will depend on the various political, historical and economic pressures faced by the government. Moreover, each design will be expected to have a specific spending response on the recipient government. In general, according to the literature, the recipient's response can range from complete substitution to stimulation (Boyne, 1990, p. 210). In the first instance the recipient uses the total transfer or a portion of it (partial substitution) to, for example, reduce local taxes. In the second instance the recipient uses all the resources or a portion of them (partial stimulation) to, for example, increase general spending.

Making specific design choices regarding the transferred amount, the allocation formula, and the transfer conditions the Federal government has addressed, through these types of programs, many of policy problems. Fiscal transfers in Canada, as Richer (2007) explained, have taken the form of unconditional grants to provincial governments,

² For an overview of the various rationales applied to the use of intergovernmental transfers see, for example, Bahl (2000); Bird & Smart (2007); Boadway R. W. (1980); Boadway & Hobson (1993); Ma (1997); and Shah (1994).

such as the equalization program; non-matching conditional grants, such as the Canada Social Transfer and the Canada Health Transfer; matching grants, such as the post-secondary education program and the Canada Assistance Plan; and other transfer payments, where the Federal government allocates money directly to individuals, agencies or municipalities, such as the Millennium Scholarship Foundation, the Universal Child Care Benefit, and the Gas Tax Fund. In 2009-2010, for example, transfer payments in Canada amounted to approximately \$165 billion dollars, which represented 60 percent of the total Government expenditures (Government of Canada, 2010a, p. 1.7).³ Of this, approximately \$4.2 billion was allocated to Infrastructure Canada, of which \$1.8 billion represented the Gas Tax Fund, a transfer with innovative features implemented in 2006 (Government of Canada, 2010b, pp. 264,266).

The Gas Tax Fund, originally a key component of Prime Minister Paul Martin's New Deal for Cities and Communities, is a transfer to municipalities of a notional portion of the excise tax revenues collected by the Federal government on gasoline to support environmentally sustainable infrastructure investments in areas such as transit, water, and sewers. Through the program the Government hoped to promote improved quality of life

³ More specifically, major transfers to other levels of government, e.g. Canada Health Transfer and Canada Social Transfer, fiscal arrangements and other transfers, transfers to provinces on behalf of Canada's cities and communities, and Alternative Payments for Standing Programs, made up 20.8 percent of total expenses Major transfers to persons, e.g. elderly benefits, EI benefits, the Canada Child Tax Benefit and the Universal Child Care Benefit, made up 25 percent. Other transfer payments made up 14.6 percent (Government of Canada, 2010a, p. 1.7). Moreover, when compared to total transfer payments made the previous fiscal year (2008-2009) expenses in this category increased 20 percent; when compared to the payments of 2000-2001 they increased 88 percent (Government of Canada, 2010a, p. 1.16).

in Canadian municipalities and its expected outcomes were cleaner air, cleaner water, and reduced greenhouse gas (GHG) emissions. Under this transfer, the Government allocated to municipalities in 2006 the equivalent of 1.5 cents per litre, or \$600 million in revenues. By 2010, the initial end date of the program, this amount increased to the equivalent of 5 cents per litre, or \$2 billion annually. In 2007, the Harper Conservatives extended the program from 2010 to 2014 at \$2 billion per year. Then, the 2008 Budget announced that the Gas Tax Fund would be extended at \$2 billion per year beyond 2014 becoming a permanent measure. The funds are distributed, for the most part, on a per capita basis to the provinces and territories, which are responsible for disbursing the funding to municipalities according to arrangements negotiated in each jurisdiction.⁴

In the case of Ontario, the Federal government transferred \$1,865.50 million over the original 5 years of funding (2005-2010), which represented 37.31% of the total funding. In the province, the Association of Municipalities of Ontario (AMO) was chosen as the administrator of the program for all municipalities with the exception of the City of Toronto, which receives its allocation directly from the Federal government. This made Ontario one of only two provinces, the other one being British Columbia, where a non-government body was given the administration responsibilities and the only province where a municipality was a direct signatory to the Agreement.

⁴ To ensure that the least populated province, Prince Edward Island, and the territories received an adequate level of funding, the Federal government set a base amount of \$37.5 million. Likewise, it set a base amount for First Nation communities of \$62.55 million.

Transfer payments, such as the Gas Tax Fund, have been, and continue to be, an integral part of the Government's policy instrument tool kit⁵ and one of the most important sources of revenues for the provinces and, to a certain extent, for municipalities.⁶ Considering their importance to the Canadian fiscal policy framework, it becomes interesting, from a policy analysis perspective, to understand under what conditions these instruments are chosen, and what drives the combination of design features that result in either conditional or unconditional transfer systems. Moreover, because policies are implemented to "address a given problem or an interrelated set of problems" it is important to further understand how the chosen design and other potential intervening factors result in the successful attainment of the policy objectives or the failure to do so, and their relation to the policy outputs and outcomes (Pal, 2001, p. 2). Using as a case study the Gas Tax Fund this dissertation seeks to further our understanding of these issues.

⁵ For example, in the report of the Independent Blue Ribbon Panel on Grants and Contributions the authors argued that "one of the most striking conclusions" to emerge from their work "was the reminder of just how important federal grants and contributions are to Canadians" (Lankin & Clark, 2006, p. vi).

⁶ Due to the established constitutional fiscal arrangement in Canada, municipalities are often referred to as 'creatures of the province.' As such, most of the intergovernmental transfers received come from the provincial governments. As Slack (2009, p. 6) argued, "Federal transfers to municipalities have historically been fairly small and all federal grants are for specific purposes." For example, in 2007 only 2 percent of total municipal revenue came from federal specific purpose transfers, and 14.4 percent came from Provincial specific purpose transfers (Slack, 2009, p. 6).

RESEARCH QUESTIONS:***Intergovernmental Transfers - Policy Design and Implementation***

Using a policy design and implementation analytical framework this dissertation seeks to further our understanding of the way the theory on fiscal federalism, and more specifically on transfer payments, relates to the empirical evidence gathered and analyzed using both quantitative and qualitative methods of inquiry. With this analytical framework this study will explore: (a) the factors influencing the transfer payment policy design process; (b) the factors influencing the transfer payments implementation process; (c) the relationship, and possible gap, between the intentions and statements of the policy on the one hand and the accomplishment of the policy objectives on the other; and (d) the policy outputs and outcomes. Focusing on both policy design and policy implementation “is essential to a full understanding of politics,” as Dolbeare and Hammond (1971, p. 149) explained, because “very little may really be decided by the words of a decision or a statute: the enunciation of such national policy may be just the beginning of the decisive process of determining what will happen to whom.”

While this dissertation is neither intended to be exhaustive nor comprehensive in examining all the potential implications of the design and implementation of the Gas Tax Fund transfer program in Ontario, it aims to contribute to the knowledge gap left in the existing academic research evaluating the establishment of current transfer payment arrangements in Canada and their impact. Moreover, since the Gas Tax Fund fiscal arrangement has been branded as innovative, and as such it might be used as a model for

future programs, this research seeks to make a contribution to the understanding of the challenges of transfer payment implementation, the relation between stated goals and actual outcomes, and the trade-off between the level of investment and the measurable impact, all of which can have implications for future fiscal policy developments.

The four central research questions of this dissertation are the following:⁷

1. *What were the principal factors that influenced the Government's choice of a transfer as a policy instrument and the specific design of the Gas Tax Fund policy?*
2. *To what extent were the actions of implementing officials consistent with the objectives and procedures outlined in the original policy announcement and the Gas Tax Fund Agreement?*
3. *To what extent were the policy objectives attained over time? To what extent were the outputs and impacts consistent with the objectives?*
4. *What were the principal factors affecting policy outputs and impacts, both those relevant to the policy design and those related to the policy implementation?*

While many definitions of implementation have been formulated, this study uses one of the most influential definitions in this field of research given by Mazmanian and Sabatier (1981, pp. 5-6):

“Implementation is the carrying out of a basic policy decision usually incorporated in a statute but which can also take the form

⁷ Some of these research questions have been adapted from the implementation analysis work of Sabatier and Mazmanian (1989, pp. 13-14) that inspired the analytical framework that will guide the case study analysis in this dissertation. This work has “been around for several years; it has been subjected to extensive empirical testing; and it is viewed by some observers (Alterman, 1983; Goggin, 1984) as a leading proponent of the top-down approach to implementation” (Sabatier, 1986, p. 22).

of important executive orders or court decisions. Ideally, that decision identifies the problem(s) to be addressed, stipulates the objective(s) to be pursued, and, in a variety of ways, 'structures' the implementation process."

In this process, "implementing officials"⁸ refer to those individuals that are responsible for executing the policy decision. This decision will be implemented to achieve specific policy "objectives," which are the overall expected results. Once implemented, the policy will result in a number of "outputs," and will have specific "impacts," also referred in the literature as outcomes. The term "outputs" in this study refers to "what government actually delivers as opposed to what it has promised or has authorized" in the policy (Hogwood & Gunn, 1992, p. 16). In general, these government actions can take many forms, such as the transfer of resources, the delivery of goods and services, and the enforcement of rules. On the other hand, the term "impact" refers to "the things that are actually achieved, whatever the objectives of the policy may have been; they are real results, whether intended or unintended and are not government actions (Lane & Ersson, 2000, p. 63)."

In the case of the Gas Tax Fund transfer, as it will be further explained in Chapter 4, the implementing officials belonged to Infrastructure Canada, the Provinces, the Territories, and the municipalities. Moreover, in the case of British Columbia and Ontario they also belonged to the municipal associations, the Union of British Columbia Municipalities (UBCM), and the Association of Municipalities of Ontario (AMO)

⁸ In this dissertation implementing officials will also be referred as implementors.

respectively. According to the Integrated Results-based Management and Accountability Framework developed by Infrastructure Canada (2007b), the Gas Tax Fund focused on three objectives: the achievement of environmentally sustainable municipal infrastructure goals; the promotion of integrated, community sustainability plans; and a collaborative approach to helping build competitive, sustainable cities and communities, involving transformative partnership. Among the expected outputs from the municipalities were: being informed and supportive of the policy process; maintaining a collaborative involvement; and complying with the Agreement terms. Finally, based on the program objectives, the expected impacts of the program were: the informed and supportive involvement of broad communities of Canadians; the achievement of benefits derived from improved infrastructure; and a legacy of collaboration and improved community capacity and actions within the context of integrated community sustainability plans.

METHODOLOGY

To answer the stated research questions this dissertation uses both qualitative and quantitative research methods of inquiry, which include the use of econometrics, and two case studies. The sources of information and data include both primary and secondary research material pertaining to policy design and implementation, fiscal federalism, transfer payments, the Gas Tax Fund, municipal government finance, municipal infrastructure spending, and municipal operating decisions. The primary research consists of semi-structured interviews (over the phone, in-person, and via email) with 41 key

informants⁹ conducted in Ontario and British Columbia¹⁰ between 2007 and 2011.¹¹ These key informants belonged to: (a) the political and bureaucratic spheres of the Federal government and the municipal governments of the City of Ottawa, the City of Toronto, the City of Kelowna, and Metro Vancouver; (b) the AMO; (c) the UBCM; and (d) the Federation of Canadian Municipalities (FCM). The secondary research consists of an extensive academic literature review, municipal data analysis, and relevant document review.

The focus of the empirical research is the province of Ontario. This province was chosen for three reasons. First, as previously mentioned, it is the only province that has a municipality as a direct signatory, and it is one of only two provinces where a non-government body was chosen to fulfil such an important role for the administration of a federal program. This unique and interesting arrangement raises questions about: (a) accountability; (b) the capacity of the AMO to fulfill its responsibilities and ensure the achievement of the program objectives; (c) the impact on the relationship of the municipalities with the AMO, which also has to fulfill its advocacy role; and (d) the

⁹ Some of the key informants were interviewed several times over the course of the research.

¹⁰ While the primary focus of this dissertation is the province of Ontario, the interviews conducted on British Columbia provided useful context on general issues related to the design and implementation of the Gas Tax Fund Program.

¹¹ The interviews were conducted on a confidential, anonymous and not-for-direct attribution basis. Those conducted in-person or over the phone lasted, on average, 60 minutes. For the interviews' supporting documents, including a copy of the letter of information, consent form given to participants, and a sample of the interview questions, see Appendix A.

rationale and implications of the decision to allow the City of Toronto to become the only municipality across Canada with a direct deal with the Federal government.

Second, Ontario is a good subject for the study because, compared to the other provinces, it has many municipalities (119) with a population of 18000 or more, which is the cut-off that was chosen for the econometric analysis (Chapter 6). This population size was selected because smaller municipalities get less than \$1.5 million in Gas Tax funding, which was not considered a large enough amount to make a difference in their investment and operating decisions. On the other hand, a data set including only larger municipalities would have significantly reduced the number of observations.

Third, in relation to access to information, the AMO has been fulfilling its reporting requirements every year, and has continued to offer many background documents, press releases, outcome updates, and other official documents related to the program on its website. No other province, with the exception of B.C., has this amount of readily available Gas Tax Fund information. Moreover, the Ontario Ministry of Municipal Affairs and Housing provides online the Financial Information Return (FIR), a set of year-end reports that capture financial and statistical information for each municipality in the Province. This data set contained the required data for the econometric analysis.

Qualitative Inquiry

To answer the research questions, this dissertation uses the case study approach to study the design and implementation of the Gas Tax Fund, including its outputs and outcomes, in Ontario from 2005 to 2010. This research is divided in three separate case studies, each focusing on a different level of government, and representing a different level of analysis. Since the Gas Tax Fund is a federal program, the first case study overviews the emergence and design of the policy at the federal level (Chapter 4). Since the focus of the dissertation is Ontario, the second one examines the design and implementation of the Gas Tax Fund in the province (Chapter 5). The third one focuses on the municipal level by looking at the implementation of the policy in the City of Toronto and the City of Ottawa (Chapter 7).

The rationale for choosing Ottawa and Toronto is that each represents a different and interesting case study. With over 2 Million people, Toronto is the largest municipality in Canada and, as explained before, it is the only municipality with a direct deal with the Federal government. Its total allocation over the five years of the original Agreement was \$407.3 million. With such a substantive allocation, Toronto is in the position of covering important infrastructure capital expenditures. Including Ottawa, whose allocation was \$125.8 million, is a way of assessing the potential impact of different levels of funding, and different funding priorities. Moreover, having these case studies allows for the evaluation of how different the administration and impact of the

funds is on a municipality that deals with the AMO vs. one that is accountable directly to the Federal government.

Quantitative Inquiry

To answer the question related to the attainment to the policy objectives over time, and more specifically to achieving environmentally sustainable municipal infrastructure goals this dissertation looks at the financial data reported by the AMO on the municipal expenditures of Gas Tax Fund resources (Chapter 6). Analysis of this data allows for the understanding of the types of projects that have been completed, the amount of Gas Tax Fund resources that have been spent, and the total value of the municipal investments.

At the same time, to quantify the impact of the Gas Tax Fund that, as the transfer payment theory predicts, can range from complete substitution to stimulation this dissertation includes an econometric analysis. This analysis is interesting because the Gas Tax Fund agreements have an incrementality clause where municipalities agreed not to claw-back their infrastructure spending with respect to an agreed period before the implementation of the program. Regression analysis is used to show if that was the case, or if there was any direct or indirect substitution of funds. The analysis uses municipal financial statistical information collected from the FIR tracing the historical municipal spending on infrastructure from 2001 to 2008, and the state of their finances.

Analytical and Theoretical Framework

To explain the findings of the research, this dissertation uses a policy design and implementation framework, and an intergovernmental transfer payment theoretical framework. These frameworks, which will be explained in detail in Chapter 2 and 3 respectively, guide the analysis of the design and implementation of the Gas Tax Fund in Ontario, provide a logical organization of the empirical findings, establish the relationship between the concepts previously outlined, and, finally, situate the dissertation's conclusions on the public policy and fiscal federalism literature.

OVERVIEW OF CHAPTERS

This dissertation proceeds in four sections. The first comprises this chapter and chapters 2 and 3. This introductory chapter outlined the research questions, the purpose of the research, and the methodology (Appendix A further details the methodology). Chapter 2 outlines the policy design and implementation framework that will guide the analysis on this dissertation's empirical findings. More specifically, it describes the three dimensions that are the focus of the framework: the socio-political and economic context of the policy; the stages of policy development and implementation; and the internal and external variables that affect the likelihood that a policy will achieve its intended impact. Chapter 3 focuses on intergovernmental fiscal transfers and outlines a theoretical framework of instrument choice and design. It describes the justifications used by central governments for the use of intergovernmental transfers, the transfer payment taxonomy,

the effects that transfer payments can have on the fiscal choices of the recipient governments, and the choices that are involved in the process of designing a transfer system.

The second section, consisting of Chapter 4, examines the socio-political and economic context of the policy and its design at the federal level. The chapter describes the provisions and practices that guide the use of intergovernmental fiscal transfers in Canada's complex fiscal framework. It explores how urban issues arose on the Government's agenda from the early 1990s to 2004 leading to the establishment of the Gas Tax Fund. The chapter also describes how the policy was designed, and it overviews its main features.

The third section, consisting of Chapters 5, 6, and 7, focuses on the Ontario case study and the research findings. Chapter 5 looks at the provincial level, Chapter 6 addresses the municipal level in aggregation, while Chapter 7 concentrates on the two municipalities chosen for the case studies, i.e. the City of Ottawa and City of Toronto.¹² Chapter 5 starts by looking at the political context of the policy in the province explaining why and how in Ontario there were three signatories in the Agreement. It then identifies Ontario's particular arrangement in relation to governance, administration, and

¹² Due to methodological issues, the chapters in this section cover different periods. Chapter 5 and 7 begin just before the signing of the Agreement in 2005 and cover developments until December 2009. While Chapter 6, due to changes to the municipal accounting practices in Ontario in 2009, focuses on the 2005-2008 fiscal periods.

accountability. Chapter 5 concludes by describing the AMO's role and performance as the implementor of the policy. Chapter 6 covers the econometric analysis and an overview of municipal investment decisions. More specifically, it focuses on the Gas Tax Fund allocation in Ontario, the eligible projects, and the expenditure decisions of the municipalities. Chapter 7 presents a detailed case study of the City of Ottawa and the City of Toronto. This case study explores the program's impact on the cities' investment decisions, their operations, and their relationship with the Federal government. It also analyses the policy outputs and achievement of program objectives.

The fourth and final section, consisting of chapter 8, overviews the main findings and suggest potential avenues of research. While specific conclusions are presented at the end of each chapter, Chapter 8 establishes the links between the chapters by addressing each of the four research questions that guided the research endeavours for this dissertation.

CHAPTER 2

A POLICY DESIGN AND IMPLEMENTATION FRAMEWORK

INTRODUCTION

According to Pal (2001, p. 181), “implementation and policy design are conceptually distinct; design is the blueprint of a policy, while implementation is its execution.” Once the donor government has chosen the design of policy, the next step in the process is to translate the policy into action. Due to the potential significant impact that this step could have on the success or failure of a policy, i.e. its effectiveness, a field of implementation research emerged in late 1970s and the early 1980s.¹ This research, as O’Toole (Research on Policy Implementation: Assessment and Prospects, 2000, p. 266) explained, “concerns the development of systematic knowledge regarding what emerges, or is induced, as actors deal with a policy problem.” Moreover, it focuses on highlighting the problematic of implementation and on identifying key factors influencing implementation outcomes. Despite this clear focus, the extensive research in the field has produced a plurality of approaches to implementation. These approaches are based on “different research designs, varieties of models, and especially proposals for adding a

¹ See, for example, Pressman and Wildavsky (1984); Gunn (1978); Mazmanian and Sabatier (1981); Hood (1976); and Hanf and Scharpf (1978)

bewildering array of variables as part of the explanation for the implementation process and its products” (O’Toole Jr., 2000, p. 264). Today, while there is still not one congruent implementation framework, implementation research is still a critical part of public policy studies because implementation is a “major stumbling block in the policy process, [and]... one of the most heavily utilized areas of policy analysis” (Lester & Goggin, 1998, p. 1).

This chapter describes the design and implementation framework that, in conjunction with the intergovernmental fiscal transfer framework described in the next chapter, guides the analysis of the empirical findings of this dissertation. More specifically, while it does not provide hypotheses for formal testing, this framework provides a logical organization of the dissertation’s findings in Chapters 5, 6, and 7. At the same time, it situates the conclusions in those chapters and in Chapter 8 on the public policy literature by establishing the links between the variables and concepts outlined in the framework and the findings. On the other hand, it is beyond the scope of this dissertation to subject the framework to evaluation as a result of the research findings.²

The chapter proceeds in two sections. In the first section, this chapter overviews the history of implementation research looking at the first, second, and third generation of

² This means that the framework will not be modified or adapted in any way in the concluding chapter.

studies.³ The objective of the section is to provide a background for the framework described in detail in the following section. In the second section, the framework is deconstructed and explained focusing on its three dimensions: (1) the socio-political and economic context of the policy; (2) the stages of policy development and implementation; and (3) the internal and external variables that affect the likelihood that a policy will achieve its intended impact. The relationship between the three dimensions is presented in a visual format in Figure 3.

OVERVIEW OF THE DEVELOPMENT OF IMPLEMENTATION RESEARCH⁴

For a long time, “the study of policy implementation suffered from a ‘black box’ approach,” as Younis and Davidson (1990, p. 3) explained, “in that it was assumed that policy decisions were automatically carried through the implementation system as intended and with the desired end results.” This situation changed, arguably, when Pressman and Wildavsky (1984) published the results of their review of a federally funded urban job-creation program, the Oakland Project, in the United States.⁵ The study

³ In their review of previous implementation research, Goggin et. al (1990) divided existing implementation studies into two generations and propose the emergence of a third generation. This division into generations has been chosen to guide the overview in this dissertation because it has been widely adopted in the implementation literature. Under this approach, the first generation of research ranges from the early 1970s to the '80s; the second generation from the 1980s to the early 90s; and the third generation research starts in 1990 and continues onward.

⁴ The intention of this section is not to provide a comprehensive review of the vast implementation literature, but rather to briefly overview its evolution in order to contextualize the implementation analytical framework that will be defined in the following section. As such, emphasis will be placed on the second generation studies from which the framework has been adapted. For a comprehensive review of the implementation literature see, for example, Lester, O’Bowman, Goggin, & O’Toole Jr. (1987).

⁵ While they claimed to have been the first ones to do implementation research, evidence suggests that this was not the case. According to Hill and Hupe (2002, p. 18), while the word was seldom used, “earlier work

sought to explain why only \$3 million of the \$23 million employment initiative had been spent three years after the program had been implemented by the Economic Development Administration, a federal agency. The failure of this program was not self-explanatory since, as the authors pointed out, funding was available, it had political support and the initial agreement of local officials was forthcoming (Pressman & Wildavsky, 1984, p. xx).

Presman & Wildavsky's research was important because it "highlighted an enormous gap in policy analysis literature since it demonstrated that the execution and delivery of policy was a central determinant of policy outcomes" (Ryan, 1995, p. 65). The new focus of this area of research was seen as so promising that Hargrove (1975) qualified implementation studies as 'the missing link', that is, able to explain the complexities of turning an idea into a successful policy. The subsequent plethora of theories and conceptualizations that emerged because of this research generated academic debate that was originally "polarized around the apparently competing claims of the so-called 'top-down' and 'bottom-up' approaches [...] associated with differing value and disciplinary perspectives on the role of policy in governance" (Barrett, 2004, p. 255).

had involved trying to reinforce longstanding concerns in public administration with ideas of organization theory in the implementation part of policy."

First Generation

The first generation of implementation research consisted of case study analyses dealing with the relevance and importance of implementation to broader policy processes. These studies were, for the most part, concerned with describing the barriers to successful policy implementation. Moreover, they came to “the pessimistic conclusion that government-sponsored programs seldom achieve their objectives” (Lester, O’Bowman, Goggin, & O’Toole Jr., 1987, p. 201).⁶ As previously mentioned, the celebrated founding fathers of this generation were Pressman and Wildavsky (1984). According to deLeon and deLeon (2002, p. 469), the end product of this generation “was a cornucopia of fascinating idiographic case studies, each with its own prescribed lessons, but little in terms of a generic implementation theory.” This point was further supported by Ryan (1995, p. 66) who argued that “despite some suggestions regarding better implementation, [this body of work] failed to develop systematic models addressing either the dynamics of the process or failures in achieving program objectives.” Other researchers criticized some case specific methodologies employed to examine implementation issues and influences (Yanow, 1993; Goggin, 1986). Nevertheless, despite these criticisms, Mazmanian and Sabatier (1989, p. 5) argued that these works made an important contribution to the existing public administration literature. More specifically, they argued that this research: (a) expressed explicit concern with evaluation and political behaviour in addressing the extent to which policy objectives were achieved

⁶ This pessimism, which was characterized as “unnecessary” by several researchers, including Bardach (1977), was seen as one of its weaknesses.

and the reasons for the performance; (b) provided a focus on complex interactions between multiple actors in public and private institutions rather than previous concerns with single agencies and their environments; and (c) analysed causal assumptions implicit in achieving policy goals.

Second Generation

The second generation of research was concerned with the identification of the influences and issues that affect policy outcomes, and with developing coherent models of implementation. Compared to the first generation, these studies were “more analytical and comparative” (Sabatier, 1986, p. 21). Moreover, this research was “dedicated to finding the best way to move a policy proposal to its successful fruition” and, as deLeon and deLeon (2002, p. 470) argued, it was “much more sophisticated and consciously theoretic.” The work from this generation highlighted implementation variances over time, across policies, and between governments (Goggin, O’Bowman, Lester, & O’Toole, 1990b, p. 14). It identified the main influences likely to affect implementation and policy outcomes. It began the task of developing systematic frameworks for implementation analysis. As Ryan (1995, p. 67) explained, “from this quest emerged several schools of thought differing as a consequence of underlying assumptions and perspectives” regarding the roles of the initial policy-maker and of the field-level implementor. The debate between these schools has been described as one between the ‘top-down’ and the ‘bottom-up’ perspectives, which are further explained below.

a) Top-down Approach

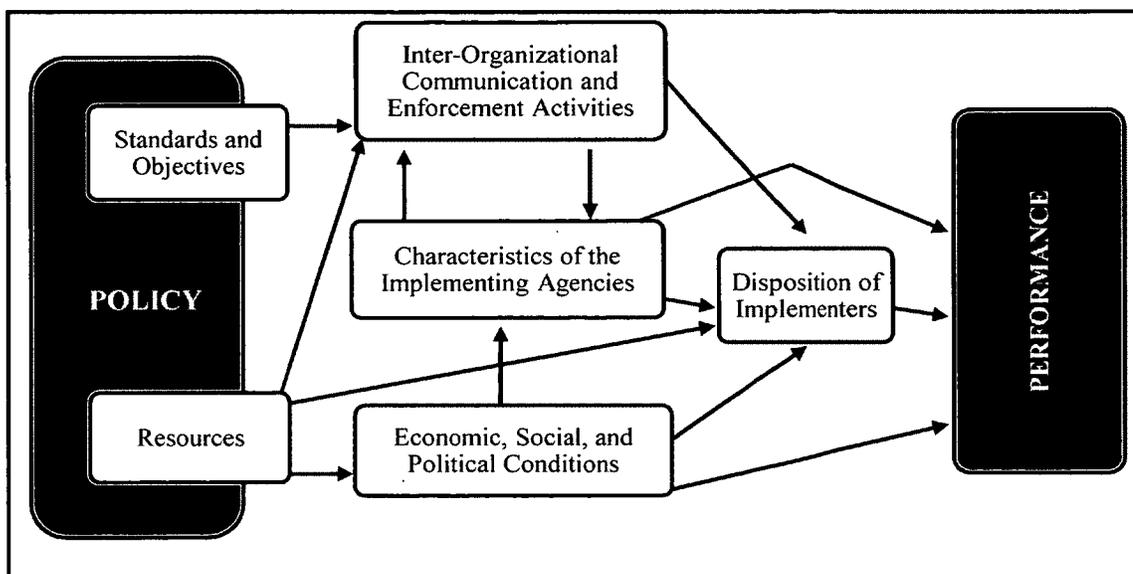
This approach, which can be qualified as prescriptive, emphasises that policy is made at the top and is then executed by agents/implementers at the bottom in compliance with policy objectives. These agents are those that have been given the funds, authority, and responsibility for achieving the policy objectives. Thus, a key element of this approach is the identifications of “where governmental actions stops and where the actions of implementers begin” (Younis & Davidson, 1990, p. 6). This emphasizes that the approach works under a framework that recognizes not only “traditional structures of governance and public sector organization,” but also “the separation of politics and administration” (Barrett, 2004, p. 254).

According to Barrett (2004, p. 255), the objective of these type of studies, was to “identify the causes of implementation problems or failure, and suggest ways of enhancing the likelihood of obtaining compliance with policy objectives.” More specifically, the issues raised under this approach, as Talib and Davidson (1990, p. 8) summarized, are concerned with: (a) the extent to which policymakers exercise control over the environment in which policy is made and over the implementers of policy; (b) the extent to which policy is changed by the implementers; (c) whether policy can be separated from implementation; and (d) whether it is proper for policymakers to exercise so much control over the process.

Some important works within this school include Van Meter and Van Horn (1975), and Mazmanian and Sabatier (1989).

At the center of Van Meter and Van Horn's (1975, pp. 458-461) framework was the idea that policies should be classified according to the amount of change required for their implementation, and the level of goal consensus among the participants in the implementation process. Their hypothesis was that success will be achieved under conditions of marginal change and high goal consensus. Their proposed analytical framework (in Figure 1 below) assumed that the implementation process started from an initial policy decision, had six variables linking policy and performance, and presented the process as a series of stages.

Figure 1: A Model of the Policy Implementation Process



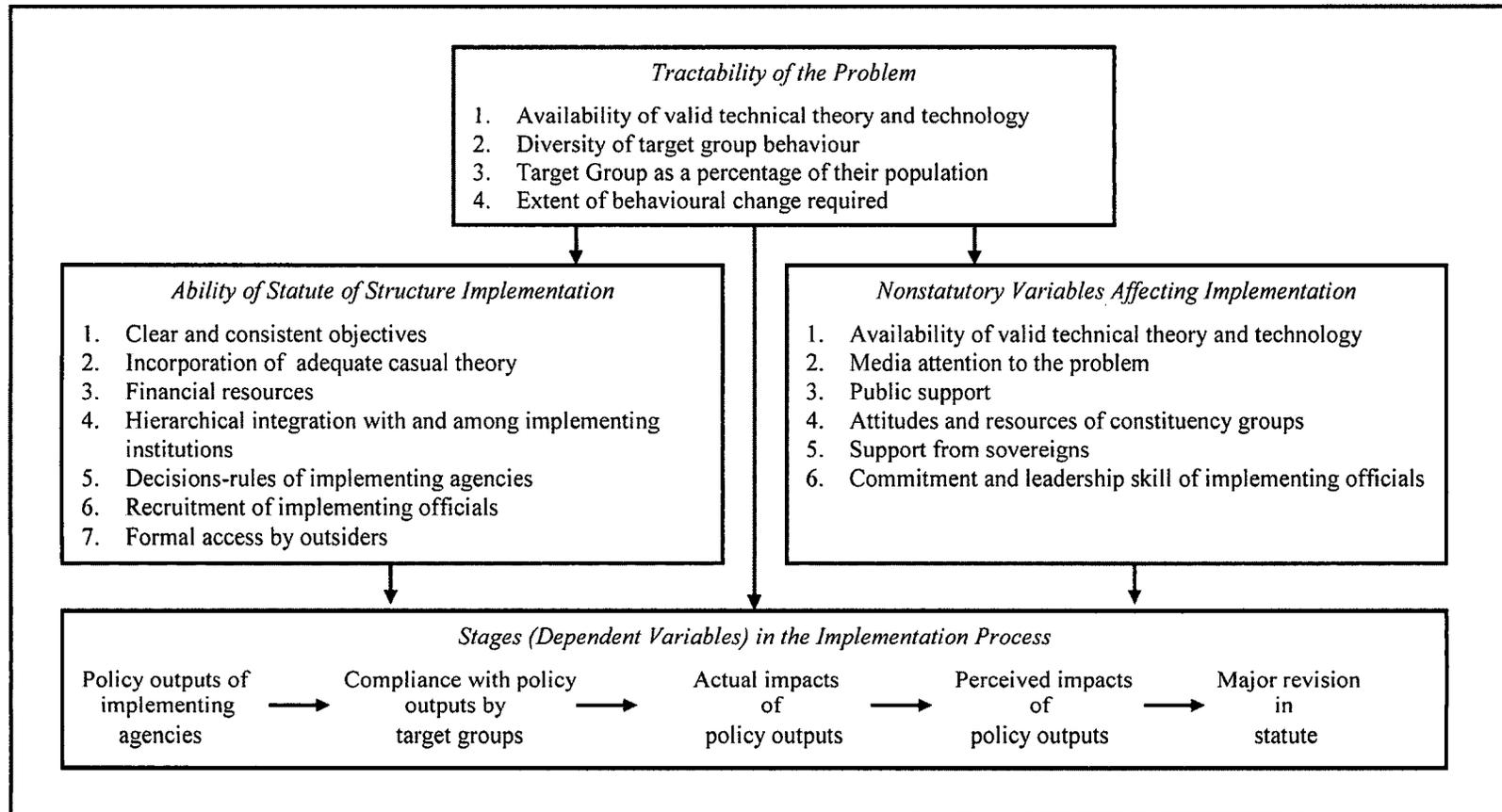
Source: Adapted from Van Meter & Van Horn (1975, p. 463)

As Figure 1 shows, the first variable is policy standards and objectives, which must be identified and measured in order to judge the policy success or failure. The second is the resources, which are necessary to facilitate administration. The third is the quality of the inter-organizational communications, regarding the policy standard and objectives, and the quality of enforcement activities. The fourth is the characteristics of the implementation agency in relation to its formal structural features, the informal attributes of its personnel, and its ties to other participants in the policy delivery system. The fifth is the economic, social, and political environment affecting the jurisdiction or the organization within which implementation takes place. The final variable is the ability and the

willingness of the implementers to carry out the policy which can be affected by their cognition (comprehension, understanding) of the policy, the direction of their response toward it (acceptance, neutrality, rejection), and the intensity of that response (Van Meter & Van Horn, 1975, pp. 463-472).

Another key contribution to this generation, as previously mentioned, was made by Mazmanian and Sabatier (1981). Their proposed analytical framework (in Figure 2 below) also assumes a clear distinction between policy design and implementation, but includes the possibility of a feedback process. For Mazmanian and Sabatier (1981, p. 6) the dependent variable is the stages of the implementation process, and the independent variables are those factors that affect the implementation process. These factors can be divided into three broad categories: (1) the tractability of the problem(s) being addressed by the statute; (2) the ability of the statute to structure the implementation process favourably; and (3) the net effect of a variety of political variables on the balance of support for statutory objectives. The framework provides a methodology for legislators and chief executives to identify the factors that could cause difficulties and those that could be controlled in the implementation process. Moreover, it also provides a checklist that can be used by implementors in order to estimate the probability that a statute will achieve its mandated objective (Mazmanian & Sabatier, 1981, p. 25).

Figure 2: Skeletal Flow Diagram of the Variables Involved in the Implementation Process



Source: Adapted from Mazmanian and Sabatier (1981, p. 7)

Based on this framework Mazmanian and Sabatier (1981, p. 30) also provided a list of crucial conditions that would improve the likelihood that a policy, especially one that seeks a substantial departure from the status quo, will achieve the desired goals. First, the enabling legislation should: mandate policy objectives which are clear and consistent; incorporate a sound theory identifying the principal factors and causal linkages affecting policy objectives and the changes in the behaviour of target groups; conditions necessary to attain the desired goals; give implementing agencies sufficient jurisdiction over the target groups and other critical areas of intervention; and structure the implementation process so as to maximize the probability that target groups will perform as desired. Second, the leaders of the implementing agency should possess substantial managerial and political skill and should be committed to statutory goals. Third, the program should be actively supported by organized constituency groups and by a few key legislators throughout the implementation process. Finally, the relative priority of statutory objectives should not be undermined over time by the emergence of conflicting public policies or by changes in relevant socio-economic conditions that challenge the statute's causal theory or political support.

While it was seen as an improvement over the first generation studies, the work of researchers using the top-down approach was widely criticised, in particular by the bottom-up researchers. After a review of the literature the main

criticisms were summarized by Ryan (1995, pp. 67-68): (1) the unwillingness to accept implementation control by target groups and 'street-level' bureaucrats; (2) too much attention given to the role and strategies of the 'centre,' thus ignoring other important actors in the implementation process; (3) too much dependence on the capacity of policy objectives to be clearly and consistently defined; (4) the difficulty of separating policy formulation and implementation; (5) the lack of recognition that inevitably programs will permit some level of discretion which will limit the capacity of central management to control implementation processes; and (6) the underestimation of the capacity of implementing actors to divert policy.

b) Bottom-up Approach

Emerging as a response to the perceived weaknesses of the 'top-down' perspective, the bottom-up researchers were no longer interested in conceptualizing implementation success or failure as related to meeting objectives. Instead, they focused on determining the capacity of implementors, which have been referred in this literature as 'street level bureaucrats' (Weatherley & Lipsky, 1977), to influence the behaviour of target groups. Under this approach these researchers studied the strategies pursued by the implementors in a policy network, who interact at the operational (local) level on a particular problem or issue, as they tried to meet their own objectives (Sabatier, 1986, p. 22). Moreover, as Barret (2004, p. 256) explained at length:

This approach was “associated with those advocating a micro-political view of intra- and inter-organizational behaviour, and included a range of models, some emphasizing consensus building, influence and exchange processes (persuasion, positive-sum negotiation and learning), and others emphasizing conflict and the exercise of power (zero-sum negotiations and power bargaining) in the policy-action relationship.

The seminal works under this approach are considered those by Lipsky (1980), by Hjern and his colleagues (Hjern & Hull, 1982; Hjern & Porter, 1981), and by Elmore (1979/1980).

Lipsky (1980), considered by some as the founding father of this approach,⁷ argued for decentralisation of control of government programs, and highlighted the importance of street-level bureaucracy in the delivery of public policy. According to Hill & Hupe (2002, p. 53) one of the key contributions that Lipsky made to this approach was “suggesting that the preoccupation of the top-down perspective with attempting to control the hierarchy from the top is beside the point because the implementation of policy is really about street-level workers with high service ideal exercising discretions under intolerable pressures.”

Instead of focusing on particular individuals, Hjern and his colleagues focused on the fact that implementation depends upon the interactions within “implementation structures” formed from “within pools of organizations” and

⁷ See, for example, Hill & Hupe (2002, p. 51), and Ryan (1995, p. 68)

“through processes of consensual self-selection” (Hjern & Porter, 1981, p. 220). Among the strengths of this approach, summarized by Sabatier (1986, pp. 33-34), are that, first, they develop an explicit and replicable methodology for identifying a policy network. Second, they are able to assess the relative importance of a variety of governmental programs vis-a-vis private organizations and market forces in solving actor’s perceived problems. Third, they are able to deal with a policy area involving a multitude of public and private programs, none of them preeminent.

Elmore’s (1979/1980) approach was more focused in how to study implementation instead of offering rules about how to control the process (Hill & Hupe, 2002, p. 58). He proposed the idea of ‘backward mapping’ which is an approach to analysing implementation that does not assume that policy is the only influence on the behaviour of people engaged in the process, does not rely on compliance with the policymaker’s intent as the standard of success or failure, and begins at the point where the problem is most immediate (Elmore, 1979/1980, p. 604). The logic of the approach is as follows:

“Begin with a concrete statement of the behaviour that creates the occasion for a policy intervention, describe a set of organizational operations that can be expected to affect that behaviour, describe the expected effect of those operations, and then describe for each level of the implementation process what effect one would expect that level to have on the target behaviour and what resources are required for that effect to occur” Elmore (1979/1980, p. 612).

Once the frameworks from both the top-down approach and bottom-up approach were proposed, their authors and others took on the endeavour of testing them. According to Van Horn (1987) four broad lessons emerged from this process:

“First, the frameworks were quite useful in constructing general explanations for policy implementation success and failure. Second, implementation researchers demonstrated that time periods are very important to implementation research. Third, some programs were successfully implemented. Finally, scholars found that even the simplest modest program can fail” (as summarized in Lester, O’Bowman, Goggin, & O’Toole Jr., 1987, p. 205).

Despite this contribution there were perceived problems with the bottom-up models. For example, as deLeon and deLeon argued (2002, p. 470), this approach “undermined any idea of a relatively expeditious implementation process, and there were occasions when a top-down perspective or command orientation seemed more in order than a bottom-up approach (e.g., national security, many legal judgments, or technically driven decisions).”

More specifically, the main shortcomings and limitations of the approach, as summarized by Ryan (1995, pp. 69-70), were: (1) the diversion of legitimate authority away from elected officials towards civil servants and interest groups; (2) the emphasis placed on actor interaction and developing strategies to solve a problem, rather than on the problem of implementing government policy interpreted as carrying out a government decision; (3) the miscalculation of the constraints affecting implementors such as resource limitations, organisational

boundaries, social imperatives or legal structures; (4) the fact that implementors operate within certain paradigms which may be divorced from broader social, economic or political objectives; and (5) the absence of clear objectives which limits the capacity to evaluate the broader public benefits of programs.

Third Generation

The third generation of research was focused on synthesis and revisions. These researchers tried to develop analytical frameworks that combined the positive elements of both the top-down and bottom-up approaches while avoiding their weaknesses. Their intent was to “achieve an ambitious and difficult goal: theory building and validation based on more rigorously scientific, quantitative (both comparative and longitudinal), hypothesis testing” (Goggin et al., 1990a). Among the key works of this generation were Goggin et al. (1990b), Sabatier (1986), and Winter (1990).

Goggin et al. (1990b, p. 18) argued that “the objective of third-generation research is to be more *scientific* than the previous two [generations] in its approach to the study of implementation.” They sought to explain “why behaviour varies across time, across policies, and across units of government by predicting the type of implementation behaviour that is likely to occur in the future” (Goggin et al., 1990b, p. 18). Their model, which they called “the communications model of inter-governmental policy implementation,” placed emphasis upon what affects the acceptance or rejection of

messages between layers of government and outlined three types of variables: (1) independent variables – federal-, state-, and local-level inducement constraints; (2) intervening variables – organizational, ecological, feedback and policy capacity; and (3) dependent variable – state implementation (1990, p.32). Based on the model, they made seventeen hypotheses (often utilizing concepts of game theory or principal-agent theory) about the implementation process. Among the criticism of this approach is that these hypotheses are “hopelessly awash in ambiguities, and provide little attention to defining terms and calibrating measurements” (deLeon & deLeon, 2002, p. 472).

The “advocacy coalition framework” proposed by Sabatier (1986), focused on the analysis of policy change over periods of a decade or more. More specifically, it adopted from the bottom-uppers “their unit of analysis – a whole variety of public and private actors involved with a policy problem - as well as their concerns with understanding the perspectives and strategies of all major categories of actors,” and from the top-downers “their concerns with the manner in which socio-economic conditions and legal instruments constrain behaviour” (Sabatier, 1986, p. 39). As Sabatier (1986, p. 40) explained, the central premise of the framework was that “the most useful aggregate unit of analysis for understanding policy change in modern industrial societies is not any specific governmental organization but rather a policy subsystem, i.e. those actors from a variety of public and private organizations who are actively concerned with a policy problem or issue.”

Winter (1990, p. 20) tried to present “a preliminary model to explain implementation outcomes by identifying some of the key variables, and by suggesting how these variables can be brought together in one model.” The simple model is based on four interrelated socio-political processes or conditions that affect implementation outcomes: the character of the policy formation process prior to the law or decision to be implemented; the organisational and inter-organisational implementation behaviour; street-level bureaucratic behaviour; and the response by target groups and other changes in society (1990, p. 20). More specifically, Winter (1990, p. 36) argued that “these processes can be found in different phases of the policy process,” thus proposing that implementation and policy formation need to be considered concurrently, and that the relative importance of each of them would vary cross policy areas.

As can be seen from this concise overview of the development of implementation research in the first, second, and third generation, “the implementation problem was reconceptualised in somewhat different fashions, and work proceeded along a number of parallel, overlapping, and highly relevant lines of research” (O’Toole Jr., 2000, p. 268). While this plurality of approaches could be considered a weakness in implementation analysis, according to Ryan (1996, p. 34) this actually “strengthens its capacity to address the diversity of policy situations confronting public administration practitioners.” More recently, in order to enrich this field of research, analysts have been advocating for the

consideration of works on implementation in other areas. For example, in this regard, Meir (1999, pp. 6-7) argued that:

“My biased survey of literature suggest[s] that a wide range of journals publish articles that inform the study of policy implementation—the mainstream sociology journals, most of the public administration journals, the professions journals (public health, social work, sometimes law or medicine), many of the economics journals, and on rare occasion a political science journal. Much of this literature is not intended to directly answer questions of policy implementation, but it addresses concerns that are central to policy implementation.”

Among the directions taken by this literature are institutional analysis, the study of governance, and the study of networks and network management⁸ Overall, while in the study of policy implementation weaknesses are still apparent and issues are still unresolved, there is still room for the broadening and enrichment of the relevant research enterprise (O’Toole Jr., 2000).

THE FRAMEWORK

The proposed framework used in this dissertation is based on a review of the literature on public policy development and implementation and it draws heavily on a framework developed by Friedman (2003). Friedman’s framework, inspired by the conceptual model of the implementation process developed by Mazmanian and Sabatier (1989), the work done by Elmore (1979/1980) on policy instruments, and the policy analysis research of Dunst and his colleagues (1993), was conceived for studying policy

⁸ However, because the research done under these rubrics reaches “considerably beyond the implementation problem” by looking at “the subject of public administration more generally” its overview is beyond the scope of this dissertation (O’Toole Jr., 2000, p. 274) .

development and implementation in children's mental health. The framework was expected to: "(a) stimulate research on the policy development and implementation field, (b) help policy makers better understand the impact of policy and the advantages and disadvantages of different approaches to policy development and implementation, and (c) make policy makers and advocates think carefully about which features of a proposed policy and its implementation will be most likely to result in positive outcomes" (Friedman, 2003, p. 17).⁹

In order to better reflect the policy context of the case studies of this dissertation, Friedman's framework was adapted with changes inspired by the works of Van Meter and Van Horn (1975), Mazmanian and Sabatier (1989), and Winter (1990). The modified framework focuses on three dimensions: (1) the socio-political and economic context of the policy; (2) the stages of policy development and implementation; and (3) the internal and external variables that affect the likelihood that a policy will achieve its intended impact.

⁹ In particular, the framework was meant to challenge policy makers to consider the following points: "(1) the potential advantages of a backward mapping approach to a forward mapping approach, given the emphasis on developing community-based systems of care; (b) the importance of a valid and clearly stated theory of change; (c) the value of selecting appropriate accountability procedures that are tied to the theory of change, provide practical information, and are not excessively oriented toward the monitoring of compliance with procedures; (d) the relative value of capacity building and system change strategies in comparison to mandates and inducements; and (e) the importance of giving at least as much thought to policy implementation strategies as is given to the content of the policy itself (Friedman, 2003, p. 17).

The Social, Political, Economic, and Legal Context of the Policy

Policymaking does not happen in a vacuum; every stage of the process is influenced by the social, political, economic, and legal context. For example, the emergence and recognition of the problem can be the result of particular conditions, such as economic downturns, elections, and the emergence of a strong advocacy network. Moreover, in the policy design stage, these conditions “may constrain or encourage the use of particular policy instruments (Howlett, 1991, p. 4).” These conditions, as Van Meter and Van Horn (1975, p. 471) argued, “may have a profound effect on the performance of implementing agencies.”¹⁰ This point was further supported by Berman (1980, p. 213) when he explained that “the effectiveness of implementation strategies depend on how they interact with the constraints inherent to the policy situation, i.e. the context which policy makers cannot affect.” The degree of impact of these variables on public policy, as Sharkansky and Hofferbert (1969, p. 878) explained, “varies with the dimensions of each phenomena that are at issue.” At the same time, since the context is likely to vary at the local level, their degree of influence on the policy’s overall implementation will reflect local differences (Berman, 1980, p. 213).

¹⁰ According to Van Meter and Van Horn (1975, p. 471) in the late 1960s and early 1970s, the impact of economic, social, and political conditions on public policy was the focus of much attention especially by researchers in the field of comparative state politics and public policy. This research was focused on identifying the influence of these environmental variables on policy outputs. See, for example, Sharkansky (1967); Sharkansky and Hofferbert (1969); Cnudde and McCrone (1969); Dye (1966); and Hofferbert (1964).

Stages of Policy Development and Implementation

According to Anderson (1975, p. 19), the policy process is a “sequential pattern of actions involving a number of functional categories of activities that can be analytically distinguished.”¹¹ In this dissertation these actions, which do not necessarily occur in a linear fashion and might overlap, are recognized as: problem emergence, formulation, development, implementation, and evaluation.¹² As Altman and Petkus (1994, p. 38) explained at length, the relation between the stages is as follows:

The first stage of the traditional policy process, problem definition, involves the emergence and recognition of some problem or crisis. Second, policy to address specific problems is formulated by various governmental and non-governmental actors such as legislators, executive branch officials, the courts, citizens and special interest groups. Special policy proposals are adopted in the third stage. The fourth stage is policy implementation, wherein the adopted alternatives are executed by administrative units. Finally, in the policy evaluation stage, policymakers determine whether the policy has achieved its goals.

Furthermore, the last stage, i.e. evaluation, can result in the adoption of changes to the policy or the implementation strategy starting the policy process again, i.e. it incorporates a feedback loop.

¹¹ While many models of the policy process have been proposed, all with its advantages and disadvantages, this “phase” model is recognized as one of the “most common approaches” both in science and in policy practice (Teisman, 2000, p. 938). For example of different models see Laswell (1956), Hogwood and Gunn (1992), and Dror (1989).

¹² In the case study analysis covered by this dissertation emphasis is placed on formulation, development, and implementation.

Policy Development Related Variables

According to Mazmanian and Sabatier (1981, p. 10) the policy design, which “indicates the problem(s) being addressed and stipulates the objective(s) to be pursued” has the “capacity to structure the entire implementation process through its selection of the implementing institutions; through providing legal and financial resources to those institutions; through biasing the probable policy orientations of agency officials; and through regulating the opportunities for participation by non-agency actors in the implementation process.” This framework focuses on six variables related to the policy development stage: (a) mapping approach; (b) consultation and negotiation; (c) clarity of the policy; (d) casual theory; (e) policy instruments; and (f) financial resources.

a) Mapping Approach

According to Elmore (1979/1980, pp. 602-605) there are two clearly distinguishable approaches to policy design and implementation analysis: forward mapping and backward mapping. Forward mapping begins at the top of the process with an objective, it elaborates an increasingly specific set of steps for achieving that objective, and it states an outcome against which success or failure can be measured. The problem with this approach, as Elmore argued, is its implicit and unquestioned assumption that policymakers control the organizational, political, and technological processes that affect implementation. On the other hand, backward mapping begins at the point where the problem is

most immediate with a statement of the specific behaviour that generates the need for a policy. From there, the analysis backs up through the structure of implementing agencies, asking: What is the ability of the specific unit to affect the behaviour that is the target of the policy? And, what resources does the unit require in order to have that effect. Once these questions are answered, the policymaker develops a policy that directs resources at the units likely to have the greatest effect. While forward mapping stresses compliance, uniformity, standardization, and control with centralized authority, backward mapping relies on consultation, delegation, and discretion that disperse authority. Due to their emphasis on different factors, the mapping approach taken by policymakers will result in different types of policies.

b) Consultation & Negotiation

“With increasing complexity in problems facing policymakers and increased numbers of stakeholders in the policy process,” as Altman and Petkus (1994, p. 42) explained, “it has become important for policymakers to allow stakeholders a more active role in the policy development process.” Consultation involves eliciting from the stakeholders their specific interests, concerns, and information in order to design policies that are more responsive to the stakeholder’s needs and, in turn, more likely to achieve the desired objectives. While policymakers using backward mapping approaches are expected to include

stakeholders in the process, those using forward mapping could also benefit from having prior knowledge of stakeholder attitudes and desires.

Among the benefits of including consultation and negotiation in the policy design process is the potential reduction in “litigation to solve policy problems because the various interests can be accommodated before the policy is formulated” (Altman & Petkus, 1994, p. 43). This point was further supported by Gross et al. (1971 , pp. 24-29) when they identified the extent to which implementors have participated in the making of the policy decision as one of the key factors that affect consensus. In relation to the degree of conflict or consensus, Van Meter and Van Horn (1975, p. 461) hypothesized that policy development processes where goal consensus is high results in policies that are successfully implemented. Moreover, they believed that goal consensus has a greater effect on the policy implementation process than the amount of change required. In relation to negotiation Berman (1980, p. 218) argued that “rather than using ‘carrot and stick’ tactics to override disagreements, means for negotiating an acceptable compromise should be sought.” As a result of consultation and negotiation the final policy design and its implementation could be far different from the one originally conceived by policymakers.

c) *Clarity of the policy*

A clear policy is one that goes beyond listing overall goals by providing concrete objectives that are clear, consistent, and ranked in importance. Clear objectives are important because they can “serve as an indispensable aid in program evaluation, as unambiguous directives to implementing officials, and as a resource available to supporters of those objectives (Mazmanian & Sabatier, 1981, p. 10).” When clarity is not achieved, “substantial unanticipated policy changes” can occur as ambiguities may be exploited by implementors to serve their own policies or agency interests (Edwards, 1980, p. 44).

At the same time, as Van Meter and Van Horn (1975, p. 464) argued, sometimes ambiguous objectives are chosen deliberately by policy makers “in order to ensure a positive response on the part of those responsible for implementation at other levels of the organization or the policy delivery system.” Or they may be chosen in an attempt to avoid overwhelming implementors with details that may lead to “goal displacement, rigidity, or the circumvention of regulations (Edwards, 1980, p. 44).

d) *Causal theory*

Every policy contains explicitly or implicitly, a causal theory of the manner in which the objectives are to be attained. As Mazmanian and Sabatier

(1981, p. 11) explained, an adequate casual theory requires: (a) that the principal casual linkages between government intervention be understood and (b) that the officials responsible for implementing the program have jurisdiction over sufficient number of critical linkages to attain the objectives. The problem is that when the validity of the casual theory is uncertain “the application of a programmed strategy can lead to severe implementation problems created, ironically, by the strategy itself” (Berman, 1980, p. 217). The importance of a clear and valid causal theory is reflected in the increased use of tools, such as logic models, to assist policy designers in articulating a clear theory of change that can serve as a guide for the actions of the implementors (Friedman, 2003).

e) **Policy Instruments**

Policy instruments are “techniques of governance which, one way or another, involve the utilization of state resources, or their conscious limitation, in order to achieve policy goals; they are the ‘tools of government,’ the mechanisms and techniques used to implement or give effect to public policies” (Howlett, Kim, & Weaver, 2005, p. 3). The choice of instrument is important because, as Salamon and Lund (1989) suggested, different instruments involve varying degrees of effectiveness, efficiency, equity, legitimacy, and partisan support and changes in a particular situation affects their appropriateness. In this field of research many attempts have been made to produce parsimonious and

comprehensive or generic classifications that would allow comparisons across time, area, and policy domain, but despite the efforts there is still “not one universally accepted typology” (Pal, 2001, p. 135).¹³

For the purpose of the analytical framework, this dissertation will adopt the “deliberately eclectic” classification of policy instruments proposed by Pal (2001, pp. 135-152). This classification assumes that the policymaker’s purpose is to achieve outcomes in relation to the behaviour of individuals; political, social, or economic conditions; and services provided to the public. It provides three broad categories of potential tools for achieving those outcomes: doing nothing; acting indirectly, and acting directly. Option one would be an appropriate action when a “perceived policy problem was not a problem at all, the costs of intervention exceeds the benefits, or when other factors will achieve the desired outcome in the absence of government action” (2001, p. 135). Option two can promote, prohibit or restrain behaviours or outcomes through “affecting the information or values that underpin behaviour (information or exhortation instruments), the calculus of monetary costs, benefits, and resources (expenditure based instruments such as transfer payments and taxes); or stipulating rules and sanctions attached to certain behaviours (regulatory instruments such as licenses and criminal law)” (2001, p. 137). In option three the government achieves its objectives through a state

¹³ See, for example, Kirshen (1964), Doern and Phidd (1992), and Hood (1984).

department, agency or corporation with the use of its own resources and organizational capacity to change conditions or provide services (2001, p. 137).

Woodside (1986, pp. 792-793), explaining the importance of policy instruments as factors in the policy-making process, concluded that: (a) instruments have fairly durable and persistent characteristics that can have long-term impacts on the pattern of politics in a particular area of policy, on who benefits from the policy and on how much they can benefit; (b) each instrument is associated with identifiable policy processes that serve to provide varying degrees of autonomy from the broader political process for those actors normally involved in a particular area of policy; (c) understanding policy instruments plays a useful role in focussing our attention on the broad nature of government intervention in the economy and society and the subtle and multitudinous ways that this intervention can be effected; (d) the specific structure of policy instruments provides an important source of information about the character of a regime and how it is influenced by its various domestic constituencies; and (e) there are important limitations to any conception that governments have a wide-ranging choice of instruments available to them to deal with a specific problem at any one time.

f) Resources

Adequate resources might include “staff of the proper size and with necessary expertise, relevant and adequate information on how to implement the policy and on the compliance of others involved, the authority to make sure that policies are carried out as they are intended,” and monetary funds (Edwards, 1980, p. 11). Monetary funds and other financial incentives in transfer programs, for example, are required to cover not only the allocation costs of the program, but also the administrative costs. The administration costs could include the expenses related to the need to hire new staff, and those related to monitoring and compliance. “Determining what constitutes adequate financial resources, is however, extremely difficult, except to note that it must be related to the seriousness of the problem(s) to be addressed (with per capita allocations often used as a very crude indicator)” (Mazmanian & Sabatier, 1981, p. 32).

Policy Implementation Related Variables

The implementation phase, as Van Meter and Van Horn (1975, p. 448) argued, “does not commence until goals and objectives have been established (or identified) by prior policy decisions; it takes place only after legislation has been passed and funds committed.” This framework focuses on three variables related to this phase: (a) amount of change required; (b) governance and administration; and (c) enforcement and

accountability procedures. These variables examine those factors that contribute to the realization or nonrealization of policy objectives.

a) Amount of Change Required

Not all policy problems are the same. Based on specific aspects “some problems are much easier to deal with than others,” and this will affect the ability of the policy to achieve its objectives (Mazmanian & Sabatier, *Effective Policy Implementation*, 1981, p. 6). This framework focuses on one of these aspects: the amount of change required. As Van Meter and Van Horn (1975, p. 458) argued, the extent to which the policy deviates from previous policies and the amount of organizational change that is required will affect the implementation process. In this regard they hypothesized that: (a) “incremental changes are more likely to engender a positive response than will drastic ones;” and (b) “policies which mandate changes in the relationships among participants involved in the implementation process will be more difficult to carry out than will policies which require only marginal change in established relationships” (Van Meter & Van Horn, 1975, pp. 458-459).

b) Governance and Administration

- ***Characteristics of the implementing Organizations***

When it comes to the policy process, as Friedman (2003, p. 12) argued, one of the most important issues is not the level of government that develops the policy but the relationships among the different levels of government involved in the implementation. More specifically, all the implementing agents in the different levels of government are responsible for: (1) establishing and maintaining a variety of linkages in the implementation chain; (2) co-ordinating their actions and resources; (3) dealing with conflict, which is likely to emerge because of different interests and value systems; and (4) achieving consensus while being willing to compromise (Fudge & Barret, 1981, p. 252). Due to these responsibilities, the number of organizations involved in the implementation process is one of the potential impediments to effective implementation (Friedman, 2003; Pressman & Wildavsky, 1984; Mazmanian & Sabatier, 1981). This point was emphasised by Elmore (1979/1980, p. 608) who argued that “the greater the number of checks and decision points required to assure compliance, the more opportunities for diversion and delay, the greater the reliance of subordinates on superiors for guidance, and the lower the reliance on individual judgement and problem-solving ability.”

On the other hand, among the characteristics of the implementing agency that influence the implementation process are the interests of the dominant coalition, the internal structure, and the availability of skills and expertise. As Hasenfeld and Brock (1991, p. 468) explained in detail:

“When the dominant coalition (i.e., the group that controls the key resources in the agency) is in conflict with the policy instruments, the agency is more likely to undertake symbolic rather than substantive implementation. [...] Similarly, when the internal structure of the agency is highly differentiated or loosely coupled, the more diffused is the internal power needed to implement the program. As a result, the problem of coordination increases, making the assembly of the program components more difficult. Finally, the availability of expertise and skills needed by the program design will influence the agency's ability to translate program requirements into coherent technical specifications.”

- ***Inter-organizational Communication***

Since effective implementation requires that program objectives be understood by implementors, one key variable is communication. Besides ensuring that policy objectives are clear, as previously explained, policy makers need to ensure that they are communicated accurately and consistently to implementors. Inconsistency may immobilize the implementors who are unable to meet all the demands made upon them. In regards to communication Van Meter and Van Horn (1975, p. 466) argued that:

“Communication within and between organizations is a complex and difficult process. In transmitting messages downward in an organization, or from one organization to

another, communicators inevitably distort them both intentionally and unintentionally. Furthermore, if different sources of communication provide inconsistent interpretations of objectives or if the same source provides conflicting interpretations over time, implementors will find it even more difficult to carry out the intentions of policy.”

This point is supported by Edwards (1980, p. 43) who explained that policy implementation should be carried out by a relatively small and cohesive group of people because the more persons who must be reached the greater the chances of missing some of them, and the higher probability of distortion. Moreover, he argued that achieving policy consensus can reduce the likelihood that implementors will use their discretion to ignore or distort the message.

c) Enforcement and Accountability Procedures

Having a good accountability framework can play a vital role in program improvement, overall effectiveness, and achieving positive outcomes (Friedman, 2003). In the context of inter-organizational (or intergovernmental) relations, as Van Meter and Van Horn (1975, pp. 467-469) explained, two types of enforcement or follow-up activities are most important. First, superiors can rely on a wide variety of positive sanctions, such as the allocation and manipulation of symbolic and material rewards, the invitation to participate in the program, giving fund allowances for administration, and the provision of crucial support services

(technical advice, staff loans, and research) to implementing organizations. Second, superiors can rely on more compelling devices at their disposal, which range from gentle to explicit forms of coercive power, such as on-site visitations, elaborate plans for the program's administration, mandated audited reports, and program evaluations. These compelling devices usually have conditions attached and failure to meet them could result in the withdrawal or the withholding of the funds.

CONCLUSION - *Summary of the Policy Design and Implementation Model*

The model, as depicted in Figure 3 on page 55, posits six sets of variables (represented by the white boxes with black solid borders) which shape the linkage between policy and outputs and outcomes. This model makes explicit the relationships between: (a) the steps in the policy making process, i.e. problem emergence, formulation, development, implementation, and evaluation (represented by the gray boxes); (b) the sets of variables that affect the process, i.e. the context, those related to the policy development, and those related to its implementation; and (c) the outputs and outcomes (represented by the white boxes with segmented borders).

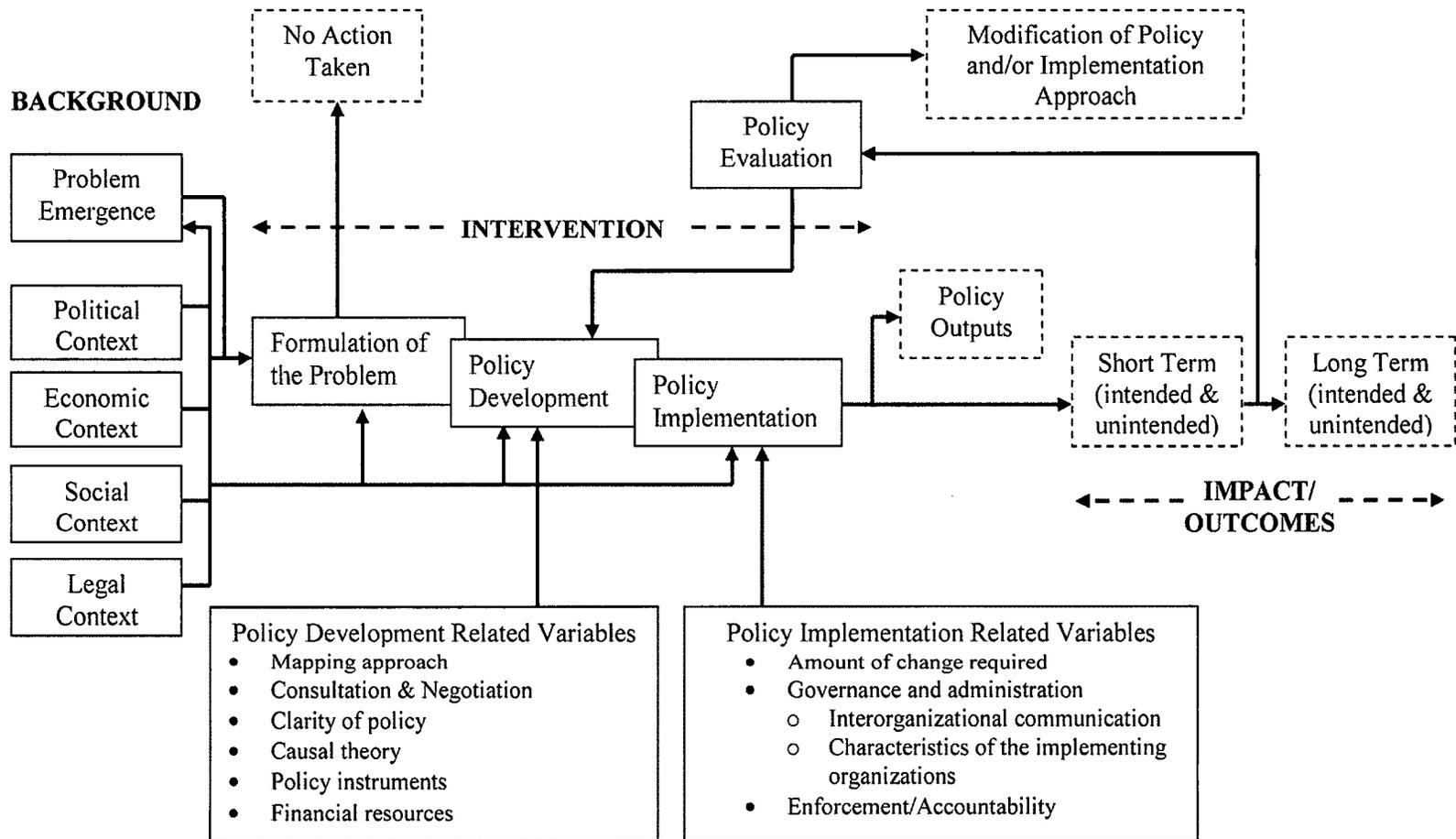
More specifically, in this framework, the process starts with the emergence of the problem. This problem is going to be the result of a combination of political, economic, legal, and social systemic factors affecting a particular population. Once the problem

emerges, the next step in the process is the formal identification and recognition of the problem by the government. With the problem formulated, the government has the choice of taking or not a policy action. If the government chooses to act on the problem then a policy and a plan for its implementation are developed. In the figure, problem formulation, policy development, and implementation overlap because the way the problem is defined, and the course of action chosen in the policy development will, to a lesser or greater extent, influence the manner in which the policy will be implemented. On the other hand, the direction of the arrows explains the connections between the variables and stages in the process. So, for example, it shows that the context influences every stage of the policy process and that policy evaluation can result in the process going back to policy development if changes are required. Finally, the process results in specific policy outputs, and intended and unintended short-term and long-term outcomes.

As explained in Chapter 1, this dissertation seeks to explore: (a) the factors influencing the transfer payment policy design process; (b) the factors influencing the transfer payments implementation process; (c) the relationship, and possible gap, between the intentions and statements of the policy on the one hand and the accomplishment of the policy objectives on the other; and (d) the policy outputs and outcomes using this analytical framework. The analysis will focus on the background variables, the policy development variables, and the policy implementation related variables outlined in the model. At the same time, it will explore the outputs and short-term intended and

unintended outcomes after the intervention. However, as previously mentioned, while the framework will, among other things, guide the analysis of the empirical findings of this dissertation it will not be evaluated or modified as a result of the research findings.

Figure 3: Policy Design and Implementation Model



Source: Adapted from Friedman (2003, p. 17), Van Meter and Van Horn (1975), Mazmanian and Sabatier (1989), and Winter (1990).

CHAPTER 3

INTERGOVERNMENTAL FISCAL TRANSFERS - AN ANALYTICAL FRAMEWORK

INTRODUCTION¹

This chapter provides a comprehensive overview of the theory of intergovernmental fiscal transfers which, as Oates (1999, p. 1126) remarked, “constitute a distinctive and important policy instrument in fiscal federalism that can serve a number of different functions.” These fiscal flows are “payments made from one type of government to another in order to address fiscal imbalances that are inherent in a system of fiscal decentralization,” and in practice they always move from higher to lower tiers of government (Ebel & Peteri, 2007, p. 122).² Besides being used for redistributive purposes, these transfers can be designed to stimulate additional subnational spending in certain functional areas.

¹ Sections of this Chapter draw freely on related prior work. See Adams & Maslove (2009) presented at the Canadian Political Science Association 81th Conference on May 27th 2009.

² This chapter mostly focuses on a model of a donor and a recipient government where the type of government involved (i.e. federal, provincial, or municipal) is irrelevant for the analysis. Nevertheless, where appropriate, specific Canadian examples are provided for illustration purposes. Moreover, in the section on empirical works references are made to specific studies that focused on the United States’ political system. The recipient government is sometimes referred to as the local government or jurisdiction, and the donor as the central government.

The chapter proceeds in four sections. The first section describes the justifications used by central governments for the use of intergovernmental transfers. The second portion overviews the transfer payment taxonomy that explains the different kinds of transfer payments according to the conditions placed on the recipient by the donor for the disbursement of the available resources. The third section overviews the effects that transfer payments can have on the fiscal choices of the recipient governments, and it presents empirical work that has been done under the theoretical framework of fiscal federalism. The fourth section reviews the choices that are involved in the process of designing a transfer system, including the identification of the source and size of the distributable pool, and the ways in which the identified pool can be distributed among recipient governments.

RATIONALE FOR THE USE OF INTERGOVERNMENTAL TRANSFERS

The literature on fiscal federalism suggests several rationales for intergovernmental transfers and, in practice, transfers might fulfill more than one of these objectives.³ Among the justifications for the use of transfers are: closing the fiscal gap, equalization, addressing inter-jurisdictional spillover effects, addressing political imperatives and furthering central government's policy goals, and achieving coordination and efficiency.

³ See, for example, Bahl (2000); Bird & Smart (2001); Boadway R. W. (1980); Boadway & Hobson (1993); Ma (1997); and Shah (1994).

Closing the Fiscal Gap

A vertical fiscal gap exists when there is a difference between the constitutionally assigned expenditure responsibilities and own-source revenues at different levels of government. According to Shaw (1994, p. 42), reasons for this fiscal gap include inappropriate expenditure and tax assignment, limited or unproductive tax bases available to lower levels of government, regional tax competition, and limited revenue-raising potential due to the level of central government taxation. The result can be an inadequate provision of public goods and services. This gap can be addressed with an increase of the revenue raising powers of the local government, or with the use of intergovernmental fiscal transfers.

If transfers are chosen as the solution there are two practical issues that, as Bahl (2000, p. 3) explained, must be considered: the difficulty of measuring the vertical fiscal imbalance to define the required level of the transfer, and the alignment of vertical balance considerations with efficiency considerations. Despite these practical challenges, in most developed countries unconditional transfers are used as a key policy instrument to address the perceived revenue short-falls.

Equalization

Besides addressing the vertical imbalance, transfers are also used to address the differences between the resources available to governments at the same level, which is

referred as a horizontal imbalance. As Ma (1997, p. 2) explained, the difference in fiscal capacities can be the result of, for example, one local government having access to a tax base not available to the others, having a population with higher income levels, or having extraordinary expenditure needs based on their location and their population. The result is unequal living conditions, opportunities, and quality of services available for persons in like circumstances in different jurisdictions. To address this problem with intergovernmental transfers, the central government must consider three questions: “How are transfers financed (i.e., what taxes support the transfers), what services do local governments deliver, and what distribution formulas are used to allocate resources among them?” (Bahl, 2000, p. 4).

Under this rationale, the goals of the unconditional transfer are achieving a national minimum level of service and the equalization, across local governments, of the fiscal effort required to provide these minimum program levels (Oates, 1972b, p. 87).⁴ Most countries with formal systems of equalization transfers avoid revenue-pooling (Bird & Smart, 2001, p. 4). Besides economic considerations, equalization transfers are justified on political grounds because, as Shaw (2006, p. 19) argued, “large regional

⁴ The merits of this rationale, and the formulas used to allocate the equalization transfers are subject to intense debate both academically and in practice because it is a complex economic and political issue. According to Oates (1999), equalization is a contentious issue from an efficiency perspective. He argued that “some observers see such transfers as playing an important role in allowing poorer jurisdictions to compete effectively with fiscally stronger ones while, on the other hand, some have argued that equalization can actually hold back the development of poorer areas by impeding the needed interregional flow of resources (both emigration and immigration) in response to cost differentials” (1999, p. 1127). For an example of a position against equalization payments see Courchene (1978, pp. 145-186).

fiscal disparities can be politically divisive and may even create threats of secession.” The grant formulas used are carefully designed to reflect either the recipients’ needs and/or fiscal capacities to avoid discouraging local revenue-raising effort and local expenditure restraint.⁵

Addressing Inter-Jurisdictional Spillover Effects

Benefits from the provision of public goods or services, like pollution-abatement measures and inter-regional highways, can cross jurisdictional boundaries. Since local governments only feel politically responsible for serving their residents, and since non-residents enjoy the benefit without contributing to the costs, they tend to provide lower than optimal levels of these goods and services. To address this under-provision, donor governments use matching conditional transfers as practical means of encouraging expenditures in the desired areas to alleviate the inefficiencies created.

In this case, as Boadway (1980, p. 46) explained, the matching rate should try to come as close as possible to the ratio of the spill-over to the local benefit, and the transfer should be open-ended in the cases where the benefits will continue to accrue while the

⁵ In the case of Canada, according to the Department of Finance (2010a), the recipient needs are not taken into account for equalization payments. Instead “equalization entitlements are determined by measuring provinces’ ability to raise revenues.” Additionally the formula is adjusted to ensure: (a) fairness among provinces; (b) that receiving provinces can get a net fiscal benefit from their resources equivalent to half the per capita resource revenues of the receiving provinces; (c) that the total program payout grows in line with the economy; and (d) that Nova Scotia and Newfoundland and Labrador maintain the benefits of the Atlantic Accords (Department of Finance Canada, 2010a).

expenditure is in place. On the other hand, as Bird & Smart (2001, p. 7) pointed out, the matching rate could be associated with the strength of the preferences of the donor government for the funded good or service, or with the nature of the aided activity. To address this objective, the central government must determine the size of the grant required, and choose the appropriate distribution mechanism that ensures the money reaches the government responsible for the targeted expenditure (Bahl, 2000, p. 4).

Addressing Political Imperatives and Furthering Central Government's Policy Goals

Central governments also use intergovernmental fiscal transfers for non-economic objectives as a way of addressing political challenges and for priority setting in lower-levels of government. For example, a central government might be forced to make a transfer payment to a jurisdiction that might not require the funds to make it politically feasible to make a transfer to other jurisdictions in need (Bird & Smart, 2001, p. 9), or it might direct transfers to politically powerful jurisdictions to get support from its voters (Sato, 2007, p. 174). At the same time, the government might use the conditions set out in the transfer agreement to leverage the actions of a local government towards achieving policy goals that will fulfill the central government's priorities.

Achieving Coordination and Efficiency

Another justification is that, compared to local governments, the central government has a greater capacity to assess and collect certain taxes in a cost-efficient

manner which can then be redistributed in the form of intergovernmental transfers. For example, in a federation like Canada “mobility of factors severely limits the redistributive role of local governments” (Shah, 1994, p. 42). At the same time, this capacity to redistribute resources can be used to achieve coordination and minimum standards for public services. This could avoid disjointed actions and differing levels of efforts at the local government level which can produce uneven outcomes. Furthermore, national standards contribute to the free flow of goods, services, labour, and capital; reduce wasteful interjurisdictional expenditure competition; improve the gains from trade from the internal common market; and serve national equity objectives (Shah, 2006, pp. 35-36). In this case, output-based (performance-oriented) grants should be used to encourage compliance with the standards specified by the federal government.

TAXONOMY OF INTERGOVERNMENTAL TRANSFERS

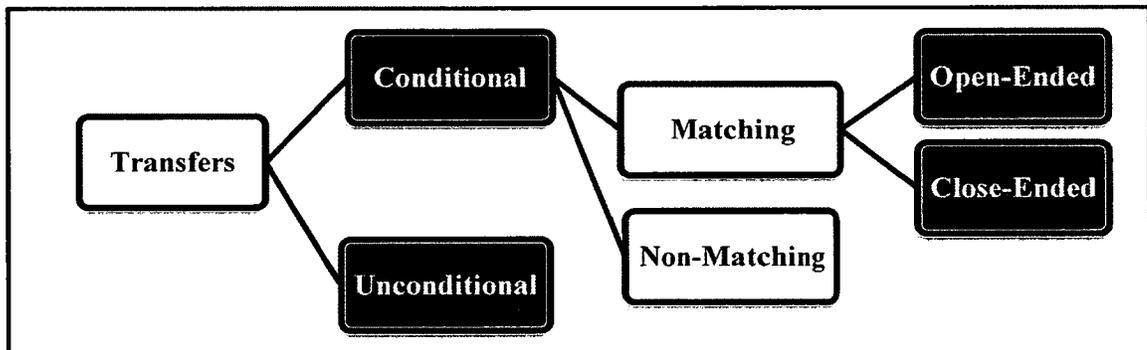
Transfers are classified in different categories depending on the restrictions on the purpose to which the recipient government can use the transfer (see Figure 4).⁶ According to the conditionality clause, transfers can be either *unconditional* or *conditional*.⁷ While

⁶ See: Boadway R. W. (1980); Kitchen (2003); Ma (1997); Shah (2006); and Shah (1994)

⁷ For example, in Canada the Federal Government provides support to provincial and territorial governments through four main transfer programs: the Canada Health Transfer (CHT), the Canada Social Transfer (CST), Equalization and Territorial Formula Financing (TFF). CHT and CST are considered conditional transfers. In the case of CHT the expenditures must maintain the national criteria for publicly provided health care as set out in the Canada Health Act, i.e. universality; comprehensiveness; portability; accessibility; and, public administration. In the case of CST the expenditures have to be directed towards programmes that support post-secondary education, social assistance and social services, including early childhood development and early learning and childcare. On the other hand, the Equalization and TFF programs provide unconditional transfers that enable the recipients to spend the money in any way they choose. In the case of Equalization less prosperous provincial governments are able to provide their

there might be conditions that the recipients must meet to receive the transfer, in the case of unconditional transfers they can use the money in any way they choose. Conditional transfers, on the other hand, have to be spent on the specified eligible expenditures or on expenditures that will guarantee a specified service level. Conditional transfers may be *matching* or *non-matching*. In the case of matching grants the recipients must cover a specific percentage of the expenditures. Matching transfers can also be *open-ended*, where the donor will continue to provide funds without limit as long as the recipient covers its share, or *close-ended*, where the recipient is aware of what the maximum contribution from the donor will be.

Figure 4: Taxonomy of Intergovernmental Transfers



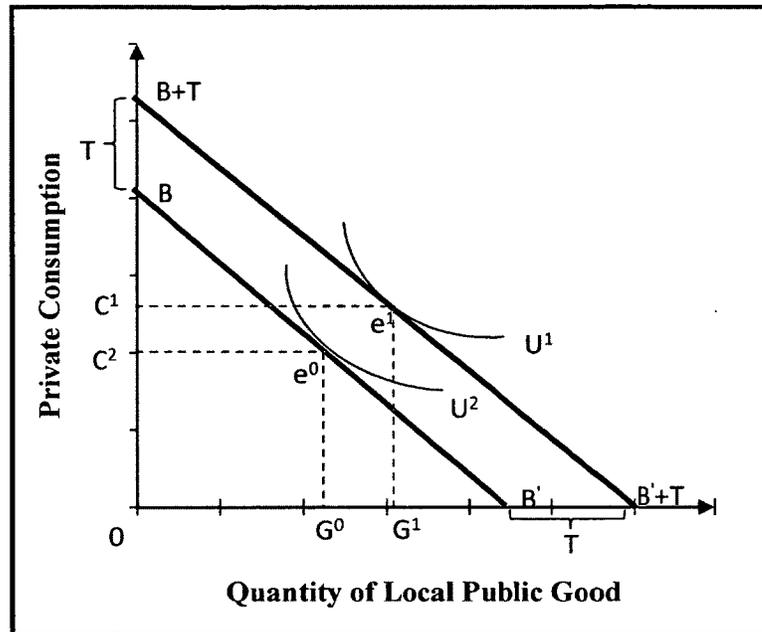
residents with public services that are reasonably comparable to those in other provinces, at reasonably comparable levels of taxation. In the case of the TFF territorial governments are able to better support public services, in recognition of the higher cost of providing programs and services in the north. For more information on these transfers see: Department of Finance Canada (2010b).

Unconditional Transfers

Unconditional transfers, also called general-purpose transfers, by imposing no restrictions on the use of the money, are flexible by design. They preserve local autonomy allowing recipients to pursue those objectives that will ultimately maximize their own welfare (Shah, 2006, p. 6). According to Oates, this use of these transfers is appropriate when, for example, the central government's objective is to address fiscal equalization.

As Figure 5 illustrates, this type of transfer shifts the recipient's budget line, BB' , upwards and to the right, becoming $(B+T)(B'+T)$ where T equals the amount of the transfer. This shift indicates an income effect, but since marginal cost of the public good remains unchanged there is no substitution effect. Assuming that private consumption and public goods are normal goods, with the grant the utility maximizing equilibrium would be e^1 , the government expenditures would rise to G^1 , and private consumption would be at C^1 . Econometric studies of unconditional transfers have found that the typical quantitative effect in spending is less than \$0.50 for each additional \$1 received (Shah, 2006, p. 4). This has led researchers to theorize that the failure of this kind of transfer to stimulate bigger spending might result from the recipient's tendency to use the bulk of the funds as tax relief, either by avoiding a tax increase or by lowering taxes.

Figure 5: Effect of an Unconditional Transfer⁸



Source: Adapted from Bruce (2001), p.568

Conditional Transfers

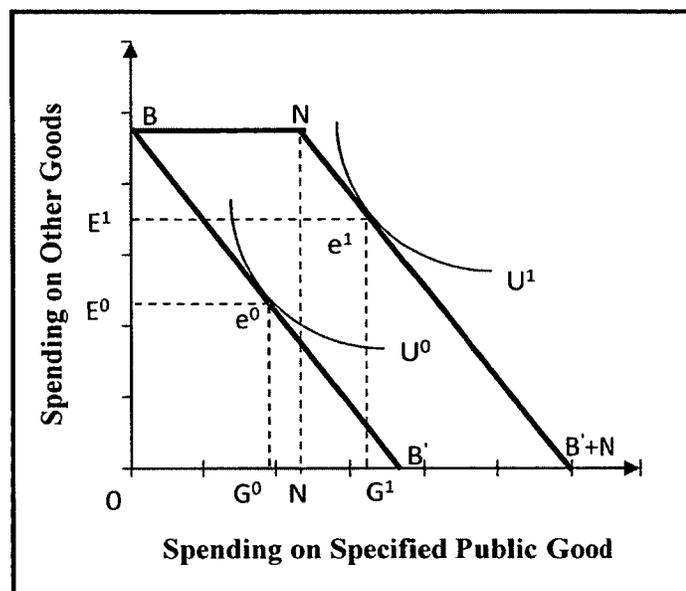
Conditional transfers, or specific purpose transfers, are “one of the government’s key instruments in furthering its broad policy objectives and priorities,” because they are designed to incentivize recipients to spend on specific functional areas, such as infrastructure and health (Treasury Board of Canada Secretariat, 2008). The conditionality clause might be attached to the type of expenditure that can be financed

⁸ This graph and the other ones in this section use the community preference model. This model represents the preferences of the residents of the recipient community in a series of indifference curves, and the objective is to maximize their utility subject to a budget constraint that changes in the presence of a transfer payment. The model assumes that the local government will act as an individual with a given income (I), considered the aggregate community income, who allocates I between the consumption of private goods (x) or public goods (z). In this general case the utility function is represented as $u(x,z)$, and the budget constraint is $x + z = I$.

(input-based conditionality) which, as Shah (2006, p. 5) explained, can be “intrusive and unproductive,” or to the attainment of specific outcomes (output-based conditionality) which “can advance grantors’ objectives while preserving local autonomy”. In either case, these kinds of transfers involve strict accountability frameworks that might result in recipients dealing with bureaucratic red-tape.

a) *Non-Matching (Bloc Transfers)*

Similarly to the unconditional transfer, as shown in Figure 6 below, a non-matching transfer shifts the recipients’ budget line (BB’) upwards and to the right becoming $BN(B'+N)$. In this case, because of the conditionality, the new budget line is truncated above the amount of the transfer (BN). This means that spending northwest of point N cannot be funded with the grant which guarantees that at least ON of the assisted public good will be provided. These kinds of transfers are “best suited for subsidizing activities considered high priority by a higher-level government but low priority by local governments [...] without distorting local priorities among alternative activities or inducing inefficient allocations in the targeted expenditure area” (Shah, 2006, p. 6).

Figure 6: Effect of a Non-matching Transfer

Source: Adapted from Bruce (2001), p.567

In relation to the effect of this kind of transfer on spending, there has been much theorizing and research done.⁹ In theory, despite the accountability requirements, because money is fungible (i.e. interchangeable) even with this kind of transfer the recipient government might reduce its spending on the specified public good, partially or in full, liberating funds for other purposes. This unintended consequence might potentially reduce the intended incremental spending effect of the transfer. The level of fungibility will depend “on both the level of spending on the assisted public service and the relative priority of such spending (Shah, 2006, p. 8).” For example, if the recipient government did not use any of its own resources

⁹ See: Fisher (1982); Hines & Thaler (1995); Shaw (2005); and Wyckoff (1991)

in the specified public good there could not be a diversion of the funds. According to Oates (1972b, p. 77), this potential leakage of funds makes these kinds of transfers inadequate for achieving efficient levels of output of specific public goods, but he believes that they should be effective in inducing recipient governments to adopt certain desired practices, like certain budgetary and planning procedures.

b) Matching

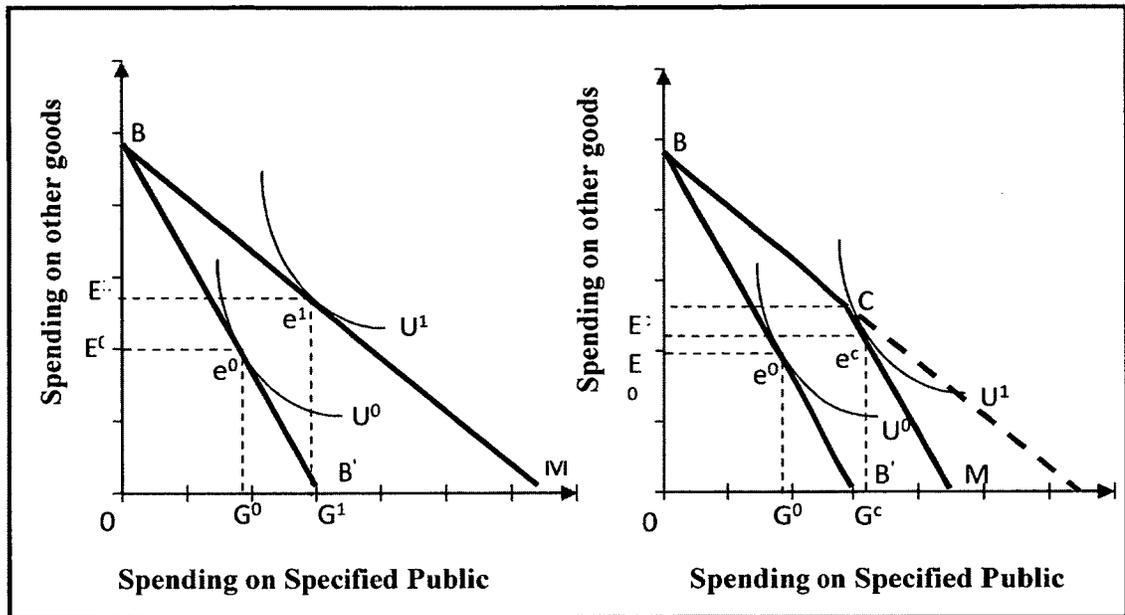
Under a matching transfer, the recipient must spend from its own resources a specified amount, i.e. the match rate (m). Because of this, they might be motivated to be more involved in the definition of the purpose of the transfer, and to be more efficient and effective on the expenditure of the funds. With the transfer, the tax priced to local residents of government spending on the specified purpose is $1/(1+m)$ per dollar. In theory, the required matching rate, as Bird & Smart (2001, p. 8) argued, faced by the recipient would be: (1) higher the greater the degree of the donor's interest in the specified good or service, and (2) lower the expected degree of local enthusiasm (price-elasticity) and ability (income-elasticity) to support that good or service. In practice, this information might not exist, or it might be difficult to access, making its exact identification a difficult task.

Unlike the previous kinds of transfers, a matching conditional transfer has both an income and a substitution effect. The transfer increases the available resources to the recipient government, and it reduces the relative price of the funded public good allowing the recipient to acquire more of the specified goods (G) for a given budget. The sum of these two effects can be seen in the graph on the left of Figure 7, where the original budget line (BB') pivots outwards becoming BM. G^1 and E^1 should theoretically be determined by the strength of each effect, where a stronger substitution effect leads to increase spending in G and a stronger income effect might lead to an increase in E. Quantitative studies in this area, as Shah (1994, p. 40) observed, have shown that spending in G increases by less than the amount of the grant, with the remainder going towards other goods (E).¹⁰

According to Oates (1999, p. 1227), this type of transfer should be employed when, for example, the government is trying to address inter-jurisdictional spillovers. The objective of the transfer in this case is to induce local policy makers to incorporate spillover benefits into their decision-making calculus. In this case the matching rate should reflect the extent of the spillover.

¹⁰ To review some of these studies see: McMillan, Shah, and Gillen (1980); Shah (1986); Shah (1989)

Figure 7: Effect of an Open-ended and Close-ended Matching



Source: Adapted from Bruce (2001), p.572; and Boadway & Hobson (1993), p.98

Matching grants can also be close-ended which allow the donor government to properly budget its resources because they are predictable. From the point of view of efficiency, the drawback of this kind of transfer is that it can lead to the distortion of local priorities. As Shah (1994, p. 41) explained, this can result in overspending on the specified activity, and the funding of capital-intensive alternatives because capital outlays are usually subsidized while operating costs are not. A representation of the effects of a closed-ended matching transfer, see graph on the right of Figure 7, shows that the maximum value that the government is willing to transfer (i.e. the cap) imposed on spending makes the new budget line BCM kinked at the point of the cap (C). The effect of the cap on total spending

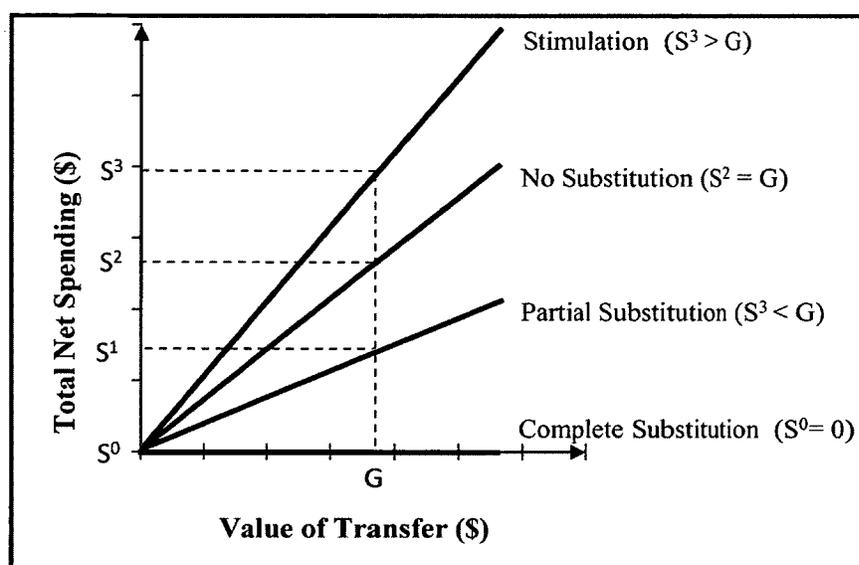
will depend on the level of provision of the good, and in this case the utility maximum equilibrium (ec) is at a lower point that it would had been in the absence of the cap (e1). This means that in theory there should be a smaller provision of the specified public good (Gc). If the amount spent falls below C the effect matches that of an open-ended grant, if the recipient spends more than C the effect replicates that of a non-matching grant. Empirical studies in this area have found that “the estimated response to an additional \$1.00 of this kind of grant is typically \$1.50” which, when compared to an open-ended transfer, implies a larger stimulation of expenditures (Shah, 2006, p. 8).

THE EFFECT OF TRANSFER PAYMENTS

As previously outlined, each type of transfer is expected to have a different effect on local expenditures. This effect, as illustrated in Figure 8, can range from complete substitution to stimulation (Boyne, 1990, p. 210). In the case of complete substitution, expenditures are unresponsive to changes in the value of the grants because the money is used to cut local taxes. When the increase in spending is less than the full amount of the grant there is partial substitution, where a portion of the money is allocated to cut local taxes. In theory, both effects should only be seen in the case of unconditional transfer, but because money is fungible it can also happen under conditional transfers. No substitution occurs when the full amount of the grant increases general spending, in the case of unconditional transfers, or is allocated for the intended expenditure, in the case of

conditional transfers. With no substitution a change in the value of the grant will directly affect the level of investment. The final effect is stimulation. This effect, which is predicted for matching transfers, results in a level of expenditure that is higher than the amount of the transfer.

Figure 8: Effects of Grants on Spending



Source: Adapted from Boyne, G. (1990), p.210

From an economics perspective the effects of a shift in the value of the transfer will vary according to the type of transfer. On the other hand, from a political perspective, as Boyne (1990, pp. 209-210) argued, the impact could be mediated by: local financial circumstances, the prior size of the transfer, the sensitivity of local authorities to the anticipated reaction of the electorate if taxes levels are increased to

compensate for reductions in the level of funding, and the local priorities for spending and tax reduction.

Empirical Work on the Effect of Transfers on Recipient Governments

Under the theoretical framework of fiscal federalism, many empirical studies have investigated the effects of transfers on the recipient's fiscal choices focusing on the effects of the different kinds of transfers. The findings have usually been inconsistent with the predicted behaviours and, according to Oates (2004, p. 94), this most likely reflects the fact that: transfer programs are usually the “result of political processes and various pragmatic considerations, which lead to imperfect programs,” and of “objectives that are not wholly consistent with a narrow view of economic efficiency and equity.”¹¹

One of the most debated and, according to Heyndels and Van Driessche (1995), most documented¹² empirical phenomenon in this literature is the one that has been dubbed the ‘flypaper effect,’ because the money is said to ‘stick where it hits’ in the public sector.¹³ Even though money is fungible, recipient governments seem to spend the resources received for the purpose for which they were intended instead of using them for

¹¹ Related to the theory outlined in Chapter 2, Oates (2004, p. 94) observations hint to the influence of political, economic, legal, and social systemic factors on the emergence and recognition of the policy problem, and the impact of a flawed policy development process on the resulting policy. In particular it can be infer that pragmatic considerations could result in compromises being made on the choice of policy instruments and financial resources, and that flawed objectives could result from using a flawed casual theory.

¹² A Google Scholar search under the heading “flypaper effect,” reveals over 3500 scholarly journals documenting and seeking to explain this effect written in the subject areas of business, administration, finance, economics, social sciences, and arts and humanities.

¹³ The term ‘flypaper effect’ was coined by U.S. economist Arthur Okun.

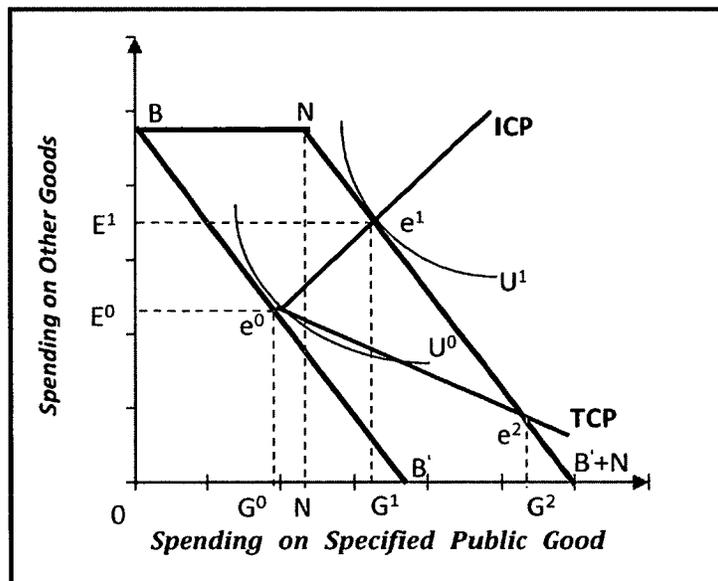
other forms of spending or tax relief. While based on the income elasticity of local government spending, as Bruce (2001, p. 573) explained, it has been theorized that the increase in expenditures on the specified good should be, at the most, 10 to 15 cents per 1\$ of the transfer, empirical studies have produced different results. Evidence suggests that unconditional and conditional transfers can stimulate public expenditures far more than increases in the local government's private income. After reviewing the most commonly cited studies in this area, Hines & Thaler (1995, p. 219) showed that empirical estimates on the low-end have found that the stimulating power of the flypaper effect is close to 25 cents per 1\$ of the transfer, and high-end estimates put it closer to 90 cents.¹⁴

Using Figure 6 from the previous section, that showed the expected theoretical effect of a non-matching transfer, the flypaper effect can be demonstrated by looking at the income consumption path (ICP) and the transfer consumption path (TCP). In Figure 9 below, the ICP shows the locus of consumption choices arising from the increase in the community's income, while the TCP represents the empirical result where receipt of a lump-sum conditional grant has a greater stimulatory effect on local government spending than an equivalent increase in community income ($G_2 > G_1$). As Bailey and Connolly (1998, p. 338) argued, the flypaper effect occurs as long as TCP lies below ICP.

¹⁴ This discrepancy in the range of what is considered the flypaper effect fuels the debate of its existence. The high-end estimates are considered to be by some researchers overstated, and the low-end estimates are considered insufficient to be qualified a stimulating. For additional econometric analyses in this area see: Barnett, Levaggi, & Smith (1991); Bailey & Connolly (1998); Fisher (1982); Levaggi & Zanola (2003); Moffitt (1984); Strumpf (1998); and Wyckoff (1991).

The problem with the flypaper-effect findings, as Oates argued, is that they are “not so easy to reconcile with models of rational choice, for they suggest that the same budget constraint gives rise to different choices depending on what form the increment to the budget takes” (1999, p. 1129) In response to this inconsistency, authors have either challenged the econometric assumptions used by researchers in their regressions, or have sought to explain the flypaper effect on theoretical grounds.

Figure 9: Possible Flypaper Effect of a Non-Matching Transfer



Sample of Theoretical & Empirical Explanations for the Flypaper Effect

Among the theoretical explanations for this effect are: (a) the fiscal illusion hypothesis, which is based on models that assume that voters face fiscal illusion, self-interested politicians, and an absence of political competition; (b) the

budget-maximizing, monopolistic government hypothesis, which is based on models that view politicians as self-interested and assume that there is imperfect competition in the political system; and (c) the fungibility hypothesis, which is based on models that assume that local governments convert conditional transfer resources into income supplement (Gamkhar & Shah, 2007, p. 227; Meyers, 1987).

a) *Voters/Resident Fiscal illusion*

Ignorance as to the size of transfer funds, and failure to see the link between the taxes paid and the transfers received, tends to reduce the perceived marginal tax price of recipient expenditures and increase demand for public goods.¹⁵ As Oates (1979, p. 29) explained, “increases in personal incomes to the members of a community are not equivalent, in terms of their budgetary effects, to an equal increase in lump-sum intergovernmental revenues because, although they may generate the same true budget constraint, they do not result in the same perceived budget constraint.” In this model, local government officials are assumed to be output maximizers, and willing to use the transfer to deceive local voters into thinking that the cost of service is less than it actually is to bias expenditures upwards. Instead of returning the additional income to the voters through a rebate or via tax rate reductions the government officials use it to expand the public budget.

¹⁵ For a good summary of empirical studies looking at the flypaper effect under the fiscal illusion hypothesis see Dollery & Worthington (1996, pp. 277-283)

One of the ways in which empirical studies have looked at fiscal illusion and its relation to the flypaper effect is by using the hypothesis that the illusion is possible in federal structures due to the separation of taxing and spending powers. Researchers testing this hypothesis (see Grossman 1990; Logan 1986, and Winer 1983) have argued that if the degree of fiscal illusion increases with the degree of separation between the taxing government and the spending government, then federal grants should have a greater impact on local expenditures than provincial/state grants. The rationale, as Grossman (1990, p. 314) explained, is that “grants from higher levels of government are perceived by the recipients to be partially paid for by residents of other localities despite the fact that the recipients, in turn, will be paying for part of similar grants to other localities.” In his research of federal unconditional grants received by the counties and cities of the state of Virginia, Grossman (1990, p. 325) found that these grants “generate, at the minimum, approximately twice the increase in local expenditures as do state unconditional grants.”¹⁶ At the same time, research in this area shows that voter’s awareness of the aid received is not a mitigating factor in the persistence of fiscal illusion. As Dollery & Worthington (1999, p. 278) explained:

“if the voter is unaware of aid he may perceive a reduction in costs because of a higher portion of government spending in financing expenditures. If the voter is aware of aid, illusion may still prevail since the voter may well be unaware of their own provincial status

¹⁶ For example, he found that education expenditures increase by approximately \$1.60 for every dollar of federal unconditional grants, whereas state unconditional grants increase education expenditures by \$0.70 (Grossman, 1990, p. 325).

(grantor tax share > local tax share) or that all communities in some sense finance a portion of aid to other provinces (intergovernmental-complexity).”

b) Budget-Maximizing, Monopolistic Government Hypothesis

Incumbent politicians have monopoly power over their constituents’ choices and seek to “expand [their] budget through hidden expenditures” (Wyckoff P. , 1991, p. 324). In this model, voters lack that necessary information and the budget-maximizing agent can control the expenditure agenda.

Wyckoff (1991) analyzed state aid to local school districts in Michigan, and tested both theoretical and empirical explanations of the flypaper effect: econometric misspecification, omitted variables, fiscal illusion, and perception and behavioural elements. In the four cases, he found that they did not explain the flypaper effect. He concluded that the “data is consistent with the idea that the flypaper effect is caused by a single factor which is imbedded much more deeply in the process of local government decision-making than is currently acknowledged,” and he believes that this factor might be ‘bureaucracy’ (1991, p. 328). In an earlier paper, Wyckoff (1988) showed how a bureaucratic model of the type suggested by Niskanen (1971) could be used to explain the flypaper effect for capital expenditures. The local budget process is assumed to be a two-way struggle between city council and the operating departments which produce public goods. These departments have an interest in maximizing their budget, and

have an extreme information advantage concerning the true cost of public goods. By controlling the information they are able to distort the choices of city council which result in the observed flypaper effect.

c) **Fungibility**

As illustrated by Meyers' (1987) findings, fungibility is the process by which a local government converts conditional transfer resources into income supplement.¹⁷ Focusing on Federal highway close-ended matching grants in the United States, Meyers (1987) studied the degree to which recipient States displaced the donor's resources, and the implications for program efficiency. He found that additional grants are mostly used to fund highway expenditures that would have been undertaken by the States alone, freeing State revenues for other uses. Despite the grants having a matching ratio, he found that about 63 cents out of each new federal dollar displaces State own source outlays.¹⁸ He concluded that the potential cause for the displacement is differences in expenditure preferences at different levels of government.

¹⁷ Another study in this area was conducted by Zampelli (1986). He developed a model of local government expenditure decisions and applied it to data for large U.S. city governments. His findings supported the fungibility hypothesis and provided very little evidence in support of the flypaper effect. More specifically his research revealed that that "seventy percent of social and urban support services is converted into fungible resources" (1986, p. 39).

¹⁸ While for some researchers, as previously mentioned, having 37% of the resources sticking is an acceptable proof of the stimulating power of the flypaper effect, Meyers (1987, p. 233) argues that this amount leaves "room for considerable improvement" to achieve more efficiency and budgetary savings.

In the case of fungible resources the diversion can be accomplished, for example, by: (a) reducing the local normal funding of the subsidized output; (b) using a project which was going to be undertaken anyway as the means of securing a matching transfer; (c) redefining budget categories; (d) reselling or exchanging an aided good; (e) allocating a part of the transfer for overhead expenses shared by other programs; or (e) acquiring capital equipment which can be subsequently used for unaided activities (Zampelli, 1986; Meyers 1987; Islam, 1998). Although, one could argue that all these methods of diversion could, in theory, be avoided by a strong transfer agreement that limits these types of expenditures or that requires a certain level of expenditure from the recipient's own sources of revenues.

On the other hand, those that question the existence of the flypaper effect, or those that argue that its magnitude is overstated, provide empirical explanations that focus on model misspecification. In a review of papers that are examples of these empirical shortcomings and those that criticized them, Bailey & Connolly (1998) explained that among the potential problems are incorrect operationalization of variables, omitted or inappropriate variables, correlations among the variables, and incorrect functional form.

a) **Incorrect Operationalization**

Operationalization is the process of strictly defining variables into measurable factors, and some researchers believe that those studies that have found the existence of the flypaper effect have failed to correctly define their variables. Among the identified problems are: failing to consider transfers as endogenous, and not accounting for the different type of transfers (e.g. unconditional, matching, and close-ended).

According to Chernick, (1979) when the grantor government chooses local government projects to support with a lump-sum transfer it favours those projects where recipient governments are willing to spend a large amount of local government funds. In this model, as Fisher (1982, p. 338) explained “it is in the grantor’s interest to favour, *ceteris paribus*, recipient jurisdictions offering to pay a larger fraction of the total cost to maximize output for a given grantor cost.” By becoming an implicit¹⁹ matching transfer the variable becomes endogenous, and should be specified as such in the econometric models, because the amount of the transfer is determined by the amount of local government expenditures simultaneously.

¹⁹ The transfer becomes an implicit matching transfer because it is officially a lump-sum transfer that lacks a matching rate, but the award of the transfer was biased based on the willingness of the recipient to contribute its own resources.

At the same time, as previously explained, each type of transfer has an expected price and income effect, and by failing to take this into consideration in the analysis the effect will be incorrectly measured (Inman, 2008). According to Moffit (1984) and Megdal (1987), this failure leads to an incorrect specification of the budget constraint and thus biased and inconsistent estimators of the parameters of interest. They argued that some types of transfer create piece-wise budget constraints that cannot be studied with simple estimation methods such as Ordinary Least-Squares (OLS), and concluded that the theoretically correct way to estimate demand functions in the face of closed-ended matching grants is by using the maximum likelihood method.²⁰

b) Omitted Variables and Correlations

The argument is that researchers may have either: (a) omitted important determinants of government spending likely to be correlated with citizen income or intergovernmental aid, or (b) use variables in their equation that they assume were independent but instead are correlated, leading to biased estimates. For example, Hamilton (1983) argues that the flypaper effect may result when income, used as a proxy for other socioeconomic factors, is not considered an input in the education production function. According to Bailey & Connolly

²⁰ The maximum likelihood method is the procedure of finding the value of one or more parameters for a given statistic which makes the known likelihood, i.e. the hypothetical probability that an event that has already occurred would yield a specific outcome, distribution a maximum, i.e. the largest value of a set (Weisstein, 2009).

(1998) other potentially relevant omitted variables are local government's savings ratio, and expenditures on private sector alternatives. For Boyne (1990), a more explicit conceptual framework should include prior level of grant funding, party politics, and the cost to taxpayers for replacing grant cuts. Moreover, to address endogeneity the governmental expenditures equations should incorporate variables that account for institutional constraints (Dollery & Worthington, 1999).

c) **Functional Form**

The evidence on this seems to suggest that the estimation of the flypaper effect is sensitive to the functional form of the econometric equation. To understand any economic relationship a choice must be made about the functional form that will be used in the estimation. While this choice should be based on a theory that predicts the relationship between the chosen variables, the reality is that in most cases researchers most choose the form based on other criteria. These include "convenience in estimation, ease of interpretation, and simply choosing the form that best fits the data" (Becker, 1996, p. 87).²¹ The problem is that the incorrect choice can lead to inaccurate findings. According to Becker's (1996, p. 97) findings, the use of a "linear equation produces estimates of the spending responses to grants that are inflated by a factor of nearly six", while the use of a

²¹ As Becker (1996) further illustrated, researchers have conceded in their papers that a logarithmic or exponential form with constant elasticities may be theoretically more appropriate, but they chose to use a linear functional form, as McGuire (1978, p. 32) explained, for "its simplicity, its ability to accommodate local need variables in a clear-cut systematic fashion, and because it permits linear estimation techniques."

double logarithmic form, with identical data and explanatory variables, provides no evidence of the flypaper effect.

In response to these empirical explanations, those that have attempted to correct the perceived misspecification errors, like Wyckoff (1991), believe that the evidence shows that these arguments are all limited to particular institutional arrangements, particular aid schemes, or particular estimating techniques, while observed flypaper effects cut across those boundaries.

DESIGNING A TRANSFER SYSTEM

The design of a transfer system, just as the design of any government policy, should, in theory, be guided by the nature of the problem that is being addressed, the circumstances, and the intended outcomes. As Bird and Smart argued, “since circumstances and objectives differ, no simple, uniform pattern of transfers is universally appropriate” (2001, p. 2). Some circumstances that will inevitably influence the structure and the amounts of the transfer are: (a) the political environment, such as the ideological inclinations of the governing party, or the minister in charge of the particular expenditure; and (b) the organization of the intergovernmental system, such as the expenditure responsibilities of local governments, the size of the recipient government, and the historical and constitutional relationship between the different levels of government (Ebel & Peteri, 2007).

For the design stage in the policy making process, as well as for implementation and evaluation, the extent to which relevant information is available is critical. Because of this, an effective transfer system should include a detailed plan for the systematic collection, analysis, and reporting of information that can be used to: (a) verify compliance with goals, (b) make any necessary adjustments to the size of the distributable pool or the chosen method to distribute the funds, and (c) made local public aware of what is done, how well it is done, how much it cost, and who paid for it (Bird & Smart, 2001, p. 17).

The design is what will ultimately determine the incentives for the donor and the recipient governments. Intergovernmental fiscal transfers, according to Bird, “are neither inherently good nor inherently bad; what matters are their effects on such policy outcomes as allocative efficiency, distributional equity, and macroeconomic stability” (2001, p. 25).” For the design, more than focusing on who gives the transfer or who gets it, the crucial element is focusing on the potential intended and unintended outcomes. Explaining the potential effects of the transfer design on the outcomes, Ebel and Peteri (2007, p. 122) argued that:

“If designed poorly, the system will not only fail to address imbalances, but will create additional problems. One such problem is what economists refer to as a ‘soft budget constraint,’ whereby central government engages in negotiating ad hoc ‘gap-filling’ spending at the end of a fiscal year—a practice that over time will cause subnational governments to become permanently transfer-dependent and will undercut the political and fiscal accountability link between policymakers and the citizenry. However, if done well, a transfer system can not only enhance the overall efficiency of

the public sector and ensure that even the poorest of local jurisdictions are able to finance a minimum standard of services, but can also serve as ‘fiscal glue’ for national cohesion through intergovernmental partnership.”

To design an effective system, ideally the donor government should ensure that it takes into account and addresses the key elements and questions that are identified in Table 1 below.²²

²² See Bird & Smart (2001); Ma (1997); Shah (1994); Shah (2006); and Yilmaz & Bindebir (2003)

Table 1: Key Elements and Questions that Should be Addressed When Designing a Transfer System.

ELEMENTS	QUESTIONS
Objectives	Are the objectives of the transfer clearly specified, and does the design safeguard their achievement?
Revenue adequacy	Is the amount of the transfer sufficient to achieve the desired objectives?
Local tax effort and expenditure control	Does the transfer encourage local revenue raising and fiscal prudence?
Distributional equity	Is the amount of the transfer responsive to local fiscal need and capacity?
Transparency and simplicity	Are recipients aware of the formula used to determine the level of funding, and is the formula based on objective factors over which recipients have little control?
Predictability	Does the formula, and the stipulated term of funding, allow for long-term planning at the local level?
Stability	Does the transfer contribute to political stability in the federation?
Autonomy & Flexibility	Is there a balance between central oversight and local discretion on decision making; are recipients able to make planning and expenditure decisions that will maximize their welfare?
Affordability	Are, and will, resources be available to fund the transfer for its entire stipulated duration?
Monitoring and Evaluation	Does the transfer stipulate the systemic collection, analysis, and reporting of information that can be used to verify compliance with objectives and to assist future decisions; are performance and outcome measure clearly outlined?
Accountability	Will recipients be accountable for their actions and the results obtained with the aid of the transfer to their residents and the donor government?

There are three steps to the designing of transfer systems. First, the objectives of the transfer must be identified. Second, the total amount to be transferred, i.e. the distributable pool, must be determined. Third, the way the available resources are going to be distributed between the recipients must be decided. For the second and third step, as Bahl explained, each available option will meet a different objective and will generate different types of incentives for recipient governments, so it is important for policy makers to have “a full understanding of the match between the objectives of the program and the vertical and horizontal dimensions of the system” (2000, p. 8).

Identifying the Source and Size of the Distributable Pool

Once the transfer’s objectives have been identified, the donor government has to decide where will the money come from, and what is the total amount to be allocated. Researchers in this area agree that there are basically three ways of determining the size of the distributable pool: as a fixed share of the donor’s government revenues; on an ad hoc basis as part of the annual budget decision; and on a formula-driven basis as a proportion of approved specific local expenditures to be reimbursed.²³

a) Sharing Revenues

Usually attached to a specific tax, like a portion of retail taxes or the gasoline taxes, this option, as Ebel and Peteri argued, “provides some degree of

²³ See Bahl (2000); Ebel & Peteri (2007); Yilmaz and Bindebir (2003); Bird (1999)

stability and transparency” for the recipient governments (2007, p. 125). Instead of a fixed amount of money, the donor government chooses the percentage of the collections to be shared, and the period for which the policy will be in place. In this case, the choice of the tax to be shared is quite important because it will determine the size of the donor’s commitment. For example, a large tax base with an income-elastic growth, like consumption taxes, is a big commitment that can compromise the fiscal flexibility of the donor government to respond to cyclical variations in their revenues (Bahl, 2000, p. 6). According to Bird, one of the potential drawbacks of this approach is that it might bias tax policy over time “as donor governments are inclined to increase more those taxes which they do not have to share” (1999, p. 25).

b) Formula Driven

When using this approach the donor government defines the eligible expenditures that it is willing to cover, and the level of reimbursement. Due to the comprehensive conditions that are usually attached to these kinds of arrangements, donor governments like this approach because it allows them to enforce their policy priorities and establish their desired standards. On the other hand, it represents an administrative burden for both the donor and the recipient because it requires significant monitoring and reporting, and it takes away some control over planning and expenditures decisions of the recipients

(Bahl, 2000, p. 9). Moreover, the emphasis on standards and uniformity can discourage local innovation.

c) *Ad-Hoc*

This approach involves deciding the total amount of the distributable pool every year as part of the budget making process. This is likely the best, and most centralized, system from the donor governments' perspective because of the discretionary nature of the process. For the recipient government, on the other hand, there are some drawbacks, such as the inability to make long-term fiscal plans, and the possibility of experiencing large cuts when policy and budgetary priorities shift or when the government fiscal position is experiencing a downturn. Moreover, as Bahl argued, the process: can lack transparency; is subject to political manipulation; it denies the link between expenditure responsibilities and revenue resources; and can discourage recipients to increase efficiency (2000, p. 7).

Deciding the Distribution of the Pool among Recipient Governments²⁴

Once the source and size of the distributable pool have identified, the donor government has to decide how to distribute the available resources among the recipient governments. According to Bahl, there are basically four ways of distributing the

²⁴ The text that follows is a synopsis of Bahl's (2000, pp. 9-19) detailed arguments on the choices available to donor government for deciding the distribution of available resources among recipient governments.

resources: the derivation approach, where local governments retain a share of what is collected within their boundaries; using a formula; reimbursing costs; and the ad hoc approach (2000).²⁵

a) **Derivation**

Once the distributable pool has been identified through a shared revenue approach attached to a specific tax, the distribution of the resources is done by giving each recipient an amount based on collections of that tax within their geographic boundaries. This is different from a local tax because the recipient has no control over the tax rate or the tax base. This choice presents some advantages: (a) these transfers tend to be unconditional, which gives the recipient freedom and flexibility in its expenditures decisions; (b) produce more certainty in local budgeting and fiscal planning; and (c) the administrative costs are relatively low. On the other hand, these transfers can also have some potential disadvantages: (a) they are not equalizing; (b) compared to a local tax, they do not strongly encourage tax effort; (c) they discourage local government autonomy because they cannot influence the total amount of revenue; (d) they discourage accountability because

²⁵ According to Ebel and Peteri there are three other ways of approaching the distribution of the resources: “(a) gap-filling model, where the grant for a municipality is equal to the difference between estimated level of expenditure and the planned local revenues; (b) local government respects hard budget constraint, whereby government spending is equal to the sum of own source revenues and grants made available for the locality; and (c) fiscal capacity based methods, where a formula-based grant is made to each recipient based on a calculated estimate of the difference between the summed amount of a (nationally) standardized set of expenditure functions and the recipient governments’ ability to mobilize own source revenues from a (nationally) standardized set of revenue bases” (2007, p. 125).

citizens are more inclined to hold local officials accountable when services are financed from local taxes; and (e) they leave the central government with less flexibility to make ad-hoc changes.

b) Formula

A formula based transfer uses “some objective, quantitative criteria to allocate the distributable pool among the eligible recipients” (Bahl, 2000, p. 13). This approach makes the transfer payment process transparent and objective, provides certainty for the recipients, and gives flexibility to the donor government. Before designing a transfer based on a formula the donor government must take into consideration: (a) the desired elements of the formula, which should ideally reflect the objectives of the transfers; (b) the data necessary to implement the formula, which should be available, reliable, and up-to-date; (c) the costs associated with administering the program, which are usually higher than those for shared tax transfers; (d) what conditions will be placed on the use of the resources, which are usually flexible; and (e) how will the program be monitored and evaluated on a regular basis.

c) Cost Reimbursement

Usually based on a conditional transfer, under this approach the donor government agrees to reimburse the recipient for all or a portion of the cost of a

specific expenditure. Compared to the other options, cost reimbursement is the only one that takes the cost of providing the service explicitly into account. The most important decision in this case is the matching ratio for the service. If the required share from the recipients is too high, few communities will decide to take advantage of the program, and low-income ones will not be able to participate, but if it is too low there will be no incentives to encourage efficiency and stimulate tax effort. Cost reimbursement, as Bahl argued, “imposes important costs on the residents of recipient communities and perhaps on society” (2000, p. 17) For example, autonomy is diminished because the local budget will be shifted in favour of the aided service and against other services that local residents would have chosen. At the same time, they are not likely to be equalizing, and impose a significant administrative cost.

d) *Ad-Hoc*

An ad hoc distribution does not follow a formula or specific criteria, and as Bahl explained, it is more of a “political instrument than an economic instrument” (2000, p. 19). The donor government, usually after negotiations with the recipient, decides how the money will be distributed and for how long. The advantage of this option is that it gives the donor the flexibility to distribute among recipients as they see needs emerge. This approach is chosen when, for example, there is a lack of information to create an appropriate allocation formula, and when the recipient

faces a special need that has to be addressed in a timely manner, for example in the event of a natural disaster or a large project in the national interest. Some problems associated with it are: (a) it can be perceived as paternalistic; (b) it can be used to off-load deficits on the recipients; (c) it can discourage expenditure efficiency; (d) makes budgeting for the recipient difficult due to the lack of predictability; and (e) it lacks transparency. Because of this, as Bird and Smart argued, “discretionary or negotiated transfers are undesirable” (Bird & Smart, 2001, p. 20)

As this section makes clear, the task of designing a transfer system is not easy. Policy makers have to ensure that all the key elements are taken into consideration, and that all potential options have been carefully considered. Moreover, as Yilmaz and Bindebir explained, this is a “dynamic process,” that is never fully completed (2003, p. 20). Once the system is implemented it will require constant monitoring, and potential adjustments to respond to, among other things: (a) changing socio-political, economic, and/or legal conditions; (b) the inability of the system to achieve the specified objectives; and (c) the emergence of unintended consequences. This reality is illustrated by Kenneth C. Wheare, a federal government employee, who remarked:²⁶

“There is and can be no solution to the allocation of financial resources in a federal system. There can be only adjustments and re-allocations in the light of changing conditions. What a federal government needs, therefore, is machinery adequate to make these adjustments.”

²⁶ As quoted by Oates (1972a, p. 65)

CONCLUSION

Intergovernmental fiscal transfers are an integral part of a government's policy instrument tool kit, and one of the most important sources of revenues for local governments. As previously explained, they can be used to address a wide range of objectives, including closing the fiscal gap, equalization, addressing political imperatives and furthering central government's policy goals. Applying this theory, the next chapter will explore the rationale for the implementation of the Gas Tax Fund transfer by the Federal government. This will be achieved through a historical overview of the development of the problem that it was meant to address, and the political and economic environment that influenced the choice of this policy instrument. Chapter 4 will also overview the Gas Tax Fund's policy goals and the intended outcomes.

To better address different policy objectives, the donor government in a transfer system will choose a combination of design features that will result in either conditional or unconditional transfer systems. In the case of the Gas Tax Fund the government chose to design a conditional non-matching closed-ended transfer with innovative features which will also be identified and analyzed in detail in the next chapter. As the forgoing analysis suggested, designing a transfer system is not an easy task due to the many elements that must be taken into consideration. In the next chapter (Chapter 4), the way the federal government addressed the key elements and questions of the Gas Tax Fund

design process will be overviewed through the identification of its features, such as the size and source of the pool, the distribution formula, and the accountability framework.

As it was also previously discussed, another factor that makes the design process challenging is the fact that each decision is expected to have different effects on the recipient's spending patterns. These effects have been the focus of both quantitative and qualitative studies attempting to model and explain the potential level of expenditure stimulation that could be achieved with a particular type of transfer and the threat of substitution. Among the effects studied is the phenomenon dubbed the 'flypaper effect' that, according to empirical research, shows that recipient governments seem to spend the resources received for the purpose for which they were intended instead of using them for other forms of spending or tax relief. The evidence of this phenomenon in the transfer of the Gas Tax Fund in Ontario will be further explored with an econometrics analysis in Chapter 6.

CHAPTER 4

THE GAS TAX TRANSFER: CONTEXT, ORIGINS, AND DESIGN

INTRODUCTION¹

This chapter provides a comprehensive overview of the Gas Tax transfer. It sets the historical and policy context within which the municipal expenditures decisions for sustainable infrastructure investment under the Gas Tax Fund have been made since 2005. The chapter proceeds in three sections. In the first section, the chapter describes the provisions and practices that guide the use of intergovernmental fiscal transfers in Canada's complex fiscal framework. In the second portion, the chapter explores how urban issues arose on the Government's agenda from the early 1990s to 2004 leading to the drafting of a New Deal for Cities and Communities under Paul Martin's Liberal government. This deal included the establishment of the Gas Tax Fund. In the third section, the chapter describes how the Gas Tax Transfer was designed as an innovative hybrid between a grant and a contribution, and it overviews the policy objectives, the driving policy principles, the provincial allocations, the use of the funds, and the accountability framework. These three sections address the first research question of this

¹ Much of this chapter draws freely on related prior work. See Adams & Maslove (2009) presented at the Canadian Political Science Association 81th Conference on May 27th 2009; and Adams & Maslove (Forthcoming)

dissertation: *What were the principal factors that influenced the Government's choice of a transfer as a policy instrument and the specific design of the Gas Tax Fund policy?*

INTERGOVERNMENTAL FISCAL TRANSFERS IN CANADA

Legal Context

Intergovernmental transfers have been historically a dominant feature of the highly decentralized Canadian fiscal framework.² While their number, size, and nature have changed through the years since Confederation,³ these public financing instruments have been consistently used as a way of addressing the changing circumstances not properly addressed by the initial division of responsibility and taxing authority established by the Constitution Act⁴, 1867. Among these changing circumstances, as Richmond (1980) argued, were the “relative increase in the demand for government services and the growth of public sector spending that resulted; and the substantial change in the composition of the public goods and services being requested.” At the same time, these instruments have been used as a way of “facilitating the achievement of the advantages of decentralization while minimizing its adverse consequences for national objectives” (Boadway R. W., 2007, p. 55).

² For a discussion on fiscal federalism see Oates W. (1999), and for an introduction to Canada's fiscal arrangements see Boadway R. (2006).

³ In 1994-1995, for example, intergovernmental transfers in Canada amounted to approximately \$115 billion, while in 2004-2005 they amounted to approximately \$99 billion (Public Works and Government Service Canada, 2012). In 2006-2007 the expenditures were approximately \$125 billion dollars: of this approximately \$1.8 billion was allocated to Infrastructure Canada, of which \$590 million represented the Gas Tax Fund transfer. All figures are presented in 2007 dollars.

⁴ The Constitution Act was formerly called the British North American Act. The name was changed in 1982.

The provisions and practices that guide the use of these transfer payments in Canada have their origin in the notion known as ‘spending power,’ and the Constitution Act, 1867, including its successive amendments. The federal spending power “emerged along with the welfare state from a series of federal government initiatives undertaken mostly in the wake of World War II; it is closely linked with efforts to centralize the taxing power” (Richer, 2007, p. 5). This notion has been defined as the “power of Parliament to make payments to people, institutions, or provincial governments for purposes on which Parliament does not necessarily have the power to legislate” (Trudeau, 1969, p. 4).⁵ While not explicitly referred to in the Constitution Act, 1867, it is inferred from the outline of the distribution of legislative power contained in sections 91 - Powers of Parliament, and 92 - Exclusive Powers of Provincial Legislatures.⁶

Section 91 grants Parliament the power to make “Laws for the Peace, Order, and good Government of Canada,” and Section 106 grants it the right to appropriate funds from the Consolidated Revenue Fund of Canada for the “Public Service” (Constitution Act, 1982). Both of these have been used as a justification for spending measures, such as transfers, that serve the national interest. Section 91(1A) grants Parliament the power to legislate in relation to “the public debt and property,” while section 91(3) grants it the

⁵ As Boadway and Watts (2000, p. 11) remarked, in 1991 the Supreme Court of Canada’s “latest decision on the constitutionality of the federal spending power made it clear that as long as the federal government does not go beyond granting or withholding money, there is no unconstitutional trespass into provincial jurisdiction.” For a detailed explanation of this case see Hogg (1996, pp. 149-150). For a discussion on the spending power in federal systems see Watts (1999).

⁶ For the full text of the Constitution Act, 1867 and 1982, see Department of Justice Canada (2008).

power to legislate in relation to “the raising of money by any mode or system of taxation” (Constitution Act, 1982). These provisions provide Parliament with the sources of revenue necessary to support its spending decisions.

Section 92 (2) grants Provincial Legislatures the power of “direct taxation” to raise revenue for provincial purposes (Constitution Act, 1982). With a few exceptions, such as the federal right over custom duties and the provincial right over mineral resources, this provision gives both levels of government concurrent jurisdiction over common tax bases. In practice, this means that both levels of government must negotiate the tax room that each can occupy to avoid taxing the same base excessively. This can result in a vertical fiscal imbalance that, in the past, has been addressed with intergovernmental transfers.

Section 92 (8), which is the base for the popular conceptualization of cities as ‘creatures of the province,’ grants Provincial Legislatures exclusive power over making laws in relation to municipal institutions (Constitution Act, 1982). As Sancton and Young (2004, p. 31) argued, this provision means that they alone can “create municipalities, allocate powers to them, and prescribe or proscribe their behaviour,” but, notwithstanding the political realities, it “fails to restrain the Federal government from transferring funds to municipalities, or from spending and otherwise acting within those boundaries”

Furthermore, Schedule B of the Constitution Act, 1982, contains several provisions with potentially important implications for federal-provincial fiscal relations, including furthering the justification of the use of the spending power (Boadway & Hobson, 1993, p. 6). For example, Part III (Equalization and Regional Disparities), Section 36(2), establishes the commitment to “the principle of making equalization payments to ensure that provincial governments have sufficient revenues to provide reasonably comparable levels of public services at reasonably comparable levels of taxation” (Constitution Act, 1982). This provision directly outlines the continuing obligation of the Federal government to make equalization transfer payments to the provinces.⁷

At the same time, Section 36(1) establishes that “(a) promoting equal opportunities for the well-being of Canadians; (b) furthering economic development to reduce disparity in opportunities; and (c) providing essential public services of reasonable quality to all Canadians” are national objectives for which the Federal government and the provinces are jointly responsible (Constitution Act, 1982). While the use of equalization and other transfer payments precedes the Constitution Act, 1982, this provision allows the achievement of these objectives to be used as concrete rationales for

⁷ While the Government had been making equalization payments since Confederation, and a formal system of equalization payments was first introduced in 1957, it was not until 1982 that the concept of these payments became ingrained in the Canadian constitution.

different kinds of transfer payments to the provinces for services related to areas such as health, education, and welfare.

This legislative framework, in conjunction with the political and socio-economic environment, guides the transfer payment agenda in Canada. To decide whether an intergovernmental transfer is the appropriate policy instrument to address the identified problem, and to choose the appropriate level and type of transfer, the donor government evaluates, among other things, the fiscal capacity, the need, and the tax effort of the recipient government (Oates, 1972b, p. 86).⁸ For example, in the case of the Gas Tax transfer the Government had to make an aggregated assessment that recognized the limited fiscal capacity of Canadian municipalities to raise revenues to fund infrastructure projects,⁹ and the aging and fast-crumbling infrastructure across Canada.¹⁰ Using an equitable allocation formula, where the money was distributed to local governments

⁸ A government's fiscal capacity refers to its ability to raise revenues, and it depends on the local economy and the legal constraints that delineate its tax and revenue base. The need refers to the particular characteristics, such as location and the size and age of its population, which may demand higher expenditures in certain areas. Tax effort is ratio of tax collections to tax capacity.

⁹ Revenue generating opportunities for municipal governments in Canada are tightly controlled by provincial legislation and regulations, and, as Kitchen (2002) explained, "the combination of increased funding responsibilities for municipalities, lower provincial grants, and corresponding increases in reliance on own-source revenues over the past 12 years has changed the fiscal environment in which municipalities now operate." For a comprehensive overview of the fiscal challenges resulting from this new environment see Kitchen (2003).

¹⁰ According to a report commissioned by the Federation of Canadian Municipalities (FCM), the physical foundations of Canada's cities and communities are near collapse. As the report described, in 2007 the municipal infrastructure deficit (an estimate of the total additional investment needed to repair and prevent deterioration in existing, municipally owned infrastructure assets) had reached \$123 billion (Mirza, 2007). This figure represents a dramatic increase from previous estimates that had placed the deficit at \$12 billion (1985), \$20 billion (1992), \$44 billion (1996), and \$60 (2003). For an earlier overview on the state of infrastructure in Canada and some of its implications for planning and policy see Mirza & Haider (2003).

based on population, the Federal government chose to disregard the particular needs of each of the recipients, and the possibility of rewarding high tax effort.

ORIGINS OF THE GAS TAX FUND

From Advocacy Efforts to 13 Signed Agreements - The emergence of the problem and the socio-political and economic context

Due to financial constraints, concerns about provincial jurisdiction over municipal affairs, and the unsatisfactory experience with the Ministry of State for Urban Affairs in the 1970s, the Federal government for most of the 1980s and 1990s did not have as a priority the intervention into urban affairs (Andrew C., 2001).¹¹ Moreover, as Kitchen and McMillan (1985, p. 215) argued, “Canadian local governments [were] widely regarded as minor players in the Canadian federal scene,” and “if acknowledged, they were back in the shadows, forgotten in the excitement and turmoil of federal-provincial relations.” Federal urban policies had been and continued to be, as Feldman and Milch (1981, p. 263) remarked, “not only incoherent and irrational,” but often “inconsistent and unequal.”

By the mid-1990s, amid the elimination of federal deficits and the emergence of large surpluses, a combination of factors motivated the creation of a very strong and

¹¹ Created by Prime Minister Pierre Trudeau, the Ministry of State for Urban Affairs (1971-1979) was responsible for coordinating federal activities that touched on urban development (over 100 programs), doing research on urban questions, and interacting with other levels of government. As Andrew (2001, p.104) explained, the Ministry was dissolved eight years later based on: (a) provincial government opposition to its existence, (b) federal concerns about budgets, and (c) the perceived inability of the department to meet its objectives.

vocal urban policy community¹² that started to exert considerable pressure on the Federal government for new recognition, respect, and resources (Bradford, 2004). Among the key issues were the toll on the physical and social infrastructure of cities left by the federal policy vacuum; their insufficient revenue raising capabilities against their rising expenditure needs; and their increasingly recognized role in the promotion of a country's economic growth and productivity.¹³

Interest groups, academics, think tanks, media outlets, and municipal and city employees, among others, were able to raise slowly urban issues on the federal agenda by developing different channels of advocacy. This policy community, for example, focused on critical transit, roads, water, and sewage cases that captured the public's attention because they knew that politicians like to be seen taking action to address very visible problems (GT-100, personal interview, 2007). Likewise, they constantly reminded the Federal government that: a) Canada is now one of the most urbanized countries in the world,¹⁴ b) many cities are singularly ill-equipped to cope with the responsibilities

¹² According to Pal (2001, pp. 234-235), a policy network is "the particular pattern of interactions and relationships that have consequences for the development and delivery of policy," and a policy community is "the list of actors in a policy network, presumably ones who share at least some common language, but who may be opponents on the issue."

¹³ For an overview of the growing centrality of Canadian cities at the start of the new century in terms of three key flows: of people, of capital, and of ideas see Gertler (2001).

¹⁴ In 1996 nearly 78 percent of the Canadian population was living in urban areas, defined as communities with at least 1,000 inhabitants and with a density of at least 400 persons per square kilometre. More specifically, about 62 percent of Canadians were living in the 25 census metropolitan areas, also known as CMAs, which are city-regions with population in excess of 100,000 (Bourne, 2000).

downloaded to them,¹⁵ and c) there are a whole range of federal policy concerns including economic innovation, competitiveness, and the quality of the environment that inevitably have an urban dimension (Anderson, 2002).

Among the significant players reinforcing these messages were the Federation of Canadian Municipalities (FCM), and its Big Cities Mayor Caucus (BCMC).¹⁶ For example, in 2001 the FCM released two key reports: (a) “Quality of Life in Canadian Communities” (2001c), which found that poverty and income inequality had continued to expand in large urban communities since their first study in 1999; and (b) “Early Warning: Will Canadian Cities Compete?” (2001a, p. 23), which found that municipal governments in Canada “have many fewer levers to attract investment, and scant access to federal and provincial funds,” when compared to the comprehensive set of municipal fiscal tools and national and supra-national grants available in the United States and Europe.¹⁷ On the other hand, one of the contributions of the BCMC was the launch in the same year of “Canada’s Cities: Unleash our Potential,” a campaign created to “promote the urgent need for the Federal, provincial and municipal governments to work together

¹⁵ As Graham, Andrew and Phillips (2002, p. 10) argued, the “period since 1985 was characterized by the search of provincial-municipal disentanglement, which is defined as changes in provincial-municipal relationships.” This resulted in “significant downloading of responsibilities to municipalities without financial compensation and a sharp-reduction in provincial-municipal transfers,” which are one of the three main sources of revenues to municipalities (the other two are property taxes and user fees). This process was particularly strenuous for the Province of Ontario which experienced the downloading of the Harris Conservative government in the late 1990s (GT-100, personal interview, 2007).

¹⁶ The BCMC comprised the mayors of Canada’s 22 largest FCM’s member cities and met approximately three times a year to discuss issues common to large urban areas to bring an urban perspective to the FCM’s advocacy work on municipal issues.

¹⁷ For the full reports see FCM (2001c), and FCM (2001a).

to give Canada's cities the tools and resources they need to compete on the world stage" (Miller, 2001).

Another group of mayors that had an important role was the C5.¹⁸ Their goal was to "work collaboratively, with other Canadian mayors, and with the two other levels of government, to achieve a new deal that could empower cities to manage themselves more effectively" (Rowe, 2001). Among their concerns was the flow of resources between the three levels of government. As Murray (2001) remarked at the first C5 meeting: "\$4 billion in motor fuel taxes is going out of cities across Canada to the Federal government, and less than 3.5% of that money is reinvested back in the cities that generated it in the first place."

Key roles were also played by independent research institutes that held conferences, summits, symposiums, and published reports on urban issues. Among them were the Canada West Foundation with its Western Cities Project,¹⁹ the Canadian Policy Research Network (CPRN) with its Cities and Communities research stream, and the

¹⁸ The C5 was originally conceived by renowned urbanist and economist Jane Jacobs and Toronto based businessman and philanthropist Alan Broadbent. It first met in Winnipeg in May 2001 and it was formed by the mayors of five of Canada's hub cities: Vancouver, Winnipeg, Toronto, Montreal, and Calgary.

¹⁹ Established in 2000, the Western City Project has "been providing decision-makers and the public with timely and accessible information about urban issues and putting forward practical recommendations for addressing urban public policy challenges" (Canada West Foundation, 2007). Under this project the Foundation held several conferences, including "MetroWest II: Focusing on the Future of Western Canada's Cities" in 2002, and published over 45 papers, including "Cities at the Crossroads: Addressing Intergovernmental Structures for Western Canada's Cities" (Wong, 2002). For a full list and access to all the publications see Canada West Foundation (2007).

Conference Board of Canada.²⁰ Another noteworthy contribution came from the TD Bank Financial Group, a private-sector organization that became involved on urban issues based on their concern over the rate of economic growth in Canada and the expanding role of cities in promoting new growth.²¹

In these contributions, the recurrent central theme was that in the new era of globalization, amalgamations, urbanization, and downloading well-functioning and competitive cities were required to guarantee the future of Canada's economic growth and productivity. To achieve this, the community argued, the Federal and provincial governments had to find a way of ensuring municipalities had the means of making investments in infrastructure, human capital, and culturally rich environments.²² Moreover, these higher orders of government had to start accounting for the impact that their policies have on municipalities and municipal budgets. A prime example used was immigration policies, which imposed costs on municipalities for settlement programs,

²⁰ Created in 2002, the Cities and Communities research stream was the foray of CPRN and its Family Network into the urban debate. Its first research report, "Why Cities Matter: Policy Research Perspectives for Canada," by Bradford (2002) contributed to the knowledge about the problems, prospects, and choices faced by Canadian cities in their historical context, and in relation to contemporary intellectual debates about how cities work, and how they might work better. For a full list and access to all the publications, see CPRN (2008).

²¹ In 2002, the TD Financial Group published a special report: "A Choice Between Investing in Canada's Cities or Disinvesting in Canada's Future." This report provided a good overview of Canada as an urban country, how do Canadian cities compared internationally, and municipal challenges with potential solutions. Their conclusion was that: "we must all recognize that cities will be at the forefront of Canada's march into the 21st century; without robust and vibrant cities, there is simply no hope for achieving the objective of beating the U.S. standard of living within 15 years" (TD Bank Financial Group, 2002).

²² As Martin (2002) argued, the need for investments in these areas had been exacerbated by: (a) emerging population trends that created the added costs of settling, housing, and transporting huge new influxes of people; and (b) by economic growth which often costs municipalities money as they have to pay for, among other things, the roads, sewers and other services needed to support a new plant or a new business.

education, and public health programs. This community tried to reinforce the idea that the constitutional reality should not “be used as an excuse for federal inaction,” and presented actions that could be taken without “violating the federal-provincial balance” (Tindal & Tindal, 1990, p. 213).

By the early 2000s, the Government seemed ready both financially and in principle to embrace a new urban strategy. Financially, for example, Budget 2000 included the creation of the \$2 billion Canada Infrastructure Fund, focused primarily on smaller-scale clean water and environmental initiatives, and Budget 2001 announced the creation of the \$2 billion Strategic Infrastructure Fund, aimed at larger projects that required larger investments (Martin, 2002). At the same time, “Opportunity for All,”²³ the 2000 Liberal party platform, recognized the challenges facing cities and the need to address them to remain competitive. It specifically made a commitment to “work with partners from across the country to enable citizens, experts, and officials from all orders of government to engage in a dialogue on the opportunities and challenges facing our urban regions” (Liberal Party of Canada, 2000, p. 26).

In 2001, facing strong pressures by a group within the caucus that had been pushing for a cities agenda, Prime Minister Jean Chrétien, while still hesitant to move

²³ After being in office since 1997, the governing Liberal Party of Canada called an election in 2000. “Opportunity for All” was the key document of the Liberal’s election strategy. Held on November 27, this election gave the Liberals a third consecutive majority government and more seats than the previous election.

forward on this file, fulfilled its platform promise by creating a Caucus Task Force on Urban Issues (GT-101, personal interview, 2007).²⁴ Chaired by Member of Parliament (MP) Judy Sgro, this Task Force was asked to explore ways in which the Government could better focus its efforts in urban centers to sustain and enhance their quality of life.²⁵

By 2002, Finance Minister Paul Martin was recognizing publicly that cities were entitled to a new deal to address their shortcomings and to be prepared for the economic challenges and transformations brought on by globalization (CBC News, 2002). More specifically, in his final public speech as Finance Minister, he provided the road map to what eventually would become the New Deal for Cities and Communities (Martin, 2002).²⁶ Among the most significant remarks from this speech were that the deal would establish a new relationship with all three levels of government based on cooperation, and would involve all municipalities, large and small. Moreover, it would provide predictable and reliable long-term solutions based on the principle of transparency, so that taxpayers would be able to understand where their money was going. In relation to the choice of potential solutions, he remarked that “everything was on the table” (Martin, 2002).

²⁴ Chretien firmly believed that while municipalities had dealt directly with federal departments on issues of infrastructure, housing and homelessness, it was “a fact of life that the Constitution of Canada dictates very clearly that the municipalities are under the responsibility of the provincial governments” (Fraser G., 2002)

²⁵ The Task Force’s mandate was to, among other things, identify: (a) key opportunities for increasing economic competitiveness in Canada; (b) environmental issues affecting municipalities such as air, water quality and land-use; (c) approaches to strengthening cultural assets; (d) key issues with urban transit; (e) effective approaches to settlement and integration services for newcomers to Canada; and (f) the specific needs and circumstances of at risk populations (Randa, 2001).

²⁶ The speech was delivered on May 31, 2002 to the FCM in Hamilton, Ontario,.

Shortly after Martin left Cabinet, in June 2002, the urban policy community started to get concerned once again about the prospects of a new deal. As soon as the new Finance Minister, John Manley, was appointed, he openly rejected the idea of transferring further federal tax resources to Canada's cities. During an interview he argued that he did not "believe in increasing the disconnect between the level of government that taxes and the level of government that spends," and that "it was better to have accountability for taxation with the level of government that imposes it and then spends it" (Fraser G., 2002).

Later that year, in November, hope was renewed when Martin's ideas were echoed in the final report of the Caucus Task Force on Urban Issues, "Canada's Urban Strategy: A Blueprint for Action." This report supported the view that there was a need for federal assistance in municipal infrastructure renewal, and provided, through its recommendations, "the building blocks of a national urban revitalization and innovation agenda" (Sgro, 2002). In particular, the report called for the appointment of a cabinet minister responsible for urban regions, and the establishment of a long-term (i.e. 15 years) National Infrastructure Program that would build on current programs to provide stable, reliable funding (Sgro, 2002). Moreover, it recognized the necessity for cooperation and collaboration between all players on the urban policy community, and the interrelatedness of all urban problems and their solution (Wolfe, 2003).

Despite these developments, the move from policy prospects to implementation was delayed by political uncertainty. First, there was the Liberal leadership race that culminated on November 2003 when Minister Martin succeeded Prime Minister Chrétien. Second, there was the 38th General Election, held on June 2004 where the Liberal government of Martin lost its majority, and the newly amalgamated Conservative Party of Canada became the main opposition party.

Paul Martin was committed to moving forward, and after becoming Prime Minister the cities and communities agenda was placed front and centre. First, he quickly appointed Don Valley West MP John Godfrey as his Parliamentary Secretary with special emphasis on cities and communities. Then, he appointed former British Columbia Premier and Mayor of Vancouver, Mike Harcourt, as Chair of the External Advisory Committee on Cities and Communities (EACCC).²⁷ This advisory committee was to, among other things, “develop a long-term vision on the role that cities and communities should play in sustaining Canada’s quality of life, enrich the discussion of policy options, and provide advice on how to best engage provincial, territorial, and Aboriginal governments” (Infrastructure Canada, 2006a).

²⁷ The EACCC was officially created in February 2004 to “help rethink the way Canada and its communities are shaped to ensure Canada will be a world leader in developing vibrant, creative, inclusive, prosperous and sustainable communities” (Infrastructure Canada, 2006b). In forming their recommendations the Committee solicited input from a wide variety of stakeholders across the country and reviewed domestic and international evidence. The final report, “From Restless Communities to Resilient Places: Building A Stronger Future For All Canadians,” was submitted to the Prime Minister on June 15, 2006.

In February 2004 the Government used the Speech from the Throne to Open the Third Session of the 37th Parliament of Canada to officially introduce what Martin had been promising on the campaign trail: a New Deal for Cities and Communities (NDCC). The Speech highlighted that this deal would target the infrastructure needed to support quality of life and sustainable growth; would help communities become more dynamic, more culturally rich, more cohesive, and partners in strengthening Canada's social foundations; and would deliver reliable, predictable, and long-term funding (Clarkson, 2004). Moreover, the Speech acknowledged the Government's intent to set-up the agreements to transfer funds, nominally linked to the gas tax, to municipalities.

After travelling across the country for six months consulting with mayors and municipal leaders, Aboriginal representatives, as well as leaders of relevant businesses, industries and organizations on the parameters of a new deal for municipalities, in July 2004 Minister Godfrey was appointed to the newly created position of Minister of State for Infrastructure and Communities.²⁸ This department brought together: the Cities Secretariat,²⁹ which was located at the Privy Council Office; Infrastructure, which was on

²⁸ While during the previous six months of Martin's government the Department of Infrastructure had as its senior minister the Minister of the Environment, when the Ministry of Infrastructure and Communities was created it became part of the Prime Minister's portfolio. This was done deliberately to reinforce that the cities agenda was still a major priority of the Government.

²⁹ The Cities Secretariat was "created upon an assessment from the Privy Council Office task force on Canada's Urban Communities which indicated that cross-cutting, horizontal issues facing Canadian cities (e.g.: competitiveness and quality of life) were not adequately addressed through traditional policy practices or the introverted silos that federal departments worked within." (Infrastructure Canada, 2007c). Its mandate included ensuring that a 'cities and communities lens' was applied in the consideration of policy, programs, and the Government's agenda (Infrastructure Canada, 2004).

its own;³⁰ and four Crown corporations.³¹ In his first speech as Minister of State, delivered at the second Canadian National Summit on Municipal Governance, Godfrey provided the initial details and the guiding principles of the Gas Tax transfer.³² While the exact amount was not determined, he mentioned that the total sum over a five-year period would be between \$4 billion and \$5 billion, and explained the challenges of designing the transfer to ensure that: (a) it was sufficiently simple that municipalities could understand the rules; (b) provinces did not claw back their current level of support; (c) the money went to the municipalities and that it was spent in some measurable incremental fashion on sustainable infrastructure; and (d) it met the needs of the smaller communities, as well as the largest cities, in ways which were relevant (Godfrey, 2004a).

For many years, key players - including big city mayors, such as Winnipeg's Glen Murray;³³ municipal associations, such as the FCM; and academics, such as Kitchen and Slack³⁴ - had been calling for the share of a portion of the federal revenues from fuel

³⁰ At the time of its appointment, Godfrey (2004a) candidly remarked that this was "a combination of steak and sizzle." While Infrastructure had the money, the programs, and the expertise on the ground, the Cities Secretariat had done a good job in scoping out the potential for a gas tax deal and improved, tripartite respectful relationships (Godfrey, 2004a).

³¹ The Crown corporations in the Minister's portfolio were: Canada Lands Company, the Old Port of Montréal Corporation, Parc Downsview Park, and Queens Quay West Land Corporation.

³² This summit was the perfect setting for the announcement as it was attended by, among others, mayors, councillors, other elected officials, and municipal employees. The objective of the summit was to develop proven governance practices to encourage public confidence.

³³ As Ternette (2008) explained, while the FCM had been talking about the needs of cities in Canada for a long time, for the most part the media and the Federal government had chosen to ignore the issue until Murray picked up on the idea and made it a national issue. For an overview of the rise and fall of Murray's New Deal ideas see Ternette (2008).

³⁴ In one of the contributions where they talked about fuel taxes as potential finance options for municipalities, they recognized the potential for allocating a portion of the revenues to municipalities

taxes to be devoted to addressing municipal fiscal needs. For example, advocating for new urban financing tools, the FCM argued in 2001, on both their Federal Budget Submission and their Brief to the Prime Minister's Caucus Task Force on Urban Issues, that the Federal government had an opportunity to apply programs already in place provincially at the national level (FCM, 2001a & 2001b). They were referring to the actions of Alberta, British Columbia (B.C.), and later Quebec, that had committed a certain portion of the provincial revenue from fuel taxes collected within the boundaries of large cities to support long term transportation planning and development.

While Martin had openly rejected these proposals in 2001, because he believed that dedicated tax schemes lead to distortions of taxation and spending (Mohammed, 2002), the key players kept pressuring the Government on the issue and they gained a partial victory when the Gas Tax transfer was finally announced.³⁵ The victory was only partial because, among other things, once the details were revealed it became evident that the Government was not sharing all its fuel taxes, only excise taxes on gasoline; it was a five year program, not a permanent measure; and it was not limited to the big cities or to transportation projects.

through a grant formula, such as the proposed gas tax, but argued that the problem with this method is that "it would not allow municipalities to set their own tax rates and thus would do nothing for local autonomy or accountability" (Kitchen & Slack, 2003).

³⁵ As it was evident in a speech delivered by Martin to the FCM, by 2002 he was still sceptical but receptive to the possibility of sharing the gas tax. In his remarks, he explained that "the Federal government has always been wary of dedicated taxes--arguing that such ties make it very difficult, if not impossible, to respond to changing circumstances," but that recognizing "that municipalities have inadequate revenue sources as things stand" he knew he needed to be open to considering all options (Martin, 2002).

The creation of the Ministry of Infrastructure and Communities, and the 2004 Budget, which announced a series of municipal initiatives, were promising moves from rhetoric to action.³⁶ At this point, stakeholders were hoping that the sharing of the Gas Tax would be scheduled in the 2004-05 fiscal year, but, due to financial and administrative challenges, the Government was unable to do so. According to Godfrey, it was important to “find some new incremental source of money – not just re-announced old money – and do it in a way that was clean administratively,” and which would not “come back and embarrass us because we did not figure out how to do it right” (CBC News, 2004).

After long consultations with key players, such as the FCM, city mayors, and councillors, and internal discussions between the Ministry of Infrastructure and Communities, Cabinet and Treasury Board, the Government was ready to finalize the framework of the NDCC. This framework was revealed in several communications in 2005 and subsequently made official in Budget 2005.³⁷ The details related to the gas tax

³⁶ The municipal initiatives were: the full rebate of the Goods and Service Tax (GST) paid by municipalities, accelerated federal spending through the Municipal Rural Infrastructure Fund, extensive funds for the cleanup of federal contaminated sites, and greater coordination of programs for urban Aboriginal people (Department of Finance Canada, 2004).

³⁷ The details of the Gas Tax Fund are described in the following sections. For an example of a NDCC news release see Ventin (2005). Budget 2005, “Delivering on Commitments,” announced measures that would provide Canadian communities with more than \$9 billion in funding over the next five years by: (a) providing municipalities with a share of gas tax revenues; (b) renewing existing infrastructure programs as necessary; and (c) by increasing contributions to the Green Municipal Funds. Specifically to the Gas Tax, it outlined the total amount of funding that would be available, and the total provincial allocations. Moreover, it also acknowledged that the Government would continue to seek further opportunities for dialogue with municipal leaders, while respecting provincial and territorial jurisdiction (Department of Finance Canada, 2005).

on this budget were: (a) the amount of the transfer, which was the equivalent of 1.5 cents per litre, or \$600 million in revenues starting in 2006, and increasing to the equivalent of 5 cents per litre, or \$2 billion annually, by 2009-2010; (b) the objective of the program, which was providing funds for environmentally sustainable infrastructure that contributed to cleaner air, cleaner water and reduced Green House Gas (GHG) emissions; and (c) the allocation formula, which stipulated that funds would be distributed on a per capita basis to the provinces and territories, who would be responsible for disbursing the funds to municipalities according to arrangements negotiated in each jurisdiction. With this announcement, there was no longer any doubt that the Government was finally engaged in municipal concerns.

The negotiations leading to the signing of the agreements were completed very quickly and the process was remarkably smooth. This result was attributed to several factors (GT-102, personal interview, 2007 and Godfrey, personal interview, 2007). First, the Federal government looked back as to why previous attempt had failed to identify a potentially successful point of entry.³⁸ Second, because there was a political imperative, the negotiations were done by three federal teams covering the provinces and territories simultaneously. This limited the opportunity

³⁸ As Godfrey explained, housing had been a recent nasty battle ground and the Government was hoping to avoid making the same mistakes (Godfrey, personal interview, 2007). Some of the things they did as part of their entry strategy was to: (a) carefully consider who got to call the meetings, who attended and so on (for example, the provincial ministers of municipal affairs, who were most concerned with getting on with infrastructure renewal, were always invited, but the ministers of inter-government affairs, who were more concerned with process and jurisdiction, were kept out of the negotiations); (b) avoid creating the impression with the municipalities that they were going against the provinces; and (c) tell Quebec officials that their mission was to reinforce the great work that they had done with sustainability, and that they shared the same objectives.

of each province to hold up the process to see what the other ones were doing. Moreover, with each agreement signed the negotiating teams gained more leverage because there was increased pressure for the other provinces to sign. Third, Infrastructure Canada had already dealt with many of the provincial and municipal players, establishing a good rapport that aided the negotiating teams; there were no real surprises at the negotiating tables. Fourth, the negotiations were done under the label of 'infrastructure' instead of 'cities' which could have been, especially in Quebec, a more contentious issue. Finally, there was a template for the agreements that had been approved by Cabinet and Treasury Board which represented a good starting point to the process, and placed pressure on the negotiating teams to keep them as close to it as possible.

In May 2005, after a very labour intensive process, Alberta signed the first agreement. After just seven months, 12 of the 13 agreements had been signed by the other provinces and territories (Newfoundland and Labrador signed in 2006). This was a task that very few believed could be accomplished in such a short period (GT-104, personal interview, 2007). Table 2 below shows the dates in which all of the agreements were signed. Compared to the other two components of the NDCC, i.e. the full refund of the GST and the intent to establish a new relationship with the municipalities as recognized governing bodies, the Gas Tax Fund became the most tangible policy (GT-104, personal interview, 2007).

Table 2: Signing Schedule

SIGNATORY	DATE
Canada – British Columbia – UBCM³⁹	April 15, 2005
Canada – Alberta	May 14, 2005
Canada – Yukon	May 26, 2005
Canada – Ontario – The Association of Municipalities of Ontario (AMO) – City of Toronto	June 17, 2005
Canada – Nunavut	August 3, 2005
Canada – Saskatchewan	August 23, 2005
Canada – Nova Scotia	September 23, 2005
Canada – Northwest Territories	November 10, 2005
Canada – Manitoba	November 18, 2005
Canada – Prince Edward Island	November 22, 2005
Canada – New Brunswick	November 24, 2005
Canada – Québec	November 28, 2005
Canada – Newfoundland and Labrador	August 1, 2006

Source: The provincial Gas Tax Fund Agreements available at Infrastructure Canada (2010)

POLICY DESIGN OF THE GAS TAX TRANSFER

The Policy Instrument I - A Hybrid Transfer

While the Gas Tax transfer is just one of many transfer payments made by the Federal government each year, it is considered innovative because of the way it was set up, i.e. as a hybrid between a grant and a contribution (GT-101, personal interview,

³⁹ While the Agreement in principle was signed in April, a final agreement was signed on September 19, 2005.

2007). According to the Policy on Transfer Payments in place in 2008, contributions are conditional transfer payments “for a specified purpose pursuant to a contribution agreement that is subject to being accounted for and audited,” while grants are unconditional transfer payments which “are not subject to being accounted for or audited but for which eligibility and entitlement may be verified or for which the recipient may need to meet pre-conditions” (Treasury Board of Canada Secretariat, 2008).

The Gas Tax Fund has some characteristics of a contribution agreement because it contains a complex accountability framework that includes an annual expenditure report, an outcomes report, and an audit report.⁴⁰ At the same time, it has characteristics associated with grants because the funding is given up-front, and, while the agreements specify eligible categories, the Federal government is not involved in the selection of specific projects. As Godfrey explained, while it was important for the Federal government to focus their attention on a critical issue, environmentally sustainable municipal infrastructure, they knew that setting the criteria by which projects qualify for funding, and allowing municipalities to set the individual priorities for those projects, would avoid the problem of meeting everyone’s expectations and needs (CBC News, 2004). Unlike grants, the Gas Tax transfer was based on a five-year (2005 to 2010) formula, which required annual appropriations.

⁴⁰ The common set-up of the program is outlined in all of the Gas Tax Fund Agreements available on the Department of Infrastructure (2010) Website. A detailed description of the accountability framework follows in a later section that can be found on page 143.

Based on these characteristics the Treasury Board ended up characterizing the Gas Tax transfer as an “other transfer payment,” which is defined as being “based on legislation or an arrangement which normally includes a formula or schedule as one element used to determine the expenditure amount; however, once payments are made, the recipient may redistribute the funds among the several approved categories of expenditure in the arrangement” (Treasury Board of Canada Secretariat, 2008).

The Policy Instrument II - A new approach to a conditional non-matching closed-ended transfer

As explained before, to decide whether an intergovernmental transfer was the appropriate policy instrument to address the identified problem, and to choose the appropriate level and type of transfer, the Government evaluated, among other things, the fiscal capacity, the need, and the tax effort of the municipalities. In the case of the Gas Tax transfer, the Government had to make an aggregated assessment that recognized the limited fiscal capacity of Canadian municipalities to raise revenues to fund infrastructure projects, and the crumbling state of infrastructure across Canada.⁴¹ The policy in this case had to be successful in closing the fiscal gap while, at the same time, addressing the NDCC’s political imperatives and furthering the Federal government’s policy goals.

⁴¹ This assessment addressed one of the “Key Elements and Questions that Should be Addressed When Designing a Transfer System” identified in Chapter 2, i.e. local tax effort. In this case, based on the Government’s assessment, it was decided that the transfer would not have to encourage local revenue raising.

Before choosing this delivery mechanism, the Government explored other options.⁴² One of the options considered was a contribution agreement, which involved reimbursing the money for funds spent on projects through an application process (Infrastructure Canada, 2007c). The perceived weakness of this approach was that it would not have solved the fiscal capacity problems facing municipalities and, at the same time, it was considered too intrusive and potentially difficult to manage due to the scope of the program (GT-102, personal interview, 2007).

Another alternative was for the Federal government to vacate tax room for the provinces, which would have allowed them to increase taxes and, subsequently, increase available funds for the municipalities (Infrastructure Canada, 2007c). The constraint of this approach was that it would have eliminated and/or limited the Federal government's ability to address national issues affecting the municipalities. The last option considered was a trust fund, which involved transferring the money immediately to a special off-budget account from which it would be transferred to municipalities and/or provinces over the designated period. This option was disliked by Infrastructure Canada and the

⁴² The discussion about the delivery mechanism for the Gas Tax resources was happening at the same time as the early learning and childcare debate, and the Government was concerned with the pressure that the provinces were exerting to ensure that they had the freedom to do what they wanted with the money. In this environment, the question was how conditional could they make the Gas Tax transfer to ensure that the money was spent in the desired infrastructure projects without generating the same problems (GT-102, personal interview, 2007). Moreover, after the Human Resource Development (HRDC) scandal in 2000 the Government felt the need to be overly cautious about their decision to ensure straightforward accountability (GT-102, personal interview, 2007). In this scandal a grants and contributions audit revealed that HRDC had failed to track employment program grants worth \$1 billion to make sure the money was spent properly and the promised jobs were created; for more information see Good (2003).

Prime Minister due to the loss in control, the fact that it could not be transformed into a continuous/permanent program in the future, and the perceived inability to advance federal policy objectives.⁴³

The final decision to choose this transfer arrangement was based on issues of flexibility, constitutional responsibility, and accountability. The set-up of the program had to address, among other things: (a) the concerns that Treasury Board and Finance had over the fiscal details, (b) the fact that the provinces had to receive the money before giving it to the municipalities, (c) the fact that the municipalities were allowed to choose the projects, (d) the possibility of it becoming continuous/permanent after five years, and (e) the flexibility of allowing municipalities to pool, bank and borrow against this funding (GT-101, personal interview, 2007; Godfrey, personal interview, 2007; and GT-102, personal interview, 2007).

The Gas Tax transfer is a conditional transfer because it was designed to incentivize municipalities to invest in environmentally sustainable infrastructure. In this case, the conditionality clause was represented by the list of projects that could be

⁴³ At the same time, the Government had no appetite for establishing a foundation due to the 2005 Status Report of the Auditor General of Canada released while the program framework was being chosen. In Chapter 4—"Accountability of Foundations," Sheila Fraser raised questions about important gaps in, among other things, the external audit regime, ministerial oversight, their ability to be adequately accountable to Parliament, and the non-compliance with the reporting commitments (Fraser S., 2005).

funded, and the list of approved types of expenditures.⁴⁴ For example, municipalities can only use the funds to cover capital costs, and cannot use them for maintenance costs, operating costs, debt reduction, or replacement of existing municipal infrastructure expenditures. Understanding the current fiscal capacity of the municipalities, the Federal government chose not to require a matching contribution to access the funds.

At the same time, as the transfer payment theory predicts, the expected effect of the Gas Tax transfer on municipal infrastructure spending could range from complete substitution to stimulation. To limit the possibility of substitution, the Federal government added an incrementality clause in the agreements, where municipalities agreed not to claw-back their infrastructure spending with respect to an agreed period before the implementation of the program.⁴⁵ In theory, based on this clause, there should only be ‘no substitution,’ where the spending increase equals the amount of funds received, or ‘stimulation,’ where the spending increase exceeds the amount received (as depicted in Figure 8 in Chapter 3).

⁴⁴ A detailed description of the use of the funds and expenditures follows in a later section that can be found below in page 139.

⁴⁵ The funding is supposed to be incremental for Canada, the provinces and the municipalities: (a) Canada agreed that this funding was in addition to current programs, which would be renewed once current funding is spent; (b) provinces agreed not to claw-back federal funds going to municipalities, and (c) municipalities agreed that the federal Gas Tax revenue investment will result in a net increase in total investment in municipal infrastructure over the life of the Agreement.

Clarity of the Policy I - A Transfer with Ambitious Objectives

Taking into consideration the objectives, one of the “key elements and questions that should be addressed when designing a transfer system” identified in Chapter 3, the design of the Gas Tax Fund reflected the four key elements of the NDCC, and complied with the four-pillar model of sustainability in which the NDCC was based.⁴⁶ The fact that Infrastructure Canada had been part of the Environment Canada portfolio from December 2003 to June 2004, and the existence of national and international environmental commitments, such as those defined in the Kyoto Protocol on Climate Change, resulted in the emphasis of the program goals on green projects and sustainability (GT-104, personal interview, 2007). On the other hand, the emphasis on hard infrastructure was the result of an overwhelming municipal consensus that emerged during the consultations (GT-101, personal interview, 2007). While there was pressure from key stakeholders to earmark the money for big cities,⁴⁷ the Gas Tax transfer was designed with the belief that no municipality or project was too small (Godfrey, personal interview, 2007). Overall, what characterized the NDCC was an attempt to “consider communities as a whole - one that takes each piece of the puzzle and considers how it fits with others to create the big picture” (Godfrey, 2004b). More than money, it called for government players to become more aware of the effects of government programs and policies at the local level.

⁴⁶ This four-pillar policy framework was developed by the Cities Secretariat to achieve a better quality of life and competitive advantage in Canadian cities. The framework was based on four dimensions of sustainability: economic, social, cultural and environmental (Godfrey, personal interview, 2007).

⁴⁷ In particular, from the big city mayors, such as the members of the C5 (previously identified) who became powerful political players as a result of the municipal mergers that happened in the early 2000s across the country.

The first element of the NDCC was an overarching vision of where Canadian cities and communities of all sizes should be in 30 years.⁴⁸ To achieve this vision, the Government established the improvement of the quality, efficiency, effectiveness, and sustainability of environmental municipal infrastructure as general goals of the Gas Tax Transfer, as well as cleaner air, cleaner water and the reduction of greenhouse gas emissions as specific outcomes. The second element was money, and the Government saw the transfer of the Gas Tax as a viable, politically appealing, option to address the need for stable, predictable, long-term funding for municipalities (Godfrey, personal interview, 2007).

The third element was utilizing a cities and communities lens when designing policies that would require the involvement of all levels of government with the cities and communities. Prior to the signing of the agreements municipal leaders were part of the negotiating process, and their needs were reflected in the emphasis that the goals placed on the funding of hard infrastructure, and the abandonment of the cultural aspect that was, in principle, part of the NDCC (GT-102, personal interview, 2007). The fourth element was building new relationships with municipalities based on responding to local needs and with the provinces and territories because they have the jurisdiction. To this end, the Gas Tax transfer created purposeful partnerships and emphasized flexibility

⁴⁸ The four elements of the New Deal were identified by Godfrey in his speeches as Minister of State (Infrastructure and Communities) and on the Infrastructure Canada website. For an example, see Godfrey (2004b).

based on the belief that municipalities know what is better for them and will use the money accordingly.

The framework in which the choice of these elements was based rested on a model of sustainability that depended on four interlinked dimensions: environmental responsibility, economic health, social equity, and cultural vitality.⁴⁹ Since the early 90s, sustainable development has become a key goal of public policy, within Canada and internationally. According to the Report of the Brundtland Commission, “Our Common Future:”

“Sustainable development is development that meets the needs of the present without compromising the ability of the future generations to meet their own needs. Sustainable development is not a fixed state of harmony but rather a process of change in which the exploitation of resources, the direction of investments, the orientation of technology development and institutional change are made consistent with future as well as present needs” (World Commission on Environment and Development, 1987).

Understanding that there is a connection between quality of life, human health, social equity, long-term planning, integrated decision-making, resource efficiency, technological development, governance, and institutional change the Federal government saw the NDCC as a viable way of moving forward with the sustainability and green agenda (Godfrey, 2004b).

⁴⁹ The final disconnect of the Gas Tax Fund from the cultural component was the result of: a lack of resources, an attempt to keep the program goals as focused as possible, and the case made by municipalities about the hard infrastructure needs (GT-101, personal interview, 2007).

The commitment to sustainability is expressed in the preamble of the Gas Tax Fund agreements where the Government establishes that the program should: (a) foster vibrant, creative, prosperous and sustainable cities and communities across Canada; and enable all Canadians to achieve a higher quality of life and standard of living; (b) develop environmentally sustainable municipal infrastructure (i.e. things such as urban transit, water projects that pay for themselves, new garbage disposal systems and for some small communities, the rehabilitation of roads and bridges, and community energy systems), and enhance existing infrastructure to aid in their economic, social, environmental and cultural development; (c) recognize that all orders of government must work together collaboratively and in harmony to ensure that investments in communities are strategic, purposeful and forward-looking; and (d) recognize that open communication with the public will best serve the right of Canadians to transparency, public accountability, and full information.

Additionally, to “accelerate the shift in local planning and decision-making towards a more long-term, coherent and participatory approach to achieve sustainable communities,” under the agreements the signatories are required to ensure that municipalities, or some higher level of agglomeration, develop Integrated Community Sustainability Plans (ICSPs) (Planning for Sustainable Canadian Communities Roundtable, 2005). These plans, which required members of the community to integrate and share knowledge and solutions, are expected to allow cities, communities, and First

Nations to better understand their future and work collectively towards achieving their goals. With an ICSP they should be able to choose project priorities, manage efficient and effectively their resources, deliver required services, and monitor their progress towards achieving desired outcomes.

Clarity of the Policy II - A Transfer Based on a Common Set of Principles

In November 2004 Minister Godfrey was invited to a meeting of the provincial and territorial ministers responsible for local government where possible guiding principles for the Gas Tax Fund were discussed (Infrastructure Canada, 2007c). Initially, all the provinces and territories agreed on a set of broad principles, but the Federal government felt that they lacked an emphasis on accountability. After further discussion, they all agreed on a set of six principles, described in Table 3 below, common to all of the agreements, with the exception of the one with Quebec.⁵⁰

⁵⁰ Each province and territory used a different language in the Agreement to describe the meaning of each principle, and table 3 summarizes the common points. While the Quebec final agreement makes no mention of the principles, “The Agreement in Principle” signed in June 21, 2005 mentioned 3 principles that “shall govern the implementation of a final agreement:” (1) respect for areas of jurisdiction, (2) a flexible, equitable approach, and (3) accountability and transparency (Canada-Quebec, 2008).

Table 3: Gas Tax Fund Policy Guiding Principles

PRINCIPLES	AGREEMENT
Respect for jurisdiction	All the signatories agree to respect the roles of all orders of government, and to recognize the merit of partnerships to support the NDCC.
A flexible approach	In recognition of the diversity of Canadian provinces and territories, First Nations, regions, cities and communities, all the signatories agree to a funding allocation formula and delivery mechanism to meet the specific needs of their respective local governments.
Equity	Canada commits to treating provinces, territories and First Nations equitably. Furthermore, the signatories commit to ensuring equity between urban and rural/remote communities, recognizing the different capacities of local governments.
Transparency	The signatories agree to use an open and transparent process for the purpose of implementing their agreements, and to develop performance measures to enable regular reporting to Canadians on the outcomes achieved with gas tax funds.
Accountability and Reporting to Canadians	The signatories commit to due diligence in the management of gas tax funding, and to use appropriate mechanisms to report regularly to the public on the expenditures and outcomes of the gas tax investment.
Focus on long-term solutions	The signatories recognize the need to establish a long-term vision for cities and communities that requires permanent collaboration between all orders of government on issues that significantly affect them.

Source: Adapted from the provincial Gas Tax Fund Agreements available at Infrastructure Canada (2010)

Resources I - An Allocation-driven, Predictable, Long-term transfer

Despite the fact that, in the speech given by Paul Martin (2002) at the FCM's annual meeting, the New Deal money was initially promised to municipalities and communities of all sizes, there was a lot of confusion over what the focus of the program

would be before the official announcement was made. Early in 2003, Paul Martin had claimed that it was “nonsensical in the 21st century not to recognize that 80 per cent of the population lives in big cities and their financial needs are different” (as quoted in Lin & Gillespie, 2004). This was encouraging for the big cities, which were arguing at the time that they should get a disproportionate share of the resources because they had more pressing infrastructure needs, especially in the area of transportation. In November, after being sworn in, Martin changed the focus of his message by stating that “cities, both large and small, are the engines of our economic growth and central to our quality of life” and that he would make good on the promise of a new deal “for our municipalities - our cities and towns, big and small” (as quoted in Lin & Gillespie, 2004). Small municipalities, who wanted money allocated by population, knew they were close to winning the battle when Martin argued early in 2004 that “the pressures that small municipalities face are every bit as great as larger municipalities and sometimes a great deal more” (as quoted in Lin & Gillespie, 2004).

Based on the diverging interests, and the fact that the Government had to find a way of taking into account the existence of unincorporated areas, First Nations territories and the differences across provinces, choosing the allocation formula for the available funds was not an easy task. In this confusing environment, the FCM played a useful role as the gathering point for contradictions and conflicts among municipal views with respect to the allocation of the federal funds.

While the research strongly supported the need to earmark the money for large cities, it would have been very difficult politically to alienate smaller municipalities (GT-104, personal interview, 2007). With this in mind, the Federal government decided to disregard the particular needs of each of the recipients, and it chose an equitable allocation formula that distributed the money to local governments based on their population.⁵¹ After choosing the formula, the Government had to decide on a payment schedule. The politics around the decision were very sensitive. The concern was that if the payments were set too low at the beginning the program would not be taken seriously (GT-102, personal interview, 2007 & GT-303, personal interview, 2011). To help the Department of Finance make the decision on the schedule, Infrastructure Canada provided several different models and scenarios regarding the size, speed, and timing of the allocations (GT-303, personal interview, 2011).

As can be seen in Table 4 below, the size of the allocation was the same in year one and two and then increased every year; the bulk of the funds were scheduled for the concluding years ending at \$2 billion in the fifth year. The reasons for the incremental allocation were: (1) the Government, and in particular the Department of Finance, wanted to push the major commitments further into the future for fiscal reasons; (2) considering

⁵¹To ensure that the less populated Province, Prince Edward Island, and the territories received an adequate level of funding, the Federal government set a base amount of \$37.5 million. Likewise, it set a base amount for First Nation communities of \$62.55 million.

that the money was being given upfront, Finance wanted to use an “escalator”⁵² approach so that municipalities would feel compelled to continue complying with the accountability framework; (3) considering the large amount of money involved and the challenging logistics of its disbursement, the Government wanted a way of easing into the program; and (4) it was believed that back-end loading would give the municipalities time to formulate better investment plans (GT-104, personal interview, 2007; GT-101, personal interview, 2007; & GT-303, personal interview, 2011).⁵³

⁵² An escalator clause is usually a contract provision that states that a certain payment increase will grow each year according to some formula stated in the contract. They are common in construction contracts to cover unexpected costs due to price fluctuations. While in the Gas Tax Agreement the payment schedule clause is not a common escalator clause, this was the term used internally by Infrastructure Canada and Finance when discussing the subject (GT-303, personal interview, 2011).

⁵³ These design features addressed several of the “Key Elements and Questions that Should be Addressed When Designing a Transfer System” identified in Chapter 2, i.e. revenue adequacy, distributional equity, the formula, and the stipulated term of funding. In terms of revenue adequacy the Government believed this was a substantial investment that based on the stipulations regarding the use of the funds should provide municipalities, in particular those with large populations, with a predictable source of funding that should achieve the desired objectives (GT-101, personal interview, 2007). In relation to distributional equity, as it was explained before, the Government chose not to design the transfer in a way that would be responsive to local fiscal need and capacity. The formula chosen, based on population, was transparent and simple. The stipulated term of funding allowed, and strongly encouraged, long-term planning at the local level.

Table 4: Allocation of Gas Tax Funds (millions of \$) from Fiscal Year 2005-2010 by Province and Territory

		FY 05-06	FY 06-07	FY 07-08	FY 08-09	FY 09-10	TOTAL	% OF TOTAL
PROVINCE OR TERRITORY	Alberta	\$57.2	\$57.2	\$76.3	\$95.4	\$190.8	\$476.9	9.54
	British Columbia	\$76.3	\$76.3	\$101.7	\$127.1	\$254.2	\$635.6	12.71
	Manitoba	\$20.1	\$20.1	\$26.8	\$33.5	\$66.9	\$167.3	3.35
	New Brunswick	\$13.9	\$13.9	\$18.6	\$23.2	\$46.4	\$116.1	2.32
	Newfoundland and Labrador	\$0.0	\$19.7	\$13.2	\$16.5	\$32.9	\$82.3	1.65
	Northwest Territories	\$4.5	\$4.5	\$6.0	\$7.5	\$15.0	\$37.5	0.75
	Nova Scotia	\$17.4	\$17.4	\$23.2	\$29.0	\$58.1	\$145.2	2.90
	Nunavut	\$4.5	\$4.5	\$6.0	\$7.5	\$15.0	\$37.5	0.75
	Ontario	\$223.9	\$223.9	\$298.5	\$373.1	\$746.2	\$1,865.6	37.31
	Prince Edward Island	\$4.5	\$4.5	\$6.0	\$7.5	\$15.0	\$37.5	0.75
	Quebec (not incl. Bill C-66)	\$138.1	\$138.1	\$184.2	\$230.2	\$460.4	\$1,151.0	23.02
	Saskatchewan	\$17.7	\$17.7	\$23.6	\$29.5	\$59.1	\$147.7	2.95
	First Nations	\$7.5	\$7.5	\$10.0	\$12.0	\$25.0	\$62.6	1.00
	Yukon	\$4.5	\$4.5	\$6.0	\$7.5	\$15.0	\$37.5	0.75
	Reported Total	\$600.0	\$600.0	\$800.0	\$1,000.0	\$2,000.0	\$5,000.0	100.00%

Source: Adapted from Infrastructure Canada (2009e)

The source of the funds is closely linked to the federal revenues from the excise tax on gasoline. This decision was politically appealing because the tax is collected from drivers and vehicles that impose considerable costs on municipalities for road construction, maintenance, snow clearing, and policing (GT-101, personal interview, 2007). While the connection is logical, in reality, it is only notional. The Federal government charges 10 cents-per-litre excise tax on gasoline, and in 2002-2003 this tax raised \$4.5 billion in revenue (Haggart, 2004, p. 6). The amount of the federal transfer does not depend on collection levels and it does not vary if collection levels increase or decrease. Rather, the program is financed through a charge against the Government's Consolidated Revenue Fund, initially amounting to \$5 billion over 5 years.⁵⁴

The contributions are paid to the municipalities in equal semi-annual payments (the first no later than July 1st, and the second not later than November 1st) in each Fiscal Year. The payments for 05-06 and 06-07 were equal, representing 12% of the total allocated amount, and then they increased progressively each year: 16% in 07-08, 20% in 08-09, and 40% in 09-10. The exception was Newfoundland that got 0% in 05-06 and

⁵⁴ While Godfrey really wanted to make this program permanent, at the time it was not feasible as Finance had little appetite for establishing permanent programs (GT-104, personal interview, 2007).

24% in 06-07 because it signed the Gas Tax Fund Agreement⁵⁵ in August 2006, and First Nations that signed their agreement in October 2007.⁵⁶

Besides the Federal government allocation received by the municipalities, the Province of Québec was the only provincial government to add additional funds (\$383.6 million). This contribution represents 29.2% of the total allocation. Moreover, Quebec was the only province that required municipalities to add their own contribution. The rationale behind this decision was that municipalities needed to have a stake on the decision-making process, and Quebec believed that this contribution would encourage them to make prudent infrastructure investments (GT-102, personal interview, 2007). The requested municipal contribution is determined by taking into account the level of municipal investment to be maintained and the minimum capital baseline in infrastructure reconstruction of \$28 per resident per year applied under other Infrastructure programs⁵⁷ (Direction des infrastructures, Ministère des Affaires municipales et des Régions, 2006).

⁵⁵ In this chapter, the Gas Tax Fund Agreement will be subsequently referred to as “the Agreement.”

⁵⁶ While First Nations communities in the three territories receive funding through the federal-territorial Gas Tax Fund agreement, in October the Federal government created The First Nations Infrastructure Fund (FNIF) open to First Nation communities in the ten provinces. The Agreement was signed by The Honourable Chuck Strahl, Minister of Indian Affairs and Northern Development and Federal Interlocutor for Métis and Non-Status Indians; the Honourable Lawrence Cannon, Minister of Transport, Infrastructure and Communities; and the Assembly of First Nations Regional Chief (Yukon), Rick O’Brien. This five year program, with \$131M in funding, was a combination of funds from existing federal funding sources: The First Nations component of the Municipal Rural Infrastructure Fund; The First Nations component of the Gas Tax Fund; and The Capital Facilities and Maintenance Program. For more information see Indian and Northern Affairs Canada (2009).

⁵⁷ These programs are the Canada Quebec Infrastructure Works Program 2000, the Quebec Municipalities infrastructure programs, and the Municipal Rural Infrastructure Fund.

In the provincial agreements, while there are some exceptions, funds for municipalities are allocated on essentially a per-capita, entitlement basis with some minor adjustments to ensure that the smaller communities receive a base amount. These allocations are subject to change as new Census data become available. One of the exceptions is Nova Scotia, which created an allocation formula that gives municipalities a percentage of the total allocation depending on their number of dwelling units, population, and five year rolling average of standard expenditures.

Another exception is British Columbia, which created three funds for the delivery of the resources (GT-239, personal interview, 2008). The 3 funds created were: (1) The Community Works Fund (CWF), which disburses funding directly to municipalities based on a percentage of the per capita allocation for local spending priorities, and has a funding floor to ensure a reasonable base allocation of funds; (2) The Strategic Priorities Fund (SPF), which provides funding for strategic investments that are larger in scale or regional in impact, and was created by pooling a percentage of the per capita allocation,⁵⁸ and (3) The Innovations Fund (IF), which provides funds for projects and initiatives by eligible recipients that show an innovative approach to achieving the intended outcomes. It comprises up to 5% of the total Gas Tax Fund allocation for the Province. At the same time, B.C. divided its municipalities into three tiers based on differing community characteristics including population density, degree of urbanization, adjacency of

⁵⁸ In the case of the Metro Vancouver, the Board of Directors requested that 100% of their per capita allocation be placed in this fund and be made available for transportation investments.

communities to urbanized areas, and the need for intra-regional infrastructure (GT-239, personal interview, 2008). Each tier was allocated a different percentage of the resources.⁵⁹

In Budget 2007,⁶⁰ the Harper Conservatives re-branded the Gas Tax Fund under the seven-year \$33 billion Building Canada Plan⁶¹ and extended the funding from 2010 to 2014 at \$2 billion per year (Department of Finance Canada, 2007). This announcement officially ended months of speculations about the future of the Gas Tax Fund under the new government. In 2005 during the Conservatives' policy convention, party "members defeated a motion suggesting a Conservative government share the gas tax with municipalities" so all the individuals that had lobbied hard to achieve Martin's commitment to the New Deal were worried that they would lose everything they had gained (Kuitenbrouwer, 2005). Table 5 below shows the total Gas Tax Fund allocation by province/territory through the year 2014.

⁵⁹ Tier 1: all areas of British Columbia except those in Tier 2 and 3; CWF allocation - 75% and SPF - 25%. Tier 2: Regional District of Okanagan-Similkameen, Regional District of Central Okanagan, Regional District of North Okanagan, Capital Regional District, Cowichan Valley Regional District, Regional District of Nanaimo, Fraser Valley Regional District, Squamish Lillooet Regional District; CWF allocation - 50%, and SPF- 50%. Tier 3: Greater Vancouver Regional District; CWF allocation - up to 25%, SPF - 100%.

⁶⁰ Budget 2007 was tabled by the Honourable Jim Flaherty, Minister of Finance, on March 19th, 2007. It represented a long-term economic plan to restore fiscal balance and further debt reduction. Besides extending the Gas Tax Fund, it allocated new funding to support additional investments in municipal infrastructure projects (Department of Finance Canada, 2007).

⁶¹ For more information on the Building Canada Plan see Infrastructure Canada (2009b).

**Table 5: Allocation of Gas Tax Funds through 2014
by Province/Territory**

PROVINCE OR TERRITORY	2005-2014
Alberta	\$1.275 Billion
British Columbia	\$1.638 Billion
Manitoba	\$431.9 Million
New Brunswick	\$294.5 Million
Newfoundland and Labrador	\$206.95 Million
Northwest Territories	\$97.5 Million
Nova Scotia	\$368.9 Million
Nunavut	\$97.5 Million
Ontario	\$4.853 Billion
Prince Edward Island	\$97.5 Million
Quebec	\$3.005 Billion
Saskatchewan	\$372 Million
Yukon	\$97.5 Million

Source: Infrastructure Canada (2009d)

Despite previous indications that the question of permanency of the Gas Tax Fund would be contingent on an evaluation of the program due to the Federal Treasury Board by mid-2009, in December 2007 the House of Commons passed a motion with all party support endorsing the extension of the Gas Tax Fund Program (AMO, 2007d). The motion read:⁶²

“That, consistent with the spirit of the Liberal New Deal for Cities and Communities, this House believes it is in the best interests of Canadians that the Government should take steps to make permanent the sharing of

⁶² The motion was introduced by a member of the opposition, Mr. Paul Zed (Saint John, Liberal), on December 6, 2007.

the Federal Excise Tax on gasoline with all Canadian municipalities for the purposes of enhancing local community infrastructure.”

Then, “in response to ongoing requests for stable, long-term funding,” Budget 2008 officially announced that the Gas Tax Fund would be extended at \$2 billion per year⁶³ beyond 2014 (Department of Finance Canada, 2008). Unfortunately, the announcement did not include an escalator mechanism independent of budget decisions. This could have ensured adequate annual increases in funding to meet emerging issues, such as inflation. This commitment was made official with the passage of Bill C-13, “Keeping Canada’s Economy and Jobs Growing Act,” where the federal Gas Tax Fund was enshrined in legislation as a permanent annual source of infrastructure funding (AMO, 2011c).⁶⁴

Resources II - Use of Funds

In the spirit of a ‘flexible approach’ and a ‘long-term solution,’ the signatories agreed on desired outcomes and eligible project categories rather than earmarking the money for specific projects.⁶⁵ In the case of Quebec, instead of a list of eligible projects,

⁶³ This amount reflects the notional equivalent of 5 cents a litre.

⁶⁴ As a result, new permanent agreements would have to be negotiated and, according to the AMO (2011), this “process will be tied in with federal consultations with provinces, territories, the FCM and other stakeholders to build a long-term plan for investing in public infrastructure.” The AMO will take this opportunity to work with the FCM to ensure the funds are indexed so that investments can keep pace with the pressures of economic and population growth.

⁶⁵ This design feature addressed one of the “key elements and questions that should be addressed when designing a transfer system” identified in Chapter 2, i.e. autonomy & flexibility. As explained before there is a positive balance between central oversight and local discretion on decision making as recipients are able to make planning and expenditure decisions that will maximize their welfare.

the Province decided to establish a list of work priorities.⁶⁶ Overall, as Godfrey explained, while it was important for the Federal government to focus attention on a critical issue, i.e. environmentally sustainable municipal infrastructure, setting the criteria by which projects qualify for funding, and allowing municipalities to set the individual priorities for those projects, would avoid the problem of trying to satisfy everyone's expectations and needs (CBC News, 2004). Furthermore, the Government chose not to take the 'Ottawa knows best' approach based on the belief that local actors would know what projects they would like to see happening in their community (GT-101, personal interview, 2007), and hoping that it would "circumvent the law of unintended outcomes, where people design their bid for funding based on the program, and not what the community actually wants and needs" (Laroche as quoted in Kenter, 2006).

Municipalities can use the funds to cover, among other things, capital costs and the costs related to the development of ICSPs,⁶⁷ and cannot use them for routine repair

⁶⁶ These priorities are: (a) bringing drinking water and wastewater catchment and treatment equipment up to code. Municipalities must; (b) acquiring knowledge about the condition of pipes for drinking water and sewers (inventory, diagnosis and action plan to renew the pipes); (c) renewing pipes for drinking water and sewage; and (d) local road systems (repairs to and improvements of the local road system, such as bridges or other municipal engineering structures, municipal streets or other local roads). Quebec municipalities must demonstrate that they do not have the need for any projects under the highest priority before they can move to lower priorities. Priority 1 and 2, do not apply to municipalities that do not have such pipes, or can demonstrate no need for renewal in the next 10 years.

⁶⁷ More specifically, eligible costs include: (a) the capital costs of acquiring, constructing or renovating a tangible capital asset and any debt financing charges specifically identified with that asset; (b) the fees paid to professionals, technical personnel, consultants and contractors specifically engaged to undertake the surveying, design, engineering, manufacturing or construction of a project infrastructure asset and related facilities and structures; (c) the costs of environmental assessments, monitoring, and follow-up programs as

and maintenance costs, operating costs, debt reduction, or replacement of existing municipal infrastructure expenditures.⁶⁸ They can also bank funds and accrue interest which can be used to pay for the municipality's administrative costs. Additionally, all municipalities are encouraged to pool resources with other municipalities to support projects and initiatives that can benefit the region. The project categories, as well as examples, that apply to all the agreements except the one for Quebec can be found in Table 6 below.

Large municipalities are only allowed to choose two of the categories from the eligible list of projects. After the 2005 Speech from the Throne, Paul Martin invited the City mayors to his official residences and told them that he wanted large cities (over 500,000) to concentrate their investment on transit and water (Godfrey, personal interview, March 8, 2007). This signalled that he intended to restrict the categories of potential projects for larger cities. The objective of this clause was to discourage large municipalities from stretching the funds over too many project categories resulting in less transformative investments. As Godfrey (Personal interview, March 8, 2007) explained,

required by the "Canadian Environmental Assessment Act;" or a provincial equivalent; and (d) the costs related to strengthening the ability of Local Governments to develop ICSPs. Each agreement, with the exception of Quebec, lists both the eligible and ineligible costs in a schedule attach to the Agreement.

⁶⁸ More specifically, ineligible costs include: (a) a municipality's overhead costs, its direct or indirect operating or administrative costs, and more specifically its costs related to planning, engineering, architecture, supervision, management and other activities normally carried out by its applicant's staff; (b) costs of feasibility and planning studies for individual Eligible Projects; (c) taxes for which the municipality is eligible for a tax rebate and all other costs eligible for rebates; (d) costs of land or any interest therein, and related costs; (e) legal fees; and (f) audit and evaluation costs.

the Prime Minister always wanted higher standards for the big cities, but not more favouring in terms of resources.⁶⁹

Table 6: Eligible Project Categories and Examples

PROJECT CATEGORY	EXAMPLES
Public transit	Rapid transit (tangible capital assets and rolling stock such as light rail, subways, ferries, transit stations, park and ride facilities); transit buses (bus rolling stock, transit bus stations); intelligent transport system; and transit priority capital investments.
Water	Drinking water supply, drinking water purification and treatment systems, drinking water distribution systems, water metering systems.
Wastewater	Systems including sanitary and combined sewer systems; and separate storm water systems.
Solid waste	Waste diversion; material recovery facilities, organics management, collection depots, and waste disposal landfills.
Community Energy Systems	Cogeneration or combined heat and power projects, and heating and cooling projects
Capacity Building	Collaboration (building partnerships and strategic alliances, participation, and consultation and outreach); knowledge (use of new technology, research, and monitoring and evaluation); integration (planning, policy development and implementation).
Active transportation infrastructure (for communities > 500,000)	Bike lanes, local roads, bridges and tunnels that enhance sustainability outcomes

Source: The provincial Gas Tax Fund Agreements available at Infrastructure Canada (2010)

⁶⁹ The research conducted for this dissertation reveals that most of the large municipalities (such as Calgary, Edmonton, Vancouver, and Toronto) have chosen to use all of their Gas Tax allocation for transportation expenditures.

Accountability Framework

In the wake of the sponsorship scandal, the Government, and in particular Treasury Board, was determined to have a reliable accountability framework in place that would ensure the policy goals were met efficiently and effectively under the least possible amount of administrative burden. The big concern for Treasury Board⁷⁰ was the hybrid nature of the transfer with the innovative features previously outlined, which made the negotiations for the approval of the program a real struggle for Infrastructure Canada. As one interviewee explained, they had to promise repeatedly that the program would be accountable even with the parameters of the new funding approach (GT-303, personal interview, 2011).

To address Treasury Board's concerns, signatories are required, as part of the Gas Tax Fund accountability framework, to produce an annual expenditure report, and an audit report. Additionally, signatories agreed to keep proper records about the use of the funds for three years after the completion of each project because the Federal government might request an audit, which must be paid by the signatory, of any one or more projects. For the purpose of assessing, among other things, the extent of the achievement of the program objectives, the way the funds were used, and the effectiveness of the funding approach, in 2009 the signatories were required to complete a joint formative evaluation

⁷⁰ Treasury Board and its Secretariat are responsible for ensuring that departmental submissions for funding allocations for new policy initiatives “identify a cost-effective use of resources; incorporate appropriate safeguards to protect public funds; identify a suitable program design that conforms with relevant legislation, regulations and Treasury Board management policies; and identify a sound plan to measure and evaluate program performance” (Smith, 2009) .

of the program with the Federal government. The results of these joint bilateral evaluations were incorporated in a national evaluation that the Federal government completed in the same year.⁷¹ In 2009, and periodically thereafter, signatories will also be required to submit an outcomes report that will measure results and outcomes of the program based on previously agreed indicators.⁷² Besides this reporting, audits, and evaluation requirements, the signatories must also comply with a detailed list of responsibilities.⁷³ Some of these responsibilities are outlined in Table 7 below.

⁷¹ When the extension of the Gas Tax Fund was announced, Treasury Board pressured INFC to complete the national evaluation before the new agreements were signed. To achieve this, they had to complete 13 joint evaluations simultaneously in a very short period of time, which became “an amazing project” that was successfully completed just in time (GT-218, personal interview, 2009).

⁷² Requiring an Outcomes Report follows the Canadian trend of “requiring local governments to implement performance measurement systems” to improve “transparency, accountability, and performance” (Agocs & Brunet-Jailly, 2010, p. 154). The problem, as Agocs and Brunet-Jailly (2010, p. 154) explained, is that an outcomes report represents only a requirement to implement performance measures instead of a system, and “measures alone do not improve organizational results.” While allowing each province to identify its own set of measures was a step in the right direction, without clear guidelines as to how the findings would be used to improve the recipients performance or to identify potential shortcomings of the Gas Tax program design, these measures will “fail to deliver the benefits and improvements they are meant to bring to local government administration (Agocs & Brunet-Jailly, 2010, p. 174).”

⁷³ These design features addressed several of the “key elements and questions that should be addressed when designing a transfer system” identified in Chapter 2, i.e. monitoring, evaluation, and accountability. In terms of monitoring and evaluation, the transfer stipulates for the systemic collection and reporting of information that can be used to verify compliance with objectives, such as the summative evaluation, the annual expenditure reports, and the outcomes reports. Moreover, INFC was committed to avoid “passively waiting for annual reports” and instead decided to take an active role educating recipients on the expectations and procedures, and monitoring to identify problems early on (GT-104, personal interview, 2007). In relation to accountability, recipients that fail to meet their responsibilities would have their funds withheld until they comply with the requirements.

Table 7: Signatories Responsibilities

SIGNATORY	RESPONSIBILITIES
Canada	<ul style="list-style-type: none"> • Contribute the agreed portion of the Gas Tax in a timely manner. • Ensure that the funding provides additional revenues for municipalities rather than displacing other federal infrastructure funding.
Province, the AMO & the UBCM	<ul style="list-style-type: none"> • Ensure that over the period April 1, 2005 to March 31, 2010 the provincial average annual capital spending on municipal infrastructure and that of their municipalities will not be less than the Base Amount.⁷⁴ • Sign a Memorandum of Agreement with each Municipality prior to the transfer of funds, and transfer the agreed funds in a timely manner. • Enforce penalties if a municipality is non-compliant with the terms and conditions. Penalties may include withholding, reduction, or return of payment and/or non-renewal of the Agreement.
Municipalities	<ul style="list-style-type: none"> • Complete a multi-year capital investment plan prior to the fourth year. • Develop an ICSP as the basis upon which they will determine plans and priorities to aid in their achieving the agreed upon environmental sustainability outcomes. • Retain title to, and ownership of, the infrastructure resulting for the eligible projects for at least 10 years after its completion. • Deposit the contributions into a separate and distinct account.

Source: The provincial Gas Tax Fund Agreements available at Infrastructure Canada (2010)

In the case of B.C. and Ontario, the accountability framework is different due to the additional signatories to the respective agreements. In Ontario the provincial government, while a signatory to the Agreement, is not involved in the administration of

⁷⁴ The Base Amount is defined as the average of spending by the province and municipalities on municipal infrastructure for the five years preceding the signing of the agreements. This condition was put in place to prevent provinces and municipalities from diverting their own funds away from these investments as a result of the gas tax program.

the program and the disbursement of the funds, with the exception of the \$5.8 million allocated to unincorporated areas, This role is fulfilled by the Association of Municipalities of Ontario (AMO) for all municipalities except the City of Toronto.⁷⁵ Toronto is a signatory to the Agreement and receives the funds directly from the Federal government. A similar arrangement was negotiated with British Columbia. In this case, the administering agency is the Union of British Columbia Municipalities (UBCM), an organization that has represented the interests of local governments in B.C. since 1905, and whose membership includes all the municipal governments in the Province. While the AMO is a non-government organization, the UBCM has its own Act passed by her Majesty with the advice and consent of the Legislative Assembly of the Province of British Columbia.

These two provinces might be required to complete a Compliance Audit and/or a Performance Audit of the UBCM and the AMO, due to their administrative role in the implementation of the agreements and the allocation the funds to the municipalities in those provinces respectively. This audit would be conducted by the Federal Minister or the Auditor General of Canada at their cost.

Quebec also has a different accountability arrangement due to the involvement of the Société de financement des infrastructures locales du Québec (SOFIL). While SOFIL

⁷⁵ The arrangement in Ontario will be explained in detail in Chapter 5

is not a direct signatory to the Agreement, it is responsible for the administration of the funds, just as the AMO and the UBCM (Canada-Quebec, 2008). SOFIL was created in 2004 with the sole purpose of providing financial support to municipalities and to assist in the implementation of their infrastructure projects. Under the Quebec agreement, SOFIL and the Auditor General of Quebec are responsible for the annual financial statements and activity reports required by Canada.

CONCLUSION

As this chapter makes evident, the design of intergovernmental transfer payments does not happen in a vacuum. Instead, the process is influenced by the current legislative framework, which in Canada has and continues to enable the Government to use transfer payments as key policy tools; and the political and socio-economic environment. The relevance of the later point was made evident in the historical overview of how the Gas Tax Fund transfer came to be. Of particular significance was the role played by the policy community and Prime Minister Paul Martin, as well as the strong financial position of the Government in the early 2000s. The urban policy community, through its advocacy efforts, was able to raise urban issues to the top of the Government's agenda and Prime Minister Paul Martin responded with the New Deal for Cities and Communities. This deal was designed to, among other things, establish a new relationship with all three levels of government based on cooperation, and to provide predictable and reliable long-term solutions, which included the establishment of the Gas Tax Fund.

In terms of the mapping approach in the development of the Gas Tax Fund, as outlined in the proposed framework in Chapter 2, it could be argued that it was a combination of forward and backward mapping. As explained in Chapter 2, forward mapping stresses compliance, uniformity, standardization, and control with centralized authority, while backward mapping relies on consultation, delegation, and discretion that disperse authority. Due to the role that the advocacy community played in the emergence and formulation of the problem, and the prominent role that consultation played in the development of the policy, it is evident that the process had some characteristics of backward mapping. For example, allowing provinces to tailor the agreements to meet their specific needs was a clear move away from the standardization prevalent in earlier infrastructure funding programs. As long as the guiding principles were respected, and the funds were used for the intended purpose, the negotiating teams had no problem allowing some provinces to involve their municipal association in the administration of the program, or allowing the creation of specific purpose funds for the allocation of the resources (GT-301, personal interview, 2011).

On the other hand, the process also had some characteristics of forward mapping as a result of the established role and responsibilities of the Government's four central agencies, i.e. the Prime Minister's Office (PMO), the Privy Council Office (PCO), the Treasury Board of Canada Secretariat, and the Department of Finance. During the policy design process, government departments are required to interact with each of these

agencies through established procedures characterized by, among other things, submissions with standardized formats and compliance with the outcome of their decisions and recommendations. For example, Finance determined the size and schedule of the program's allocation, and Treasury Board approved the standardized template for the agreements used by the negotiating teams which had principles that were not negotiable. Nevertheless, despite these formal procedures, Infrastructure Canada had the advantage of designing a policy that was part of the New Deal. This meant that the policy was a priority of the PMO, and it had started to take shape in the Cities and Communities Secretariat, which was originally part of the PCO.⁷⁶ As one interviewee explained at length:

Because all the fundamental policy work had been completed under the PCO “all the very senior bureaucrats were already on board; they understood the program and they were very excited by it.” This meant that Infrastructure Canada was several steps ahead in the policy design process which allowed them, in conjunction with the PCO, to work with Treasury Board to successfully address all of their concerns around accountability (GT-303, personal interview, 2011) .

The fact that Infrastructure Canada was able to deal with the biggest obstacle to the program, i.e. Treasury Board,⁷⁷ seems to suggest that the previously outlined advantage allowed for some backward mapping to take place in the form of successful negotiations instead of top-down imposed parameters. Considering the level of satisfaction of the

⁷⁶ As previously mentioned in July 2004 a new ministry was created, the Ministry of State for Infrastructure and Communities, which brought together: the Cities Secretariat, Infrastructure, and four Crown corporations.

⁷⁷ In particular, since in Treasury Board, at least until 2010, there were still doubters about the capacity of this program to be accountable (GT-303, personal interview, 2011).

provinces with their individual agreements, it would seem that the combination of these two approaches was beneficial to the policy design process.

At the same time, as mentioned in the previous chapter, when designing a transfer system governments face the challenge of addressing the needs of an usually diverse policy community. In the case of the Gas Tax Fund this was made evident with the discord about the allocation formula. Big cities argued they should get a disproportionate share of the transfer because they had more pressing infrastructure needs, while small municipalities argued the allocation should be based on population. As will be seen in Chapter 5, the same challenge was present in the negotiation of the Ontario agreement because the City of Toronto wanted to be entitled to a bigger proportional allocation than the rest of the municipalities.

The fact that despite this, and other design challenges outlined in this chapter, the Federal government was able to sign all 13 provincial agreements in a very short timeframe highlights the importance of integrating consultation and negotiation as part of the policy design process. For example, having conducted an extensive cross-country consultation prior to the negotiations allowed the Government to understand what the recipients were expecting from the agreements and to be prepared to address any potential thorny issues. At the same time, when the Government was negotiating the individual agreements, it was willing to make compromises allowing, for example, the

UBCM and the AMO to become administrators of the program in B.C. and Ontario respectively when its original intent was to deal with the provinces directly. While policies might not be able to address the needs and interests of all the stakeholders, these processes increase the likelihood of achieving consensus and thus a successful implementation, as explained in Chapter 2.

In relation to the causal theory, the Government outlined the policy's result logic in the "Integrated Results-based Management and Accountability Framework" developed by Infrastructure Canada (2007a). In this document, the Government uses one of the key tools for articulating a clear theory of change that can serve as a guide for the actions of the implementors, i.e. a logic model. Focused on the three key objectives of the program, this model, which can be found in Appendix B, outlines the chain of expected results within differing spheres of Infrastructure Canada's management control and influence.

The casual theory is also linked to the clarity of the policy, another of the key policy development variables of the proposed analytical framework. In reference to the clarity of the policy, it can be argued that between the outline of the driving principles, the objectives, and the list of eligible project categories the Gas Tax Fund policy is a very clear and consistent policy. The driving principles set the frame of the policy, and they are reflected in the key sections of the agreements. While some of the wording of the objectives might require some interpretation, for example "transformative partnerships,"

the policy goes beyond listing general goals and instead provides concrete objectives. The list of eligible projects categories also demonstrates a link to the expected outcomes of cleaner air, cleaner water, and reduction of GHG emissions.

This chapter also overviewed how the Gas Tax transfer represents a new federal direction with transfer payments through the analysis of its innovative features, including its hybrid design, its ambitious objectives, and the fact that it is a predictable source of funding for municipalities. The next three chapters explore these interesting features through a case study of the Gas Tax Fund in the province of Ontario. More specifically, Chapter 5 includes a historical review of why, and how, in Ontario there were three signatories to the Agreement, as well as the particular governance, administration, and accountability arrangements in the Province. Chapter 6 looks at the expenditure impact of these particular arrangements through an analysis of municipal spending of Gas Tax Fund resources, as well as an econometric analysis of expenditures in infrastructure between 2001 and 2008. Chapter 7 looks at other potential impacts, including allowing municipalities to make long-term plans, choose the type of green infrastructure projects that best suit their needs, and having a closer relationship with the Federal government through a case study of the City of Ottawa and the City of Toronto. The concluding chapter of the dissertation reviews the impacts of the design of the Gas Tax Fund transfer system in Ontario and links the empirical findings with the dissertation hypothesis.

CHAPTER 5

THE GAS TAX TRANSFER IN ONTARIO I:

BACKGROUND, GOVERNANCE, ADMINISTRATION & ACCOUNTABILITY

INTRODUCTION¹

On June 17, 2005, the Government of Canada, the Province of Ontario, the City of Toronto and the Association of Municipalities of Ontario (AMO) signed the *Agreement for the Transfer of Federal Gas Tax Revenues under the New Deal for Cities and Communities* in Richmond Hill, Ontario.² Under this agreement, the Federal government agreed to contribute \$1,865.50 million over the original 5 years of funding (2005-2010), which represented approximately 37.31% of the total federal Gas Tax funding for this period. Ontario presents an interesting case study because it is one of only two provinces (the other one being B.C., as previously explained in Chapter 4) where a non-government body was chosen to fulfill such an important role in the administration of a federal program. Moreover, signing the Agreement directly with the City of Toronto marked a new direction for the Federal government.

¹ Sections of this Chapter draw freely on related prior work. See Adams & Maslove (2009) presented at the Canadian Political Science Association 81th Conference on May 27, 2009, and Adams & Maslove (Forthcoming).

² In this chapter this agreement will be subsequently referred as “the Agreement.” For the full text, see Canada, Ontario, AMO, City of Toronto (2005). At the same time, AMO will also be referred as “the Association.”

This chapter is one of three that concentrate on a comprehensive case study of the Gas Tax Fund in the Province of Ontario. The period that they cover begins just before the signing of the Agreement in 2005 until December 2010.³ This chapter focuses on: (a) explaining why and how in Ontario there were three signatories to the Agreement; (b) identifying the consequences of this particular arrangement for governance, administration, and accountability; and (c) describing the AMO's role and performance in those three areas. The next chapter (Chapter 6) covers the econometric analysis and an overview of municipal expenditures. The final chapter focusing on Ontario (Chapter 7) presents a detailed case study of the City of Ottawa and the City of Toronto.

This chapter proceeds in 3 sections. The first focuses on Ontario's political context. It is an overview of the AMO and of the changes to the provincial-municipal dynamics in Ontario in 2004 and 2005 that had a direct impact on the way the Gas Tax Agreement for the Province was drafted. The second and third section focus on the policy implementation related variables in connection to the Agreement. The second describes its influence on the governance and administration structure in Ontario, with an emphasis on the role of the AMO. The third analyzes its influence on the reporting and accountability framework, highlighting the compliance of the AMO and the municipalities with the communication and other reporting requirements, such as the annual reports, the capital investment plans, and the evaluations. These three sections

³ This means that, due to the reporting timelines for the Gas Tax Fund, the last Annual Expenditure report that will be covered by this dissertation will be for the 2009 Fiscal Year.

address the first and second research questions of this dissertation: (1) *What were the principal factors that influenced the Government's choice of a transfer as a policy instrument and the specific design of the Gas Tax Fund policy?*; (2) *To what extent were the actions of implementing officials consistent with the objectives and procedures outlined in the original policy announcement and the Gas Tax Fund Agreement?*

THE ONTARIO POLITICAL CONTEXT

The Association of Municipalities of Ontario (AMO) - Background

As a result of the federal-provincial-municipal dynamics described in Chapter 4, “local governments, particularly in the more populous areas, have been gradually transforming themselves from their 1960s’ role of delivering services to assuming responsibility for the economic, social, cultural and environmental health of their communities” (Stevenson & Gilbert, 2009, p. 1). This transformation, in turn, made the role played by municipal associations more important while, at the same time, making their jobs more difficult. For example, as a result of further urbanization these associations are increasingly struggling to represent the divergent interests of large urban areas and smaller municipalities.⁴ On the one hand, these associations are able to present a strong united front speaking with a powerful voice, but on the other hand to accomplish this they must “negotiate their way through a complex pattern of interests that pose an ongoing threat to the unity of their organizations” (Chenier, 2009, p. 412).

⁴ In 1999 there were 17 provincial-municipal and territorial-municipal associations with some provinces having more than one (Stevenson & Gilbert, 2009, p. 1).

The downside of this struggle is that the resulting policy outcomes might not be the best for the municipal sector (Chenier, 2009, p. 412) . This point is further supported by Feldman and Graham who argue that a “consequence of associations’ quest for a common denominator among their membership before they speak on intergovernmental matters is that they [might] end up mute” (Feldman & Graham, 1979, p. 16). For example, as Stevenson and Gilbert (2009, p. 16) argued, the creation of large cities, such as Toronto,⁵ through amalgamations has “open the potential of an increase in the direct relationships of those cities with the provincial and federal governments, bypassing the associations.”⁶ Nevertheless, despite this threat, these municipal associations are “quite stable and well-established,” and are “able to attract as members most municipalities that are eligible for membership,” which is an indication that they are “recognized as viable entities speaking for the municipal community” (Siegel, 1980, p. 317).

In Ontario, “municipal associations have a long history consisting of numerous amalgamations and mergers of separate organizations,” dating back to 1899 (AMO, 2011b). The focus of this dissertation, the Association of Municipalities of Ontario (AMO), was formally established as a non-profit organization in 1982 when it absorbed the rural and upper-tier associations.⁷ Then, in 1990 the AMO was legally incorporated as

⁵ The words City of Toronto and Toronto are used interchangeably in this chapter.

⁶ The Ontario Gas Tax Fund agreement, as will be explained in this chapter, is evidence of this development.

⁷ The AMO, as a non-profit organization, relies on membership fees as a source of revenue to cover a portion of their operating costs.

an entity under the Ontario Corporations Act (AMO, 2011b). Despite “several ups and downs, several executive directors, and a fluctuating number of staff, particularly those devoted to policy and research,” in the 1990s, the AMO “has been [since its establishment] a traditional and effective association focused on service to the membership (Stevenson & Gilbert, 2009, p. 10).”⁸

Today, the AMO represents and acts in the interest of almost all of Ontario’s 444 municipal governments.⁹ Its mandate is to “support and enhance strong and effective municipal government in Ontario;” a role that it fulfills by having the opportunity to directly provide municipal input and reaction to provincial policy ideas pre-consultation, and by providing a variety of services and products to members and non-members (AMO, 2010b). The relationship between the Province and the Association is mediated

⁸ A good example of the AMO’s influence in municipal-provincial dynamics in Ontario is the key role the organization played in the debate on provincial disentanglement. As Stevenson & Gilbert (2009, p. 10) explained in detailed:

“In the early 1990s AMO presented a series of position papers to the provincial government on the future of the municipal sector culminating in a proposed bill of rights for local government, the Ontario Charter. It called for a disentanglement of provincial and municipal responsibilities and a new municipal act that would treat municipalities as an order of government. In 1997 the Ontario government, as part of its policy of deregulating, simplifying, and downsizing government, reshaped the entire framework of provincial-municipal relations. It responded to AMO’s position papers by abolishing almost all conditional grants to municipalities, assuming more provincial control over education, but giving municipalities unfettered responsibility for most local services. It brought forward a draft municipal act along the lines of AMO’s proposal, and reduced the number of municipalities in the Province from 820 to fewer than 590.”

⁹ At the end of 2011 AMO had 421 member municipalities. One of the exceptions is the Toronto which, as previously explained, quit the association in 2004, and most of the other ones are “smaller municipalities that choose not to join due to their lack of financial resources” (GT-310, personal communication, 2012).

by the Memorandum of Understanding (MOU) originally signed in 2001, and last renewed in 2010.¹⁰

Provincial-Municipal Dynamics in 2004 & 2005

In Ontario, 2004 and 2005 were years filled with changes to the provincial-municipal dynamics that had a direct influence on the way the Gas Tax Agreement for the Province was drafted. These changes were brought by, among other things: (a) the election of the Liberal Party of Ontario at the end of 2003; (b) several rounds of consultations and negotiations for contentious issues, such as the sharing of the provincial and federal gas tax; (c) disagreements between the position of small and large municipalities; and (d) the signing of agreements, such as the new MOU between the Province and the AMO, and the new City of Toronto Act.

In 2003, during the Ontario provincial elections campaign, The Liberal Party of Ontario made a commitment to allocate two cents of the existing provincial gas tax to municipalities for public transit investment. After being elected, the Government consulted with the AMO to determine the allocation formula and directly with key municipal officials.¹¹ The two options presented for the allocation of the provincial gas tax revenues were based on population, supported by the AMO and most municipalities,

¹⁰ For more information of the MOU see AMO (2010c)

¹¹ The AMO “in turn established a task force consisting of representatives from various municipal councils, finance departments, associations such as Ontario Good Roads, Municipal Engineers and Finance Officers, as well as the Canadian Urban Transit Association (CUTA)” (York Region Finance and Administration Committee, 2004, p. 1).

and on transit ridership, strongly supported by Toronto (York Region Finance and Administration Committee, 2004, p. 1). In the end, after difficult negotiations, a compromise was reached and the formula took both elements into account. On October 2004 the Provincial Government announced that to “strike a fair balance between the needs of large established transit systems and smaller municipalities” the allocation formula would be based 70 per cent on ridership and 30 per cent on population (Ontario Ministry of Transportation, 2004).¹²

Dissatisfied with the difficult negotiations around the formula for the disbursement of the portion of the provincial gas tax, and following another campaign promise, the Ontario Government decided in 2004 to renew the existing MOU between the Province and Ontario’s Municipalities and enshrine it into binding legislation.¹³ The new schedule included “a protocol that sets out how the Provincial Government will consult with the AMO on the Province’s discussions with the Federal Government” giving municipalities a seat at the federal-provincial table, and made the AMO responsible for “consulting municipalities, consolidating their views, aligning

¹² Under this program, that benefited 105 municipalities across Ontario, the government had planned on investing more than \$680 million in 78 transit systems. In the first year the government dedicated one cent a litre of provincial gas tax funding for public transit, in 2005 this increased to 1.5 cents, and in 2006 it increased to the full two cents (Ontario Ministry of Transportation, 2004).

¹³ The original MOU, which expires every three years, came into effect in January 2002. It was drafted to “promote the principal of consultation between the Province of Ontario and the AMO whenever the provincial proposes statutory or regulatory changes that have a significant impact on municipal budgets” (AMO, 2004).

perspectives and presenting them to the Province for discussion” (AMO, 2004).¹⁴ According to Dalton McGuinty, the Premier of Ontario, the signing of the MOU was historic because Ontario’s cities, towns, and rural communities were finally recognized as a legitimate form of government (as quoted in Brennan, 2004). Even though Schedule C made clear that the new protocol did not “preclude Ontario from consulting directly with specific municipalities,”¹⁵ when the official announcement was made in August 2004 the Mayor of the City of Toronto, David Miller, threatened to quit the Association over the plan (Swift, 2004). He argued that an organization that represents small towns couldn’t speak for Canada’s largest city (as quoted in Lin & Gillespie, 2004).¹⁶

As Harding (2004) explained, when Miller was elected he promised he would work on advancing a new arrangement with the provincial and federal governments that would include a new financial deal and more power.¹⁷ This MOU, which according to Toronto officials was drafted without the input of the City, was perceived as a serious setback. In a complaint letter to McGuinty, Miller expressed that:

¹⁴ The MOU was signed on August 23, 2004, and the issues covered by the protocol are: municipal infrastructure, immigration, labour market development, housing initiatives, and any other issues significantly affecting municipalities’ current budget year or current budget planning cycle (AMO, 2004).

¹⁵ Moreover, it stated: “Ontario may request selected municipalities to participate in provincial/municipal funding and service delivery initiatives,” which was implemented when the City of Toronto was made a signatory to the Gas Tax Fund agreement (Swift, 2004).

¹⁶ Faced with Miller’s complains, Brad Duguid, the parliamentary assistant to the Municipal Affairs Minister, explained that “when issues came up that impact[ed] Toronto or any other city, the Province fully intend[ed] to work directly with those municipalities,” and that in those instances there would be no need for “an AMO filter” (as quoted in Gillespie, 2004).

¹⁷ At the same time, he had also promised to “play a leadership role in forging consensus,” so his reaction was not expected (James, 2004).

“The document doesn’t advance the interests of municipalities very far at all. In fact, every part of it reinforces the idea that municipalities are the children of the province. Toronto is not. It is Canada’s sixth-largest government.¹⁸ That has to be acknowledged and recognized” (as quoted in Harding, 2004).

The fact that Toronto’s needs are very different was voiced loudly not only by city representatives, but also by NGO’s, academics, and the local media. Some arguments presented in favour of Toronto being recognized as different were that the City: (a) “is geographically larger than Montreal by the size of Vancouver” (GT-202, personal interview, 2009); (b) has a government bigger than all the Atlantic provinces combined, and both the governments of Saskatchewan and Manitoba combined (GT-207, personal interview, 2009);¹⁹ (c) accepts 40% of Canada’s immigrants (Lindgren, 2004); and (d) runs Canada’s largest mass transit system.

Miller’s opposition was not well received by McGuinty and his ministers, “who feigned dismay at Toronto’s discontent and voiced displeasure at the city’s tactics,” and by the other municipalities in Ontario, who for years felt isolated from government (James, 2004). Amidst the controversy, Hazel McCallion, Mayor of Mississauga and chair of the AMO’s Large Urban Mayors Caucus, argued that this protocol was a “step in the right direction” because municipalities currently had nothing, and that time should be given to see how it worked when implemented (as quoted in Gillespie, 2004).

¹⁸ The national government is the first, Quebec, Ontario, British Columbia and Alberta are the next four, and the City of Toronto is the sixth.

¹⁹ The City government has “55,000 employees, and over 12 billion dollars in direct budgets (once you include the capital and operating budget of the Toronto Transit Commission)” (GT-207, personal interview, 2009).

Furthermore, according to Deborah Haswell, Owen Sound Councillor and chair of the AMO's Small Urban Caucus, there were seven Toronto councillors on the Association's board, which meant "they were well represented" (as quoted in Gillespie, 2004).

Shortly after the signing of the MOU, the City of Toronto's Policy and Finance Committee, with the support of David Miller, voted unanimously to suspend the city's participation and membership in the AMO (Lindgren, 2004). While "some committee members had reservations that the proposal would reinforce Toronto's image as 'arrogant,' they believed that Toronto should not speak through proxies" (Lewington, 2004). In February 2005, after hearing from Miller that it would be "wrong, short-sighted, foolish, foolhardy, and frankly stupid" to continue being part of the Association, City Council, with a 33-6 vote, approved withholding its membership fee and withdrawing from the AMO's committees (Nickle, 2005a). With this action, Toronto was no longer bound by the MOU, which meant the Province had to start dealing directly with them.

In an effort to improve the relationship, McGuinty, who refused to sign a direct agreement with the City such as the one signed with the AMO, announced in September 2004 a review of the City of Toronto Act. The review, which would be introduced in the legislature by the end of 2005, would make the City more "fiscally sustainable, autonomous and accountable," and would "reshape the relationship between Ontario and

its capital city” (McGuinty as quoted in Lindgren, 2004).²⁰ At the time, Bob Chiarelli, the City of Ottawa Mayor, expressed interest in going through the same process, but the City failed to follow through.²¹

The troublesome dynamics between the Province, the City of Toronto, and the AMO described above spilled into the negotiations for the disbursement of the federal Gas Tax at the beginning of 2005. While the harmonious relationship between the municipalities, and the involvement of the Union of British Columbia Municipalities (UBCM), made agreeing on a disbursement formula for British Columbia easier,²² in Ontario it was the opposite (GT-239, personal interview, 2008). As the Honourable John Godfrey, Federal Minister of Infrastructure and Communities, commented at the time:

“We are doing well with Ontario but there are some issues. [...] I am always talking to Mayor Miller about this [the distribution formula], but it is a little difficult because of the less than perfect harmony between the City of Toronto and the AMO. [...] But I am not the guy that is going to impose anything; I am the guy that is trying to find some common ground here so that everyone is relatively happy. It is not for me to be the peacemaker between the two. They know what they have to do” (as quoted in Green, 2005).

²⁰ The modernize legislation is necessary because, as McGuinty further observed, while “the City of Toronto sets the pace in so many ways it can’t set the size of its own city council, its own speed limits, establish a code of conduct, appoint an integrity commissioner, create a lobbyist registry or enhance the powers of its auditor-general” (as quoted in Lindgren, 2004).

²¹ In December 2005, Chiarelli received confirmation from the Minister of Municipal Affairs and Housing that his request had been accepted. With the confirmation of the request came the recommendation that staff from the City and the Ministry consult “to address the details of the review, share information, and set the parameters for any new legislative proposals that would result in an enhanced City of Ottawa Act” (City of Ottawa, 2010b). On July 2005 City Council approved a report drafted by the Corporate Services and Economic Development Committee entitled “Ottawa Legislative Review: New City of Ottawa Act,” but the City failed to follow through with the actual review (City of Ottawa, 2010b).

²² British Columbia was the first province to sign the Gas Tax Fund Agreement.

The root of the disagreement was, once again, the desire of Toronto for the formula to be based on ridership, and the support of the AMO for a disbursement based on population. Considering that the City had “62 per cent per cent of Ontario’s transit ridership, but just 20 per cent of its population,” its share of Ontario’s \$1.9 billion would be closer to \$900 million under a formula weighted on ridership and only \$400 million under one weighted towards population (Gillespie, 2005b).²³

Early in the negotiation process, and based on their experience with the negotiations for the sharing of the provincial gas tax, the Province decided they would not get involved directly in the negotiations or in the delivery of the program (GT-104, personal interview, 2007). According to one interviewee, this decision was made at the highest political level, and it was disappointing for the Federal government and Infrastructure Canada who had been working well with Ontario officials at the bureaucratic level (GT-102, personal interview, 2007). Moreover, since under the program there was not a requirement for the provinces to contribute their own resources, Ontario wanted to avoid any political liability. “They wanted the credit for giving their blessing to the program, but not the potential downfall if things did not work out” (Godfrey, personal interview, 2011). Publicly however, the Government argued that this move was part of the Premier’s promise to give municipalities more power (Gillespie, 2005a).

²³ To make its case, Toronto argued that it needed that money to be able to start several major subway system expansions (Gillespie, 2005b).

This decision not to be involved in the program's administration left the Province looking for an alternative. Since the role of UBCM had already been established in the B.C. Agreement, the Province approached the AMO. Ontario and the Federal government recognized that this was a "very good organization that was in a great position to understand and communicate the infrastructure needs of the Province and to deal with the different expectations of small and large municipalities" (Godfrey, personal interview, 2011). Moreover, the involvement of the Association was also seen as the perfect vehicle to further recognize publicly the Government's respect and value of the municipal sphere (Godfrey, personal interview, 2011). Toronto was also approached since it was no longer a member of the Association.²⁴ While there were no technical issues that prevented the AMO from administering the program, the Government was concerned about the political implications of dealing directly with a city (GT-102, personal interview, 2007).²⁵

The process to achieve consensus on the federal Gas Tax sharing formula got a favourable boost as a result of two separated events. First, in April 2005 Jack Layton, federal NPD leader, and Prime Minister Paul Martin signed a \$4.6-billion deal aimed at salvaging the federal budget. This deal included the sharing of an extra cent per litre of the gas tax with municipalities for transit over the next two years, subject to the Federal

²⁴ At the time, Miller argued that if they had been part of AMO they would have been "in a very difficult position," and recognized that, while the negotiation process might be slower, "in the end it will be very good for Toronto" (as quoted in Green, 2005).

²⁵ In particular the bureaucrats involved in the negotiations were concerned about the reaction that Quebec could have. To avoid a potential breakdown of the negotiations, Quebec was reassured that the Government would not be seeking a similar arrangement there, by for example dealing directly with Montreal, and would fully respect its jurisdiction (GT-102, personal interview, 2007).

government continuing to run a surplus (Lewington, 2005). What made the announcement a positive boost to the negotiations was that the funds would be allocated on ridership, not population, which meant that of the \$310 million that would be allocated to Ontario, \$198 million would go to the Toronto (Lewington, 2005). This was a victory for the City who, in turn, felt more inclined to relieve the pressure it was bringing to the negotiation to ensure the formula would account for ridership. Second, the political uncertainty surrounding the approval of Budget 2005 brought a new sense of urgency to sign a deal before the Liberal government was potentially defeated.²⁶ As Roger Anderson, the AMO president, explained at the time:

“We are working towards that agreement; we are progressing favourably. [...] We want to sign something sooner rather than later. [...] We don’t want to keep gambling on potential non-confidence votes in Parliament” (as quoted in James, 2005).

Faced with these developments, and having approved a budget that included a federal contribution of \$46 million in gas tax funding for 2005, the Toronto knew it had much to lose if it continued to hold the negotiations based on the formula.²⁷ Losing this contribution, as Councillor Howard Moscoe, the only Toronto member that used to be part of the AMO’s executive, argued at the time, would have left the Toronto Transit Commission (TTC) in a very difficult financial position (Nickle, 2005b). In the end, the

²⁶ At the time, Stephen Harper, the Opposition Leader, promised to honour the Gas Tax deal if he defeated the Liberals and formed the next government, but this meant the deal had to be signed to be honoured (James, 2005).

²⁷ The money, “the single biggest impact on the city’s own budget,” had been allocated for “the purchase of new buses - buses already being manufactured, which were to be delivered before the end of the year” (Nickle, 2005b).

AMO was successful in negotiating a formula based exclusively on population, which they claimed was the only fair solution. The Association's position was explained by Pat Vanini, executive director of the AMO:

"I don't know how you justify that a taxpayer in one part of the Province, whether its northern Ontario or southern Ontario, is any different. Everyone has an infrastructure need. While Toronto faces massive TTC costs, small towns, with tiny property-tax bases, face things like multi-million-dollar bridge repairs" (as quoted in Gillespie, 2005b).

The final formula left Toronto with \$400-million less than they had hoped for, but, considering the Liberal-NDP budget deal, Miller expressed at the time that he was "delighted" with the final agreement (Cowan, 2005).

While the biggest hurdle, i.e. the allocation formula, was overcome there was still an un-finished component of the Ontario Agreement that could have delayed the official signing. Stemming from the decision of the Province to not be involved in the administration, Infrastructure Canada had been unable to negotiate a mechanism to distribute the funds to Unincorporated Areas, which are areas of territory without municipal organisation that are under the legislative authority of the Province.²⁸ These areas were problematic because there was not an overarching body that had the authority to administer the funding, Infrastructure Canada lacked the administrative capacity to do so, and they did not have the legislative authority to accept the cheques. Instead of holding off the resources for the whole Province, the decision was made to negotiate that

²⁸ The focus of this chapter is all of Ontario municipalities, with the exception of Toronto. As such, the arrangement for Unincorporated Areas will only be briefly discussed.

final component after the signing (GT-303, personal interview, 2011).²⁹ Despite “having the political mandate to not touch the money,” the Province, after many rounds of negotiations, finally agreed to administer this portion of the funds (GT-303, personal interview, 2011).³⁰

POLICY IMPLEMENTATION I: GOVERNANCE & ADMINISTRATION OF THE GAS TAX FUND

In Ontario, as previously explained, while the Provincial government is a signatory to the Agreement they chose not to be involved in the main administration of the program and the management of the funds. However, the provisions of the Agreement were made possible by the consent of the Ontario government which, according to the AMO (2008f, p. 5), “reflects the appreciation that Ontario’s municipalities are independent, duly elected governments that are fully capable of administering public funding with efficiency, transparency and accountability.”

The administration of the Gas Tax program in Ontario is the responsibility of the AMO for all jurisdictions, other than the City of Toronto. Toronto receives its grants directly from the Federal government and reports on the use of the funds directly to

²⁹ In this case, the Federal Government and Infrastructure Canada were flexible enough to take a “leap of faith” in trusting that the component could be successfully negotiated in a reasonable time frame (GT-303, personal interview, 2011).

³⁰ Due to the particular characteristics of the Unincorporated Areas the accountability measures and the reporting requirements for this component of the Agreement are different, but they still meet Treasury Board requirements.

them.³¹ The Province's administrative role is limited to the delivery of the funds to Unincorporated Areas. According to the Agreement (Canada, Ontario, AMO, City of Toronto, 2005, p. 8), Ontario is responsible for transferring the resources via Ontario's Consolidated Revenue Fund Special Purposes Account for Unincorporated Roads to eligible projects of Local Roads Boards. Ontario is not reimbursed for administration costs, but it is reimbursed for the cost of the annual financial audit.

Just as it is stipulated in all other provincial agreements, the final component of the governance and administrative framework for the Gas Tax Fund in Ontario also includes an oversight committee. Due to the nature of the Agreement, in this case there are two oversight committees. The first committee consists of two representatives from the Government of Canada, two representatives from the AMO, two representatives from Toronto, and two advisors from the Government of Ontario. This committee is responsible for managing any issues that may arise in the implementation of the Agreement, save any issues that deal with Unincorporated Areas, which are the responsibility of the second committee. This second committee consists of two representatives from the Government of Canada, and three representatives of the Government of Ontario.³²

³¹ As such, this chapter focuses less extensively on the case of the City of Toronto which will be addressed in more detail in Chapter 7.

³² In June 2006 the Ontario Oversight Committee created two technical subcommittees to deal with issues specific to the implementation and administration of the Agreement, including identifying measurable

According to one interviewee, the Oversight committee members have a highly functioning and constructive relationship, and meet approximately four times a year or when the need arises (GT-216, personal interview, 2009). They deal with things that are not clear cut, and make decisions on discretionary matters. They communicate their decision to all or particular municipalities depending on the situation. One of the decisions taken by the committee was that, considering the advanced regulatory and planning framework already in place in Ontario, existing official plans could be used to meet the Gas Tax Fund requirements for Integrated Community Sustainability Plans (AMO, 2007f, p. 11).

Characteristics and Performance of the Implementing Organization – the AMO and the Gas Tax Fund

The AMO's governing body is the Board of Directors, which comprises forty three elected and non-elected municipal representatives. They have a staff of twenty eight headed up by an Executive Director, and three of its employees are assigned full-time to the administration of the Gas Tax Fund. Among the activities conducted by the staff are: developing policy positions and reports on issues of general interest to municipal governments including governance, financial structure, environment, labour, emergency services and human services; conducting ongoing liaison with provincial government elected and non-elected representatives; informing and educating

environmental outcomes (AMO, 2007f, p. 12). One subcommittee was comprised of the members of Infrastructure Canada, AMO and Municipal Affairs and Housing, and the other one was comprised of the members of Toronto.

governments, the media and the public on municipal issues; marketing innovative and beneficial services to the municipal sector; and maintaining a small resource centre on issues of municipal interest.

Due to the nature of the Gas Tax program, the AMO's administration process is highly streamlined. Once the Ontario funding agreement was signed, the Association established a separate account to facilitate the transfer of money from the Federal Government. It also started working on drafting the template for the municipal funding agreements (MFA) that would set out the terms and conditions for receiving the federal funding. These agreements, that covered the first five years of funding, were sent to all 443 Gas Tax Fund eligible recipients in October, and they were required to sign and pass a bylaw ratifying them before they could receive the first payment. By the end of April 2006 all MFAs had been signed and the total 2005-2006 allocation had been transferred (AMO, 2006b, p. 3).

As specified in the Agreement, the AMO could use the funds to cover the administrative costs incurred in fulfilling its duties provided that it submitted in advance a business case justifying such use of funds to the Federal government (Canada, Ontario, AMO, City of Toronto, 2005, p. 15). Its business case, which was approved shortly after the signing of the Agreement, argued for the use of up to one percent of the funds for the

five years of the Agreement (AMO, 2007f).³³ Once the original agreement was fulfilled in 2010, and a new four year agreement was signed, the one percent was reduced to a half a percent. The rationale for this reduction was that with time the administration process had become more efficient and streamlined, requiring less resources and, at the same time, the money being disbursed had increased significantly making half a percent a sufficient carve-out (GT-216, personal interview, 2009). The resources that the Association does not apply to its administration costs go back into the funding pool available to the recipients.

When the AMO's administration costs for the Gas Tax Fund are compared to the costs incurred by the Federal government administering similar funding programs, this arrangement is significantly less costly and more efficient. According to one interviewee, "a typical carve out for a federal or provincial grant program is two sometimes three percent" (GT-216, personal interview, 2009). Moreover, as another interviewee explained at length:

"With previous contributions programs the Federal government had to establish a large and comprehensive administrative infrastructure that required a large number of people. These employees were required to travel all over the country to do site visits to make sure the work was being done in an efficient and effective manner, which could amount to large overhead costs. With the Gas Tax Fund, this can still be

³³ For the period of 2005-06 this 1% represented approximately \$1.7 million, for 2007-08 it represented approximately \$2.3 million, for 2008-09 it was approximately \$2.9 million, and for 2009-10 it was approximately \$5.8 million (AMO, 2006b, p.3; AMO 2009b, p.23, and AMO 2010a, p.31).

demonstrated, but differently, through the established reporting mechanisms” (GT-203, personal interview, 2009).³⁴

Among the Gas Tax administrative duties fulfilled by the AMO are: (a) receiving and disbursing the funds in a timely manner; (b) collecting and producing the agreed reports; (c) educating the recipients about the Gas Tax Fund program, including providing resources to help them identify eligible projects and costs, and their responsibilities; (d) maintaining open and frequent lines of communications with the recipients to ensure that the program is being administered smoothly on their ends; and (e) making sure that recipients fulfill their commitments in a timely manner. In the case where a municipality does not meet the reporting requirements, the Association is also responsible for holding back the next payment until the requirements have been met.

One of the things that differentiate the AMO’s administrative arrangement from the arrangements in place in other provinces is that they have full time resources dedicated solely to the administration of the fund. These resources include a gas tax manager, a policy adviser, and an administrative clerk. As one interviewee explained:

“In all the other thirteen jurisdictions, maybe with the exception of B.C., [the Gas Tax administration] is one component of the responsibility of someone who is managing all the federal and provincial investment in

³⁴ Due to the Gas Tax Fund program structure, Infrastructure Canada’s administration of the program is also highly efficient. As one interviewee argued, there are only 15 people in charge of running the program in a dedicated organizational unit, and the Federal government does not have an allocated administration carve-out from the Gas Tax Fund resources. The program administration is covered by the department’s budget (GT-219, personal interview, 2009). For a review of the audit of the Department’s Management Control Framework for the program see: Infrastructure Canada (2009a).

infrastructure. This represents a fundamental difference in terms of the amount of energy, and perhaps even expertise, devoted to the administration of this particular program” (GT-216, personal interview, 2009).

The result is that Ontario was, for example, among the first jurisdictions to identify outcome measures, and the first to provide municipalities with an online reporting tool for the program. However, it is important to recognize that this commitment to efficient and successful administration is motivated, in part, by the need to maintain a good relationship with the Federal government for its advocacy efforts, and to demonstrate that it is a responsible delivery agent that could be trusted with the administration of new federal or provincial programs (GT-303, personal interview, 2011).

While administering the Gas Tax Fund has added a new dimension to the services that the AMO provides, according to one interviewee, this role has not changed its relationship with its members, affected its primary role as an advocacy organization, or fundamentally changed the way it functions as an association (GT-216, personal interview, 2009). In fact, its administrative role has helped the Association in improving its advocacy role and vice versa. At one interviewee clarified at length:

“Our administration provides insights into the needs of municipalities and the constraints they face when using funding from other levels of government. This directly affects our advocacy, as we can provide information on future program design and implementation to federal and provincial policy makers. The best example is our recent submission to the Federal Standing Committee on Finance, which considered Gas Tax permanency as part of Bill C-13. In it, we talked about our unique perspective as administrators and the success of the funding model to date,

however we requested that the Fund be indexed to keep up with rising costs of inflation, population growth, and construction cost increases.

Vice versa, our advocacy work also helps our administration. With the Province, we have revealed that there is a \$60 billion infrastructure gap in Ontario's municipalities. This has been used in our Gas Tax annual reports and our outreach sessions across the Province to set the context for this funding and to promote the flexibility of the Gas Tax Fund's eligible categories (GT-310, personal communication, 2012)"

Furthermore, since the terms and conditions of the Agreement are clearly spelled out, the Association feels that its administrative role is "objective," which leaves no room for conflict (GT-216, personal interview, 2009). To avoid having to take any kind of corrective action for non compliance, the AMO tries to make sure that municipalities are constantly reminded of their obligations. It is continuously sending out information to its key contacts and the city councils about reporting requirements, deadlines, and the consequences for non-compliance. Overall, there is a high level of satisfaction among recipients with the role of the AMO in the administration of the program (Performance Management Network Inc., 2009, p. 10).

The AMO receives Ontario's Gas Tax allocation annually in two installments usually in July and November. A notable exception was 2006, when the Federal government decided to delay the second payment until December because 88 municipalities had failed to submit their annual audited statements. In 2009 and 2010 the opposite happened when, as part of the Federal government's Economic Action Plan, the first payment was accelerated by three months. According to John Baird, Canada's

Transport and Infrastructure Minister, this move was meant to “stimulate regional economies, [...] get shovels in the ground sooner, and get Canadians back to work” (as quoted in Infrastructure Canada 2009d). Table 8 below outlines the AMO’s financial position related to the Gas Tax Fund at the end of the fiscal year since the program’s creation in 2005 until 2009.

Table 8: The AMO's Gas Tax Fund Year End Balance

	2005	2006	2007	2008	2009	Cumulative
Opening Balance	-	\$24,682,230	\$1,373,579	\$ 2,058,642 ⁴	\$ 2,180,415	-
Received from Canada	\$174,296,000	\$174,296,000	\$232,395,000	\$290,493,000	\$ 580,987,000	\$ 1,452,467,000
Transferred to Municipalities	\$(148,902,308) ¹	\$(196,270,895) ²	\$(230,202,816) ³	\$(287,830,391) ⁵	\$(567,712,799) ⁶	\$ (1,430,461,192)
Administration Costs	\$(1,742,960)	\$(1,742,960)	\$(2,323,950)	\$(2,904,930)	\$ (5,809,870)	\$ (14,524,670)
Interest Earned by the AMO	\$1,031,498	\$409,204	\$358,812	\$364,094	\$ 61,355	\$ 2,224,963
Closing Balance	\$24,682,230	\$1,373,579	\$1,600,625	\$2,180,415	\$ 9,706,101	-

Notes:

¹ 81 municipalities did not have a fully executed municipal funding agreement as the end of December and could not be transferred the 2005 allocation.

² Includes: (a) \$23.7 million transferred to the 81 municipalities alluded in Note 1; (b) \$86.3 million received from Canada on December, which was not paid to municipalities until January 2007.

³ Includes funds: (a) \$112,994.20, paid using interest accrued by the AMO to three municipalities where 2001 population was corrected due to error by Statistics Canada; (b) withholding of 2007 allocation for three municipalities (\$265,551.56) until 2006 reporting requirements were completed; (c) withholding of 2007 allocation (\$1,226) for two municipalities that chose not to participate in the Federal Public Transit Funds program.

⁴ During 2008 errors were noted by a number of municipalities in the amounts reported for 2007 resulting in the discrepancy between the closing balance of 2007 and the opening balance of 2008.

⁵ Includes: (a) withholding of 2007 and 2008 allocation for a municipality (\$212,431) until 2006 and 2007 reporting requirements are completed; (b) withholding of 2008 allocation for two municipalities (\$174,212) until 2007 reporting requirements are complete.

⁶ Does not include \$7,585,619 in payables to municipalities not yet in compliance with the Agreement as of December 31, 2009.

Sources: Based on data obtained from the AMO (2006b), (2007f), (2008f), (2009c), and (2010a)

POLICY IMPLEMENTATION II: REPORTING AND ACCOUNTABILITY

As previously explained in Chapter 4, the reporting requirements for the Gas Tax Fund are standard across all of the agreements and are quite comprehensive. Due to the particular arrangement in Ontario, it is the AMO's responsibility to prepare and deliver to Canada no later than September 30th of each year, in respect of the prior fiscal year, an annual expenditure report, and an audit report.³⁵ In 2009 the Association was also responsible for preparing an outcomes report, which reported on the results achieved over the first three years of the Agreement, and a joint evaluation of the program, which addressed the achievement of the program objectives, the use of funding, and the effectiveness of the funding approach and the communications protocol. As of October 2010 the AMO has fulfilled all of its commitments in a timely manner and, as stipulated in the Agreement, has made all reports available in its website.

Similar to the AMO's reporting requirements, according to the Municipal Funding Agreement (MFA), municipalities are required to prepare and deliver to the Association an annual expenditure report by March 31st following the municipal fiscal year that includes an annual audit statement.³⁶ In most cases, municipalities have

³⁵ The audit report is a standard compliance audit outlining the Association's compliance with the terms and conditions of the Agreement. Starting with the 2007 annual expenditure report, AMO was required to report in the aggregate measurable environmental outcomes of the Gas Tax Fund investments.

³⁶ The audit statement has to be prepared by the fund recipient's auditor in accordance with section 5815 of the Canadian Institute of Chartered Accountants Handbook - Special Reports - Audit Reports on Compliance With Agreements, Statutes and Regulations, to provide assurance that the terms of the MFA have been adhered to and the funds have been spent appropriately.

submitted their reports on time or shortly after the deadline.³⁷ One notable exception was 2006 when, by October, 88 municipalities had failed to submit their audit statement. Due to this large number of missing reports, the Federal government, as previously mentioned, delayed the payments of the two instalments for all municipalities. One interviewee explained the situation at length:

“When we were doing the policy development on the Gas Tax, one of the fears was to lose control over the money. In 2006 the reports were supposed to come in September and we received no reports [from many municipalities in all the provinces]. The Conservatives had just come into office, they had tabled their Accountability Act, and there was a big, big [emphasis] on accountability. So, [the program administrators at Infrastructure Canada] made the decision, supported by the Assistant Deputy Minister and the Minister, to make no payments.” Upon finding out about the decision, “the AMO was pissed – they were mad because it was a matter of their credibility toward their members to be able to deliver this money” (GT-219, personal interview, 2009).

In the following years, the number of municipalities that failed to submit their audit statements were on average 15, and these municipalities were withheld their funds until it was received.³⁸ In every instance of reporting default, the AMO works closely with the affected municipality to help them meet the requirement as soon as possible.

Besides municipalities not submitting their reports on time, in 2006 there was another implementation issue regarding the audit requirement that affected the allocation of the resources in the first two years of the program. When the accountability framework

³⁷ Although by September 2009 there was still one municipality that had not yet provided their audit statement regarding their 2006 allocation, and two that had failed to provide their Statement regarding their 2007 allocation (AMO, 2009c).

³⁸ The number of municipalities that failed to submit their audited statements by September 2007 was 18 (AMO, 2007e); in 2008 was 16 (AMO, 2008f); and in 2009 was 11 (AMO, 2009b).

was drafted, there was uncertainty as to how to deal with a program with such innovative features. As a result, not everything was codified. In particular, the Government wanted to respect the principle of flexibility regarding the use of the funds. When it came to drafting the audit report program administrators struggled to assess if the individual municipal projects were meeting the funding conditions. When the reports came, as one interviewee explained, “the audits did not necessarily jive with the expectations” and it was evident that some auditors had gone “overboard auditing every clause of the Agreement” (GT-219, personal interview, 2009). By 2008, the third year of the program, the issue had been resolved by clarifying and successfully communicating the expectations of the Government and the responsibilities of the administrators and the recipients.

One of the key communication strategies employed by Infrastructure Canada to address those emerging issues regarding the accountability framework, and other implementation issues, was the establishment a national workshop that has been held twice a year since 2006. The initial workshops, for example, provided a suitable platform for the specification of the performance measurement framework based on a national perspective. The goal was to make it flexible enough so that it could be applied by every province and territory, and by small and large municipalities. The result was a comprehensive framework that focuses on good credible data rather than sophisticated

data that was vetted by each oversight committee. This framework was used for the development of the individual outcome reports.

From the perspective of Infrastructure Canada, the annual expenditure report and the audit report are the key monitoring and reporting instruments of the accountability framework. In relation to the administration of the program, the department has three main objectives: (a) to flow funds in a timely manner; (2) to ensure that the expenditures meet the eligible costs and category criteria; and (3) to ensure the program achieves the result it was designed for (GT-219, personal interview, 2009). To achieve these objectives, they need these reports because they show if the municipalities are meeting their responsibilities. As one interviewee remarked, since the “last thing the department wants is a scandal with the Gas Tax money,” these reports give them peace of mind and allow them to move forward with the next allocation (GT-219, personal interview, 2009).

The existing municipal accountability framework for the Gas Tax Fund, according to one interviewee, is a “good model” that certainly provides adequate oversight, but one that could have been streamlined to avoid costly duplicate processes (GT-216, personal interview, 2009). During the negotiations of the agreements the AMO argued strongly that, since Ontario municipalities already comply with comprehensive accountability measures required by federal and provincial laws, integrating the Gas Tax financial reporting with the existing municipal reporting would be the most efficient

approach. Unfortunately, the Federal government insisted on a separate process.³⁹ Based on this decision, and to “minimize municipal effort and ensure consistent reporting across all municipalities,” the AMO decided to develop a web enabled “Annual Expenditure and Outcomes Reporting Module” that is available to all eligible recipients through its website (AMO, 2009a).⁴⁰

Communications

In meeting both the Agreement’s guiding principles of transparency and regular reporting to Canadians and the Government’s need of ensuring funding programs are visible to tax payers, part of the accountability framework includes detailed expectations about communications.⁴¹ In the Ontario Agreement, the Communications Protocol can be found in Schedule F, and the most relevant requirements can be found in Table 9 below.

³⁹ As such, the annual audits statement required by the MFA has to be removed from the process of drafting the Annual Municipal Financial Audit. While the two audits have different scopes, the most be completed by March 31st each year.

⁴⁰ This module collects information through five screens: (1) Enter a New Project, (2) Edit an Existing Project/Outcomes, (3) Enter/Update Financial Information, (4) Capital Investment Plans (CIP), and (5) Integrated Community Sustainability Plans (ICSP).

⁴¹ Besides addressing accountability, this communication framework also serves as a political tool that ensures the program will have the

Table 9: Ontario Communication’s Requirements

RESPONSIBILITY	AMO & TORONTO	ONTARIO MUNICIPALITIES
	<ul style="list-style-type: none"> • Ensure all communications referring to projects funded by federal gas tax revenue clearly recognize Canada’s investments. • Ensure all communications will recognize that this initiative forms part of the New Deal through the use of the Canada wordmark and of a tagline. • Report regularly to the public on the outcomes of the investments. 	<ul style="list-style-type: none"> • Ensure all communications referring to projects funded by federal gas tax revenue clearly recognize Canada’s investments. • Ensure some form of permanent signage (e.g. plaque) at the location of projects. Where there is no fixed location for signage, such as a transit vehicle, a prominent marker e.g. a decal placed on the inside or outside of a bus) should be use. • Ensure project construction signs are installed at the start of construction and remain in place for up to 30 days following project completion. • Ensure that a minimum of 21 days notice is given before scheduled public events to allow for all orders of government to plan their involvement. • Ensure that communication costs are paid from own funds. • Ensure that communications material and signage reflect the Government of Canada communications policy, including the <i>Official Languages Act</i> (Canada), and federal-provincial/territorial identity graphics guidelines. • Ensure all joint communications materials have the approval of Infrastructure Canada

Source (Canada, Ontario, AMO, City of Toronto, 2005, pp. 40-41)

Due to the costs associated with communication efforts and the expectation that municipalities have to cover the costs with their own funds, the AMO successfully negotiated with the Federal government different communication guidelines based on the total funding each municipality receives (AMO, 2010e). For municipalities receiving over \$500,000 over the original five years, project signs must be produced and permanently displayed in prominent locations related to the funded projects. Municipalities receiving less than \$500,000 can comply by having either a project specific permanent plaque/sign or a 'total funding dollars at work' sign displayed at the project site or alternative public location such as the mayor's office, city hall or at the city limits.

Since the Agreement was signed, the AMO's communication efforts have evolved to address the changing circumstances. In 2005, the Association focused on announcing the official signing, and informing municipalities and other interested parties about the provisions of the Agreement (AMO, 2006b). Once the money started flowing, the AMO's communications became more focused. For example, they organized a session on Integrated Community Sustainability Plans for its Annual Conference, and they disseminated the Infrastructure Canada endorsed template for construction signage for municipal use, which can be found below in Figure 10 (AMO, 2007f).

Figure 10: Infrastructure Canada Endorsed Construction Signage⁴²



Source: AMO (2006a, p. 2)

Once projects started to be completed, the AMO created in 2008 the “Federal Gas Tax Fund Project Award,” and in 2009 the “Federal Gas Tax Capacity Building Award” in order “to showcase infrastructure projects that exemplify the Federal Gas Tax Fund’s environmental objectives and demonstrate long term planning for environmental and community sustainability (AMO, 2007f).”⁴³ Also in 2008, the AMO created a new interactive website: “Gas Tax at Work,” which is available at www.gastaxatwork.ca. This

⁴² In 2007 the French tagline was changed to: “Les fonds de la taxe fédérale sur l'essence à l'oeuvre dans votre collectivité.”

⁴³ Besides recognizing municipalities for their good work, this award demonstrates the positive impact that the Gas Tax Fund has had on addressing municipal infrastructure needs, and the fact that the stated objectives of the program are being met. Up to a maximum of three Awards are presented each year and there are three population based categories: municipalities of up to 25,000 people; municipalities of 25,000 to 100,000 people and municipalities of more than 100,000 people. Entries are judged according to the following general criteria: (1) project exemplifies the Gas Tax Fund’s environmental objectives; (2) project addresses an overwhelming need at the local level with quantifiable community benefits; (3) project exemplifies long term planning with respect to use of Gas Tax funding and/or environmental and community sustainability; and (4) the portion of gas tax funding used to finance the project.

innovative communications instrument has Ontario's Outcomes report, and a tool to map Gas Tax investments in the Province.⁴⁴

As the administrator of the Gas Tax Fund in Ontario, the AMO has played an important role in helping municipalities, in particular small and medium-size municipalities that do not have communications staff, with the development and implementation of their communications strategy. First, it provides useful information on its website regarding communications issues, including news releases and updates. Second, it developed a Municipal Communications Tool-kit, which provides municipalities "with media relations tools information and tips on how to host a successful event, including templates for media advisories, news releases and backgrounders" (AMO, 2007f). Third, it serves as the primary contact for the coordination of official events for the announcement and/or opening of new infrastructure investments that involve the three levels of government. Finally, it proactively encourages municipalities to seek out communication opportunities and to deliver consistent messages about the program.

According to the Association, while it has been successfully meeting its communication objectives throughout the life of the Agreement, the communication

⁴⁴ With the map tool by either providing a postal code, choosing a municipality, or clicking an interactive map the public can see the location of all the projects funded with Gas Tax resources in a community. Moreover, by choosing a specific project, they are able to see the full name of the project, the location, the cost, the expected outcome, if other government funds were used, and the status of the project (i.e. completed or ongoing).

performance of the municipalities, when compared to other provinces, can only be qualified as average (AMO, 2009b, p. 16). This point was further supported by the findings of Infrastructure Canada's "National Summative Evaluation" of the program. According to the evaluation, "despite some progress over time, an uneven representation of events and news releases [across the provinces] is apparent," with municipalities in Ontario issuing only 21 news releases between 2005-2008 and hosting 17 events (Infrastructure Canada, 2009c, p. 25).⁴⁵ This low number is attributed to some key features of the structure of the program (Infrastructure Canada, 2009c, p. 25). For example, the lack of an application-driven process and the very large number of projects makes it difficult for Infrastructure Canada and the AMO to keep track of when specific projects are started or completed. At the same time, it has been difficult to find convenient times and dates for announcements and events that required the involvement of all three levels of government.⁴⁶

Communication problems are worrisome because, with such a large financial contribution, the Federal government is expecting recognition; without it, they may feel the need to establish a program with a different framework. In relation to the Government's position, one interviewee explained at length:

⁴⁵ In comparison, Quebec issued 114 news releases, and hosted 42 events, and British Columbia issued 19, and hosted 13 (Infrastructure Canada, 2009c, pp. 2-16).

⁴⁶ More specifically, since the beginning of the transfer, the communication efforts of the municipalities have been affected in three separate occasions. In the fall of 2007 and 2008, they were hampered by the provincial campaign election period during which they were asked by the Government of Canada to postpone making announcements on projects funded through the Gas Tax until the election had taken place (AMO, 2007c). In 2008, the same request was made during the fall federal election campaign (AMO, 2008d).

“In the early years of the implementation, communication was not a big concern because the Gas Tax Fund had been launched under the Liberal government just before the Conservatives came in power. At the time, the new Government just tried to bury the program under the Building Canada Fund initiative. Later, with the economic downturn, their top priority became promoting, and getting credit for, the Infrastructure Stimulus Fund. However, now that the Stimulus Fund and other infrastructure programs are sunsetting, the focus will be back on making sure the Gas Tax Fund is a successful source of recognition of the Federal government’s support for municipal infrastructure” (GT-219, personal interview, 2009).

To improve Ontario’s performance and secure the continuation of the program, the AMO assigned in 2009 additional communications support, updated the Communications Toolkit, and hosted a communications information session at its annual conference. The Association’s efforts showed positive results as municipalities reported 21 communication initiatives (news conferences and releases), which exceeded the AMO’s 10 event target for the year (AMO, 2010a).⁴⁷ In 2011, the AMO (2011a) also took the initiative of encouraging municipalities to promote Gas Tax funded projects through social media as a “fairly simple, innovative way to provide information to the public and other stakeholders about projects in the community.”⁴⁸

At the national level another organization working directly trying to address the communications issues was the Federation of Canadian Municipalities (FCM).

⁴⁷ On the other hand, the fact that there are announcements does not guarantee that the citizens are paying attention. As one interview remarked, for most of the citizens these types of communications “are just back ground noise” (GT - 235, personal interview, 2008).

⁴⁸ The AMO wanted to take advantage of the fact that in 2011 there were 125 municipalities with a social media presence, and that many heads of council, councillors and staff members are on twitter individually promoting municipal issues and events. To help municipalities with this task they drafted social media guidelines for the Gas Tax Fund.

Understanding the importance of this program to its members, and the political importance of a visible program, the FCM worked in conjunction with Infrastructure Canada to develop a visibility campaign for the Gas Tax Fund for the fall of 2011.⁴⁹ Moreover, just as the AMO, the FCM has tried to raise the public profile of the program through its communications, conferences, and public events. Its messages usually focus on emphasizing the contribution of the funding to Canada's economic competitiveness and the reduction of the infrastructure deficit. This can be seen, for example, in a statement made by the president of the FCM in 2009:

In the last four years the Gas Tax Fund “has created thousands of jobs in communities across the country and improved the infrastructure that supports Canada’s enviable quality of life—access to affordable housing, efficient public transit and secure, safe communities. The [...] fund has delivered real, street-level value for taxpayer dollars quickly and efficiently [...] while maintaining the highest standards of transparency and accountability. In doing so, it has created the foundation on which we can build a long-term, national plan to eliminate the estimated \$123 billion municipal infrastructure deficit” (Perrault, 2009).

Capital Investment Plans and Integrated Community Sustainability Plans

According to the provisions in the Municipal Funding Agreements (MFA) signed by all eligible recipients, municipalities had to complete by the end of 2009 a Capital Investment Plan (CIP). In the MFAs this plan was defined as “a document, such as a capital plan, created through a public process, with approval from municipal elected officials, providing a detailed understanding of anticipated investments into tangible

⁴⁹ The FCM represents more than 1,900 municipalities across Canada and has been operating since 1901 (FCM, 2011).

capital assets that are considered ‘priorities’, along with a rationale” (AMO, 2005d, p. 2). To cover the costs of development, municipalities could use Gas Tax resources through the Capacity Building category of eligible expenditures.

In 2007 the Oversight Committee informed municipalities that for the CIPs they would be required to: ensure compliance with section PS 1200 and PS 3150 of the Public Sector Accounting Board (PSAB) Handbook;⁵⁰ develop a capital budget on the basis of an asset management plan that uses lifecycle costing approaches and supports the municipality’s official plan or equivalent; and develop a capital plan that integrates both operating and capital costs to identify future costs associated with assets and their long term maintenance (AMO, 2007f, p. 11).

A second eligible recipient requirement stipulated in the MFA was the development or enhancement of an Integrated Community Sustainability Plan (ICSP) by itself or as part of a higher level of agglomeration before the end of 2010. In the MFAs an ICSP was defined as “a long-term plan, developed in consultation with community members that provides direction for the community to realize sustainability objectives, including environmental, cultural, social and economic objectives” (AMO, 2005d, p. 3). Moreover, the MFA specified that developing an ICSP would require both a coordinated

⁵⁰ Section PS 3150 of the PSAB Handbook outlines the accounting principles for accounting for tangible capital assets by a public sector entity or organization that became in effect in January 1, 2009. Section PS 1200 outlines the financial statement presentation requirements (statement of financial position, operations, cash flow, and changes in net debt) for Federal, Provincial, and Territorial governments.

approach to community sustainability by, for example, establishing linkages between various plans, planning and financial tools, and collaboration with other municipalities where appropriate to achieve sustainability objectives (AMO, 2005d, p. 27). To cover the costs associated with ICSP's related activities municipalities could use Gas Tax resources under the Capacity Building category.

In 2007 the Oversight Committee in conjunction with Infrastructure Canada, recognizing the planning and environmental protection regulatory policy framework already in place in Ontario, made an important decision regarding the ICSP's requirements.⁵¹ First, it announced that municipalities that had an official municipal plan, which was in compliance with the current Ontario Planning Act, would not be required to draft a new plan to meet this requirement because these plans demonstrate the ICSP's principles (AMO, 2008g, p. 9).⁵² Second, it decided that those municipalities without an official plan would be required to demonstrate through other documentation how they would work towards the framework outlined in the MFA. This was an important decision because in most provincial Gas Tax Fund agreements municipalities are obliged to

⁵¹ This statutory and regulatory framework, which is recognized in the Gas Tax Fund Agreement, includes: (a) land use planning system and recent planning reforms, including the Provincial Policy Statement and the Greenbelt Act, 2005, S.O. 2005 c.1; (b) Ontario's commitment to long-term strategic planning for growth through the Places to Grow Act, and the Greater Golden Horseshoe Growth Plan; (c) initiatives to protect and provide safe drinking water in Ontario, including existing and proposed legislation and regulations to support safe drinking water, source water protection and the full cost recovery of water and sewer services; (d) Ontario's provincial gas tax program; (e) Ontario's requirement that all municipalities prepare annual financial statements in accordance with the principles of the PSBA, pursuant to Ontario Regulation 277/02; and (f) The Rural Plan and the Northern Prosperity Plan (Canada, Ontario, AMO, City of Toronto, 2005, pp. 10-11).

⁵² The decision also stipulated that municipalities with official plans could still enhance sustainability through other plans or initiative.

prepare ICSPs to receive the funds. As one interviewee explained, the rationale behind it was avoiding unnecessary duplication (GT-216, personal interview, 2009).

Unfortunately, according to the Honourable John Godfrey (personal interview, 2011), this was a disappointing situation in which “the AMO failed to provide the required leadership to get municipalities to work towards planning a better future.” As it was explained in Chapter 4, this transfer was designed with ambitious objectives based on a model of sustainability that depends on four interlinked dimensions: environmental responsibility, economic health, social equity, and cultural vitality. The ICSPs, a key component of the strategy, were chosen as one of the municipal responsibilities to “accelerate the shift in local planning and decision-making towards a more long-term, coherent and participatory approach to achieve sustainable communities” (Planning for Sustainable Canadian Communities Roundtable, 2005). While it is possible that existing plans in Ontario have components that demonstrate the principles of sustainability, an ICSP has very particular characteristics, including long-term thinking of 30 or more years and integration with different plans, which are usually not addressed in the identified regulatory and statutory framework.⁵³ As a result, Godfrey (personal interview, 2011)

⁵³ The planning process for an ICSP and the resulting plans emphasize: “(1) long-term thinking – future oriented to enhance community sustainability; (2) broad in scope– consider the communities’ environmental, social and/or cultural sustainability; (3) integration – reflect a co-ordinated approach to enhance community sustainability through linkages between different types of plans or planning activities; (4) collaboration – planning processes engage community members and other partners to support community sustainability; (5) public engagement and education – designing processes that enhance public input into planning processes; (6) implementation – keeping plans off the shelf and putting them into action; (7) monitoring and evaluation – setting targets and tracking results to celebrate progress and focus

argued that the Oversight Committee's decision "missed the mark completely regarding the original intention of the Gas Tax Fund."

At the same time, the Honourable John Godfrey (personal interview, 2011) also argued that the Federal government is also to blame for the lack of pressure to continue to focus on the ICSPs. For example, this commitment is now considered a soft commitment⁵⁴ by Infrastructure Canada, and the lack of interest in the sustainability discourse and the 'green agenda' is evident in the Federal governments' policies, news releases, parliamentary discussions, and websites.⁵⁵ Nevertheless, despite the Conservative's lack of interest for the ICSPs, the transfer program was extended beyond the original funding period of five years and the funding of environmentally sustainable municipal infrastructure seems to be on track, as previously explained in Chapter 4.⁵⁶

Contrary to Godfrey's assessment about the decision of the Oversight Committee, the Association argues that: (a) Ontario's municipalities are in a reporting leadership position compared to their peers across Canada; (b) evidence shows that municipalities

efforts on areas that need the most improvement" (British Columbia Ministry of Community Services, 2007).

⁵⁴ From the perspective of Infrastructure Canada, both the CIPs and the ICSPs are soft commitments. This means that municipalities will not have their allocations withheld if they fail to meet the commitment. As one interviewee from the Department explained, "I want to have a battle on what I can win, [for example] those related to the financial data, but for the other [requirements] that are barely defined in the agreements there is not much more that can be done" (GT-219, personal interview, 2009).

⁵⁵ For example, a search for ICSP and sustainability in Infrastructure Canada's website returns documents that are either related to the Gas Tax or that were published before the Conservatives came to power. In the previous government's website there was a section dedicated to ICSP resources that is no longer available.

⁵⁶ The progress achieved to date on the program's objectives will be further explored in Chapter 6 and in the next section on the program evaluations.

are developing ICSPs; (c) they fully support their members in the process; and (d) they implement the ICSPs philosophy in their own policy development (GT-310, personal communication, 2012). As one interviewee explained at length:

“While the Federal government recognized the planning requirements already in place in Ontario, many municipalities have decided to develop ICSPs voluntarily as they see the benefits of sustainable growth. This includes communities across the Province, north and south, and both rural and urban. Among them is the United Counties of Leeds and Grenville which is developing what will be the largest ICSP in Canada. [At the same time,] the AMO promotes the development of ICSPs. We have our online toolkit and we will soon be launching a councillor training seminar that focuses on barriers to sustainability. [Moreover] we continue to approach all forms of policy development using this lens to ensure the cultural, environmental, social and economic viability of our municipalities over the long-term” (GT-310, personal communication, 2012).

Evidence of the support provided by the AMO to municipalities for both the capital investment plans and the sustainability requirements can be found in their annual expenditure reports. For example, according to the reports, in 2008 the AMO expanded the online municipal Annual Expenditure Reporting Module to include a section that allowed municipalities to demonstrate how they had met these provisions (AMO, 2008f, p. 12). At the same time, the AMO developed a Sustainability Planning Tool Kit to: “(a) empower all Ontario municipalities to move towards greater sustainability; (b) provide ‘lessons learned’ about successful initiatives of other Ontario municipalities; (c) enable any municipality to self-diagnose its stage along a ‘sustainability continuum’; and (d)

provide practical sustainability tools and options (AMO, 2008g, p. 11).”⁵⁷ In late 2008 and early 2009 the AMO also provided municipal senior staff and councillors with training opportunities by hosting “Moving Beyond PSAB” and Tool Kit training sessions that were attended by representatives of approximately 30% of the municipalities (AMO, 2009b, pp. 14-16).

Prior to the 2009 dateline, according to the AMO (2008f, p. 12), most municipalities focused their efforts related to the CIPs “on developing inventories for compliance with the tangible capital assets component of the PSAB standards (PS 3150), as well as developing asset management plans and their annual budgets.” After the 2009 reporting cycle all municipalities reported having PSAB compliant financial statements. Moreover, , more than 51 per cent of the municipalities reported already having a capital budget based on lifecycle costing, and 46 per cent reported having a full Asset Management Plan in place (AMO, 2010a, p. 16).

In relation to the ICSPs, by June 2008 some of Ontario’s municipalities had already “initiated one or more sustainability-related planning processes, such as strengthening official plans, enacting environmental management plans, developing

⁵⁷ More specifically, the thirteen tools in the Sustainability Planning Kit provide municipalities with practical advice regarding, for example: how to make the case for new sustainability planning; how to engage key stakeholders and the community as a whole; how to link sustainable planning with the new accounting practices related to the PSAB and the requirement of a CIP; and how to collaborate as a group of municipalities to capture and effectively utilize federal gas tax funding (AMO, 2008b). For the full text of the Sustainability Planning Toolkit and other relevant information see AMO (2010f).

ICSPs, and/or engaging in the on-going implementation of projects and programmes supportive of sustainability,” and others were in their early planning stages (AMO, 2008a, p. 1). Furthermore, according to an interviewee, it would seem that in Ontario smaller communities have been more willing to embrace the principles of the ICSPs by going above and beyond their official plans (GT-217, personal interview, 2009).

Nevertheless, while more than 90 per cent of municipalities had complied with the requirement by the 2009 dateline, municipalities reported facing several barriers to the design and implementation of the ICSPs (AMO, 2010a, p. 17). As the AMO documented in their 2009 Annual Expenditure report, the most significant barriers are: “(1) economic challenges – in particular for municipalities that are experiencing industry closures, have limited future economic development opportunities, or have a declining population and tax base; (2) human resources limitations – municipalities’ focus on ensuring compliance with PSAB standards can limit their capacity to develop other aspects of sustainability, especially in smaller municipalities; (3) staff turnover – in particular among senior staff and those in leadership positions, as well as council changes” (AMO, 2010a, p. 17).

Outcome Measures and Aggregate Outcomes Report

The MFA stipulates that, as part of their annual expenditure report, municipalities would be required to report on the expected outcomes of their Gas Tax Fund investments

using a set of core indicators that would be developed by the Oversight Committee.⁵⁸ These indicators would be linked to the program's expected outcomes and outputs corresponding to the eligible project categories (AMO, 2005d, p. 25). In 2007, to help the signatories with this task, Infrastructure Canada developed a performance measurement approach that identified appropriate outcomes that could meet the reporting requirements for the Gas Tax Fund.⁵⁹ Moreover, after considering the "broad array of municipal project types, the reliability and relevance of net project achievement data, and the shortcomings of existing national and provincial reporting databases," the report recommended that under the approach municipalities used, wherever possible, "existing data collection, analysis, and reporting information" (Infrastructure Canada, 2007b, p. 1).

Following the recommendations of Infrastructure Canada, in Ontario the Oversight Committee consulted with municipalities and associations already working on benchmarking and measurement to identify the most appropriate, and already available, indicators. The Committee was interested in avoiding duplication, the need to collect new data, and placing an unacceptable reporting burden on municipalities with limited resources and/or capacity. In 2007 they announced that municipalities would be allowed to use the "existing measurement frameworks to report on the investments, including the

⁵⁸ The indicators were not defined in the Agreement because the Government wanted to avoid imposing them (GT-303, personal interview, 2011).

⁵⁹ This performance framework outlines the link between investments, outputs, and outcomes in three steps: (1) investments in municipal infrastructure create desirable outputs; (2) these outputs are measured through core indicators; (3) these indicators measure the contribution of the investment towards the desired environmental outcomes of the program. For the full report see Infrastructure Canada (2007b)

municipal performance and measurement program (MPMP),⁶⁰ certificate of approvals,⁶¹ and, in the case of transit, data annually submitted to the Canadian Urban Transit Association (CUTA)” (AMO, 2007b, p. 1).⁶² Moreover, recognizing that there was an information gap with respect to road and bridge investments, they announced that they had developed, in conjunction with the Ontario Good Roads Association, “a simple tool that would provide real measurable results on the reduction of CO₂ emissions, a known greenhouse gas” (AMO, 2007b, p. 2).

Even though the Oversight Committee attempted to make the outcomes reporting framework as reliable as possible, the AMO (2009d, pp. 8-9) acknowledges that it has several limitations: (1) while there are comprehensive checks and balances built into the framework, the process lacks a formal audit; (2) isolating the program’s specific impact can be difficult with projects that have multiple sources of funding; (3) the funded projects may be affected by a variety of factors, such as policy or administrative decisions, which may influence the data; (4) the data do not include the impacts of a project in its lifecycle, cradle to grave, and they do not capture the potential

⁶⁰ MPMP is a measurement and reporting system that includes twelve service areas that Ontario municipalities are required to report on each fiscal year. For more information see Ontario Ministry of Municipal Affairs and Housing (2009)

⁶¹ Certificate of Approvals are issued by the Ministry of the Environment and are required for any facility that wishes to operate lawfully and releases emissions to the atmosphere; discharges contaminants to ground or surface water; provides potable water supplies; or stores, transports or disposes of waste. For more information see Ontario Ministry of the Environment (2010).

⁶² Other approved sources of information for Community Energy System projects are the municipality’s hydro bills and energy audits For Water projects is the Drinking Water Surveillance Program (DWSP), which a voluntary, science-based, monitoring program developed by the Ministry of the Environment. This program is operated in cooperation with participating municipalities and monitors drinking water quality. For more information see Ontario Ministry of the Environment (2009)

environmental inefficiencies of improper replacement; and (5) the framework is not capable of measuring the program's impact on those things that require qualitative assessments, such as the progress on ICSPs.

Once the indicators were identified, the AMO expanded the municipal Annual Expenditure Reporting Module to allow municipalities to report the outcomes of their investments. Initially, for the 2007 Annual Expenditure Report, municipalities were only required to complete at least one measure for all projects funded from the inception of the program (AMO, 2008f, p. 11).⁶³ For subsequent years, municipalities were required to provide detailed outcomes measures from all projects that had been completed by the end of a reporting year. According to the MFA, municipalities are also required to make these outcomes reports publicly available.⁶⁴

In September 2009 the AMO released, as scheduled, the Aggregate Outcomes Report.⁶⁵ The objective of this report was to identify both the intermediate and ultimate outcomes of the federal Gas Tax Fund since the beginning of the program's implementation. Intermediate outcomes referred to issues related to "intergovernmental collaboration, incremental infrastructure spending, municipal planning capacity, and

⁶³ For a detailed list of approved indicators for Transit see Appendix C.

⁶⁴ This requirement has been met in different ways. For example, the Town of Markham has posted their outcomes on their website, while the Town of Uxbridge has said to contact them directly to request it (GT-300, personal communication, 2010). Those municipalities that have ongoing but not completed projects do not have outcome reports available.

⁶⁵ For the full report see: AMO (2009d).

communications,” while the ultimate outcomes referred to cleaner water, cleaner air and reduced greenhouse gas emissions (AMO, 2009d, p. 6). The report identifies quantifiable improvements in the achievement of all the programs’ objectives. In relation to the intermediate outcomes, the report concludes that the Gas Tax Fund has, among other things, “promoted dialogue, stakeholder engagement, local and inter-governmental partnerships, local capacity building, heritage conservation and long-term planning” (AMO, 2009d, p. 1). For the ultimate outcomes, the figures in the report show that in Ontario the funding has, among other things,: “(1) improved drinking water in 29 municipalities; (2) improved wastewater treatment for more than 40,000 households; (3) diverted 71,000 tonnes of waste from landfills; (4) expanded composting programs to 270,000 households; (5) improved 2,000 kilometres of roads; and, (6) decreased energy demands by over 7.65 million kilowatt hours” (AMO, 2009d, p. 1).

Gas Tax Fund Program Evaluation

Across the Government of Canada, according to the Treasury Board Secretariat (2009), “evaluation is the systematic collection and analysis of evidence on the outcomes of programs to make judgments about their relevance and performance, and to examine alternative ways to deliver them or to achieve the same results.” Considering the potential contribution of this tool to a program’s accountability framework, as previously explained in Chapter 2, the Gas Tax agreements included the requirement of a joint formative evaluation of the program with the Federal government. In the case of Ontario

this resulted in a Canada-AMO joint evaluation and a Canada-Toronto joint evaluation.⁶⁶ The results of all the provincial joint evaluations were then incorporated in a national summative evaluation completed by Infrastructure Canada.

The joint evaluation, which was conducted between June and December of 2008, “was designed to provide an assessment of cost effectiveness, outline the progress made towards intended outcomes and to develop recommendations to improve the Gas Tax Fund during its extended years (AMO, 2009b, p. 13).” The central questions that guided the evaluation were: “(1) What is the success/progress achieved to date? (2) Are there any indicators that the programs are encountering problems that prevent them from meeting their objectives, within budget and without unwanted outcomes? (3) Are the most appropriate and efficient means being used to achieve objectives?” (AMO, 2008c). A list of key conclusions and recommendations from the evaluation can be found in Table 10.

⁶⁶ The Canada-Toronto evaluation will be overview in Chapter 7. The Canada-AMO evaluation was completed by Performance Management Network (AMO, 2008c).

Table 10: Key Conclusions and Recommendations from the CANADA-AMO Evaluation of the Gas Tax Fund

CONCLUSIONS	RECOMMENDATIONS
<ul style="list-style-type: none"> • High satisfaction with the Agreement and administration of the fund • Predictable funding has improved municipal planning • Most completed projects have led to environmental benefits • The funds have resulted in incremental capital spending that has helped to address Ontario's infrastructure deficit • The governance structure has created beneficial co-operative relationships between the orders of government, particularly the federal and municipal orders • The AMO's program management and administration of program has been cost effective 	<ul style="list-style-type: none"> • Consideration should be given to risk-based audit requirements, and to adding other types of infrastructure • While recognizing that the program should continue to support projects in the local roads and bridges category, consideration could be given to limiting the proportion of funding for this category to ensure municipalities invest funds in projects that make significant contributions to environmental benefits • Continued requirements for incremental capital spending • Review the possibility of establishing a base funding amount over and above the per capita funding allocation • Regular updating of the per capita funding formula to reflect recent population data • The AMO's program management and control process should be used as a model • Review the terms and conditions relating to the use of municipal employees • Outcomes reporting requirements should not unduly affect the decisions of municipalities to undertake certain types of projects because reporting is easier

Source (AMO, 2009b, pp. 13-14)

The Agreements also stipulated that Infrastructure Canada would be responsible for conducting a national summative evaluation of the program by June 30, 2009. This evaluation built on the thirteen joint evaluations conducted throughout the Country, and provided additional review on the use of funds, program management and delivery, and

capital spending commitments. A list of key conclusions and recommendations from the evaluation can be found of Table 11.

Table 11: Key Conclusions and Recommendations from the National Summative Evaluation of the Gas Tax Fund

CONCLUSIONS	RECOMMENDATIONS
<p>The program is relevant:</p> <ul style="list-style-type: none"> • It responds to a demonstrable and continued need. • The objectives, the shared responsibility, and the accountability framework align with federal, provincial, territorial, and municipal investment priorities, roles and responsibilities • Program flexibility is a valued asset for all stakeholders • Funding predictability is a key component for sustainable infrastructure investment. <p>The program has demonstrated effectiveness in achieving expected outcomes:</p> <ul style="list-style-type: none"> • Intergovernmental collaboration has been fostered • Capital spending commitments by all parties are likely to be met • The program has contributed to improve municipal planning capacity • Communications of the programs' results needs to be improved <p>Management of the program has been efficient:</p> <ul style="list-style-type: none"> • Up-front funding objectives have been met • Administration of the programs has been cost-effective 	<ul style="list-style-type: none"> • Facilitate sharing of best practices to address the capacity issues of smaller recipients • Continue to support outcomes reporting • Continue to support long-term sustainable municipal planning • Review and simplify the requirements for capital spending commitments • Improve communications of the program's results

Source (Infrastructure Canada, 2009c, pp. vii-viii)

CONCLUSION

This chapter first focused in explaining why and how in Ontario there were three signatories to the Agreement. This question was answered by looking at Ontario's political context with an emphasis on the changes to the provincial-municipal dynamics in 2004 and 2005. Of particular importance was the election of the Liberal Party of Ontario at the end of 2003, the negotiations for contentious issues, the signing of the new MOU between the Province and the AMO, and the signing of the new City of Toronto Act. These developments and the impact they had on the final draft of the Gas Tax Fund agreement made evident the influence that the context can have on the policy design process.

While the Province had originally agreed to be involved in the administration of the Gas Tax Fund, the explained dynamics resulted in it pulling out of the negotiating table unexpectedly. Infrastructure Canada, under a very tight dateline, was forced to find an alternative. In this case, the department decided to use a backward mapping approach, allowing the Province to suggest an alternative and moving forward with the AMO once the legality of their involvement had been cleared. When the AMO was chosen, the next problem became what to do about Toronto, since the municipality was no longer a member of the Association. The solution, as previously explained, was to have all three parties as signatories. To make this happen, a "very well organized and coordinated" consultation and negotiation process was undertaken with all the parties involved

(GT-301, personal interview, 2011). The success of this process was attributed, in part, to the patience that Infrastructure Canada had waiting for the parties to solve their issues instead of forcing them to take a particular course of actions, and the personal involvement of Godfrey who had an established relationship with Miller (GT-301, personal interview, 2011).

Another issue that was contentious in the case of Ontario was the financial resources; more specifically, the formula that would be used to distribute those resources. In this case, once again, the context was influential in the final outcome. As it was previously explained, while Toronto kept arguing towards ridership and the AMO kept arguing for population two events influenced the ultimate resolution of the dispute. First was the NDP budget deal, which guaranteed Toronto would get more infrastructure resources based on ridership, and then was the urgency to sign a deal before the Liberal government was potentially defeated. Faced with the choice of potentially missing the opportunity to have any kind of agreement, Toronto felt compelled to compromise and agree to the population allocation.

This chapter also focused on identifying the influence of the particular Ontario arrangement on the implementation process with an emphasis on governance, administration, and accountability. Once the Agreements were signed the research suggests that the policy was implemented successfully by the AMO and the

municipalities without major complications. While the governance arrangement was a departure from previous infrastructure funding programs, all parties involved have developed a highly functioning relationship supported by the Oversight Committee. The AMO seems to have been fulfilling its administrator role in an efficient and effective manner, placing Ontario ahead of other provinces in the timing of their response to implementation issues/datelines and reporting requirements.⁶⁷ As one interviewee recalled:

There were several policy development details regarding the program requirements that were specified after the signing⁶⁸ and the AMO, “who was always on top of things and very cognisant of datelines,” immediately communicated the decisions to the municipalities, later gave them the tools to deliver on the commitments, and kept reminding them of when they were due. As a result, Ontario became an implementation driver of the Gas Tax program (GT-303, personal interview, 2011).

Moreover, the Association has utilized its website as a tool to enhance the transparency of its operations by, among other things, making all its annual reports and any administration development related to the Gas Tax Fund readily available. Overall, as one interviewee explained, Ontario municipalities are highly satisfied with the program and the AMO’s performance:

“The level of satisfaction is overwhelming, and it is very rare to have that level of satisfaction because people tend to complain about everything. And [the lack of complaining] is not due to the fact that it is free money because there is a formal [expenditure and accountability] framework [that they have to comply with]” (GT-219, personal interview, 2009).

⁶⁷ Moreover, as previously explained, while AMO does have both an advocacy and administrative role with regards to infrastructure funding, these roles are not mutually exclusive. In fact they have become mutually beneficial as its administration often informs its advocacy and vice versa.

⁶⁸ These details were related to, among other things, what would the requirements be, when would they be due, and what format would they have.

In terms of accountability, the Gas Tax Fund has a very comprehensive accountability framework that seems to be a burden for smaller recipients due to capacity issues. This issue was highlighted by both the Canada-AMO Evaluation and the National Summative Evaluation. Another implementation issue highlighted by both evaluations was the small compliance with the program's communication requirements. In terms of enforcement, both Infrastructure Canada and the AMO have been vigilant about enforcing the reporting requirements when necessary while, at the same time, attempting to provide support for municipalities to avoid having to take drastic actions.

In relation to the amount of change required, one of the policy implementation related variables of the proposed analytical framework in Chapter 2, it could be argued that the Gas Tax Fund required some considerable organizational changes. First, Infrastructure Canada was required to deal directly, for the first time, with a municipality, i.e. Toronto, and to deal with the AMO as the administrator of a federal program. Initially there was much apprehension about how this change would affect the administration of the program, but the findings suggest that this arrangement had no detrimental effect. In fact, because of the newly required working relationship, strong lines of communication were established that have allowed the resolution of emerging issues in a timely and successful manner. As one interviewee argued, "the Gas Tax program in Ontario has created a unique federal-municipal partnership that works; both sides have developed

understanding of each other's issues and have worked together to improve the program since its inception" (GT-310, personal communication, 2012).

Second, while under previous infrastructure programs municipalities were required to get individual project approval before getting the funds, under this program municipalities receive the money up-front and are allowed to bank the funds and accrue interest. While these funding conditions added a level of complexity to the annual municipal financial reporting, and additional work due to the reporting requirements of the program, they eliminated the need for costly and complicated project applications, and the long period of transactions and negotiations that could potentially end with the municipality not getting the funds.

Third, while municipalities were used to dealing with a multitude of infrastructure funding programs that are constantly phased in and phased out, for the first time they had to deal with a program that eventually became permanent. This situation encouraged municipalities to make long-term plans, and allowed them to invest in multi-year funding projects. Long-term planning was also encouraged by the program's CIP and ICSP requirements. From the perspective of Infrastructure Canada the fact that the program became permanent was also a change. As one interviewee argued, the Gas Tax Fund was "the first ever infrastructure program to not be sunset," and since the parameters were not

changed when it was made permanent, the only task of the Department became “running the program rightly” (GT-219, personal interview, 2009).

On the other hand, while in other provinces the Gas Tax Program required organizational changes related to planning because of the ICSPs requirement, in Ontario this change was not required. The process that led to the exception can be characterized as backward mapping as it was the Oversight Committee that raised the issue with Infrastructure Canada. The Department was open to “program and policy improvement” discussions because it was cognizant of the fact that it actually lacked both the legislative authority to require municipalities to draft planning documents and the expertise and capacity to evaluate them once they were completed (GT-303, personal interview, 2011). After many rounds of discussions, which established: (a) the existing planning requirements of the Province, (b) the quality of the municipal planning documents, and (c) the minimum accountability requirements of Treasury Board, the Department decided that the request to use existing planning documents to meet the commitment was “a reasonable approach” (GT-303, personal interview, 2011).

The next two chapters will continue to explore the implementation of the Gas Tax Fund in the Province of Ontario with an emphasis on the policy outputs and outcomes. More specifically, Chapter 6 looks at the expenditure impact of the Ontario arrangement through an analysis of municipal spending of Gas Tax Fund resources, and an

econometric analysis of expenditures in infrastructure between 2000 and 2008. On the other hand Chapter 7 looks at other potential impacts, including allowing municipalities to make long-term plans, choose the type of green infrastructure projects that best suit their needs, and having a closer relationship with the Federal government, through a case study of the City of Ottawa and the City of Toronto.

CHAPTER 6

ONTARIO II: MUNICIPAL IMPLEMENTATION - A QUANTITATIVE ANALYSIS

INTRODUCTION

This chapter provides a quantitative analysis of the use of the Gas Tax Funds by municipalities in the Province of Ontario. While Chapter 5 focused on the implementation of the program at the provincial level, this chapter focuses on how Ontario municipalities implemented the program by looking at their infrastructure expenditures. The chapter proceeds in two sections. One section focuses on the policy outputs, and the other one on the short-term impact of the program on their expenditure decisions. In the first section, the chapter provides a background on the Gas Tax Fund allocation in Ontario and the eligible projects, and it outlines policy outputs by analyzing the municipal expenditures of the funds between 2005 and 2008 by eligible project category. Analysis of these data allows for the understanding of the types of projects that have been completed, the amount of Gas Tax Fund resources that have been spent, and the total value of the municipal investments. In the second portion, the chapter examines the impact of the Gas Tax Fund on infrastructure expenditures through an econometric analysis. More specifically, this analysis is based on a sample of 120 municipalities in

Ontario and it covers eight fiscal periods, i.e. four before the implementation of the program (2001 to 2004), and four after (2005 to 2008). The dependent variable is the change in municipal infrastructure spending. These two sections address the second and third research questions of this dissertation: *(a) To what extent were the actions of implementing officials consistent with the objectives and procedures outlined in the original policy announcement and the Gas Tax Fund Agreement?; (b) To what extent were the policy objectives attained over time? To what extent were the outputs and impacts consistent with the objectives?*

POLICY OUTPUTS - MUNICIPAL INVESTMENTS

Money Allocation

Under the Ontario Gas Tax Fund Agreement,¹ the Federal government agreed to contribute \$1,865.50 million over the original 5 years of funding (2005-2010). The process to achieve consensus on the Gas Tax Fund sharing formula in the Province, as explained in Chapter 5, was not easy because the AMO and the City of Toronto could not reach an agreement.² After a heated debate over several months both parties agreed to an allocation based on Ontario's population, according to the 2001 National Census data from Statistics Canada.³

¹ In this chapter this agreement will be subsequently referred as "the Agreement." For the full text, see Canada, Ontario, AMO, City of Toronto (2005).

² In this chapter 'City of Toronto' and 'Toronto' are used interchangeably. At the same time, AMO will also be referred ss "the Association."

³ The 2001 Census data were also the source used to determine the national allocation among Canada's provinces and territories. Of Ontario's 445 municipalities, only 444 receive the allocation because in the

In April 2005, when the decision was taken, Roger Anderson, the AMO's president, remarked that the "allocation by population is fair and equitable, [because it ensures] that people in municipalities of all sizes, in every part of Ontario, will benefit equally from this important New Deal initiative" (AMO, 2005c). The breakdown of Canada's total contribution between the recipients is as follows: \$1,452.5 million for Ontario municipalities (29.05% of the total allocation); \$407.30 million for Toronto (8.15%); and \$5.80 million for Local Services Boards/Roads Boards (0.12%) (Canada, Ontario, AMO, City of Toronto, 2005).⁴ For a detail breakdown by fiscal year see Table 12 below.

2001 Census the Township of Cockburn Island had zero population. Given that accurate population data for Unincorporated Areas are not available they receive funds based on the kilometres of public roads managed for roads projects by Local Roads Boards.

⁴ For a detailed list of the amount that was allocated to each municipality see link available at AMO (2010d).

Table 12: Ontario Gas Tax Fund Allocation by Fiscal Year 2005-2010

FISCAL YEAR	TOTAL ALLOCATION ¹	ALLOCATION ADMINISTERED BY		
		AMO ²	ONTARIO ³	TORONTO
2005-2006	\$223.9 million	\$174.3 million	\$696,000	\$48.9 million
2006-2007	\$223.9 million	\$174.3 million	\$696,000	\$48.9 million
2007-2008	\$298.5 million	\$ 232.4 million	\$928,000	\$65.1 million
2008-2009	\$373.1 million	\$ 290.5 million	\$1.161 million	\$81.4 million
2009-2010	\$746.2 million	\$ 581.0 million	\$2.321 million	\$162.9 million
TOTAL	\$1865.5 million	\$1,452.6 million	\$5.802 million	\$407.2 million

Notes: (1) Amount includes the allocation for Toronto; (2) all of Ontario municipalities except Toronto; (3) allocation for Unincorporated Areas. Source: Canada, Ontario, AMO, City of Toronto (2005).

Where two tiers of municipal government exist, the allocation is shared 50:50 between upper-tier municipalities and lower-tier municipalities. More specifically, the upper-tier government gets half of the allocation for the total number of people in the tier, and each lower-tier government gets the other half based on their individual population. This allocation formula was chosen as recognition of the different infrastructure needs and services provided by each tier, as well as the fact that local councillors are regional councillors (GT-216, personal interview, 2009). Tier governments have the capacity to transfer their allocation back and forth to each other. As one interviewee explained, “some upper tiers have taken advantage of this flexibility to give more funds to their lower-tier municipalities, others have partnered with the lower-tier municipalities on

joint projects, and others have decided to keep the funds to put the money towards regional projects” (GT-219, personal communication, 2009).

The first payment to the municipalities was made in November 2005. In that year, municipalities received the full amount of their 2005-2006 allocation. In the following years, as previously explained in Chapter 4, municipalities received their annual allocation in two equal payments in July and November. In early 2010 municipalities received an extra one-time payment from the proceeds of the interest accumulated by the AMO on the Gas Tax Fund resources over the 2005-2009 fiscal periods. According to the AMO (2010b), the interest “accrued mainly in 2005 while municipalities were executing Municipal Funding Agreements (MFA) with the AMO,” and they were distributed on a per capita basis using population data from the 2001 Census.⁵ Once municipalities receive their allocations they have up to three years to spend the funds on eligible projects (AMO, 2005e).⁶

As previously explained in Chapter 4, Budget 2007, extended the Gas Tax funding from 2010 to 2014 guaranteeing that the Federal government would provide Ontario communities with \$746.7 million a year, for a total of \$2.99 billion. At the time

⁵ As of December 31, 2007 the cumulative interest accrued on the money received equalled \$1,845,448.00. These resources can only be used for eligible costs for eligible projects under the Gas Tax Fund.

⁶ All the Gas Tax resources from the original five year funding period (2005-2010) must be expended no later than December 31, 2012.

of the announcement, representatives from the three signatories in Ontario expressed their satisfaction with the extension:

“When this agreement was first signed, the McGuinty government took an historic step and enabled our municipal partners to work directly with the Federal government on deciding the best way to share federal gas tax funding. [...] Through this extension agreement, we are continuing to ensure that federal gas tax funds are invested directly in Ontario’s communities of all sizes” (Honourable Jim Watson, Ontario’s Minister of Municipal Affairs and Housing, as quoted in Infrastructure Canada, 2008).

“All three orders of government, federal, provincial and municipal, are working together to create employment opportunities and to strengthen our communities economically and environmentally. [...] This extension ensures that federal gas tax funding contributes to hundreds of infrastructure investments each year, right across Ontario” (Peter Hume, President of the Association of Municipalities of Ontario, as quoted in Infrastructure Canada, 2008).

“The extension of Gas Tax funding from 2010 to 2014 continues the partnership between the City and the Government of Canada in providing long-term investment in public transit for the City of Toronto. [...] Investment in public transit and our Transit City proposal is City Council’s top infrastructure priority” (David Miller, Mayor of the City of Toronto, as quoted in Infrastructure Canada, 2008).

Under the extension, the AMO’s allocation was \$589.9 million a year for Ontario municipalities, excluding Toronto, which represented \$2,359.5 million over the four years; Toronto’s allocation was \$154.8 million a year, for a total of \$619.1 million; and the allocation of Unincorporated Areas was \$2.1 million a year, which amounted to \$8.4 million (Canada, Ontario, AMO, City of Toronto, 2008). The successful negotiations for the extension of the schedule of payments for Ontario were completed in December 2008.

The signatories agreed to the existing allocation per capita, but the population data were updated to the 2006 Census (AMO, 2008f).

Once the Gas Tax Fund was made permanent with the passage of Bill C-13, “Keeping Canada’s Economy and Jobs Growing Act,” the allocation for all of Ontario municipal governments was set at \$750 million a year (AMO, 2011c).⁷ The existing MFA between the AMO and each municipality were amended in 2010 after the Gas Tax Program Evaluation was completed in 2009.

Eligible Projects

In Ontario, the standard list of eligible projects that is found in all the provincial agreements, as detailed in Chapter 4, includes two extra categories (Canada, Ontario, AMO, City of Toronto, 2005).⁸ First, there is ‘Capital Investments in Public Roads’ for Unincorporated Areas, which includes granular lifts, granular stockpiles, culvert replacements, brushing/clearing, ditching, road realignments, resurfacing, and safety improvements. Second, there is ‘Local Roads, Bridges, and Tunnels,’ which includes projects related to road resurfacing, road or structure rehabilitation, road drainage improvements, traffic signal installation, and installation of turning lanes. However,

⁷ As a result, new permanent agreements would have to be negotiated and, according to the AMO (2011), this “process will be tied in with federal consultations with provinces, territories, the FCM and other stakeholders to build a long-term plan for investing in public infrastructure.” The AMO will take this opportunity to work with the FCM to ensure the funds are indexed so that investments can keep pace with the pressures of economic and population growth.

⁸ The standard eligible categories are: public transit, water, wastewater, solid waste, community energy systems, capacity building, and active transportation infrastructure.

while all municipalities can choose the projects they want to fund from the list without restrictions, only municipalities with 2001 National Census populations under 500,000 are permitted to invest in the ‘Local Roads, Bridges, and Tunnels’ category. Moreover, they are required to submit a plan in advance intended to ensure that the municipality and the Federal government “will be able to report on the environmental benefits of the investment, such as improved fuel efficiency, the protection of waterways and other environmental outcomes” (AMO, 2005a). Table 13 below summarizes the type of outputs covered under this category and the expected sustainable outcome.

Table 13: Expected Output and Outcomes for Projects Funded Under the Local Roads and Bridges Category

OUTPUT	OUTCOME
Projects involving the restoration and rehabilitation of existing assets to extend the asset lifespan by several years	Reduced energy requirements contributing to cleaner air and/or reduced greenhouse gas emissions
Projects incorporating significant quantities of recycled and reclaimed materials (e.g. cold-in-place pavement recycling, expanded asphalt recycling and granular base reclamation)	Reduced energy requirements contributing to cleaner air and/or reduced greenhouse gas emissions
Projects that significantly reduce travel times and distances (e.g. new roads and bridges that reduce congestion by increasing travel speeds on the road network, create travel time savings and minimize travel distances)	Reduced energy requirements contributing to cleaner air and/or reduced greenhouse gas emissions
Installation of turning lanes	Reduced energy requirements contributing to cleaner air and/or reduced greenhouse gas emissions
Traffic signal installation, traffic signal upgrading and traffic signal co-ordination projects	Reduced energy requirements contributing to cleaner air and/or reduced greenhouse gas emissions
Resurfacing an unpaved road	Reduced energy requirements contributing to cleaner air when an unpaved road is appropriately resurfaced as opposed to full hot mix paving

Source: Schedule C of the Agreement (Canada, Ontario, AMO, City of Toronto, 2005)

While this category had to be included because the AMO recognized that for many municipalities in the Province this was the most pressing infrastructure need, it was

not easy to reach consensus on the 500,000 population-threshold (AMO, 2005a). There were several cities, such as Hamilton, that wanted to use the funding for roads and bridges that lay just above the population cut-off that strongly, but ultimately unsuccessfully, debated their case during the negotiations (Infrastructure Canada, 2007c). Population was also used to restrict the number of categories which municipalities could choose to address with their projects. Municipalities with a population of 500,000 or more are limited to two eligible project categories plus ‘Capacity Building.’ These municipalities include: Durham Region, Peel Region, York Region, the City of Mississauga and the City of Ottawa.

Expenditures Decisions

As previously explained in Chapter 4, one of the key guiding principles of the Gas Tax Fund policy design process was the implementation of a “flexible approach” (Infrastructure Canada, 2010). As a result, municipalities were given the opportunity to make planning and expenditure decisions that could maximize their welfare constrained only by the list of eligible projects and expenditures. Moreover, municipalities also have the option of using funds: “(a) towards the full costs of a project; (b) to support a project that benefits from other funding sources; (c) to bank revenue up to three years, for future projects; (d) to finance long-term debt for eligible projects; and (e) to accrue interest on revenue, which can then be applied toward the administrative costs of implementing the Agreement or to increase the amount of revenue available for projects” (AMO, 2011c,

pp. 6-7).⁹ While these policy features make reporting on program expenditures challenging, municipalities count with the support of the AMO's online reporting module, as previously explained in Chapter 5. The information from these individual reports is aggregated every year by the AMO, and it is published on their Annual Expenditure Report.

To quantify the expenditure decisions of municipalities in Ontario, this section evaluates: (a) the interest accrued by municipalities that chose to bank all, or portions of, the resources; (b) the allocation of accrued interest to administration costs; and (c) the municipal policy outputs, which are defined as the projects funded with Gas Tax resources. More specifically, for the policy outputs, it outlines the municipal expenditures of the funds between 2005 and 2008 by eligible project category.

a) *Outputs for April 1, 2005 to December 31, 2005*¹⁰

As of December 31, 2005 51 Ontario municipalities had allocated \$23.6 million of the total \$148.9 million that had been transferred by the AMO for this

⁹ This means that accounting for the funds in the Ontario's Financial Information Return (FIR) requires a multi-step process (GT-308, personal communication, 2009) :

- 1) When funds are received from the AMO, they go directly to the Deferred Revenue Account - shown on Schedule 60 (Continuity of Reserves and Reserve Funds).
- 2) Where there are expenditures meeting the specified criteria, the funds are transferred from Schedule 60 to Schedule 52 (Sources of Capital Fund Financing and Expenditures)
- 3) If the expenditure meets certain criteria, Gas Tax Funds can also be transferred to Schedule 10 (Revenue Fund Receipts)
- 4) The unused balance remains in Schedule 60 and earns interest.

¹⁰ This section draws primarily from the AMO's 2005 Annual Expenditure Report (AMO, 2006b)

period to 82 environmentally sustainable municipal infrastructure projects.¹¹ This left a balance of \$125.7 million for future investments.¹² This amount accrued over \$401,000 in interest, and municipalities applied \$14,400 to their administrative costs. The total estimated cost for the projects funded was \$729 million, and 90% of these were expected to be multi-year projects. In this period, there were 81 municipalities that did not receive their allocation because they did not have a fully executed MFA.¹³

¹¹ Of the 82 projects reported 13 would be undertaken in 2006 utilizing 2005 Gas Tax funds, and they represented an investment of \$3.4 million. The project breakdown is as follows: Solid Waste (2); Transit (2); Roads (7); Wastewater (1); and Water (1).

¹² As previously explained, according to the Agreement municipalities can bank the funds for future year projects that meet the terms and conditions of the Agreement, or can use them to finance long term debt. Moreover, they can use the interest accrued on the funds towards administrative costs of implementing the Agreement or increase the amount of revenue available to invest in eligible projects.

¹³ Once the agreements were signed, these municipalities received a payment for the full amount of their entitled allocation for this period.

Table 14: Municipal Expenditure of 2005 Funds by Eligible Project Category

	Number of Projects	% of Total Number of Projects	2005 Gas Tax Funds	% of Total 2005 Funds	Total Project Cost
Capacity Building	3	3.66	\$91,236	0.39	\$200,233
Energy Systems	5	6.10	\$2,811,086	11.92	\$5,683,693
Local Roads	36	43.90	\$4,427,544	18.77	\$25,348,878
Public Transit	19	23.17	\$11,325,873	48.02	\$644,920,858
Solid Waste	4	4.88	\$2,117,125	8.98	\$22,366,758
Wastewater	8	9.76	\$2,332,236	9.89	\$27,175,987
Water	7	8.54	\$479,298	2.03	\$3,308,251
TOTAL	82	100.00	\$23,584,397	100.00	\$729,004,659

Source: (AMO, 2006b)

As Table 13 shows above, the largest number of projects funded with 2005 Gas Tax funds were undertaken under the 'Local Roads and Bridges' category (36 projects), followed by 'Public Transit' (19 projects). While the number of 'Local Roads and Bridges' projects represents 44% of the total number of projects funded, it only represents 19% of the total Gas Tax fund investment, \$4.4 million. On the other hand, the largest investment, \$11.3 million, was made in 'Public Transit,' which represents 48% of the total 2005 investment. This is an indication of the large costs associated with this category. There were only 3 projects funded under the 'Capacity Building' category, which also accounted for the smallest portion of the total investment, \$91,000 or 0.39%.

b) *Outputs for January 1, 2006 to December 31, 2006*¹⁴

As of December 31, 2006, Ontario municipalities had allocated \$145.5 million of the total \$196 million that had been transferred by the AMO for this period to 506 environmentally sustainable municipal infrastructure projects.¹⁵ The total estimated value of the investment in infrastructure improvements represented by the cumulative number of projects undertaken or underway since the start of the program, over 555, was \$1.4 billion.¹⁶

Table 14 below shows that in this period, once again, the category of 'Local Roads and Bridges' accounted for the largest number of projects funded. A total of 332 projects were undertaken, which represented an increase of 822% over the previous year. While in 2005 the expenditures under this category did not represent the largest portion of the total Gas Tax investments for the period, in this case it represented over 64%. The number of projects undertaken in the other categories was over 30 for 'Public Transit,' 'Water,' and 'Wastewater,' and around 20 for 'Capacity Building,' 'Solid Waste,' and 'Energy Systems.' The total number of projects funded represented an increase from the previous year of over 500%, with 'Public Transit' representing the smallest increase of just 79%.

¹⁴ This section draws primarily from the AMO's 2006 Annual Expenditure Report (AMO, 2007f)

¹⁵ This number reflects the total number of projects that were allocated 2006 Gas Tax Resources. These projects could have been started in the previous years, and could have been previously funded with 2005 resources. Projects completed before January 1, 2006 are not included.

¹⁶ Of the reported projects, 5 (Solid Waste'- 1 and 'Local Roads and Bridges'- 4) would be undertaken in 2007 utilizing 2006 Gas Tax funds.

Table 15: Municipal Expenditure of 2006 Funds by Eligible Project Category

	Number of Projects ¹	% of Total Number of Projects	2006 Gas Tax Funds	% of Total 2006 Funds	Total Project Cost ²
Capacity Building ³	18	3.56	\$701,023	0.48	\$1,832,299
Energy Systems	26	5.14	\$4,004,481	2.75	\$18,840,613
Local Roads	332	65.61	\$93,645,300	64.35	\$325,902,963
Public Transit	34	6.72	\$10,485,906	7.21	\$831,209,766
Solid Waste	24	4.74	\$23,022,543	15.82	\$84,868,963
Wastewater	37	7.31	\$10,660,617	7.33	\$70,506,143
Water	35	6.92	\$2,998,077	2.06	\$35,050,960
TOTAL	506	100.00	\$145,517,947	100.00	\$1,368,211,706

Notes:

¹ Only includes projects that reported using 2006 Gas Tax resources. The breakdown of projects that were reported but did not use 2006 resources was as follows: Energy System (1), Transit (14), Local Roads (24), Solid Waste (3), Wastewater (5), and Water (2).

² Includes the cost of all the projects funded since the program started in 2005.

³ Two projects classified in 2005 as Capacity Building were re-classified in 2006: one as a Solid Waste project and, one as Local Roads.

Source: (AMO, 2007f)

Due to the different costs associated with each type of project category, and despite the similar number of projects undertaken under each, the percentage of the total investment they represented varied considerably. Again, 'Capacity Building' represented the smallest investment, just 0.48%, followed by 'Water' at about 2%. Despite accounting for only 7.21% of the total 2006 Gas Tax Funds investment, 'Public Transit' was still the category with the largest projected total

project cost at over \$831 million. The smaller total project cost projection was again 'Capacity Building' with over \$1.8 million.

The total aggregate municipal allocation in this period was larger than it had been stipulated in the Agreement because it included the transfer to the 81 municipalities that executed the MFA in 2006. The first instalment of the 2006 allocation was made by the AMO in July to 439 municipalities.¹⁷ The second instalment, which should have been paid by November, was delayed until January 2007 because Canada postponed the second transfer to the AMO.¹⁸ The delay was imposed, as previously explained, because by October 2006 88 municipalities had failed to submit their annual audited statements.

The municipal aggregate closing balance was \$181.7 million. This amount includes the accrued interest of over \$5.5 million gained by municipalities over their reserves. In this period, 60 municipalities applied \$188,900 from this interest to offset the costs they incurred in the administration of the Fund. Moreover, several municipalities utilized their allocations as a revenue stream to finance over \$13 million in long-term debt for priority infrastructure projects.

¹⁷ The allocation to the remaining four eligible municipalities was withheld because they failed to submit their 2005 annual expenditure report. By September all municipalities had received their transfers.

¹⁸ While the payment to two municipalities was delayed due to their failure to provide their statements, by the end of January all the funds had been allocated.

c) *Outputs from January 1, 2007 to December 31, 2007*¹⁹

As of December 31, 2007 Ontario municipalities had allocated \$215.9 million of the total \$230 million that had been transferred by the AMO for this period to 591 environmentally sustainable municipal infrastructure projects.²⁰ Moreover, over the course of the Agreement, they had invested \$511 million on 1007 projects, and the total estimated value of this investment was \$2 billion.

As Table 16 shows below, in this period, the total number of projects funded (591) was similar to the total number of projects funded with 2006 resources (506). While in the 2006 the total number of projects represented an increase of over 500% from the previous year, in this period it was only 17%. Interestingly, the category that experienced the largest growth was 'Transit' (68%), which was the category with the smaller growth in the last period. On the other hand the two categories with the highest growth in 2006, 'Local Roads and Bridges' (over 800%) and 'Solid Waste' (over 500%), had little and no growth in 2007 (7.8% and 0% respectively).

¹⁹ This section draws primarily from the AMO's 2007 Annual Expenditure Report (AMO, 2008f)

²⁰ This number reflects the total number of projects that were allocated 2007 Gas Tax Resources. These projects could have been started in the previous years, and could have been previously funded with 2005 and/or 2006 Gas Tax Resources. Projects completed before January 1st, 2007 are not included.

Table 16: Municipal Expenditure of 2007 Funds by Eligible Project Category

	Number of Projects ¹	% of Total Number of Projects	2007 Gas Tax Funds ²	% of Total 2007 Funds	Total Project Cost ³
Capacity Building	26	4.40	\$1,282,710	0.59	\$5,724,069
Energy Systems	28	4.74	\$4,514,343	2.09	\$53,543,874
Local Roads	358	60.58	\$104,730,678	48.51	\$598,113,020
Public Transit	57	9.64	\$56,408,003	26.13	\$988,749,475
Solid Waste	24	4.06	\$24,551,567	11.37	\$142,430,623
Wastewater	56	9.48	\$14,839,867	6.87	\$153,586,056
Water	42	7.11	\$9,552,198	4.42	\$56,088,364
TOTAL	591	100.00	\$215,879,367	100.00	\$1,998,235,481

Notes:

¹ Only includes projects that reported using 2007 Gas Tax resources. The breakdown of projects that were reported but did not use 2007 resources was as follows: Capacity Building (9), Energy System (22), Transit (34), Local Roads (282), Solid Waste (18), Wastewater (26), and Water (25).

² In 2008 errors were noted by some municipalities in the amounts reported to the AMO for the 2007 year, which resulted in several revisions. The amounts in this table reflect the numbers before these revisions were made. The most significant adjustments were: over \$752,000 additionally spent on Roads and Bridges, \$100,000 that were not spent on Energy Systems, and over \$84,000 not spent on Water.

³ Includes the cost of all the projects funded since the program started in 2005.

Source: (AMO, 2008g)

Despite the small reported growth for 'Local Roads and Bridges,' this category continued to be the highest investment priority. In 2007 a total of 358 projects were undertaken, which also represented the largest portion of the total 2007 investment (over 48%). 'Bridges' accounted for \$10.4 million of the total

investment (\$105 million) for this category, which represented a significant increase from the previous period.

All the other categories reported less than 60 projects with the smaller number of projects reported under 'Solid Waste' (24). As with the previous periods, projects under 'Capacity Building' represented the smallest investment of 2007 funds, just 0.59%, and the smallest estimated total project cost, \$5.7 million. At the same time, 'Public Transit' was still the category with the largest projected total project cost at over \$989 million, followed by 'Local Roads' at over \$598 million.

In 2007 three municipalities received an additional allocation paid using interest accrued by the AMO to address a population error made by Statistics Canada in the 2001 Census. At the same time, three municipalities did not receive their 2007 allocations because they failed to meet their 2006 reporting requirements. As of December 31, 2007, municipalities held over \$203.8 millions in reserve funds. Over this period municipalities gained over \$8.2 million in interest, and they applied \$416,000 from it to offset the costs of administration. Upper and Lower and tier municipalities, which according to the Agreement are allowed to transfer their Gas Tax Funds allocations to their Lower or Upper tier

governments respectively, took advantage of the clause and transferred over \$14.7 million in 2007.

d) January 1, 2008 to December 31, 2008²¹

As of December 31, 2008, Ontario municipalities had allocated \$242.5 million of the total \$288 million that had been transferred by the AMO for this period to 722 environmentally sustainable municipal infrastructure projects.²² Moreover, since the Gas Tax Fund was established in 2005, municipalities in Ontario had invested over \$620 million in over 1,600 eligible projects. The cumulative investment, based on the total expected cost of these projects, was over \$2.3 billion.

As can be seen in Table 17 below, in this period there was a 22% increase in the total number of projects funded (722) compared to the previous year (591). The category that experienced the largest growth was 'Energy Systems' (75%), which was among the categories with the smaller growth in the last period. The reason for this growth is that many municipalities used their resources to undertake energy audits and retrofits to municipally owned facilities to reduce energy costs. Another category that continued to have high growth was 'Capacity

²¹ This section draws primarily from the AMO's 2008 Annual Expenditure Report (AMO, 2009b) and (AMO, 2009c)

²² This number reflects the total number of projects that were allocated 2008 Gas Tax Resources. These projects could have been started in the previous years, and could have been previously funded with 2005, 2006, and/or 2007 Gas Tax Resources. Projects completed before January 1st, 2008 are not included.

Building' (42%), which probably reflects the approaching dateline for the municipal submission of the Capital Investment Plans and the Integrated Community Sustainability Plans, as well as the need to comply with the new Public Sector Accounting Board (PSAB) rules.²³ Despite the high growth, this category represented the smallest investment of 2008 funds (less than 1%) and the smallest estimated total project cost, \$10 million. For the first time, a category reported negative growth: 'Water' (-10%).

²³ According to the MFA municipalities could use the Gas Tax resources under this category to fund work related to meeting these requirements.

Table 17: Municipal Expenditure of 2008 Funds by Eligible Project Category

	Number of Projects ¹	% of Total Number of Projects	2008 Gas Tax Funds	% of Total 2008 Funds	Total Project Cost ²
Capacity Building	37	5.12	\$1,854,976	0.76	\$10,104,097
Energy Systems	49	6.79	\$8,962,884	3.70	\$145,950,367
Local Roads	444	61.50	\$127,606,900	52.62	\$769,572,667
Public Transit	68	9.42	\$72,272,367	29.80	\$1,079,872,623
Solid Waste	26	3.60	\$12,741,173	5.25	\$119,941,833
Wastewater	60	8.31	\$14,812,988	6.11	\$133,943,520
Water	38	5.26	\$4,236,920	1.75	\$58,841,048
TOTAL	722	100.00	\$242,488,207	100.00	\$2,318,226,153

Notes:

¹ Only includes projects that reported using 2008 Gas Tax resources. The breakdown of projects that were reported but did not use 2008 resources was as follows: Capacity Building (5), Energy System (4), Transit (26), Local Roads (100), Solid Waste (10), Wastewater (25), and Water (13).

² Includes the cost of all the projects funded since the program started in 2005.

Source: (AMO, 2009c)

During this period the same trends seen in the previous period emerged. ‘Local Roads and Bridges’ was the highest investment priority for municipalities with over 440 projects funded with 2008 resources. This number represented over 60% of the total number of projects undertaken under this category, and over 50% of the total 2008 funds applied. The lowest investment priority was ‘Solid Waste’ with only 26 reported projects. At the same time, ‘Public Transit’ was still the

category with the largest projected total project cost at over \$1 billion, followed by 'Local Roads' at over \$769 million.

Since municipalities are allowed to bank the funds for up to three years, at the end of this period municipalities held over \$263 millions in reserve funds. By banking the funds they were also able to earn over \$7.8 million in interest, and they applied \$373,000 from it to offset the costs of administration. Upper and Lower and tier municipalities transferred each other over \$12 million in Gas Tax Funds.

ECONOMETRIC ANALYSIS - THE IMPACT OF THE GAS TAX FUND ON INFRASTRUCTURE EXPENDITURES

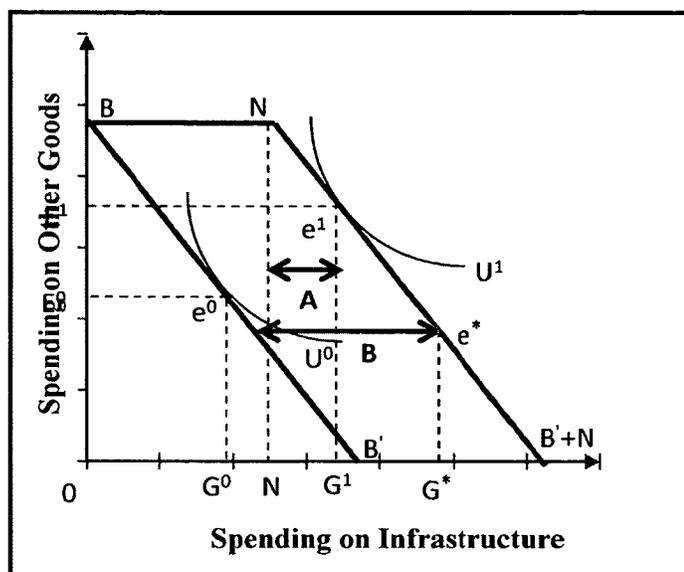
The central research focus of this econometrics analysis is the quantification of the effect of the Gas Tax Fund on municipal infrastructure expenditures in Ontario.²⁴ The transfer payment theory predicts, as previously explained in Chapter 3, that this effect can range from complete substitution to stimulation. Because there is an incrementality clause in the agreements, in theory there should only be 'no substitution,' where spending equals the amount of funds received, or 'stimulation,' where spending exceed the amount received. Nevertheless, because money is fungible, the recipient government might

²⁴ Since the focus of this dissertation is Ontario, the sample in the econometrics analysis was limited to municipalities in this Province.

reduce its spending on the specified public good, partially or in full, liberating funds for other purposes.

As illustrated in Figure 11 below, which is a modified version of Figure 6 from Chapter 3, what this part of the research measures is: how does the actual level of expenditure e^I relates to the 'no substitution level' of expenditure at e^* , where the full amount of the transfer has been used to purchase more G, which in this case is more infrastructure. If the distance between A over B equals zero ($A/B=0$) it would be a case of 'complete substitution'; if the distance was equal to 1 ($A/B=1$) it would be a case of 'no substitution'; and if the distance was higher than 1 ($A/B>1$) it would be a case of 'stimulation.'

Figure 11: Effect of a Non-matching Transfer²⁵



Source: Adapted from Bruce (2001, p. 567)

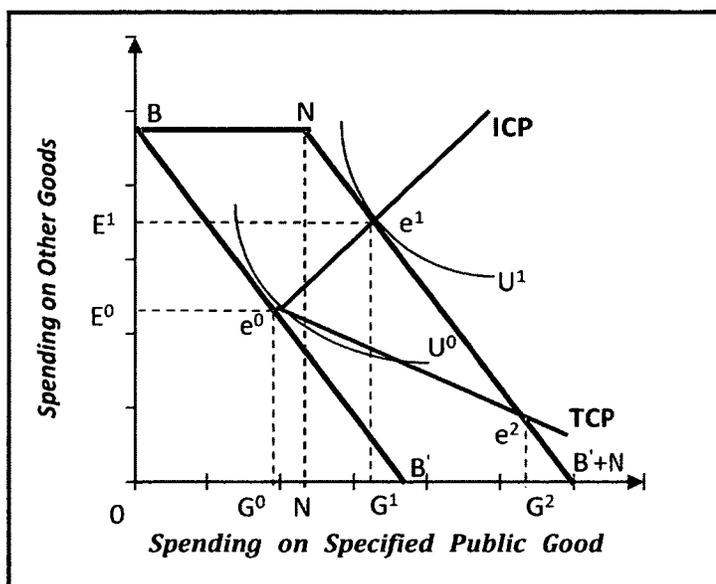
This econometric analysis is also exploring the existence of the phenomenon dubbed the 'flypaper effect' because the money is said to 'stick where it hits' in the public sector. Even though money is fungible, as noted in Chapter 3, recipient governments seem to spend the resources received for the purpose for which they were intended instead of using them for other forms of spending or tax relief. While it has been theorized that the increase in expenditures on the specified good should be, at the most, 10 to 15 cents per 1\$ of the transfer (Bruce, 2001, p. 573), empirical estimates on the

²⁵ A non-matching transfer, such as the Gas Tax Fund, as previously explained in Chapter 3, is expected to shift the recipients' budget line (BB') upwards and to the right becoming BN(B'+N). In this case, because of the conditionality placed on the eligible projects and expenditures, the new budget line is truncated above the amount of the transfer (BN). This means that spending northwest of point N cannot be funded with the allocation from the Gas Tax program which guarantees, theoretically, that municipalities will at least invest ON on infrastructure projects.

low-end have found that the stimulating power of the flypaper effect is close to 25 cents, and high-end estimates put it closer to 90 cents (Hines & Thaler, 1995, p. 219).²⁶

The flypaper effect can be demonstrated, using Figure 11, by looking at the income consumption path (ICP) and the transfer consumption path (TCP). In Figure 12 below, the ICP shows the locus of consumption choices arising from the increase in the community's income, while the TCP represents the empirical result where receipt of a lump-sum conditional grant has a greater stimulatory effect on local government spending than an equivalent increase in tax income income ($G_2 > G_1$). As Bailey and Connolly (1998, p. 338) argued, the flypaper effect occurs as long as TCP lies below ICP.

Figure 12: Possible Flypaper Effect of a Non-Matching Transfer



²⁶ For an in-depth discussion of this phenomenon see Chapter 3.

The Econometric Model

To assess the impact of the Gas Tax Fund on infrastructure expenditures the econometric model was defined as follows:

$$\begin{aligned} (INFRA_{05-08} - INFRA_{01-04})_i = & \beta_0 + \beta_1(GRANT_{05-08} - GRANT_{01-04})_i + \\ & \beta_2(TAXR_{05-08} - TAXR_{01-04})_i + \beta_3(FEES_{05-08} - FEES_{01-04})_i + \beta_4(GTF_{05-08} - \\ & 0)_i + \beta_5(POP_{05-08} - POP_{01-04})_i + \beta_6(TIME_{05-08} - TIME_{01-04})_i + \\ & (\epsilon_{05-08} - \epsilon_{01-04})_i^{27} \end{aligned}$$

or

$$\begin{aligned} \Delta INFRA_i = & \beta_1 \Delta GRANT_i + \beta_2 \Delta TAXR_i + \beta_3 \Delta FEES_i + \beta_4 GTF_i + \beta_5 \Delta POP_i + \\ & \beta_6 \Delta TIME_i + \Delta \epsilon_i^{28} \end{aligned}$$

This model has six²⁹ variables expressed as change (Δ) and, in every case, they cover the same two time periods: (a) 2005-08, where 2005 is the year in which the program was implemented; and (b) 2001-04, where 2001 is the year chosen to establish a baseline of municipal's spending patterns before the implementation of the program. The year 2001 was chosen as the first reference year to avoid potential issues with the data as a result of the wave of municipal mergers that happened in Ontario between 1996 and

²⁷ More generally for two periods:

$$\begin{aligned} y_t &= \beta_0 + \beta_1 X_{1t} + \beta_2 X_{2t} + \dots + \beta_k X_{kt} + \epsilon_t \\ y_{t-1} &= \beta_0 + \beta_1 X_{1t-1} + \beta_2 X_{2t-1} + \dots + \beta_k X_{kt-1} + \epsilon_{t-1} \end{aligned}$$

Differencing yields

$$\Delta y_t = \beta_1 \Delta X_t + \beta_2 \Delta X_t + \dots + \beta_k \Delta X_t + \Delta \epsilon_t \quad (\text{where } \Delta \text{ denotes period } t \text{ minus period } t-1)$$

²⁸ In this model the ' β s' are the regression coefficients for the explanatory variables, the ' i 's denote the individual municipality, and the ' ϵ ' is the disturbance term.

²⁹ Since in the first period of consideration (2001-04) the Gas Tax Fund was zero, this variable is equivalent to the change, in real dollars, of the Gas Tax Fund resources received by the i th municipality. Additionally, $\Delta TIME_i$ effectively denotes the constant term because it represents the infrastructure investment time trend from the chosen t_2 (2005-08) to the chosen t_1 (2001-04) of the i th municipality, which is equal to 1.

2000.³⁰ The year 2008 was chosen as the cut-off year since it was the last year for which data were available when the information was collected for the analysis.³¹ The average approach was chosen because the model is trying to capture the long term investment nature of infrastructure expenditures.³²

In this equation, the change in infrastructure spending by the i th municipality is formulated as a function of the municipal's fiscal resources (i.e. federal and provincial transfers allocated to capital expenditures, and taxes and user fees collected) and a variable that measures the need for infrastructure (population size).³³ Considering that the model is defined in terms of change (Δ), dummy variables to control for scale are not included. The rationale is that, in the two time periods considered, the value for scale would have remained unchanged and thus would not have affected the dependent variable. While 'infrastructure' can be defined in many different ways, in this regression 'infrastructure spending' is defined as capital expenditures related to: (1) transportation

³⁰ According to the Government of Ontario's website (2012), "since the mid-1990's, expansion of urban areas, changes in responsibilities of local government and provincial government initiatives have lead to a massive wave of municipal mergers." As a result, the number of municipalities in the Province has been reduced by more than forty percent, from 815 to 447.

³¹ At the same time, in 2009 the FIR reporting schedules were modified to comply with the new accounting and reporting standards approved by the PSAB. This meant that the data was no longer available in the same format. Interestingly, as explained in Chapter 4, complying with these new reporting requirements was part of the Gas Tax Fund accountability framework.

³² The assumption is that infrastructure expenditures in one year are usually attached to projects that require a multi-year funding commitment. For example, a municipality that plans to purchase 300 new buses schedules the expenditure over 5 years; a municipality building a bridge incurs infrastructure expenditures over the life of the project.

³³ This econometric approach was also followed by Gamkhar & Sim (2001) when they studied the impact of federal alcohol and drug abuse block grants on state and local government substance abuse program expenditures.

services, i.e. roadways, winter control, transit, parking, street lighting, and air transportation; and (2) environmental services, i.e. sanitary sewer system, storm sewer system, waterworks system, waste collection, waste disposal, and recycling. This definition was chosen based on the approved project categories under the program and the available data. For a more detail description of each variable see Table 18 below.

Table 18: Description of the Variables Used in the Econometric Model

VARIABLE	DESCRIPTION	SOURCE	EXPECTED SIGN OF COEFFICIENT
$\Delta INFRA_i$	The change, in real dollars, ¹ in municipal infrastructure spending by the <i>i</i> th municipality	Schedule 52 – FIR ²	
$\Delta GRANT_i$	The change, in real dollars, in both federal and provincial conditional capital grants allocated by the <i>i</i> th municipality to capital expenditures, excluding Gas Tax funding	Schedule 52 – FIR ³	+
$\Delta TAXR_i$	The change, in real dollars, in municipal tax revenues collected by the <i>i</i> th municipality	Schedule 10 – FIR ⁴	+
$\Delta FEES_i$	The change, in real dollars, of user fees and service charges collected by the <i>i</i> th municipality	Schedule 10 – FIR ⁵	+
GTF_i^6	The amount of the Gas Tax Fund resources, in real dollars, received by the <i>i</i> th municipality	AMO ⁷	+
ΔPOP_i	The change in population in the <i>i</i> th municipality	Schedule 2– FIR ⁸	+
$\Delta TIME_i^9$	The change in investment period in the <i>i</i> th municipality	-	?

Notes:

¹ The variables in this model represented in dollars amounts were divided by the consumer price index to adjust for inflation. The base year for the calculations was 2002.

² Schedule 52: Sources of Capital Fund Financing and Expenditures; Column 7: Capital Expenditures; Lines: Transportation Services (0610 to 0699) and Environmental Services (0810 to 0899)

³ Schedule 52; Column: Ontario (3) and Canada (4); Lines: Transportation Services (0610 to 0699) and Environmental Services (0810 to 0899)

⁴ Schedule 10: Revenue Funds Receipts; Line 0299: Taxation

⁵ Schedule 10; Line 1299: User Fees and Service Charges. These do not include Development Charges.

⁶ Since in the first period of consideration (2001-04) the Gas Tax Fund was zero, this variable is equivalent to the change, in real dollars, of the Gas Tax Fund resources received by the *i*th municipality.

⁷ AMO's report of actual transfers to individual municipalities

⁸ From 2001-04 provided by the MMAH. After 2005, Schedule 2: Municipal Data; Line 0041

⁹ Coefficient of the constant term since it denotes the time trend that is equal to 1

As Table 18 indicates, all the coefficients, except the one for $\Delta TIME_i$, have a positive expected sign. The rationale is that, everything else being equal, these independent variables are expected to have a positive impact on the dependent variable. This means that an additional unit increase in the independent variables is expected to increase municipal infrastructure spending ($\Delta INFRA_i$). For $\Delta GRANT_i$, $\Delta TAXR_i$, $\Delta FEES_i$, or GTF_i the unit would be one additional dollar, and for ΔPOP_i it would be an additional individual. Gas Tax Fund resources are, in theory, sources of revenue that municipalities must apply to infrastructure expenditures. As a result, they should increase spending in this category.³⁴ At the same time, municipal tax revenues and collected user fees/service charges are sources of revenue that municipalities could, potentially, allocate to infrastructure expenditures. For population, changes in the size of the population will result in different infrastructure needs. Since it is not possible to predict the infrastructure expenditure trend, the coefficient for $\Delta TIME_i$ has an unknown expected sign.

Lump-sum intergovernmental grants, according to Wyckoff (1991, p. 311), represent one of the few observable exogenous variables affecting real-world public finance decisions, and in this case the null hypotheses is $H^1_0: \beta_4(GTF) = 0$. This hypothesis suggests that an additional dollar of Gas Tax funding has no effect on additional total municipal expenditures in infrastructure in the chosen period (including both the expenditures from the Gas Tax transfer and the municipal's own sources of

³⁴ Federal and provincial conditional capital grants are defined as funds allocated to capital expenditures and, as a result, they directly affect infrastructure expenditures.

revenues). This is the case of total substitution. If β_4 is greater than 0 but less than \$1 ($\$1 > \beta_4 > 0$) the results would signal partial substitution. In the case where β_4 was equal or greater than \$1 it would signal no-substitution ($\beta_4 = \$1$), or stimulation ($\beta_4 > \1).

Moreover, if the coefficient for β_4 was statistically significant and $\beta_4 > \beta_2$, it could be concluded that the flypaper effect is present. The comparison of the two coefficients is important because, as Bojorquez (2006, p. 14) explains, empirical evidence suggests that due to the flypaper effect municipalities “are more responsive to grant windfalls than to changes in tax income.” As a result, this would show if grants, when compared to an increase in own income, affect public spending in a different way.

Data

For this analysis, municipal financial statistical information was collected from the Ontario Financial Information Return (FIR), which is the main municipal data collection tool used by the Ministry of Municipal Affairs and Housing.³⁵ The chosen data traced the historical municipal spending on infrastructure from 2001 to 2008, as well as

³⁵ All municipalities in Ontario are required to submit financial data to the Ministry by May 31st each year. The FIR provides a method of capturing detailed standardized financial and statistical information that allows comparisons of municipalities over time. Since its introduction in 1977, the FIR had remained virtually unchanged until 2000. At that time, the FIR was reviewed to determine the appropriateness of the information collected in light of user needs and changes in municipal responsibilities resulting from amalgamations, the reform of the assessment and taxation system, and the commitment to implement PSAB standards for municipal financial reporting. The FIR is organized using a series of numbered “Schedules,” which collect different types of information (Ministry of Municipal Affairs and Housing, 2012).

the state of their finances. Additionally, data on the Gas Tax Fund allocation by municipality was provided by the AMO.

While using one single source for the data is always desirable, due to several factors the available FIR data related to the Gas Tax Fund were not reliable and/or appropriate for the econometric analysis. First, while the Gas Tax allocation is based on the Federal budget cycle, which is from April to March, municipalities complete the FIR based on their budget cycle, which is from January to December. Since municipalities can only report the amounts on their financial statements if they have received the funds during their fiscal year, any delay in receiving their allocation affects when the money is accounted for. Second, if municipalities have used the funds during the year they have to report it on Schedule 52. If they have not utilized the funds they have to report them on Schedule 60.³⁶ The problem is that some municipalities have been misreporting their allocations as either an operating grant on Schedule 12 or on Schedule 52 in the wrong column.³⁷ Third, it is not clear where Upper or Lower tiers report the Gas Tax Fund resources that they transfer to each other. Fourth, for methodological reasons, it was decided that using the allocated amount, as reported by the AMO, instead of the actual

³⁶ Schedule 52 – Sources of Capital Fund Financing and Expenditures, Column 10 – Canada Gas Tax Financing; Schedule 60 – Continuity of Reserve and Reserves Funds, Line 0862 – Gas Tax Federal.

³⁷ Schedule 12 – Current Revenues for Specific Functions, Column 2 – Canada Conditional Grants; Schedule 52, Column 4 – Canada. Those responsible for managing the FIR have been trying to correct this problem by working with the municipalities where the errors have been identified (GT-307, personal communication, 2010).

expenditures would be a better measure of impact on expenditures because municipalities can bank the resources for up to three years and can debenture against it.

For the analysis, a sample of 118 municipalities was chosen based on a population cut-off of 18000. This population size was chosen because smaller municipalities get less than \$1.5 million in Gas Tax funding which was not considered a large enough amount to make an observable difference in the municipal's investment and operating decisions. On the other hand, choosing a larger population cut-off would have reduced significantly the number of observations.

Even though the municipal data available in the FIR are quite comprehensive the choice of variables for the econometric model was still limited. Two of the variables that could have potentially biased the remaining estimates due to their omission are: municipal GDP, and all federal and provincial transfers received by the municipality. Having a measure such as change in GDP would control for the impact of the financial standing of the municipality on the change in infrastructure spending.³⁸ Additionally, considering the fungibility of resources, having a measure for the change in the total value of government transfers, instead of the reported portion allocated to capital expenditures (GRANT), would better control for the overall impact of transfers on the change in infrastructure spending.

³⁸ Arguably, the measure of tax revenues (TAXR) in the specified equation could be considered a proxy for this independent variable.

Econometric Analysis & Results

Regression analysis was the quantitative method employed to estimate the spending effect of the Gas Tax Fund on the change in infrastructure spending. The specified equation was estimated using the Ordinary Least Squares (OLS) and Weighted Least Squares method (WLS). The equation was also estimated using the double log functional form.³⁹ Table 19 below reports the results of the regressions.

³⁹ The double log model was estimated to address Becker's (1996) argument that the use of a double logarithmic form, with identical data and explanatory variables, provides no evidence of the flypaper effect. Becker (1996, p. 97) concluded that the flypaper effect is highly sensitive to the specification of the expenditure equations, and he found that the use of a "linear equation produces estimates of the spending responses to grants that are inflated by a factor of nearly six." The results of this regression showed that the coefficient of GTF continued to have the expected sign, and was statistically significant: Adjusted R² .107 | lnGTF: 1.75 (3.641)***.

Table 19: Regression Results for the Change, in Dollars, in Municipal Infrastructure Spending in Ontario

		Coefficients of the Independent Variable	
		OLS	WLS
INDEPENDENT VARIABLES	<i>GTF</i>	1.612 (7.046)***	1.266 (2.242)**
	Δ <i>GRANT</i>	0.641 (4.217)***	0.955 (4.652)***
	Δ <i>TAXR</i>	0.137 (1.687)*	0.083 (0.747)
	Δ <i>FEES</i>	0.114 (1.896)*	0.029 (0.373)
	Δ <i>POP</i>	193.480 (5.876)***	165.795 (3.489)***
	<i>Constant (Impact of TIME)</i>	-2163628.403 (-2.652) ***	-98205.655 (-0.197)
ADJUSTED R²		0.954	0.645

Notes:

Figures in parentheses are *t*-values corresponding to the coefficient in the row above.⁴⁰

*** Significantly different from 0 at the 1% level for a two-tailed test

** Significantly different from 0 at the 5% level for a two-tailed test

* Significantly different from 0 at the 10% level for a two-tailed test

The regression results reported in column 1 (OLS) were found to be heteroskedastic.⁴¹ While this means that the estimated coefficients should be unbiased

⁴⁰ For the two tailed test the significant *t* values are as follows: 1.658 (10%); 1.981 (5%), and 2.620 (1%)

⁴¹ To test for heteroskedasticity, the Park test was used with average population (AVPOP) as the proportionality factor. The results were as follows: Adjusted R² (0.236) | lnAVPOP: 1.074 (6.005)***. Because the calculated t-score is significant for a two tailed, 1% test the null hypothesis of

and consistent, there is still the possibility that the variance of the estimated parameters is biased and, as a result, the usual confidence intervals and t-scores are incorrect and may lead to incorrect conclusions. Since the OLS estimators are no longer efficient, i.e., they are no longer the best linear unbiased estimators, the equation was re-estimated using WLS with average population as the weight. The analysis in this section will focus on the results of estimating the equation after correcting for heteroskedasticity (WLS).

The results reported in column 2 indicate that the sign of the coefficients for all the variables conform to a priori expectations, but only GTF, Δ GRANT, and Δ POP are statistically significant. The Gas Tax Fund transfer (GTF) seems to have a considerable effect on infrastructure expenditures as a dollar of transfer generates \$1.27 of additional spending. In terms of the predictions of transfer payment theories regarding the effect of transfers on local expenditures, this signals to stimulation, i.e. a level of expenditure that is higher than the amount of the transfer. This means that the null hypothesis previously outlined ($H^1_0: \beta_4(\text{GTF}) = 0$) can be rejected. At the same time, since the change in federal and provincial conditional capital grants allocated to infrastructure expenditures (Δ GRANT) is, in theory, an accounting identity, the coefficient of this variable was expected to have a considerable effect and be equal to one.⁴² Finally, population change

homoskedasticity was rejected ($H_0: \beta_1(\ln\text{AVPOP}) = 0$). To correct for the likely presence of heteroskedasticity the stated equation was re-estimated using WLS..

⁴² Because of the way the variable was defined, in theory, a one dollar from conditional grants reported in the FIR as 'allocated' should result in a one dollar increase in infrastructure expenditures. The results from the regression showed that a dollar from these transfers generates \$0.96 of additional spending.

(Δ POP) is also significant with one additional individual generating \$165.8 in infrastructure spending.

The effects of the change in municipal tax revenues (Δ TAXR), of the user fees and service charges collected (Δ FEES), and of the time trend (Δ TIME) is not statistically different from zero. These results show that there is weak evidence that changes in these variables would have an effect on the levels of infrastructure expenditure. They may also indicate that other factors not considered are important in determining the municipal level of expenditures.

While the fact that the coefficient for GTF is statistically greater than zero,⁴³ and potentially indicative of stimulation, provide some support for the existence of the flypaper effect, according to Bojorquez (2006, p. 14) the important test is the comparison of this coefficient with the one of Δ TAXR. According to him, if $\beta_4 > \beta_2$ it could be concluded that the flypaper effect is present. Based on the results ($1.27 > 0.08$) it seems that, when looking at infrastructure expenditures, municipalities in Ontario “are more responsive to grant windfalls than to changes in tax income” (2006, p. 14). In relation to Figure 12 in page 236, if the Gas Tax Fund Transfer consumption path was drawn in the graph it would lie under the income consumption path (ICP), i.e. the locus of consumption choices arising from the increase in the community’s income.

⁴³ But it is not significantly greater than 1.

CONCLUSION

This chapter first provided a background on the Gas Tax Fund allocation in Ontario and the eligible projects. Of particular interest is that in the Province the allocation is shared 50:50 between upper-tier and lower-tier municipalities and they are allowed to transfer their allocation back and forth.⁴⁴ This allocation decision is important because it presents another example of the principle of flexibility that the Federal government supported in the drafting of the individual agreements. In this case, the flexibility allows: (a) upper tiers to support lower tiers by transferring all, or portions of, their allocation; (b) upper and lower tiers to partner to fund joint projects; and (c) upper tiers to fund projects of regional interest. At the same time, the eligible project category of Local Roads and Bridges is also evidence of this flexibility. In Ontario, the AMO was able to make the case that for many municipalities this was the most pressing infrastructure need and, as a result, it was included in the list.

This chapter also outlined policy outputs by analyzing the municipal expenditures of the funds between 2005 and 2008 by eligible project category. Overall, some interesting numbers and trends merit highlighting. A summary allocation by year for all of Ontario municipalities, with the exception of Toronto, can be found in Table 20 below.

⁴⁴ As previously explained, the upper-tier government gets half of the allocation for the total number of people in the tier, and each lower-tier governments gets the other half based on their individual population.

Table 20: Municipal Aggregate Annual Expenditure Reports 2005 to 2008

	2005 ¹	2006	2007	2008	Cumulative
Opening Balance	-	\$125,705,159	\$181,658,046	\$210,986,013 ⁶	-
Received from the AMO	\$148,902,308	\$196,242,660 ²	\$230,136,202	\$287,646,681 ⁷	\$862,927,851
Transferred to Eligible Recipient ⁴	-	\$(22,975,840)	\$(14,729,366)	\$(12,320,337)	\$(50,025,543)
Transferred from Eligible Recipient ⁵	-	\$22,975,840	\$14,729,366	\$12,320,337	\$50,025,543
Interests Earned by Municipalities	\$401,724	\$5,448,050	\$8,241,763	\$7,870,904	\$21,962,441
Interest Earned Applied to Municipal Administration Costs	\$(14,476)	\$(188,888)	\$(416,347)	\$(373,756)	\$(993,467)
Expenditures on :					
Capacity Building	\$(91,236)	\$(701,023)	\$(1,272,368)	\$(1,854,976)	\$(3,919,603)
Community Energy Systems	\$(2,811,086)	\$(4,004,481)	\$(4,514,343)	\$(8,962,884)	\$(20,292,794)
Local Roads and Bridges	\$(4,427,544)	\$(93,645,300)	\$(104,475,184)	\$(127,606,899)	\$(330,154,927)
Public Transit	\$(11,325,873)	\$(10,485,906)	\$(56,408,003)	\$(72,272,367)	\$(150,492,149)
Solid Waste	\$(2,117,126)	\$(23,022,54)	\$(24,551,567)	\$(12,741,173)	\$(41,712,120)
Wastewater	\$(2,332,236)	\$(10,660,617)	\$(14,839,867)	\$(14,812,988)	\$(42,645,708)
Water	\$(479,298)	\$(2,998,077)	\$(9,552,198)	\$(4,236,920)	\$(17,266,493)
Closing Balance ³	\$125,705,159	\$181,689,034	\$204,006,134	\$263,641,635	\$263,641,635

Notes:

¹ Reduced Capacity Building by \$656,000, Water by \$420,000, Roads by \$582,065.79 because the money was not expensed in 2005.

² Includes \$23.7 million of the 2005 allocation transferred to 81 municipalities that executed the MFA in 2006.

³ Reflects how much was held at the end of the fiscal year by municipalities in reserve funds.

^{4,5} This category represents the transfers between upper and lower tier municipalities allowed under the Agreement.

⁶ During 2008 errors were noted by some municipalities in the amounts reported for 2007 resulting in the discrepancy between the closing balance of 2007 and the opening balance of 2008.

⁷ Includes \$386,643 of 2007 and 2008 instalments transferred to three municipalities after 2008 due to delays in their auditor's reports.

Source: (Clarkson, 2004) (AMO, 2007f) (AMO, 2008g)

First, it seems that municipalities are taking advantage of the possibility to bank all, or portions of, the resources for up to three years. This is made evident by the fact that, of the total resources that had been disbursed by the end of 2008, municipalities had only applied 70.28% to infrastructure projects.⁴⁵ By doing this, they have earned over \$20 million in interest. Second, as allowed under the Agreement, upper and lower tier municipalities have transferred over \$50 million of their allocated resources to each other. These transfers emphasize that they are diverting and pooling resources for projects that will likely better meet the municipalities or the region's need. Third, more than half of the allocated resources to infrastructure projects (54.4%) have been spent on the 'Local Roads and Bridges' category, which is a category unique to the province of Ontario.

Considering the emphasis of the Gas Tax Fund program funding objectives on sustainable infrastructure, and on specific expected outcomes related to environmental benefits, the funding of so many projects under the 'Local Roads and Bridges' category is somewhat concerning.⁴⁶ When this issue was raised with interviewees they argued that: (a) the AMO presented a strong rationale for the inclusion of this category; and (b) municipalities are required to fill a comprehensive form that outlines the impact of

⁴⁵ In this period, according to the National Summative Evaluation (including Toronto) the percentage of resources that had been committed was 72.3% (Infrastructure Canada, 2009c, pp. 2-13).

⁴⁶ Especially since environmental monitoring for roads and bridges after the completion of the project is not required as is the case in other project categories.

investments on this category on sustainability outcomes (GT-216, personal interview, 2009 and GT-300, personal communication, 2010).⁴⁷

Nevertheless, the concern was also mentioned on the Canada-AMO Joint Evaluation of the program. In the conclusions of the evaluation, it is argued that: “while there is some evidence of environmental benefits resulting from these types of projects, other project categories are better aligned with environmental benefits” (Performance Management Network Inc., 2009, p. 40). Furthermore, the evaluation recommended that, while it was important to continue the support of projects under this category due to the pressing needs of municipalities, “consideration could be given to limiting the proportion of Gas Tax funding going to these types of project to ensure municipalities invest funds in projects that make significant contributions to environmental benefits” (2009, p. 40).

Overall, based on project descriptions provided by the AMO in their annual reports and the information provided through their gastatwork.ca website,⁴⁸ it could be argued that the program outputs are consistent with the objectives. The Canada-AMO joint evaluation also supports this conclusion by observing that “most projects selected by the municipalities are in general well aligned” with the eligible project categories, and that there is evidence that “a broad range of new and improved capital infrastructure has or will result from these projects” (Performance Management Network Inc., 2009, p.

⁴⁷ See Table 13 in pg.214.

⁴⁸ www.GasTaxAtWork.ca profiles all the GTF projects funded since 2005 and their outcomes. The website is based on a Geographic Information System (GIS) that uses an Ontario map to show the location of projects funded. Users are then able to click on the project to get all the funding details (i.e. project category, cost, sources of funding, environmental outcome, and project status).

11).⁴⁹ This finding is not surprising considering that the AMO works very closely with municipalities to ensure that all the funded projects meet the eligibility requirements.

In the second portion, the chapter examines the impact of the Gas Tax Fund on infrastructure expenditures through an econometric analysis. The results showed that the Gas Tax Fund transfer has a considerable effect on infrastructure expenditures as a dollar of transfer generates \$1.27 of additional spending. Moreover, this signaled to the potential that the transfer is stimulating additional municipal spending. This finding is consistent with the annual AMO reports, and the findings of the Joint Canada-AMO evaluation.⁵⁰ For example, as Figure 13 depicts below, the AMO (2010a, p. 11) reported from 2005-2009 for every Gas Tax Fund dollar municipalities invested, on average, \$2.52 additional dollars.⁵¹ At the same time, analysing reported data on projects undertaken up to December 31, 2007, the joint evaluation showed that “on average, an additional \$3.75 had been provided by other funders for every \$1.00 of GTF funding”

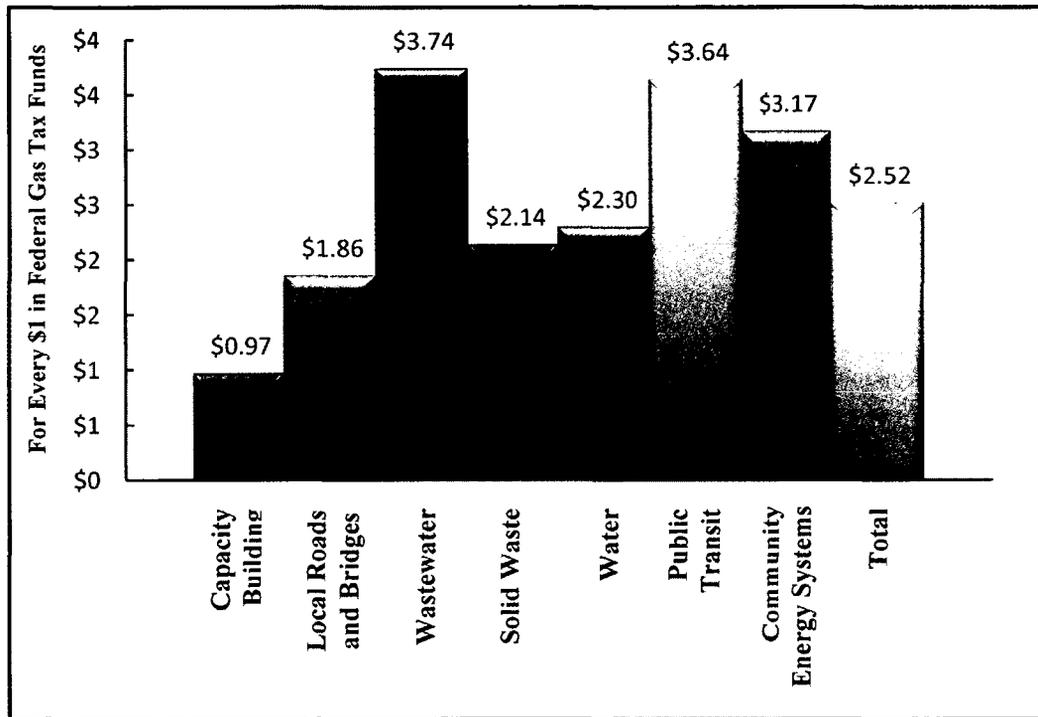
⁴⁹ More specifically, the evaluation noted that projects identified under (a) the Water, Wastewater, and Solid Waste category “appear to be well aligned;” (b) Community Energy Systems “have some alignment, although they are not necessarily ‘energy systems’;” (c) Public Transit could have also been “eligible under the local roads and bridges category;” and (d) Local Roads and Bridges could also fit better under other categories (Performance Management Network Inc., 2009, p. 11).

⁵⁰ Interestingly, the National Summative Evaluation argues that “even though the reporting requirements include reporting on all other sources of funding, reporting has been inconsistent: most jurisdictions do not report on this, others report a total amount for other sources while very few report in detail” (Infrastructure Canada, 2009c, p. 19). As a result, at the national level, the government was unable to conclude as to the amount of monies leveraged through the GTF programs.

⁵¹ As part of the program’s reporting requirements, municipalities must report to AMO all the sources of funding for the projects using Gas Tax Fund resources. To estimate the leverage, AMO calculates the municipal (own resources), provincial and federal contributions in relation to the total project cost (GT-310, personal communication, 2012).

(Performance Management Network Inc., 2009, p. 26).⁵² Since these stimulation figures are for different periods they are not truly comparable, but the important issue is that they support the finding that additional resources are being leveraged.

Figure 13: Spending Leveraged 2005-2009



Source: AMO (2010a, p. 11)

In terms of the design of this transfer, some features that might be either encouraging stimulation, or affecting municipal accounting, are recipients being allowed to: (a) stack other sources of funding for projects using Gas Tax resources; (b) to bank revenue up to three years; (c) accrue interest on gas tax revenue that has to be reinvested

⁵² Again, 'other funders' refer to contributions from the municipalities (own resources), the province and the Federal government through different transfers.

in infrastructure projects; and (d) finance long-term debt for eligible projects. Because of these features, the findings from the econometrics analysis should be treated with caution. While the influence of stacking was partially⁵³ accounted by Δ GRANT, and the one of banking was controlled by defining GTF as the amount of resources received instead of applied to projects, the other two could not be accounted for due to the limitations of the available data.

Another design feature that might have affected the way municipalities spent the Gas Tax Fund resources was the incrementality clause. As explained in Chapter 4, to limit the possibility of substitution the Federal government added a clause to ensure that municipalities agreed that the federal Gas Tax revenue investment would result in a net increase in total investment in municipal infrastructure over the life of the Agreement.⁵⁴ Unfortunately, since leveraging resources is not directly connected to incremental spending, the regression analysis can't provide any insights into the impact of this particular design feature. Nevertheless, when considered in aggregation with the evidence from the compliance with the other oversight features, the econometrics' results support the finding that the Gas Tax Fund is a properly designed program that is meeting its intended objectives.

⁵³ It was not accounted in full because the contribution from own funds was not included in the analysis.

⁵⁴ Incremental spending was defined as the amount spent over the full term of the Agreement (2005-2009 inclusive), less a base amount (measured from 2000-2004 inclusive).

Related to the overall design of transfer programs, the findings suggest that a conditional, non-matching, closed-ended transfer can positively affect the recipients' spending patterns; and that federal oversight - in the form of 'incrementality clauses,' detailed list of eligible projects and expenditures, and strong reporting requirements -, might be an effective way of achieving the desired spending objective.⁵⁵ For example, evidence that the accountability framework of the Gas Tax Fund is robust and potentially superior to the design of other capital transfer programs can be interpreted from the fact that the coefficient of ΔGRANT showed the potential of partial substitution when the one of GTF showed stimulation.

In relation to the two coefficients that were found to be not statistically different from zero (ΔTAXR and ΔFEES) the results are not surprising. First, it could be argued that revenue collected from taxes is assigned mainly to operational expenditures. For example, in 2011 the City of Ottawa reported that of the portion⁵⁶ of the taxes that belong to the city only 12% is assigned to "Capital Financing" (City of Ottawa, 2012a). While this is just one case, it is consistent with the finding that for every tax dollar municipalities spend \$0.08 in infrastructure. Second, user fees are mostly collected on a cost recovery basis- in other words, municipalities cannot charge more than it costs them to provide a service. Some of these user fees are transit fares, water rates, sewer

⁵⁵ As explained in Chapter 4, to limit the possibility of substitution the Federal government added an incrementality clause in the Agreements, where municipalities agreed that the federal Gas Tax revenue investment would result in a net increase in total investment in municipal infrastructure over the life of the Agreement.

⁵⁶ A portion goes directly to local school boards and conservation authorities.

surcharge, and registration and entry fees for recreation programs and facilities. User fees and charges directly fund a portion of the program or service costs. While capital expenditures could potentially be made with a portion of the collected fees to improve service delivery it is not clear what portion, if any, is diverted for this purpose.

These findings are supported by Kitchen (2004, p. 10), who argued that municipalities use annual operating revenues, such as those collected from property taxes and user fees, to finance capital spending “for assets with a short life expectancy (such as police cars) or recurrent expenditures (such as the maintenance and upgrading of sidewalks, roads, and street lightning).” This would mean that these expenditures could be reported under the FIR schedule for Revenue Fund Expenditures, and would not be captured under Infrastructure Expenditures (INFRA) as defined in the regression.

Finally, this estimation represents, to the best of the author’s knowledge, the first attempt at the empirical analysis of the flypaper effect in Canada caused by the existence of an intergovernmental grant between the Federal government and municipalities in Ontario. The results from the estimation procedures used provide support for the existence of the flypaper effect, i.e. municipalities in Ontario “are more responsive to grant windfalls than to changes in tax income” (Bojorquez, 2006, p. 14). However, given the inherent limitations in the model underlying these estimations, the results obtained should be treated with caution. Further empirical work on the flypaper effect in Canadian is necessary to confirm this tentative finding.

The next chapter will continue to explore the implementation of the Gas Tax Fund in the province of Ontario with an emphasis on the policy outputs and outcomes. Through a case study of the City of Toronto and the City of Ottawa, Chapter 7 looks at other potential impacts, including allowing municipalities to make long-term plans, choose the type of green infrastructure projects that best suit their needs, and having a closer relationship with the Federal government.

CHAPTER 7

ONTARIO III – CITY OF TORONTO AND CITY OF OTTAWA

CASE STUDIES

INTRODUCTION

This chapter focuses on the two municipalities that were chosen for the case studies, i.e. the City of Ottawa and the City of Toronto.¹ The rationale for including these two municipalities is that each represents a distinct and interesting case study. The City of Toronto,² with over 2 Million people, is the largest municipality in Canada and, as explained in Chapter 5, it is the only municipality with a direct deal with the Federal government. Their total allocation for the five years of the original agreement was \$407.2 million, and, with such a substantive allocation, the City is in the position of funding important infrastructure capital expenditures. Including the City of Ottawa,³

¹ While both case studies are addressed in each section in this Chapter, the level of detail and the way the information is presented is different for the City of Ottawa and the City of Toronto. Among the reasons for the discrepancy are: (a) Toronto's direct agreement with the Federal government; (b) Toronto's allocation to the Toronto Transit Commission (TTC); and (c) the willingness of municipal employees to participate in the study. As a result of the direct agreement, Toronto was required to draft an outcomes report, an evaluation of the program, and yearly expenditure reports. These documents provide a wealth of information not available for Ottawa, since the City was only required to submit annual expenditure reports to the AMO. At the same time, the TTC has a website that contains very detailed documents regarding their operations, long-term capital plans, budgets, and annual expenditures. Finally, getting access to the City of Ottawa's employees after the first round of interviews in 2009 was very difficult and the information provided was superficial.

² In this chapter, 'City of Toronto' and 'Toronto' are used interchangeably.

³ In this chapter, 'City of Ottawa' and 'Ottawa' are used interchangeably.

which received \$125.8 million, provides a way of assessing the potential impact of different levels of funding. Moreover, having these two case studies allows for the evaluation of how different the administration and impact of the funds is for a municipality that deals with the AMO vs. one that is accountable directly to the Federal government. For a breakdown of the Gas Tax Fund allocation over the first five years of the program see Table 21 below.

Table 21: Gas Tax Fund Allocation Over Five Years

		OTTAWA	TORONTO
FISCAL YEAR	05-06	\$15,093,912	\$48,868,000
	06-07	\$15,093,912	\$48,868,000
	07-08	\$20,122,969	\$65,157,000
	08-09	\$25,152,026	\$81,446,000
	09-10	\$50,304,053	\$162,892,000
TOTAL		\$125,766,874	\$407,231,000

Source: Canada, Ontario, AMO, City of Toronto (2005) & AMO (2005a)

The chapter proceeds in four main sections. Each section is divided in two parts, one for each municipality. The first three sections examine the impact of the program on three different aspects: municipal investment decisions; municipal operations; and municipal, provincial, and federal relationships. The fourth section of the chapter describes the policy outputs and achievement of program objectives by outlining the way the Gas Tax Fund resources were used. The analysis in these four sections focuses on the

six key principles and the three main expected outcomes that were recognized on the Gas Tax Fund Agreement. While an in-depth discussion of these can be found on Chapter 4, a summary is provided on Table 22 below.

Table 22: Gas Tax Fund - Key Principles and Expected Outcomes

AGREEMENT	
PRINCIPLES	<ul style="list-style-type: none"> • Respect for jurisdiction while recognizing the merit of inter-governmental cooperation; • Flexibility; • Equity; • Promote long-term solutions including long-term, stable and predictable funding and ongoing collaboration; • Transparency; • Accountability and reporting commitments to due diligence in the management of the Funds, to build upon existing delivery mechanisms, and to regular reporting to Canadians with respect to the use of funds and achievement of outcomes.
OUTCOMES	<ul style="list-style-type: none"> • Environmental sustainable municipal infrastructure: cleaner air, cleaner water, lower GHG emissions; • Integrated sustainable community planning and management; • Collaboration – transformative tripartite partnerships.

Source: Canada, Ontario, AMO, City of Toronto (2005)

This chapter addresses the second and third research question of this dissertation:

(a) *To what extent were the actions of implementing officials consistent with the objectives and procedures outlined in the original policy announcement and the Gas Tax*

Fund agreement? And (b) To what extent were the policy objectives attained over time, i.e. to what extent were the impacts consistent with the objectives?

PROGRAM'S IMPACT ON MUNICIPAL INVESTMENT DECISIONS

As noted in Chapter 3, besides addressing a fiscal gap, central governments might use the conditions set out in transfer agreements to leverage the actions of a local government towards achieving policy goals that will fulfill the central government's priorities. In the case of the Gas Tax, as explained in Chapter 4, the Federal government established the improvement of the quality, efficiency, effectiveness, and sustainability of environmental municipal infrastructure as general goals of the Gas Tax Transfer, as well as cleaner air, cleaner water and the reduction of greenhouse gas emissions as specific outcomes. Moreover, they encouraged municipalities to focus on long-term solutions through a flexible and predictable approach to funding that includes known future allocations, the ability to bank funds up to three years, and the ability to use funds for debt financing. Considering these policy design features, this section explores: (a) if funding priorities have changed, (b) if there has been a change in the type of projects funded, i.e. are they more focused on green infrastructure? (c) the impact on long term planning, and (d) the impact of the principles of predictability and flexibility.

City of Toronto

Recognizing Toronto's "declining vehicle occupancy rates, increased road congestion, and diminishing air quality," the City chose improving public transit as one of its high priorities in the City of Toronto Official Plan, which was approved by the Ontario Minister of Municipal Affairs in 2003 (City of Toronto, 2006a, p. 1). As a result, almost half of Toronto's capital budget goes to transit. Despite this large budgetary allocation, the City for many years has only been able to maintain the state of good repair of its current transit stock and its transit infrastructure (GT-201 & GT-207, personal interviews, 2009).⁴ As confirmed by the 2006 Capital Budget, the City's primary capital investment objective was "ensuring that existing infrastructure and capital assets [were] rehabilitated and maintained in a state of good repair [...] while remaining financially stable" (City of Toronto, 2005a, p. 1).⁵ Nevertheless, Toronto aspired to have enough resources to do more than just maintenance to achieve growth through expansion.⁶

⁴ For example, in 2009 48% of the recommended capital budget was allocated to transit (City of Toronto, 2008a).

⁵ In the 2006 Capital Budget, 67% of the resources (\$833.365 million) were allocated for state of good repair (City of Toronto, 2005, p. 1).

⁶ This goal was at the center of the disagreement, outlined in Chapter 5, with the proposed allocation formula for Ontario. As previously explained, Toronto had hoped the formula would take into account Transit ridership instead of just population. The dissatisfaction with the final outcome was expressed by one of the interviewees who believed that: (a) a larger portion of the resources should have been slotted towards transit, and (b) that there should have been a separate fund for water/sewer projects directed towards smaller municipalities (GT-202, personal interview, 2009). More specifically, from a public policy perspective, the interviewee argued that: "it all ties back to economic competitiveness, they are interlinked, and if you want our big cities to be competitive you have to get a decent transit system, especially in the largest city in Canada that represents 11% of our GDP" (GT-202, personal interview, 2009).

Once the Gas Tax Funds were in place, the City saw an opportunity to achieve this goal in the long term. As one interviewee described at length:

“Because of the delay in getting [infrastructure] money from both the Province and the feds in the late 90s and early 2000s we borrowed and we spent a lot of money. The bottom line is we did a lot of state of good repair with property tax funding, much to our disappointment. We were trying to get funding and it did not happen. Now,[the Gas Tax Fund] is coming. [While] there is still a lot of significant repairs [to be completed], the lion’s share we did do on our debt. That is why a lot of [planning] going forward is for projects and vehicles that the feds like anyways because it is for new vehicles and hopefully, [...] new subway and light rail transit lines” (GT-202, personal interview, 2009).

Due to the pressing need to replace vehicles and add vehicles for growth, Toronto’s City Council decided in 2005 to allocate all the Gas Tax Fund resources to public transit expenditures.⁷ More specifically, they decided to give the entire allocation to the City’s public transportation agency, the Toronto Transit Commission (TTC).⁸ The TTC is responsible for the construction, maintenance, and operation of all forms of local passenger transportation within the urban area of Toronto, except for railways incorporated under federal and provincial statutes, and taxis (Infrastructure Canada, 2008). Moreover, the TTC is owned and operated by the City of Toronto and is overseen by nine city councillors who make up the Commission’s Board. The Board has the authority to make planning and expenditure decisions, but they work closely with the

⁷ Details on the use of the funds are provided in the next section.

⁸ This decision was taken without public consultation because, from previous public sessions, City Council knew that the public’s message was always loud and clear, i.e. they wanted more funding for transit. As one interviewee argued, when the decision was made “there was no outcry because everyone agreed; it was one of those slam dunks if you will”(GT-202, personal interview, 2009).

Mayor's office, the Budget committee, and the City bureaucrats (GT-207, personal interview, 2009).⁹

The allocation of the resources to the TTC, as interviewees pointed out, allowed the City to complete projects they could not have afforded, and to maintain its capacity to continue to carry transit passengers without reaching a crisis point (GT-202 & GT-207, personal interviews, 2009). While the City has the option of banking the Gas Tax Fund allocation, due to this pressing need for resources, there is no money that goes to the reserves. It is all spent on the fiscal year in which it is allocated. Moreover, in the absence of this allocation, Toronto would not have been able to afford the additional debt, about \$1 billion, to fund the needed capital expenditures to achieve the same outcomes (GT-207, personal interview, 2009).¹⁰

Despite the Gas Tax Fund's impact on actual expenditures, the program does not seem to have made an impact on the City's expenditure priorities. Before the Gas Tax Agreement was signed, as previously mentioned, Toronto approved the new "City of

⁹ While only nine city councillors sit on the TTC Board, all of them have a role representing the interests of their communities. While communities are consulted directly on transit decisions that will affect them, it is the role of the councillor to be aware of the local concerns and bring them up at council meetings to make sure that those concerns are dealt with. Nevertheless, as one interviewee clarified, "they do not directly control the projects; in fact, [...] a community may want something that ultimately, at the end of the day, is either not affordable, technically achievable, or advisable. The final decision comes down to the TTC" (GT-207, personal interview, 2009).

¹⁰ More specifically, from 2006 to 2010 the target for the total affordable new debt in the City's capital budget, as recommended by the Deputy City Manager and City Financial Officer in 2006, was \$1,606 million (City of Toronto, 2005, p. 3). Moreover, even if Toronto could have afforded the amount, issuing that much debt would have increased their borrowing costs exponentially.

Toronto Official Plan,” which envisioned “little expansion of the major road system,” and reinforced “public transit as the principal means of achieving land use objectives for a more compact, diversified, urban form” (City of Toronto, 2006a, p. 1). Moreover, this plan had as a fundamental objective reducing dependence on the private automobile and increasing the competitiveness of alternative means of transportation such as public transit. With this plan, the City had already defined its funding priorities, and so the Gas Tax Fund became just a vehicle to achieve progress in meeting those objectives.

According to one individual:

“Gas tax funding does not drive or change the TTC’s capital priorities [as they are] based on asset life cycle replacement, condition assessments, or identification of new justified initiatives within the parameters of available funding. The current capital program has a significant funding shortfall, [which has been] a consistent pattern over the last several years, and the Gas Tax funding helps to fill the funding gaps, although not fully¹¹” (GT-304, personal communication, 2011).

This lack of interference in municipal decision-making is seen as one of the strengths of the program. As one of the interviewees remarked: “this is one of the real values of the Gas Tax, [...] we are not [required to] negotiate on a project by project [basis for projects that are] of federal interest, but not a City priority; these projects are City’s priorities” (GT-201, personal interview, 2009).

¹¹ As described by several interviewees, the City of Toronto has a very large funding gap for their planned base capital program. In 2009 this program was valued at approximately \$4.7 billion over five years, and there was approximately \$1.5 billion of uncommitted funding (GT-203, personal interview, 2009). So, while the Gas Tax provides some funding relief there is still a large portion of Toronto’s capital plan that requires additional funding.

In terms of influence, it could even be argued that Toronto was able to shift the Gas Tax Fund expenditure priorities, as it was able to convince the Federal government that replacement vehicles should be accepted as eligible expenditures. One of the interviewees explained: “in the past [the federal] government always wanted something that was part of growth, [such as] a new shiny bus, a new subway car; I think they understand now, and we had to have discussions, that replacement vehicles are as important as growth vehicles” (GT-202, personal interview, 2009). Toronto argued that replacement of some vehicles was necessary because, while the TTC had worked very hard trying to keep the vehicles going, they were very old and had become very unreliable. Moreover, the City explained that replacement vehicles are at the heart of the TTC’s capital funding priorities “not just because they provide for a safe, efficient and well-maintained system, but because they are critical to protecting and securing the existing ridership base” (City of Toronto, 2006a, p. 2).¹²

Similarly, while the Federal government was hoping cities would only buy hybrid buses with the Gas Tax resources, as they had done under the Canada Strategic Infrastructure Fund (CSIF), the City of Toronto was able to make the case for clean diesel buses based on the poor performance of previous hybrid purchases (GT-202, personal interview, 2009). One individual explained the situation with hybrid buses at length:

¹² As Toronto further explained, “since the TTC carries about 90% of all local transit trips in the Greater Toronto Area (GTA), relatively small percentage drops in ridership represent huge numbers of riders” (City of Toronto, 2006a, p. 2).

“[Before 2006] hybrid buses were [based on] a new technology that had not been tested in Canada, although New York had some experience with them. Hybrids were also significantly more expensive than diesel buses; there was a hybrid premium of about \$250k per bus. Under the CSIF agreement there was a requirement to buy alternative fuel buses and the Federal government would not fund non-green diesel buses. [After Toronto purchased the hybrid buses] there were some complications, part of which relates to lower than anticipated efficiency and low battery life, particularly where vehicles are utilized in higher speed routings where they cannot realize the recharging benefits of regenerative braking. Subsequent to 2009 the bus purchase decisions were reverted back to clean diesel” (GT-304, personal communication, 2011).

The failure of the hybrid buses was used by Toronto as further evidence of the “huge advantages of a choice model” in which municipalities are not required to implement policies designed at the federal level, which might disregard local priorities and needs (GT-205, personal interview, 2009). At the same time, is important to recognize that this model does not guarantee better-designed policies, as made evident by the fact that Toronto might have chosen to try hybrid buses on its own. Nevertheless, the City appreciates having the discretion to choose its projects, examine the outcomes, and establish best practices (GT-205, personal interview, 2009).

In terms of investment decisions, one of the biggest perceived benefits of the Gas Tax Fund is its predictability (GT-203, GT-205 & GT-208, personal interviews, 2009). With a predictable source of funds the City is better able to do long term planning, which allows them to better estimate their future funding needs. As one interviewee observed, while City council is presented with five year plans, Toronto has ten and twenty-year plans that are very detailed, in particular with regards to the TTC due to the scale and

scope of its projects (GT-208, personal interview, 2009). Moreover, this predictability has actually encouraged a change of mentality among municipal planners and employees who have been inspired to create long-term visions that are innovative and bold. One individual supported this point by explaining:

“There was a high degree of frustration before when it was so strings attached and project specific. [...] People police themselves when they know you are always going to be begging, [and they ask]: what is the point in even saying this one aloud? Now, knowing this predictable source of funding is coming actually enhances the visionary thinking before we even get to the core budget planning. [...] It has really begun to change people’s minds in terms of vision and strategy” (GT-208, personal interview, 2009).

On the other hand, predictability is also less costly because Toronto is not required to spend time and resources filling onerous applications and waiting for funding to start flowing, even after agreements are in place, as it is usually required to do for project based funding programs. To illustrate this point, an interviewee talked about Toronto’s experience with CSIF:

“Under CSIF it took almost four years to get an agreement. [Toronto] applied in 2003, [the Federal government] announced it in 2004, and we finally had an agreement in March 2008. [Now, in 2009,] we are still wrestling with trying to get the basic project requirements addressed. [...] There is so much administrative effort in going through all this process and it takes so long. The agreement covers 2004 to 2012, [...] and we have seen very little money of that. [The Federal Government] will say it is because we have not submitted certain things, but we move along and requirements seem to keep changing, and we end up seemingly having to redo things. We are finally moving forward, but it has taken a huge effort” (GT-203, personal interview, 2009).

Predictability also ensures that municipalities are easily able to debenture against the Gas Tax Fund if they need to (GT-207, personal interview, 2009).

Besides predictability, the other major perceived benefit of the Gas Tax Fund is its flexibility. By being flexible, i.e. not attached to specific projects, the City is guaranteed that the funding will continue to flow even if they need to adjust their priorities. If something slowed down a specific project, Toronto has a special protocol where they look at what they call “the B list” and, as long as they stay in the same dollar values, they can choose to go forward with the “B project” (GT-208, personal interviews, 2009). This protocol guarantees that the City is always working on something. As the individual further explained:

“We never slow to a halt. We sometimes have to reprioritize, but we can stay in that domain when you keep the work flowing, which is key. The way the Gas Tax flows is really the only funding vehicle, other than our own ability to take on debt and our own property taxes, that allows us to do that” (GT-208, personal interview, 2009).

City of Ottawa

In 2001 the City of Ottawa was created to “provide streamlined governance to residents and more efficient, cost-effective delivery of municipal services” (City of Ottawa, 2012d).¹³ Through amalgamation, the City became the second largest in the

¹³ In the restructuring the former Region of Ottawa-Carleton, the former cities of Ottawa, Nepean, Kanata, Gloucester, Vanier, and Cumberland; the former townships of West Carleton, Goulburn, Rideau, and Osgoode; and the former village of Rockcliffe Park were amalgamated into the new City of Ottawa (City of Ottawa Act, 1999).

Province of Ontario and the fourth largest in Canada. To address the new challenges brought on by this process, Ottawa undertook a comprehensive planning exercise. In 2002, the City of Ottawa started developing long-range financial plans that identify, among other things, the 10-year capital needs of the City and a financing scheme.¹⁴ Moreover, in 2003 the City drafted a growth plan, “Ottawa 20/20,” which has been acting as a blueprint to plan Ottawa’s future growth and development until 2023. Finally, the City developed and approved, in subsequent years, several master plans that set out infrastructure and program elements and strategies supportive of the policy direction contained in the Official Plan. The four plans are the Infrastructure Master Plan (2009), the Transportation Master Plan (2008), the Greenspace Master Plan (2006), and the Environmental Strategy (2003).¹⁵

With all of these plans, the City has a very clear picture of the types of infrastructure projects that need to be funded. As a result, more than a priority-setting tool, the Gas Tax Fund is an answer to the perennial question of: how can these needs be funded?¹⁶ As one interviewee explained, “the Gas Tax revenues are significant, and

¹⁴ The need to draft these plans emerged in 2002 during the review of the City’s budget. In the review, “staff indicated that the capital budget requests significantly exceeded the revenue available to finance the requests. Additionally, the requests would totally draw down reserve funds over the five-year period leaving no fiscal flexibility in future years. [...] Moreover, there [was] an identified gap of over \$270 million for which funding solutions were required” (City of Ottawa, 2002).

¹⁵ For the full text of the plans, see City of Ottawa (2012c).

¹⁶ Since “the City funds water and wastewater from the water bill and was already implementing a strategy to deal with capital requirements for that area, and solid waste did not have a significant capital funding problem, the only area that could benefit from these funds was transit” (City of Ottawa, 2006). In this case, this was not a problem because transit was, and continues to be, the City’s top capital funding priority (GT-213, personal interview, 2009). Based on Ottawa’s capital needs, and the program’s eligible project

therefore are important; they are one of the key ingredients in the [City's] funding mix (GT-211, personal interview, 2009)." To further illustrate how significant the resources are, this individual explained that "a 1% tax increase generates roughly 10 million dollars in additional revenue" and, for example, in 2009 the Gas Tax Fund allocation for the City was over \$50 million" (GT-211, personal interview, 2009). Moreover, by being a flexible and predictable source of funds, this transfer allows Ottawa to fund the projects in the order of priority that has been established in the City's plans.

In comparison with sporadic, one-time, transfers Ottawa has been in the position of having to fund non-priority projects just because they fitted the requirements of the particular funding program. The interviewees explained that with this type of funding there are three things that really constrain the City's choices: the set amount of money, the time frame in which the project must be completed, and politics (GT-210 & 212, personal interviews, 2009). Because the most pressing projects might cost more than the allocation, or are projected to take longer to be completed, the City chooses any project that meets the requirement just to avoid losing access to those resources. At the same time, they might have to choose a particular project to address specific political pressures.

requirements, City Council made the decision to allocate the Gas Tax Fund resources to transit related projects such as: (a) bus rolling stock additions; (b) IT, signalling, and traffic information investments that improve the quality of service; (c) investment in para-transpo services; and (d) bike lanes (GT-214, personal interview, 2009).

On the other hand, considering that the Infrastructure and the Transportation Master Plans were approved after the Gas Tax Fund was in place, it could be argued that it probably influenced some planning decisions. One of the interviewees acknowledged that this was the case by observing that the Fund, from “a big planning point of view, forced the City to come to the decision to invest [infrastructure resources] in transit facilities, cycling and pedestrian plans instead of just roads,” as it had done before (GT-209, personal interview, 2009).¹⁷

In terms of influencing long-term thinking, surprisingly, the Gas Tax Fund was taken into consideration in the City’s long range financial plans even before the Agreement was signed. In 2004, shortly after the announcement of the New Deal for Cities and Communities, the City presented its Long Range Financial Plan II (LRFP II), which included the transfer in its forecast from 2005 to 2014. Unfortunately, Ottawa made several wrong assumptions regarding the Gas Tax Fund that resulted in a capital funding gap that was larger than projected (City of Ottawa, 2006).¹⁸ First, it wrongly assumed that the allocation formula would be based on a combined transit ridership and per capita basis. As a result, the City had to adjust the forecast from 2005 to 2014 by \$20

¹⁷ In this case the word “forced” should not be interpreted with a negative connotation. Instead, the interviewee was trying to imply that the Fund encouraged City planners to establish as funding priorities projects that supported the vision “of the way the City wants to evolve” (GT-209, personal interview, 2009).

¹⁸ In the LRFP II the City also made wrong assumptions regarding other new non-tax capital sources of revenue, i.e. the provincial gas tax, the Goods and Services Tax, Development charges, and the Hydro Ottawa endowment fund and Ottawa Hydro dividends. Overall, as a result, the gap between the funding requirement for capital projects and the amount available increased from \$757 to \$1,401 million over the same 10 years (City of Ottawa, 2006).

million. Second, it assumed that the eligible projects would include capital needs that support all forms of transportation, including roads and bridges. Since this was not the case, the capital funding gap increased by \$100 million.¹⁹ Third, it did not take into account the incrementality clause that was included in the Agreement.²⁰ Since, as a result of the clause, “maximizing debt with Gas Tax Fund resources would not free up funds for other non-transit capital works” the City no longer needed to issue \$661 million in debt for transit from the \$761 million forecasted. Taking into consideration debt servicing costs, this revision resulted in an increase of \$336 million in the capital funding gap.

In addition, in terms of long-term thinking associated with the sustainability principles of the program and the encouragement to develop of Integrated Community Sustainability Plans (ICSPs), research shows that the Gas Tax Fund has had a positive effect on the City of Ottawa. First, while the need to think more in terms of sustainability emerged before the implementation of the transfer, the sustainability principles were used by those supporting the establishment of a new sustainability department as a way of making people aware of the value of sustainability planning. In the view of one individual:

“One of the challenges internally has been to help people to see the benefits of sustainability planning. If you simply talk to them about the need to create a 100 year vision, you can imagine it is pretty difficult to

¹⁹ In the original LRFP II, \$100 million in gas tax-supported debt had been applied to non-transit projects (City of Ottawa, 2006).

²⁰ As previously explained in Chapter 4, according to this clause Canada and Ontario agreed not to reduce other infrastructure funding sources, and municipalities agreed not to displace current capital investment or use the revenue to reduce municipal taxes (Canada, Ontario, AMO, City of Toronto, 2005).

get people excited about it. But, if you can hold up some very tangible benefit, [such as those associated with the Gas Tax funding], it anchors the importance of investing with the long-term in mind” (GT-211, personal interview, 2009).

In 2008, Ottawa went through a reorganisation within City Hall and one of the major outcomes of that process was a new department called Community Sustainability.²¹ The department was created “on the basis of really wanting to bring an increased focal point within City Hall around sustainability leadership” (GT-211, personal interview, 2009).

Second, the ICSPs’ requirement became a supporting driver of the work of the new department, and a source of leverage for the decision to develop a long-term sustainability plan, i.e. “Choosing our Future.”²² As one individual observed:

“[For the department], the way that the Gas Tax Fund is [focused on] sustainability is very helpful, as having the word sustainability gain prominence is quite beneficial to our work.” At the same time, “one of the advantages of the Fund is the fact that there are municipal reporting requirements for sustainability. As we have developed the ‘Choosing our Future’ project, one of the ways in which we have sold it internally is to say that there are some very immediate practical benefits, [such as] meeting those requirements” (GT-211, personal interview, 2009).

Third, while the transfer is not currently driving the priorities that are being identified as part of the “Choosing our Future” initiative, several of the strategies (e.g.

²¹ The department falls under the Infrastructure Services & Community Sustainability Portfolio, and it has four branches: Economic Development, Environmental Sustainability, Sustainability Practice and Neighbourhood Liveability, and Sustainability Planning and Development Branch (City of Ottawa, 2011).

²² According to the City, “Choosing our Future” is “an exciting initiative of the City of Ottawa, the City of Gatineau and the National Capital Commission to help Canada’s Capital Region to succeed in meeting the challenges of the 21st century. It’s about making informed choices and considering the long-term impacts of how we travel, where we live and how we build prosperous, healthy communities” (City of Ottawa, 2012e).

developing a compact and transit-friendly region, and encouraging sustainable mobility) are very much aligned with the Gas Tax program principles, and benefit from the Gas Tax resources (GT-305, personal interview, 2011) In addition, the issue of affordability of municipal infrastructure has been one of the underlying themes of the City's sustainability work and the Gas Tax Fund is very helpful in this regard.

Overall, from a long-term planning perspective, the City of Ottawa, just as the City of Toronto, sees predictability as one of the biggest benefits of the Gas Tax Fund. As one interviewee explained, historically there have been issues with stability of senior government funding and, therefore, "having a flow of funds that is understood, dependable and consistent is key in allowing the City to plan for the future" (GT-211, personal interview, 2009).

PROGRAM'S IMPACT ON MUNICIPAL OPERATIONS

As previously explained in Chapter 2, the successful implementation of a new policy depends on a number of variables: (a) amount of organizational change required; (b) governance and administration; and (c) enforcement and accountability procedures. Considering the innovative program features previously described in Chapter 4 and 5, this section explores the impact on the municipal daily operations stemming from the administrative burden of the transfer and its comprehensive accountability framework. It focuses on the program's administration, reporting, communication and audit

requirements. Moreover, considering that the Federal government wanted to ensure that the policy goals were met efficiently and effectively under the least possible amount of administrative burden, this section explores if these requirements are perceived by the municipalities as appropriate and necessary.

City of Toronto

In Toronto the administration responsibility of the Gas Tax Fund falls under the Corporate Finance Division and, more specifically, its Business Investment and Intergovernmental Finance department. The Corporate Finance Division was originally “involved in creating the impetus for the Gas Tax Fund” with several petitions to both the Federal and Provincial government for new sources of revenues for municipalities (GT-205, personal interview, 2009). In terms of administration, the Business Investment and Intergovernmental Finance department is responsible for: (a) being the bridge between the TTC and the City’s financial client group,” (b) tracking the administrative requirements and making sure they are met, (c) coordinating and running the audit of the annual funding, and (d) drafting and submitting the annual report (GT-205 & GT-206, personal interview, 2009).

In relation to the accountability requirements, the City of Toronto participated in the workshops that Infrastructure Canada held for the recipients, and it has had no problem complying with the annual expenditure reports, the required evaluation, and the

outcomes report. Moreover, as one interviewee explained, the City feels the requirements “are very reasonable” (GT-201, personal interview, 2009). In particular, when compared to the requirements of other transfers, the process is quite streamlined. As one of the interviewees remarked: “the process is as smooth as anything we have seen before; the Building Canada Fund, [for example], is the exact opposite, everything is just so bureaucratic that it really holds things up” (GT-202, personal interview, 2009).

The main concern for city officials is to be able to make the necessary commitments to move forward on their infrastructure projects and not the reporting or auditing requirements. They want to be able to spend the money to get shovels in the ground and place their vehicle orders. In one person’s view, one of the advantages of the Gas Tax Fund arrangement is that it “takes away the administration at the project level,” which means that project managers are not burdened with additional work (GT-203, personal interview, 2009).²³ This is why they have recommended to the Federal government the use of the same approach for future funds.

In the case of Toronto, the City is able to comply easily with the requirements because it has the capacity and the expertise to do so.²⁴ For example, the TTC employs a

²³ As the interviewee observed under CSIF, for example, the TTC “is driving the project managers crazy because [they] need their involvement and their input.” and the problem is that sometimes “it is hard to justify all the work [required] to try and get the money” (GT-203, personal interview, 2009). At the same time, they cannot say that \$350 million is not worth it, but in the end “it has a significant impact on the projects” (GT-203, personal interview, 2009).

²⁴ As one interviewee commented, the program’s administration fits into their existence infrastructure allowing the City of Toronto to do everything that the AMO can (GT-303, personal interview, 2011). At

sophisticated accounting methodology to keep track of the different sources of funding and the individual contributions they make to each project by year (GT-204, personal interview, 2009). This methodology is required, in part, because every contribution agreement has different requirements and the TTC has to make sure that all the rules, such as the stacking rules and the eligibility requirements, are being followed (GT-201, personal interview, 2009). The resulting spreadsheets make tracking the Gas Tax Fund resources very easy and allow the City's in-house staff, which deals with these types of requirements on a regular basis, to complete the annual expenditure reports. Additionally, one of the tactics used by the TTC to make the tracking of the Gas Tax Fund resources, as well as those of their other programs, easier is to try to apply them to large projects and to be very systematic and consistent in the kinds of expenditures covered. As one interviewee remarked: "you do not want to apply [the resources] to each and every little project because then you get into a lot of administration and audit issues."

On the other hand, for the Evaluation Report the in-house staff worked with an infrastructure consultant, and for the Outcomes Report they work in collaboration with the TTC Environment's office. While the TTC shares the Gas Tax Fund administration responsibilities with the City, according to the Agreement, neither the TTC nor the City receives a carve-out for administration or overhead.

the same time, the interviewees recognize that smaller municipalities might have a hard time with the requirements based on their lack of capacity, and the potential use of the resources in different project categories (GT-205, personal interview, 2009).

To fulfill the reporting requirements of their varied sources of funding in a timely manner, including those of the Gas Tax Fund, the TTC had to hire one new staff member in 2009. According to one interviewee, this staff addition made financial sense because anything that delays the City's annual expenditure report holds up its Gas Tax Fund resources. As the interviewee observed: "when the allocation is over \$160 million, [as it was for example in 2009-2010], the foregone interest revenue becomes way more significant than the price of having somebody there to help expedite the process" (GT-220, personal interview, 2009).

For the Integrated Community Sustainability Plans (ICSPs) the City argued that it had met the requirements because they have a sufficient number of formal plans.²⁵ Just as the AMO argued when it convinced the Federal government to change the requirement for Ontario, the City of Toronto believes that the "Province of Ontario has a very rigorous planning regime, and any municipality in Ontario would be in good shape [to meet this requirement] (GT-201, personal interview, 2009). Moreover, since Toronto has been drafting official plans for over forty years this, requirement came across as an underestimation of the capabilities of municipalities to conduct their business. As the interviewee observed:

"I first encountered the term ICSP in a report from the Roundtable on the Environment and the Economy by Mike Harcourt, and [the message] was:

²⁵ These include: The City of Toronto Official Plan (City of Toronto, 2011a); Toronto's Agenda for Prosperity (City of Toronto, 2006b); Council's Strategic Plan (City of Toronto, 1999); Clean, Green and Healthy: A Plan for an Environmentally Sustainable Toronto; (City of Toronto, 2000); and a Social Development Strategy (City of Toronto, 2001).

cities should plan. Well, [the problem is that the report] assumed that municipalities do not plan. [With this program the assumption was that] with the federal money cities will now plan, but we have been planning, we do plan” (GT-201, personal interview, 2009).

In relation to the accountability to citizens, the City acknowledges that meeting the communication objectives of the program has not been easy, but it believes that it has met the requirements. As noted in Chapter 5, Infrastructure Canada’s National Summative Evaluation of the program highlighted the “uneven representation of events and news releases [across the provinces]” (Infrastructure Canada, 2009c, p. 25).²⁶ The problem, as one individual argued, is that the federal Gas Tax contribution needs to be evaluated in the context of the overall city budget and the budget of the TTC (GT-202, personal interview, 2009). While the Gas Tax Fund is a significant contribution to those budgets, the fact that there is not an actual program around the transfer makes it difficult to make the contributions of the transfer visible to citizens. Additionally, due to the number of resources coming from different programs, which fund essentially the same kinds of projects, it can get quite complicated to make the relevant acknowledgments. One interviewee gave an example to illustrate this point:

“In the case of buses, sixty percent of the hybrid buses were [bought using funding from the] CSIF; the remaining forty percent were bought using other funding. So, when it came to decaling the buses, which is the visibility on the vehicles, we just [put the acknowledgment on all of them] because it was not worth it [to make the distinction]. What we came up with was a plan to try and keep [communication] to a minimal administration. [...] This probably gives the Federal government

²⁶ In comparison, Quebec issued 114 news releases, and hosted 42 events, and British Columbia issued 19, and hosted 13 (Infrastructure Canada, 2009c, pp. 2-16).

overexposure, but otherwise we could not handle it (GT-203, personal interview, 2009).

As a result, the City sustains that it is doing everything it can, sometimes even going overboard, to make sure the credit is given to the appropriate government for their financial contributions (GT-202, personal interview, 2009).

On the other hand, while there is a desire to communicate with the public, another problem the City faces has to do with timing. First, as previously mentioned in Chapter 5, there were two elections that happened after the implementation of the Gas Tax Fund program. These events affected the City's communications efforts because the signage plan that was being rolled-out had to be stopped in 2007 due to the provincial election campaign.²⁷ Then, the plan had to be changed as a request of the new staff that came in after the federal election in 2008 (GT-203, personal interview, 2009). Second, the City has many infrastructure projects going on at the same time. This makes officials think carefully which kinds of announcement to make, and when to make them, "not because there is a reason to keep them from the public, but because there is so much news" (GT-201, personal interview, 2009). To address this problem they make sure that the communications efforts are coordinated and try to avoid repetition.²⁸

²⁷ In the fall of 2007 the Government of Canada asked municipalities to postpone making announcements on projects funded through the Gas Tax until the provincial election had taken place (AMO, 2007b). In 2008, the same request was made during the fall federal election campaign (AMO, 2008d).

²⁸ Notably the City of Toronto had, for a while, a page on their website dedicated to the program: "Canada's Gas Tax Fund – Keeping Toronto Moving!" (City of Toronto, 2012a). This page was active

Overall, the interviewees from Toronto feel that the accountability requirements are appropriate and sufficient. Trying to dispel the misconception that the Gas Tax Fund lacks accountability an interviewee argued:

“With the Gas Tax there are checks, audits, provisions; [...] there is follow-up. Sure we have the money, but it is in our best interest to continue to follow the rules of the plan because [we know] there is more money coming; and you jeopardize your future access to those funds if you were to misuse them. So, it works really well” (GT-207, personal interview, 2009).

Moreover, they argued that beyond the accountability provisions of the Gas Tax Fund, a mature order of government as Toronto, “which delivers hard services to over two and a half million people,” counts with formal “accountability structures” and “democratic processes” and it is constantly faced with “extreme media and public scrutiny” of the actions of council (GT-207 & GT-208 personal interviews, 2009). As one interviewee further suggested, as a result of the Bellamy inquiry²⁹ the City’s accountability structure has been, and continues to be, strengthened as the inquiry’s recommendations are addressed (GT-205, personal interview, 2009).³⁰

until 2010 and it was a great source of information as it had the annual expenditure reports from 2005 to 2009, the Outcomes Report, and other useful background documents.

²⁹ In 2002 Madame Justice Denise Bellamy headed the public inquiry convened to determine any wrongdoing in a computer leasing arrangement the City reached with MFP Financial Services after an investigation determined that Toronto had paid almost twice its original budget of \$43 million for the computers. The final report of the inquiry, released in 2005, made 241 recommendations for the City’s future conduct, including the hiring of integrity commissioner to oversee the procurement process. For more information on the inquiry, see Sutton (2005).

³⁰ For example, because of the inquiry, David J. Mullan was appointed as integrity commissioner in 2004 to provide independent and consistent advice in upholding city council’s code of conduct and to support high standards and principles (City of Toronto, 2004). Among the other steps that were taken by the City to strengthen the accountability structure where: “(1) tougher lobbying guidelines and controls through the

Interestingly though, despite their administrative capacity and their agreement with the accountability framework, the City has an issue with the timing of the Audit. Since the Audit coincides with the drafting of their capital budget, and the audits for other transfer programs, the TTC finds it hard to meet the dateline and, as a result, the entire Gas Tax Fund payment gets withheld (GT-205, personal interview, 2009). For Toronto, because of the magnitude of the grant, this represents a very significant and disproportionate penalty.³¹ In this regard, interviewees believe that it would be better if there was either more flexibility in the dateline of submission, or a modest fixed penalty, such as a 5% holdback, that still maintains the incentive for promptly submission (GT-206 & 206, personal interview, 2009).

City of Ottawa

In the case of the City of Ottawa, the administration of the Gas Tax has had a different impact on municipal operations for several reasons. First, the City deals with the AMO instead of directly with the Federal government. This means that they have the support of the AMO, who as noted in Chapter 5, has been working hard with municipalities to address any operational and administrative issues and concerns.

introduction of a Lobbying By-law, Lobbyist Registry and Lobbyist Registrar; (2) strengthening of the City's Purchasing policy; (3) the introduction of the Toronto Public Service Guide for City employees, which includes strong guidance on staff ethics; (4) creating the City's Mission, Values and Ethics workshop for senior managers; (5) the introduction of the policy framework for Toronto's accountability officers; (6) the implementation of a Management Controls Checklist for staff involved in procurement; and (7) strengthening the ability of staff to make recommendations free of political influence" (City of Toronto, 2010).

³¹ As the individual remarked, "in 2010 the hold back would be 80 million dollars for a small technical document that is largely like last year's" (GT-205, personal interview, 2009).

Moreover, it means that they can use the online reporting module created by the AMO to ease the burden of the program's annual reporting requirement. Second, Ottawa does not have an equivalent to the TTC. This means that, while the money was still allocated to transit, the administration of the resources has a different governance structure and the in-house staff is responsible for a broad portfolio.³² Third, since it was the AMO's responsibility, the City was not required to submit an independent evaluation of the program.

In terms of administration, the Gas Tax Fund represents an additional source of revenue that needs to be considered when making planning and budget decisions (GT-215, personal interview, 2009). Just as with other transfer payments, the City's goal is to identify how it can finance capital projects in a way that maximizes the use of its allocation. As a result, for projects that meet certain financing rules, instead of applying the resources directly, Ottawa "gets creative and issues debt, through, for example, municipal bonds (GT-214, personal interview, 2009). Then, it uses Gas Tax Fund resources to pay the resulting principal and interest."³³ This way, as one individual

³² The Gas Tax Funds fall under the responsibility of the Infrastructure Services and Community Sustainability Portfolio, which includes, Transit, Solid Waste, Water, Waste Water, Planning and Growth Management and Infrastructure Services (Engineering) Departments.

³³ In 2010, for example, "the City claimed \$101.4 million worth of eligible expenses under the Gas Tax Fund, and \$7.3 million was claimed to pay for interest and principal on Gas Tax Fund related debt for a total federal Gas Tax utilization of \$108.7 million" (GT-305, personal interview, 2011).

explained, “only a portion of the resources are used, and they get spread out on a number of years to get paid back, just like a mortgage” (GT-214, personal interview, 2009).³⁴

Because Ottawa does not have the equivalent of the TTC, the decisions about the City’s capital program are taken by a department under the Infrastructure Services and Community Sustainability Portfolio. Once the required expenditures have been identified, the staff in Budget and Financial Planning determine how best to utilize all sources of revenue to fund the projects (GT-214, personal interview, 2009). In the case of Gas Tax Fund, the decisions are straightforward because of council’s decision to make it a dedicated source of financing allocated to transit. This means, as one interviewee argued, that transit projects are not competing with parks and recreation, water or sewer capital needs for funding (GT-213, personal interview, 2009).

In relation to the reporting requirements, the City has a problem with the Audit. While Toronto only had an issue with the timing of the Audit, Ottawa believes that having a full audit every year is not necessary. First, as one individual argued, “the money comes in and is spent on the priority that council has identified, i.e. transit, and [the decisions] are all on the public record” (GT-213, personal interview, 2009). Second, the audit for the Gas Tax Fund, from an accounting perspective, has a very low

³⁴As the individual further explained, “as opposed to, for example, using \$10 million to fund a \$10 million project, you issue debt for the same amount and you only use \$1 million per year for ten years or so, to pay back the principal and interest.”

materiality³⁵ but requires a disproportionate amount of work and expenditure of resources³⁶ (GT-214, personal interview, 2009). Third, there is the precedent that was set for the transfer of the provincial gas tax, which requires periodical, but not annual, audits that are completed by provincial government auditors (GT-215, personal interview, 2009).

To ease the burden of the audit and to streamline the administration of the resources, just as Toronto, Ottawa has chosen “to concentrate the Gas Tax Funds on a limited number of large scale transit projects with a high dollar value of expenditures such as bus purchases” (GT-305, personal interview, 2011). “Since most expenses for these types of projects are based on a reduced number of invoices and or vendors,” as one interviewee explained, this “reduces the amount of staff effort required to pull documents for the audit” (GT-305, personal interview, 2011).

For the ICSPs, as previously explained, the City took advantage of the requirement as a source of leverage to gain support from Council to develop one.

According to the “Choosing our Future” website:

This ICSP is “a multi-year joint planning initiative that will prepare the National Capital Region to face the challenges and opportunities of the 21st century by integrating the three central concepts of sustainability, resiliency and liveability into all facets of planning, design and governance. This important joint initiative will help define a 100-year

³⁵ Materiality is an expression of relative significance or importance of a particular matter, in this case the Gas Tax Fund, in context to the overall City’s financial statements.

³⁶ An audit of this kind cost over \$10,000 (GT-214, personal interview, 2009).

vision and 30-year action plan for the future, positioning the Cities of Ottawa and Gatineau, as well as the National Capital Commission, as proactive rather than reactive to future change. At its core, six principles guide the formulation of plans for the future of the Region: long-term thinking; local and global vision; one planet; integration of systems; diversity and creativity; and, learning and cooperation” (City of Ottawa, 2010a).

According to one interviewee, the City’s plan should be ready in early 2012 (GT-305, personal interview, 2011).

In terms of meeting the program communications’ requirements, research shows that there is no evidence of any remarkable attempt by Ottawa to meet them. While one of the interviewees from the City argued that “when you have a partner that is providing funds it makes sense to make sure that you are acknowledging [their contribution], particularly if you want to get more” (GT-211, personal interview, 2009), the communications efforts are limited to accounting information in its annual budget documents and a few mentions in some of the City’s annual reports.³⁷ Moreover, in many instances the mention is for the ‘Federal/Provincial Gas Tax Program.’ The fact that the Gas Tax Fund is bundled with the provincial Gas Tax program in these communications is a problem because, from an accountability perspective, it makes it difficult to appreciate and/or track the use of funds and their impact.

³⁷ In the budgets documents, i.e. their consolidated financial statements and in their operating and capital budget, the mentions are limited to lines that report Gas Tax Fund amounts and a list of projects funded with the resources every year.

Interestingly several of the interviewees claimed that Ottawa was probably meeting the requirements, but were unable to provide a concrete example (GT-209, GT-210, GT-211 & GT-214, personal interviews, 2009). The only City document that was found to discuss the program and its impact in more detailed was the Long range Financial Plan II and III.³⁸ Moreover, a search in the City's website did not produce any relevant results for 'Federal Gas Tax Fund.'³⁹ To address this issue, according to an AMO interviewee, in early 2012 the City was working with Infrastructure Canada to find potential communications opportunities (GT-310, personal communication, 2012).

Overall in Ottawa, according to one individual, "there has been a slight increase in workload stemming from the reporting and administrative requirements, particularly at year end to meet the audit requirement," but not enough of an increase to warrant hiring additional staff (GT-305, personal interview, 2011).

PROGRAM'S IMPACT ON RELATIONSHIPS

As previously explained in Chapter 4, the Government established the achievement of transformative tripartite partnerships as a specific outcome of the program. Moreover, it wanted to foster collaboration based on the principle of respect for provincial and territorial jurisdiction while being responsive of local needs. Considering

³⁸ As previously mentioned, LRFPII included a mention of the fund even before the Agreement was signed.

³⁹ Several word combinations related to the Gas Tax Fund were attempted both in the City's website and through Google.

this expected outcome, this section explores if the relationships between the Federal government, the AMO, and the municipalities changed as a result of the implementation of this program.

City of Toronto

For Toronto, being a direct signatory to the Gas Tax Fund agreement was really important because it meant that that the City would not be required to work through an intermediary, i.e. the Province or the AMO, when dealing with the Federal government (GT-201, personal interview, 2009). Interviewees provided different rationales to explain why the City of Toronto was able to become the only municipality in Canada with this direct arrangement. Among the rationales mentioned were: (a) that the City of Toronto is the sixth largest government in Canada,⁴⁰ which means they are not unsophisticated and have plenty of experience dealing directly with all levels of government; (b) they are larger than Montreal by the size of Vancouver, and larger than all the Atlantic provinces combined; and (c) they have the City of Toronto Act, which allows them to deal directly with the Province, instead of having to go through the AMO, and establishes a comprehensive oversight and accountability structure to which they are bound (GT-201, GT-202, GT-203, GT-205, GT-207 & GT-209, personal interviews, 2009).

⁴⁰ As further explained, the National government is the first, Quebec, Ontario, British Columbia and Alberta being the next four, and the City of Toronto, with its close to 55,000 employees, over 12 billion dollars in direct budgets (once you include the capital and operating budget of the TTC), the sixth (GT-207, personal interview, 2009).

This direct relationship is perceived as quite positive; “night and day now compared to what it was” and “getting exponentially better with time” (GT-202, personal interview, 2009). As one interviewee candidly remarked:

“We have a relationship now where we will probably be meeting quarterly for the big ministries, like infrastructure, and [for the smaller ministries] it will be like twice a year. That never happened. I have been in this silly business for over 30 years, and when I first started I could not believe how you did not talk to the federal or provincial governments, as we should have been [doing]. It has been a long struggle for municipalities, but it is happening worldwide and, as usually, we are ten years behind the rest of the world with that” (GT-202, personal interview, 2009).

Moreover, one interviewee argued that the regularity of the exchanges between the city staff and federal officials is really building their capacity and professionalism, changing employee morale, and even enhancing their sense of responsibility to make the new direct relationship successful (GT-208, personal interview, 2009). On the other hand, because the City is the direct recipient of the allocation, there is limited interaction of the TTC with the Federal government related to the Gas Tax Fund (GT-304, personal communication, 2011).

As a result of this improved direct relationship, the City also feels that the Federal government has been more “open and accommodating” when dealing with problems related to the required annual Gas Tax reports (GT-206, personal interview, 2009). In fact, they have been able to submit a draft of the document before the due date to get preliminary feedback. This has been very useful, as one interviewee explained, because “it increases the chances of success of the final document, and it reduces the risk of

delay” in receiving the funds due to complications with the report (GT-205, personal interview, 2009).

While there was a concern that other cities might feel a resentment towards Toronto as a result of this unique deal, evidence suggests that it has not been the case (GT-202, personal interview, 2009). The reason for this, according to one interviewee, is that at the time the agreements were signed Minister Godfrey and Mayor Miller worked really hard building a consensus between the urban and rural municipalities by making sure they understood what was at stake and by presenting clear reasons for the choices that were made (GT-208, personal interview, 2009). At the same time, there is also no resentment between the AMO and Toronto because both parties understand that the City decision to leave the Association preceded the establishment of the Gas Tax Fund. As one interviewee explained, they work together in many initiatives, and there has been no conflict in their working relationship as members of the Gas Tax Fund Oversight Committee (GT-216, personal interview, 2009).

City of Ottawa

Since the City of Ottawa deals with the AMO for the administration of the funds, the Finance and Budgeting department has not had any direct contact with the Federal Government as a result of the Gas Tax Fund, nor has its relationship with the Province

changed in any way (GT-315, personal interview, 2011).⁴¹ Interviewees did emphasize that they have a very good working relationship with the AMO. They acknowledge the support that AMO has given them when they required clarification on the ability to claim federal Gas Tax funding for debt servicing costs, and they appreciate the efforts of the AMO in ensuring the City gets the funds on a timely basis (GT-315, personal interview, 2011).

POLICY OUTPUTS AND ACHIEVEMENT OF PROGRAM OBJECTIVES - USE OF THE GAS TAX FUNDS

The stated objectives of the Gas Tax Fund, as previously highlighted in Chapter 3, included: (a) foster vibrant, creative, prosperous and sustainable cities and communities across Canada; (b) enable all Canadians to achieve a higher quality of life and standard of living; (c) develop environmentally sustainable municipal infrastructure; and (d) enhance existing infrastructure to aid in their economic, social, environmental and cultural development. Moreover, the Federal government established cleaner air, cleaner water and the reduction of greenhouse gas emissions as specific outcomes.

In the case of the Gas Tax Fund program, the most tangible policy outputs are the additions of, and/or improvements to, municipal infrastructure; i.e. the projects to which the Gas Tax Fund resources are applied. The previous chapter, Chapter 6, outlined the

⁴¹ It is not clear which department is dealing directly with Infrastructure to address the communications issues previously identified. Nevertheless, even if that communication is happening, it could not be qualified as a “transformative partnership,” which was the goal of the program.

policy outputs between 2005 and 2008 of all the municipal recipients in Ontario, with the exception of Toronto, by eligible project category. While this overview revealed interesting trends, it did not provide any detail as to which specific projects were funded under those categories or how are they meeting the expected outcomes. Considering the program's objectives this section explores: (a) how the City of Toronto and the City of Ottawa applied the resources to their projects, (b) how these projects meet the program's objectives; and (c) how are they expected to achieve the expected outcomes.

City of Toronto

As previously explained, to make the tracking of Gas Tax Fund expenditures easier, the TTC chose to apply the resource in a very systematic and consistent way to three large projects. Between 2005 and 2008 the Toronto applied the total Gas Tax Fund allocation (\$81.5 million) towards rolling stock for the purchase of 430 Orion VII low floor diesel buses, 190 Orion VII low floor electric/hybrid buses and 156 Bombardier New Toronto Rocket 6-car train sets. For a detailed description of the expenditure see Table 23 below.

Table 23: Toronto Gas tax Fund Expenditures, 2005-2008

Year	Project	Total Expenditures		GTF Contributions		Other Federal Funding	Vehicle Type
		Amount (\$M)	# Vehicles	Amount (\$M)	# Vehicles		
2005	Buses (R&NG) ¹	\$137.2	250	\$48.9	141		Orion VII diesel buses ²
2006	Buses (R&NG)	\$148.9	80	\$25.1	53	CSIF ³	Orion VII diesel buses
	Subway cars (R&NG)	\$105.5	234	\$23.8	152	CSIF: 78 of 234	Bombardier 6-car train sets ⁴
2007	Additional Buses for RGS ⁵	\$49.0	100	\$32.4	67		Orion VII diesel buses
	Subway cars (R&NG)	\$89.1	234	\$32.7	156	CSIF: 78 of 234	Bombardier 6-car train sets
2008	Buses (R&NG)	\$253.8	190	\$47.3	106	CSIF: 84 of 190	Orion VII diesel buses
	Subway cars (R&NG)	\$77.4	234	\$34.2	156	CSIF: 78 of 234	Bombardier 6-car train sets
2005-2008 TOTAL				\$81.5			

Notes:¹ R&NG = Replacement and normal growth² Orion VII low floor diesel buses³ CSIF = Canada Strategic Infrastructure Fund⁴ Bombardier New Toronto Rocket 6-car train sets⁵ RGS = Ridership Growth Strategy

Source: Toronto (2009, p. 11)

As can be seen in the table, Toronto applied \$106.4 million from their allocation to the purchase of low floor diesel buses. This contribution represented 31.8% of the

total cost of the buses (\$335.1 million). At the same time, it applied \$47.3 million to electric/hybrid buses, which covered 18.6% of the total cost (\$253.8 million). The last portion of the allocation (\$90.7 million) was used for subway cars covering 33.3% of the total municipal expenditure during this period (\$272 million).⁴² All of these purchases were made as part of the TTC's base capital program that will amount to an investment of over \$6 billion between 2006 and 2016 (City of Toronto, 2006a, p. 1).⁴³

For both the buses and subway car purchases, Toronto utilized other federal and provincial sources of funding, as well as, its own sources of revenue. For a breakdown of the percentage contributions from all the sources of revenue used to fund these projects see Figure 14 below. As can be seen in the figure, the Gas Tax Fund represents the most significant source of funding. In the case of the buses, it represents over 25% of the total contribution. The two other sources of funds that come close to that level of contribution are the "Ontario Bus Replacement Program (OBRP)"⁴⁴ and the "Federal Public Transit Capital Trust."⁴⁵ In the case of the subways, the contribution is even more significant as it

⁴² This allocation does not represent the total cost of the 156 trains, but instead it is the contribution that was allocated towards the purchase of these vehicles between the 2005-2008 fiscal years.

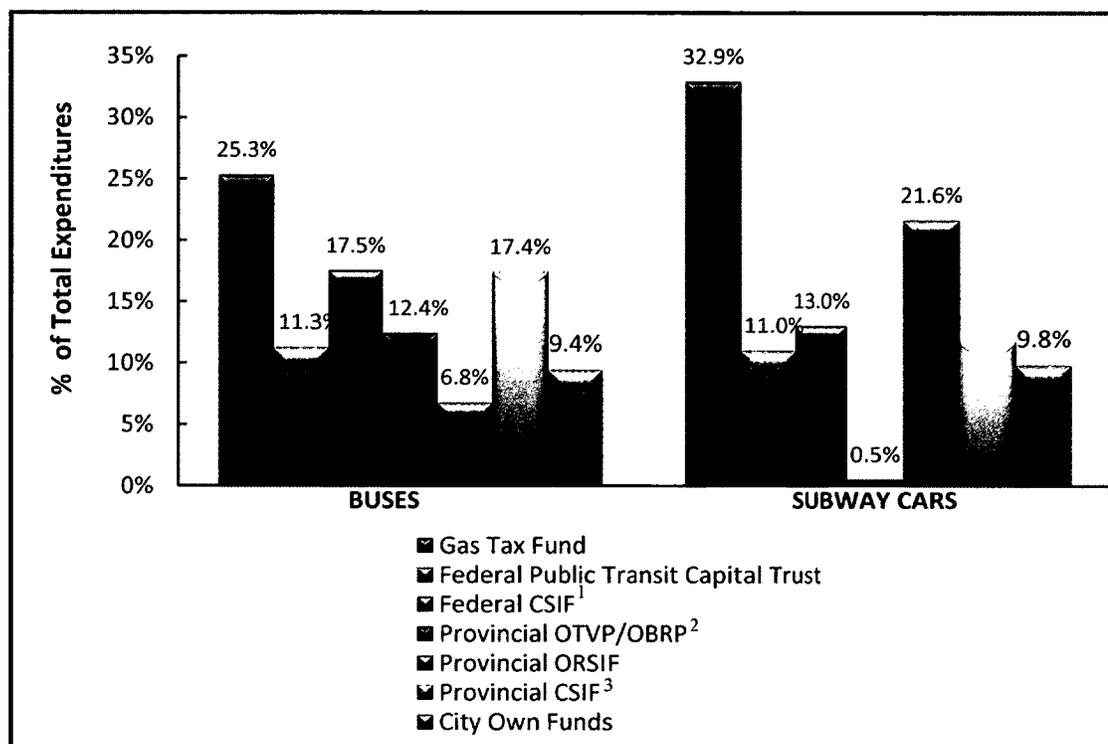
⁴³ The majority of the base capital requirements (53%) relates to vehicles including purchase of 234 subway cars, 1410 buses, 159WT vehicles, 44 SRT cars and 196 streetcar rebuilds/purchases (City of Toronto, 2006a, p. 4).

⁴⁴ The OBRP (and its predecessor program, the "Ontario Transit Vehicle One-Third Funding Program" or OTVP) was initiated in 2002 to assist in the replacement of ageing transit buses because the Province recognized that "ageing buses contribute to higher operating costs, increased emissions, reductions in service and reliability, and delays in achieving system accessibility" (Simulik, 2010).

⁴⁵ "The Public Transit Capital Trust involved \$900 million in federal funding for transit capital projects (rapid transit expansion or renewal, transit stations, rolling stock and transit technologies) from 2006 through 2009 across Canada. Funds are allocated on a per-capita basis to provinces and territories, and then on a ridership basis within provinces" (Canadian Urban Transit Association, 2008).

approaches almost 33%. The one other significant source of funding (21.6%) is the Ontario Rolling Stock Infrastructure Funding (ORSIF) program.⁴⁶

Figure 14: Sources of Funding for Buses and Subway Cars Purchases (2005-2008)



Notes:

¹ CSIF = Canada Strategic Infrastructure Fund

² OTVP: Ontario Transit Vehicle Program | OBRP = Ontario Bus Replacement Program

³ ORSIF = Ontario Rolling Stock Infrastructure Funding

Source: Adapted from information available in Enst & Young (2010)

⁴⁶ In 2007 the Province of Ontario gave the City a one-time transfer of \$150.0 million in support of Toronto's unique rolling stock requirements to fund expenditures for 2006, 2007, and 2008. This payment replaced funding expected from the OTVP during these years, for funding on other vehicles and bus overhauls (City of Toronto, 2008).

By contributing to the urban transit infrastructure, the City argued that these purchases have a “direct impact on the liveability of the region, the competitiveness of the regional economy and the quality of life in the City of Toronto and the GTA” (2006a, p. 1).⁴⁷ More specifically, Toronto argued in its first Gas Tax Fund annual expenditure report (2006a, p. 7) that research has showed that in Canada public transit “contributes significantly to the health of cities and ultimately to the wealth of the economy, and that it is always far more efficient than the automobile.”⁴⁸ The central idea is that investments in the public transit system that contribute to the achievement of a “fast, reliable, comfortable, and inexpensive” service make urban passengers rely less on the automobile (City of Toronto, 2006a, p.2). This provides a “key opportunity to making urban transportation more sustainable and to achieving measurable improvements in air quality” (City of Toronto, 2006a, p.10). Moreover, it listed research evidence that supported the contribution that transit can make to the Gas Tax Fund expected outcomes of cleaner air and reduction of greenhouse gas (GhG) emissions.⁴⁹ For a sample of the evidence, see Table 24 below.

⁴⁷ This directly addresses the stated program objectives previously identified.

⁴⁸ The City argued that this contribution is made through: congestion reduction, property impacts, increased labour mobility, personal productivity, job creation, and public health and safety benefits (City of Toronto, 2006a, p. 13).

⁴⁹ The contribution of transportation related gasoline and diesel fuel combustion in Toronto to GHG and criteria air contaminants emissions was also outlined in detail in Toronto’s Outcome Report. For more details, see City of Toronto (2009).

Table 24: Evidence of the Benefits of Transit to Gas Tax Fund Objectives

Objective	Evidence
<p>Reduction of GhG Emissions and Cleaner Air</p>	<ul style="list-style-type: none"> • The Federal government’s “Transportation Climate Change Table” concluded that “fast, convenient, safe and reliable transit service is fundamental to any meaningful strategy to reduce GhG emissions from urban passenger transportation” • Of Canada’s total GhG emissions (in 1997), the transportation sector emitted 27%, of which about 8% were from urban passenger travel, while less than 0.3% were caused by public transit operations • Transit has a substantial GhG emission reduction potential by shifting passenger travel from cars onto public transit • Public transit creates 65% fewer GhG emissions than automobile travel for each passenger-kilometre of travel • The transportation sector is the biggest source of urban air pollution in Toronto causing up to 90% of carbon monoxide emissions (eCO₂), 83% of nitrogen oxide (NO_x) emissions and 60% of sulphur dioxide emissions; these figures would be even worse without public transit • A full bus removes about 40 single occupant vehicles from the road, which results in an avoidance of about nine tonnes of air pollutants annually

Source: City of Toronto (2006a, p. 9)

In relation to the specific vehicle purchases, when compared to regular buses, the Orion VII hybrid buses have several advantages: (a) an approximate 35 percent improvement in fuel economy; (b) less maintenance required; and (c) reduction of the particulates spewing out of the tailpipe by about 90 percent – NO_x emissions are reduced by about 40 percent, and GhG emissions overall are reduced by about 30 percent

(Kanellos, 2006). The one disadvantage is their price.⁵⁰ At the same time, the Bombardier 6-car train sets also have several benefits over previous subway cars purchased. Among these benefits are: “an increased passenger capacity; an electronic information system; an improved ventilation and air conditioning system with increased cooling capacity; and, increased energy efficiency and service reliability” (Bombardier, 2011).

In relation to specific outcomes, the City recognizes that there are too many variables that affect transit ridership to draw a direct one-to-one relationship between individual investments and improvements in ridership levels and environmental outcomes (City of Toronto, 2009, p. 13). Nevertheless, the TTC has estimated some potential outcomes based on the fact that the vehicles purchases made with Gas Tax Fund resources and the Public Transit Fund are expected to accommodate 190 million riders per year:

“Factoring in average auto occupancy rates, these investments eliminate an estimated 160 million car trips per year, yielding a proportionate reduction in CO₂ and smog causing pollutants. On average a passenger trip on the TTC is twice as fuel efficient and produces less than half the emission of an equivalent car trip” (City of Toronto, 2009, p. 13).

While the subways cars were scheduled to be delivered between 2009 and 2011, the bus purchases were all in service by 2008, and contributed to a reported: 8.35% increase in the TTC’s annual ridership, an 8.45% increase in the TTC’s system capacity, and an 17.19% increase in the size of the bus fleet from 2005 (City of Toronto, 2009, ps.

⁵⁰ While a standard diesel bus might cost \$250,000 to \$280,000, and Orion VII hybrid bus costs around \$488,000 (Kanellos, 2006).

14&15). Moreover, they reduced the average age of the bus fleet from 10.8 years to 6, and the number of buses that were more than 15 years old from 569 to 207.

Looking towards the future, the Toronto sees three problems with the Gas Tax Fund that it believes should be addressed to ensure that municipalities are able to continue to meet successfully the program objectives. First, the need to clarify the eligibility of projects related to overhauling buses, subways cars, and rail vehicles. Based on the agreement, according to one individual, these expenditures fall into a gray area (GT-203, personal interview, 2009). While Toronto has not had any problems using the money for this purpose, the individual believes that the Government needs to officially recognize the importance of overhauling versus replacing and how different it is from simple maintenance.⁵¹

Second, the allocation is not indexed to construction cost increases or inflation, which means that with each passing year municipalities are able to do less with the money (GT-205 & GT-203, personal interviews, 2009). Third, reliance on the census information is perceived as troublesome (GT-206, personal interview, 2009). While it is almost certainly the most reliable source of the information, for high growth areas it is

⁵¹ By allowing municipalities to overhaul their fleets, they are able to avoid disruption of services and giving the stock extra life when replacements are not financially feasible.

not updated with the speed that would be required, which means the City's infrastructure needs cannot be adequately addressed.⁵²

City of Ottawa

While the City of Ottawa also claimed to attempt to focus the expenditures of Gas Tax Fund resources in fewer projects for reporting purposes, the research revealed that between 2005 and 2008 12 projects were funded with the resources. This number increased significantly in 2011 as the City had reportedly allocated the funds to 28 more projects (AMO, 2011). Table 25 below outlines in detail the projects funded by the City of Ottawa between 2005 and 2008. The table outlines total project cost, the Gas Tax Fund contribution, the expected outcome, and the description of the project.

Table 25: City of Ottawa Projects Funded with Gas Tax Fund resources 2005-2008

Project	Transitway Rehabilitation		
Project Cost	\$6,599,200.00	Total Funds Used	\$349,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> This program is comprised of a series of projects that serve to maintain, rehabilitate and protect the City's investment in transit roadways and structures. The activities include asphalt overlays, rehabilitation of concrete, and pavements and other surface repairs/rehabilitation works at transit stations 		

⁵² According to the interviewee, the 2006 census numbers had some serious issues that resulted in Toronto's population figures, in which the first five year allocation was based, to be under-represented. To illustrate the impact, the individual explained that in 2009 Toronto's allocation was \$10 million less than they had expected because of the census (GT-206, personal interview, 2009).

Project Transit Facility Operational Response			
Project Cost	\$16,815,000.00	Total Funds Used	\$647,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> The Operational Response program, also managed by the Real Property Asset Management Branch (RPAMB), is intended to address legislative requirements, health and safety practices, compliance orders, risk management initiatives, repairs, and upgrades to protect assets, operational delivery improvements, efficiencies and harmonization initiatives. Projects will result in improved efficiency of a facility, from an operational, programming and public use perspective. 		
Project Bus Equipment Replacement Program			
Project Cost	\$13,372,000.00	Total Funds Used	\$1,320,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> This program is designed for the timely replacement of existing bus equipment and shop equipment that has reached its useful life. To keep over 900 buses on the road, as well as to ensure the appropriate level of service, various types of tools and equipment require replacement on an ongoing basis, dependent upon age, usage and function. The impact of not proceeding with these larger projects along with ongoing tool repairs/replacements will be to reduce service levels and lead to increased repair times and costs. 		
Project Bus Refurbishment Program			
Project Cost	\$83,519,000.00	Total Funds Used	\$780,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> This program is designed to extend the life of over 900 buses in the fleet from the manufacturer's average 12 year design life to the City's planned life cycle of 18 years. As each bus approaches the nine year mark, they are subjected to periodic appraisals and scheduled for refurbishment according to an assigned priority. This program complements the ongoing maintenance and repair functions and is an efficient and cost effective way of putting the optimum number of safe buses on the road daily. Failure to do this work would result in fewer buses for revenue service. 		

Project Transit Facility Retrofit/Lifecycle			
Project Cost	\$25,628,809.00	Total Funds Used	\$869,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> • The City owns and operates 10 buildings, 34 transit stations, 5 light rail stations, 7 Park and Ride lots and 5,600 bus stops, with a total value in excess of \$237M, directly supporting OC Transpo operations. • The RPAMB, through its Comprehensive Asset Management Division, ensures that buildings are able to provide continuous uninterrupted support to city programming by developing and implementing a specific life cycle renewal plan for each building and building component. • This capital program entails a wide assortment of major repairs and replacement work, and condition audits of the asset inventory. The completion of this work will ensure that city transit facilities continue to support core-mandated programs and services and will minimize the number of unforeseen failures, thereby avoiding costly repairs and loss of revenue. 		
Project Bus Additions			
Project Cost	\$212,817,000.00	Total Funds Used	\$7,365,000.00
Outcome	Cleaner Air	Year Funds Used	2005, 2007
Description	<ul style="list-style-type: none"> • Program objective is to purchase sufficient buses to increase transit service by approximately 3% per year to reach the Transportation Master Plan goal of 30%. • This additional capacity is required to support new development in the suburbs, infill developments in older parts of the City and a small improvement in the peak period modal share. 		
Project Transitway Structures			
Project Cost	\$6,741,400.00	Total Funds Used	\$601,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> • This program provides for the engineering and construction activities relating to repair and rehabilitation of various transitway structures to address deficiencies and to extend their service life. The size and complexity of the projects vary considerably. The activities are scheduled based on needs identified through the Structures Inventory Management System. 		

Project Integrated Voice Response System			
Project Cost	\$2,477,100.00	Total Funds Used	\$54,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> The purpose of this project is to provide the hardware, software and other information technology services required to support the business of Para Transpo Major project deliverables: (1) upgrades and new functionality for Para Transpo computerized scheduling and dispatch system hardware and software; (2) upgrades and enhancements to Para Transpo radio system; and (3) upgrades and enhancements to other core business applications 		
Project Transit Vehicle Information Systems			
Project Cost	\$7,416,300.00	Total Funds Used	\$347,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> The purpose of this project is to implement a SmartBus system in all Transit Services revenue vehicles. This system uses a GPS system to track vehicle movements and monitor schedule adherence. Major project deliverables: (1) enable all Transit Services revenue vehicles to be monitored in real time and improve on-street service delivery; (2) improve employee and passenger safety; (3) improve efficiency, reduce operating and maintenance costs; (4) increase service reliability, schedule adherence, and increase ridership; (5) improve communications between service controllers, dispatch and operating staff. 		
Project Transit Computer Systems - New Initiatives			
Project Cost	\$23,703,500.00	Total Funds Used	\$223,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> The purpose of this project is to provide the hardware, software and other information technology services required to support the business of OC Transpo (Transit Services). Major project deliverable - Support of Transit Services scheduling and service control applications, including upgrades and enhancements, core business applications, public information systems, radio systems, Closed Circuit Television Systems, including upgrades, enhancements and new installations. 		

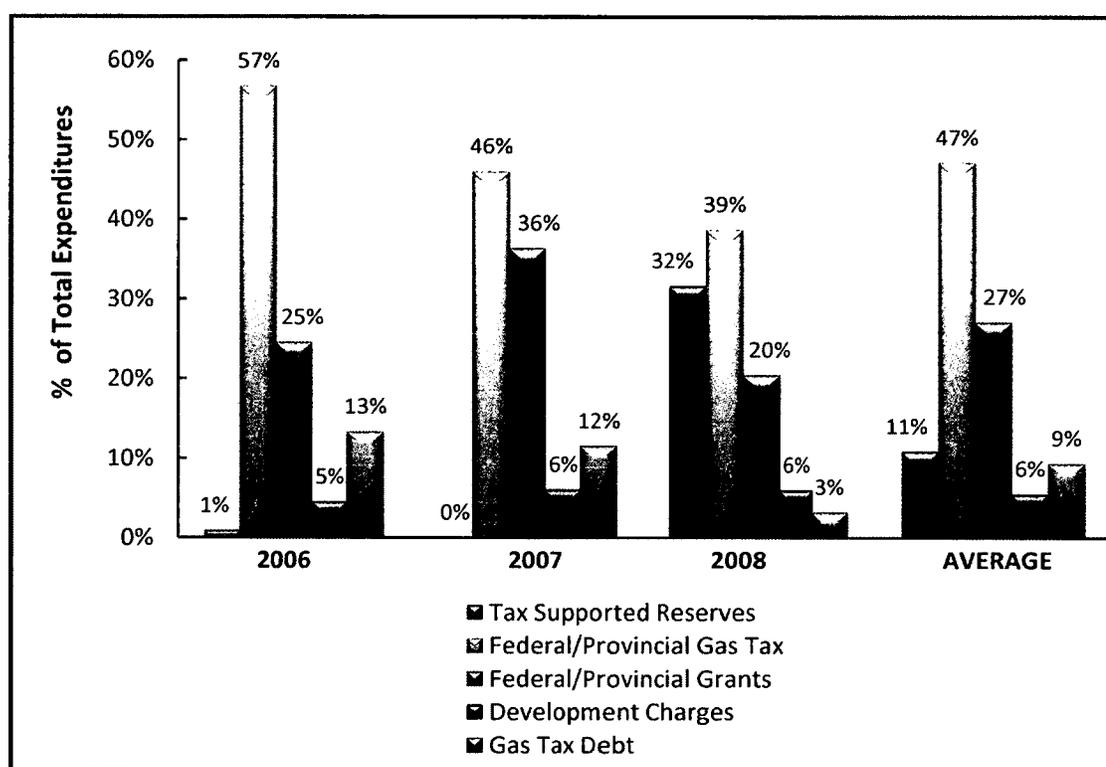
Project	Revenue Bus Replacement Program		
Project Cost	\$231,440,000.00	Total Funds Used	\$23,988,992.00
Outcome	Cleaner Air	Year Funds Used	2005, 2006, 2008
Description	<ul style="list-style-type: none"> • This program is designed for the timely renewal or modification of the revenue transit bus fleet to ensure the reliability of the bus service and the cost of maintenance operations. • Replacements will primarily be forty-foot, low-floor, wheelchair-accessible buses. Bus modifications are necessary to have buses meet operational requirements that could not be introduced in bus production by the supplier. 		
Project	Automated Fare Collection		
Project Cost	\$12,428,000.00	Total Funds Used	\$80,000.00
Outcome	Cleaner Air	Year Funds Used	2005
Description	<ul style="list-style-type: none"> • This project supports the installation of contactless smart card electronic fare collection devices in all revenue vehicles. These devices will be used to electronically collect passenger fares. • Major project deliverables include reductions in: passenger travel times due to decreased boarding times, fraud, the use of cash and tickets and the cost of revenue processing. 		

Source: AMO (2006b; 2007a; 2008; 2009c) and (City of Ottawa, 2005)

As can be seen in the table, as previously outlined, all of the projects are related to transit. Four of the projects are related to additions and improvements to the rolling stock, four are related to the maintenance and improvement of the Transitway and transit facilities, and the last four are related to new technology advancement to improve the rolling stock's service quality. While most of these projects received a one-time contribution from Gas Tax Fund resources, it is likely that those that are long-term projects will be allocated additional resources in the future. Based on the AMO's annual

Gas Tax Fund expenditure reports the only other source of funding for these projects are the City's own funds, but a close examination of the City's Capital Budgets reveal a different story. Table 26 below provides some insight into the funding for these projects.⁵³

Figure 15: Sources of Funding for Projects using Gas Tax Funds (2006-2008)



Source: Adapted from information available in City of Ottawa (2005)

⁵³ Based on the reporting format it is difficult to identify exactly the other sources of funding applied to these projects. Moreover, every year the spending estimates are revised so the amounts change slightly between capital budgets. To get an idea of the funding the trends, Figure 15 was created using the information available in the City's 2006 Capital Budget for the 2006-2008 fiscal years. Taking into consideration the total cost of the identified projects, the percentage contribution of the different sources of funding to the total expenditure was calculated. After, the average over the three years was also calculated. It is important to note that not every project received funding from all of the identified sources of funding, so the percentage values referred to the aggregated total expenditures.

As can be seen in the figure, federal and provincial Gas Tax are the most significant sources of funding in all three periods representing an average contribution of 47%. This contribution is even more significant if the funding from Gas Tax Debt is taken into consideration (9%). The second most important contribution comes from other federal and provincial grants (27%). Based on this information, Ottawa should be reporting through the AMO the contribution of other provincial and federal funding in the space provided in their reporting module.

Based on Ottawa's transit vision, it can be argued that the identified projects are meeting the Gas Tax Fund program objectives. The City's transportation vision, which guides its capital plans and expenditures, is that by 2031 "Ottawa's transportation system will enhance [the citizens] quality of life by supporting social, environmental and economic sustainability in an accountable and responsive manner" (City of Ottawa, 2008, p. 22). Among the specific elements identified with this vision are: (1) reduce automobile dependence, (2) meet mobility needs; (3) protect public health and safety; (4) protect the environment, and (5) deliver cost-effective services. Furthermore, each element is accompanied by several principles that are intended to guide the City's future actions (City of Ottawa, 2008, pp. 22-25). Based on these principles, the projects funded are meeting the program's objectives by: (a) giving priority to public transit in meeting future growth in travel demand; (b) aiming to provide an acceptable standard of service for public transit; (c) minimizing the need for new infrastructure; (d) minimizing

transportation energy use, greenhouse gas emissions and other impacts on air; and (e) integrating the consideration of life-cycle capital and operating costs into decision-making processes.

Just as was the case in Toronto, for Ottawa establishing a direct one-to-one relationship between individual investments and improvements in ridership levels and environmental outcomes is very difficult. In fact, looking at the projects associated with technological improvements it seems that the connection will be even harder to make. Nevertheless, according to an interviewee, the City argues that “any improvement to the transit system leads to increased ridership, this in turn leads to less cars on the road, which in turn leads to cleaner air” (GT-305, personal interview, 2011). To demonstrate measurable environmental outcomes, the City is required by the AMO to report on a set of indicators related to its investments.⁵⁴ Since interviewees did not provide access to this information, Table 26 below provides transit service performance measures as reported by OC Transpo, the Transit Services Department of the City of Ottawa, and by the Ontario Municipal Benchmarking Initiative (OMBI).⁵⁵

⁵⁴ For a detailed list of approved indicators for Transit see Appendix C.

⁵⁵ OMBI is “a groundbreaking collaboration of 15 Ontario municipalities that represent 73% of the population. This initiative provides new ways to measure, share and compare performance statistics and operational practices to assist Council, staff and citizens to understand how their municipality is performing over time and in relation to others” (OMBI, 2008, p. 3).

Table 26: City of Ottawa Transit Performance Measures 2005-2008

MEASURE	DESCRIPTION	YEAR			
		2005	2006	2007	2008 ¹
Number of Conventional Transit Trips per Capita	<p><i>How often do people take public transit?</i></p> <p>This measure illustrates the extent of transit service utilization. It includes all modes of transit with the exception of specialized, door-to-door services for persons with disabilities.</p>	118	119	123	120
Passenger Trips per In-service Vehicle Hour	<p><i>How well utilized are transit vehicles?</i></p> <p>It reflects the degree to which the service is used compared to the service provided. It provides an indication of productivity. The higher the ratio, the greater the usage level. It can be affected by economic conditions as well as socio-economic/demographic factors.</p>	-	54	54	55
Millions of Bus Revenue-Km	<p><i>How has the amount of service change over time?</i></p> <p>It indicates the number of kilometres travelled by buses while in revenue service.</p>	43.3	45.7	47.2	45.6
Grams CO2 Equivalent Per Vehicle-Km	<p><i>How much have GhG emissions been reduced?</i></p> <p>The rate at which buses emit GhGs can be affected by passenger loads, driver behaviour, fuel blends and vehicle and engine specifications.</p>	1824	1720	1737	1710
Km per hour	<p><i>How much has the network speed changed?</i></p> <p>The average speed experienced by transit users on board buses.</p>	26.0	26.7	26.7	26.5

Notes:

¹ 2008 was marked by a labour strike that disrupted service from December 20 until the end of January 2009. This strike affected the performance measured by these indicators.

Source: Adapted from information available in OC Transpo (2008) and OMBI (2008)

The measures in Table 26 can be considered a proxy of the potential impact of the Gas Tax Funds on ridership levels, and on the quality and productivity of the transit services. Accounting for the negative impact caused by the labour strike in 2008, the numbers indicate a slight improvement for most of the indicators since 2005. First, people are taking more trips in public transit (123 trips per capita vs. 118). Second, as measured by the number of kilometres travelled by buses while in revenue service, the service has expanded (47.2 vs. 43.3 Km). Third, there is a sustained improvement in GhG emission rates (CO₂ emission decline from 1824 to 1737 grams per vehicle-Km). Also, there is a slight improvement in the operating speed of the network (from 26.0 to 26.7 Km per hour).

CONCLUSION

As explained in Chapter 3, the design of a transfer system is guided by the nature of the problem that is being addressed, the circumstances, and the intended outcomes. Moreover, the design is what will ultimately determine the incentives for the donor and the recipient governments to adhere to their roles and responsibilities as outlined in the transfer agreement. In the case of the Gas Tax Fund, the policy was designed with particular features, as previously explained, to encourage long-term investments in environmentally sustainable infrastructure.

The first section of this chapter overviewed the program's impact on the City of Ottawa, and the City of Toronto's investment decisions. More specifically, it focused on the change in funding priorities, the change in the type of projects funded, the impact on long term planning, and the impact of the principles of predictability and flexibility. For both cities, the transfer is a welcome, and much needed, source of revenue. However, as significant as the transfer is, the funds represent a very small contribution to their large infrastructure needs. Nevertheless, the research showed that the Gas Tax transfer has had a positive impact on investment decisions and long-term planning without really affecting priorities.

The positive impact can be directly linked to the program's design features: (a) permanency and predictability, which enhances the cities' ability to plan and achieve strategic capacity; (b) flexibility, which allows them to choose to invest in their priorities, instead of those of the Federal or provincial government, while not having to chase a grant because it would be fiscally irresponsible not to; (c) adjustability, which allows the cities to reprioritize and make allocation adjustments in the case of planning and/or completion problems with projects since the money is not tied to specific capital projects; (d) expediency in the delivery of the funds, especially when compared to the time it can take them to be able to access resources approved and allocated under the Building Canada Fund; (e) bankability, which allows Ottawa to use the Gas Tax resources to fund

both interest and principal if they want to borrow; (f) no matching fund requirement; and (g) after fact reporting rather and prior project approval.⁵⁶

In terms of funding priorities, it is not surprising that in these two case studies they were not really affected. First, Toronto is the largest city in the Province and Ottawa is the fourth (Statistics Canada, 2012). As a result, they both have large and sophisticated governments that have the technical expertise to draft, and rely on, comprehensive planning and financial management tools. Second, as previously explained in Chapter 5, Ontario has an advanced planning policy framework that includes a number of laws, regulations, zoning bylaws, and policies. As described, both cities have plans that outline the way they want to grow and the type of community they envision. This means that the projects that need to be funded have already been identified and they only need to decide where the funding will come from. Third, the funds have to be allocated to projects that support sustainable infrastructure. In these two cases the cities have: a serious infrastructure deficit,⁵⁷ transit as a top priority,⁵⁸ and sustainable and environmental

⁵⁶ In both cities interviewees strongly emphasized preferring the design of this program over that of application driven project funding, such as the mechanisms used under the CSIF. Nevertheless, assessing the possibility that the Federal government would replicate this format for future funding agreements, municipal employees expressed being worried because they believe that it is likely that the Government will be going back to, as one interviewee observed, the “whole constrained thinking malaise that existed before the Gas Tax Fund” (GT-208, personal interview, 2009). On the other one, one interviewee was optimistic. He believed that the positive experience with the Fund might contribute to the Government finally gaining confidence in cities, which might open new doors (GT-206, personal interview, 2009).

⁵⁷ All the municipal interviewees agree that the needs far outweigh the revenues, which is also confirmed in the FCM report “Danger Ahead: The coming collapse of Canada’s Municipal Infrastructure.” According to the report:

“Since the late 1970s, as the responsibility for infrastructure investment shifted to municipalities and the municipal property tax, there was a precipitous decline in capital stock. As a result, the average age of municipal infrastructure increased

practices in place.⁵⁹ This means that their needs and behaviours were already aligned with the objectives of the Gas Tax Fund.

While priorities were not affected, both cities recognized that the Gas Tax Fund allowed them to make investments for projects that either they would not have been able to afford or they would have delayed or reduced in scope. In the case of the City of Ottawa, the program also influenced its long range financing plans since the City issued debt related to the program's eligible capital expenditures and is using a portion of the funds to cover its debt servicing costs. Moreover, related to the ICSP requirement, the Gas Tax Fund became a supporting driver for the work of a new City of Ottawa department focused on sustainability, and a source of leverage for the decision to develop a long-term sustainability plan, i.e. "Choosing our Future."

Looking at the impact on the municipal daily operations stemming from the administrative burden of the transfer and its comprehensive accountability framework, it

significantly over this period. In short, a vicious cycle was created that led to a critical backlog of investments in municipal infrastructure, now known as the municipal infrastructure deficit" (Mirza, 2007).

⁵⁸ Interestingly, in Toronto, based on the idea that the expenditure of revenues should be tied back to the service from where it was collected, one of the interviewees argued that the only projects that should had been eligible were those related to transit (GT-202, personal interview, 2009). Even more so if one takes into account economic competitiveness. As the individual remarked: "if you want our big cities to be competitive you have got to get a decent transit system, especially in the largest cities in Canada that represent 11% of the country's GDP (GT-Interviewee 02, 2009). While the individual understood the pressure to be flexible to accommodate municipalities of all sizes, he believed that another fund should have been created to address the needs of the small ones.

⁵⁹ For more information on Toronto's extensive environmental initiatives, visit the City's Environment Portal available at: City of Toronto (2012b). For an overview of Ottawa's sustainability initiative, visit the "Choosing Our Future" website available at: City of Ottawa (2012b).

is interesting to note the role played by the different governance and administrative structure of Ottawa and Toronto as related to the program. As explained in Chapter 2, governance and administration are two of the implementation related variables in the policy design and implementation framework informing the analysis of this dissertation. In this case, dealing directly with the Federal Government and allocating the resources to the TTC established a different structure in Toronto. This structure resulted in both mandated additional reporting requirements and a different internal accounting and administration of the resources. For Ottawa, having to work with the AMO resulted in the City having an organization that provided support when necessary, fewer mandated requirements, but a larger burden on the in-house staff that is responsible for a broad portfolio.

Even though each city has a different governance and administration structure, the Gas Tax Fund accountability framework is generally believed to be quite efficient and appropriate, and does not affect municipal daily operations in a significant way. The one exception is the audit requirement. In the case of Toronto, the City finds the timing of the audit problematic because it coincides with the drafting of its capital budgets, and the audits for other transfer programs. In the case of Ottawa, the City finds that having a full audit every year is not necessary. To cope with the extra work and complexity brought on by having to account for an additional source of funding, both cities try to be systemic and consistent in the kinds of expenditures covered.

Just as it was the case with the impact of the municipal daily operations, the different governance structures of Ottawa and Toronto played an important role on the impact of the program on relationships. Toronto, as a signatory, deals directly with the Government as an administrator of a federal program. This new partnership is perceived as quite positive, and it has increased the nature and type of exchanges between them. Moreover, the City argued that it is building its capacity and professionalism and changing employee morale. Ottawa, instead, deals directly with the AMO for the administration of the funds and, as a result, their relationship with the Association has improved. On the other hand, this means that it has very limited contact with the Federal government.

In both case studies, the tangible policy outputs relate to transit investments, which meet the program objectives regarding sustainability, higher quality of life and standard of living for citizens and the addition and enhancement of environmental sustainable infrastructure. These investments are expected to contribute to the policy outcome of cleaner air through the reduction of harmful emissions from the transportation sector as a result of increased public transportation ridership and more environmentally friendly rolling stock. In the case of Toronto, as explained in the City's Gas Tax Fund Outcome Report, the City strongly believes that:

“A transit system which offers frequent, reliable service to the places where people live, work, and want to go will be patronized by more people. And the existence (or even promise) of adequate transit service

itself can shape development decisions and result in more compact, environmentally sustainable communities” (City of Toronto, 2009, p. 6).

In the case of Ottawa, a similar but less ambitious argument was made to support the expenditures. According to one individual: “any improvement to the transit system leads to increased ridership, this in turn leads to less cars on the road, which in turn leads to cleaner air (GT-305, personal interview, 2011).

The investments made were supported in both cases by additional federal, provincial, and municipal sources of revenue, as allowed under the program. Due to Toronto’s reporting requirements and type of investments it is easier to exactly identify the other sources of funding and the exact contribution of the Gas Tax Fund towards the investments, i.e. number of buses and subway cars bought. At the same time, they also make estimating the potential environmental contribution of the investment easier. Based on the available data for both cities it could be argued that the Gas Tax Fund represents a very significant source of funding for the projects that were completed with the allocation. Moreover, the statistics also seem to suggest that during the period the investments were made there was a measurable increase in ridership, improvement to the quality of service, and reduction of GhG emissions.

Further research focused on smaller municipalities, or on municipalities in a different province could be useful to reveal the potential impact of size and/or the provincial policy framework on the findings discussed in this chapter.

CHAPTER 8

CONCLUSION

INTRODUCTION

Considering the importance of Transfer payments to the Canadian fiscal policy framework, the purpose of this research was, from a policy analysis perspective, to identify under which conditions these instruments are chosen, and what drives the combination of design features that results in either conditional or unconditional transfer systems. Moreover, because policies are implemented to address a given problem, this research also intended to explore how the chosen design, and other potential intervening factors, result in the successful attainment of the policy objectives or the failure to do so, as well as their relation to the policy outputs and outcomes.

Using as a case study the Gas Tax Fund transfer in Ontario, the first ever infrastructure transfer program to not be sunset, this dissertation began by posing four central research questions to explore these issues:

- 1. What were the principal factors that influenced the Government's choice of a transfer as a policy instrument and the specific design of the Gas Tax Fund policy?*

2. *To what extent were the actions of implementing officials consistent with the objectives and procedures outlined in the original policy announcement and the Gas Tax Fund agreement?*
3. *To what extent were the policy objectives attained over time? To what extent were the outputs and impacts consistent with the objectives?*
4. *What were the principal factors affecting policy outputs and impacts, both those relevant to the policy design and those related to the policy implementation?*

The empirical evidence gathered to answer these four questions was analyzed through a policy design and implementation analytical framework and an intergovernmental fiscal transfer framework. The research used both quantitative and qualitative research methods of inquiry, which included the use of econometrics and two case studies. The information and data were gathered from both primary and secondary sources, such as semi-structured interviews, extensive academic literature review, municipal data analysis, and relevant document review. This concluding chapter summarizes the main research findings, identifies research contribution and limitations, and proposes new potential avenues of research.

MAIN FINDINGS

Principal factors that influenced the Government's choice of a transfer as a policy instrument and the specific design of the Gas Tax Fund policy

Intergovernmental fiscal transfers can be used to manage a wide range of objectives, including addressing political imperatives and furthering central government's policy goals. Once a transfer has been identified as the right policy choice, the donor

government chooses a combination of design features that result in either conditional or unconditional transfer systems. Choosing these features, as argued in Chapter 3, is not an easy task due to the large number of elements that must be taken into consideration. Moreover, as explained in Chapter 2, policymaking does not happen in a vacuum; every stage of the process is influenced by the social, political, economic, and legal context.

The research shows that, in the case of the Gas Tax Fund, the definition of the problem, and the decision to formulate a specific policy to address it, was influenced by several contextual factors, which can be grouped into three categories. Those that influenced: (a) the timing and the choice of a transfer; (b) the specific choice of a conditional non-matching closed-ended transfer with innovative features and its adoption; and (c) the specific design features in the Ontario Agreement.

a) Contextual Factors that Influenced the Timing and Choice of a Transfer:

First, Canada's legislative framework enables the Federal government to use transfer payments as key policy tools. Second, the urban policy community was able to raise urban issues to the top of the Government's agenda through its advocacy efforts. Third, Prime Minister Paul Martin recognized that municipalities were entitled to a new deal to address their financial shortcomings. Fourth, while the Government reported a strong financial standing in the early 2000s, political uncertainty delayed concrete policy actions in 2003 and 2004.

Finally, the creation of a new Ministry of Infrastructure and Communities, the appointment of John Godfrey as Minister of State, and the 2004 Budget, which announced a series of municipal initiatives, sustained the drive for the drafting of the New Deal for Cities and Communities.

The timing and choice of policies that would provide Canadian communities with more than \$9 billion in funding over five years through the New Deal were all encouraged and influenced by these contextual factors. The New Deal, made official in Budget 2005, included the creation of the Gas Tax Fund, which was designed to establish a new relationship with all three levels of government, based on cooperation, and provide predictable and reliable long-term solutions. Once the deal was announced, a different set of contextual factors influenced the choice of the particular kind of transfer the Gas Tax Fund would become and the adoption of the policy.

b) Contextual Factors that Influenced the Type of Transfer, its Innovative Features and its Adoption:

Conditional transfers, or specific purpose transfers, are one of the Government's key instruments in furthering its broad policy objectives and priorities because they are designed to incentivize recipients to spend on specific functional areas. As a result, the two main contextual factors influencing the choice of a conditional transfer were the serious municipal infrastructure deficit

and the political drive to embrace the four-pillar model of sustainability in policy decisions. The choice was intended to direct the expenditures to environmentally sustainable municipal infrastructure. Furthermore, the economic context of the municipalities, i.e. their limited fiscal capacity to raise revenues to fund infrastructure, influenced the decision to make it a non-matching transfer. Finally, close-ended transfers allow the donor government to budget properly its resources because they are predictable. In this case, the department of Finance and its assessment of the Government's fiscal outlook were the contributing factors towards the establishment of the Gas Tax Fund as a five-year program.

Once the type of transfer was chosen, policy makers had to develop further the design of the program and, again, the choices made were heavily influence by contextual factors. First, the program was designed as a hybrid between a contribution, because it contains a complex accountability framework, and a grant, because the funding is given up-front and the Government is not involved in the selection of specific projects. Influencing the design of the accountability framework was the Liberal sponsorship scandal, which made Treasury Board determined to have a reliable framework that would ensure the policy goals were met efficiently and effectively. The choice to select those characteristics of a grant was influenced by the New Deal political imperatives, more specifically by

the desire to provide stable, predictable, long-term funding for municipalities through a flexible mechanism.

Second, the focus on green hard infrastructure was influenced by the existence of national and international environmental commitments and the overwhelming municipal consensus that emerged during the consultations. Third, the diverse nature of the policy community, which created a discord regarding the allocation formula, and the political pressure to satisfy everyone's expectations, resulted in the Government choosing an allocation formula that distributes the money based on population.

Fourth, after choosing the formula, the government had to decide on a payment schedule. The final choice of an incremental allocation was the result of several factors: (a) fiscal reasons - Finance wanted to push the major commitments further into the future; (b) desire to compel continued municipal compliance with the accountability framework; (c) administrative considerations - it would allow the Government to ease into the program; and (d) desire to encourage long-term investment - it could give municipalities time to formulate better investment plans.

Finally, there were separate contextual factors that made the completion of the negotiations and signing of the provincial agreements a remarkably quick and

smooth process: (a) previous unsuccessful negotiation experiences were taken into account by the Federal government when choosing the negotiating strategy; (b) there was a strong political imperative that resulted in a significant deployment of human resources, i.e. three federal teams covering the provinces and territories simultaneously; and (e) the existence of a template for the agreements that had been approved by Cabinet and Treasury Board, which represented a good starting point to the process.

c) Contextual Factors that Influenced the design features in Ontario:

In the case of Ontario, the political context, which emerged as a result of the changes to the provincial-municipal dynamics in the Province between 2004 and 2005, was the most influential on the particular features of the Agreement. Among these relevant developments were: the election of the Liberal Party of Ontario at the end of 2003, the negotiations for contentious issues, the signing of the new MOU between the Province and the AMO, and the signing of the new City of Toronto Act. Because of this context, there are four signatories in the Ontario Gas Tax Fund agreement, i.e. the Government of Canada, the Province of Ontario, the AMO, and the City of Toronto, and the Province has a very limited involvement in the administration of the program.

Once the governance structure was chosen, the parties had to choose the allocation formula and the process was as difficult and contentious as it had been at the Federal level. The two contextual factors that positively influenced the decision: (a) the NDP 2005 budget deal, which translated into Toronto receiving additional infrastructure funds allocated based on ridership; and (b) the political uncertainty surrounding the approval of Budget 2005, which brought a new sense of urgency to sign a deal before the Liberal government was potentially defeated. As a result of these factors, the AMO was successful in negotiating a formula based exclusively on population.

Finally, in Ontario the other particular design feature is found in the accountability framework where Integrated Community Sustainability Plans (ICSPs) are not required. In this case, the decision to accept existing planning documents was influenced by two contextual factors: the existing planning and environmental protection regulatory policy framework of the Province and the quality of the municipal planning documents.

These findings illustrate important dynamics between the context and the emergence and formulation of the problem, and policy development. They show a direct link between the federal, provincial, and municipal context and the creation of the Gas Tax Fund transfer, as well as its distinctive design features. Moreover, the degree to

which the social, economic, political, and legal context affected the process varied through time and it reflected, in the case of Ontario, local differences.

The dissertation's empirical findings also lend support to the importance of the policy development related variables identified in the Policy Design and Implementation Model, described in Chapter 2, in influencing the success of the process to design the transfer program. First, in terms of the mapping approach, it could be argued that it was a combination of: (a) forward mapping, as exemplified by the prominent role played by the advocacy community in the emergence and formulation of the problem and consultation in the development of the policy; and (b) backward mapping, as a result of the established role and responsibilities of the Government's four central agencies. Moreover, in the case of Ontario, Infrastructure Canada also used a backward mapping approach when it patiently waited while the Province, the AMO, and the City of Toronto solved their issues instead of forcing them to take a particular course of action. Considering the level of satisfaction of the provinces, and in particular of Ontario, with their individual agreements, it would seem that the combination of these two approaches was beneficial to the policy design process.

Second, the very short timeframe in which the agreements were signed could indicate the importance of integrating consultation and negotiation as part of the policy design process. The extensive cross-country consultation prior to the negotiations

allowed the government to understand what the recipients were expecting and to be prepared to address any potential thorny issues. At the same time, the willingness of the Government to make compromises resulted in, for example, the AMO becoming the program administrator when Ontario chose not to be involved. While policies might not be able to address the needs and interests of all the stakeholders, these processes increase the likelihood of achieving consensus and thus a successful implementation.

Third, in relation to the causal theory, the Government drafted a logic model that, focusing on the three key objectives of the program, outlined the chain of expected results within differing spheres of Infrastructure Canada's management control and influence. Fourth, the policy was made very clear and consistent through the outline of the driving principles, the objectives and the list of eligible project categories. Finally, as previously explained, key decisions in this stage revolved around the choice of policy instruments and the fiscal capacity of the Federal government.

Consistency of the actions of implementing officials with the objectives and procedures outlined in the original policy announcement and the Gas Tax Fund agreement

Once the Gas Tax Fund goals and objectives were established, the agreements were signed, and the funds were committed administrators and recipients had to implement the policy. In the case studies covered by this dissertation there were two implementors: the AMO and Ontario municipalities. The evidence from this study suggests that their actions during this phase were very consistent with the objectives and

procedures of the policy. They have all successfully implemented the policy without major complications and, for the most part, have been meeting their roles and responsibilities as outlined in the Agreement.

a) The AMO:

The AMO, who has three full time staff members assigned to the Gas Tax Fund administration, seems to have been fulfilling its role in an efficient and cost-effective manner. Its efforts have placed Ontario ahead of other provinces in the timing of their response to implementation issues/datelines and reporting requirements. Among its Gas Tax administrative duties are: (a) receiving and disbursing the funds in a timely manner; (b) collecting and producing the agreed reports; (c) educating the recipients about the program; (d) maintaining open and frequent lines of communications with the recipients; and (e) making sure that recipients fulfill their commitments in a timely manner. Of note is the considerable effort that the AMO has made to enhance the transparency of its operations and the visibility of the program using their website, a twitter account (GasTaxInOntario), and a website created just for the program (gastaxatwork.ca).

b) Ontario Municipalities:

This study has found that generally municipalities seem to have been using the funds for their intended purpose. Moreover, despite some serious delays in 2006, in most cases municipalities have submitted their annual expenditure

reports on time or shortly after the deadline. While no major issues have emerged since the establishment of the program, evidence suggests there are two implementation problems that are still unresolved. The first issue is the municipalities' communication performance that, when compared to other provinces, has been qualified as average. While there are some key features of the program that make communication difficult, the uneven representation of events and news releases is not desirable from a political perspective. As a result, the AMO has worked hard in ensuring municipalities meet their commitments. The second issue is the reporting capacity of small municipalities who have reported problems meeting the annual reporting requirements, in particular the annual auditing requirement, based on costs and human resource constraints.

Based on their size, both the City of Ottawa and the City of Toronto have large and sophisticated governments that have the technical expertise and the human resource capacity to implement successfully a program such as the Gas Tax Fund. At the same time, having serious infrastructure needs and transit as a top priority aligned their interests with the objectives of the program. As a result, it is not surprising that their actions seem to be consistent with the objectives and procedures of the policy.

For the City of Toronto, being a direct signatory to the Agreement and allocating the resources to the Toronto Transit Commission (TTC) translated into having to implement the program differently from Ottawa. In particular, Toronto's implementation was based on a governance structure that resulted in both mandated additional reporting requirements and a different internal accounting and administration of the resources. For Ottawa, having to work with the AMO resulted in the City having external implementation support when necessary and fewer mandated requirements.

These findings suggest that the program's governance structure and the administration, enforcement, and accountability procedures, some of the implementation related variables from the Model in Chapter 2, influenced the success of the implementation. In relation to the amount of change required, the program required some considerable organizational changes. First, Infrastructure Canada was required to deal directly, for the first time, with a municipality, i.e. the City of Toronto, and to deal with the AMO as the administrator of a federal program. Second, while under previous infrastructure programs municipalities were required to get individual project approval before getting the funds, under this program municipalities receive the money up-front and are allowed to bank the funds and accrue interest. Third, while municipalities and Infrastructure Canada were used to dealing with a multitude of infrastructure funding programs that are constantly phased in and phased out, for the first time they had to deal

with a program that eventually became permanent. While according to the literature this considerable amount of required change could have negatively affected the successful implementation of the program, the evidence suggests that this was not the case.

One potential explanation for this finding relies on the recognition that both the AMO and the recipients of the funds were highly motivated to achieve this level of success. In the case of the AMO, their motivation came, in part, from the need to: maintain a good relationship with the Federal government for its advocacy efforts; keep its members satisfied; and demonstrate that it is a responsible delivery agent that could be trusted with the administration of new federal or provincial programs. In the case of the municipalities, the motivation came from the considerable financial implications. The same could apply to Infrastructure Canada that was highly motivated to satisfy Prime Minister Martin and Secretary of State Godfrey who had a keen interest in the successful rollout of the New Deal.

Attainment of policy objectives and consistency of outputs and impacts with those objectives

The overall objective of the Gas Tax Fund transfer was to provide long term, predictable funding to support incremental expenditures in environmentally sustainable municipal infrastructure in the categories of community energy systems, public transit, water and wastewater, solid waste and roads and bridges. These investments were expected to have a quantifiable environmental impact resulting in cleaner air, cleaner

water and/or reduced greenhouse gas (GhG) emissions. At the same time, the program was also focused on accelerating the shift in local planning and decision-making towards a more long-term, coherent and participatory approach to achieve sustainable communities, and on the achievement of a collaborative approach involving transformative partnerships. In Ontario, the research shows that progress has been made on all three objectives. The empirical evidence suggests that, because of the Gas Tax Fund, municipalities have been able to make incremental investments in all the project categories that will result in new and improved capital infrastructure. More specifically, the transfer has helped municipalities to start and/or complete more projects sooner than planned, and/or to enhance the projects' scope.

To quantify the overall effect of the Gas Tax Fund on municipal infrastructure expenditures in Ontario, this research included an econometric analysis. The results showed that the Gas Tax Fund transfer has a considerable effect on infrastructure expenditures as a dollar of transfer generates \$1.27 of additional spending. Moreover, this signaled to the potential that the transfer is stimulating additional municipal spending. This finding is consistent with the annual AMO reports, and the findings of the Joint Canada-AMO evaluation. Moreover, it is also consistent with the evidence on the leveraging of resources from the Ottawa and Toronto case studies. Nevertheless, the econometrics' findings should be treated with caution due to the limitations of the available data used in the analysis.

In the case of the City of Ottawa and the City of Toronto, the tangible policy outputs relate to transit investments. Toronto's investments under the program are focused on their rolling stock, i.e. in the replacement of vehicles to maintain the service quality and capacity and in the addition of vehicles for growth. Besides the tangible outputs, the program has encouraged a change of mentality among municipal planners and employees who have been inspired to create long-term visions that are innovative and bold. Ottawa's investments covered a wider range of eligible projects and included projects related to: additions and improvements to the rolling stock, the maintenance and improvement of the Transitway and transit facilities, and new technology advancement to improve the rolling stock's service quality. For both cities, having a flow of funds that is understood, dependable and consistent has considerably improved their ability to forecast their infrastructure needs and expenditures.

In general, multiple lines of evidence suggest that the program outputs, i.e. funded projects, are consistent with the Gas Tax Fund's environmental and sustainability objectives. First, there is evidence that the AMO works closely with municipalities to ensure that the funded projects meet the eligibility requirements, and thus the program's objectives. Second, the projects that have received the AMO's "Federal Gas Tax Fund Project Awards" and the "Federal Gas Tax Capacity Building Award" are concrete evidence of policy outputs that meet the program's environmental objectives and demonstrate long term planning for environmental and community sustainability. Third,

the Canada-AMO joint evaluation also found that most projects funded are, in general, well aligned with the eligible project categories.

In both the Ottawa and Toronto case studies the tangible policy outputs meet the program objectives and are expected to contribute to the policy outcome of cleaner air through the reduction of harmful emissions as a result of increased public transportation ridership and more environmentally friendly rolling stock. In the case of Toronto, the City argued that their investments are making urban transportation more sustainable and are achieving measurable improvements in air quality. Moreover, by contributing to the urban transit infrastructure, these investments have a direct impact on the liveability of the region and the competitiveness of the regional economy. In the case of Ottawa, the projects are meeting the program's objectives by: (a) giving priority to public transit in meeting future growth in travel demand; (b) aiming to provide an acceptable standard of service for public transit; (c) minimizing the need for new infrastructure; and (d) minimizing transportation energy use, greenhouse gas emissions and other impacts on air.

To measure the impact of the Gas Tax Fund investment, municipalities are required to report on outcomes measures from all projects that had been completed by the end of a reporting year using a set of core indicators developed by the Oversight Committee. For the projects completed to the end of 2008 the AMO (2009d, p. 1) reported that the funding had, for example, "(1) improved drinking water in 29

municipalities; (2) improved wastewater treatment for more than 40,000 households; (3) diverted 71,000 tonnes of waste from landfills; (4) improved 2,000 kilometres of roads; (5) 138 new conventional buses and 9 new accessible vehicles; and (6) decreased energy demands by over 7.65 million kilowatt hours.” Nevertheless, evidence suggests that, while steps were taken to make the measures reliable, they have several limitations. Of note are that: (a) isolating the program’s specific impact can be difficult with projects that have multiple sources of funding; (b) the funded projects may be affected by a variety of factors, such as policy or administrative decisions, which may influence the data; and (c) the data does not include the impacts of a project in its lifecycle and it does not capture the potential environmental inefficiencies of improper replacement. In relation to these limitations, the City of Ottawa and City of Toronto specifically acknowledge the difficulty of drawing a direct one-to-one relationship between individual investments and improvements in ridership levels and environmental outcomes due to the large number of variables that impact transit ridership.

In Ontario, municipalities are in a reporting leadership position compared to their peers across Canada. Before the Gas Tax Fund program was implemented, municipalities were already working on improving local planning and decision-making to achieve sustainable communities. As a result, ICSPs were not required for municipalities that had an official municipal plan in compliance with the current Ontario Planning Act. Nevertheless, research shows that many municipalities have initiated one or more

sustainability-related planning processes, such as strengthening Official Plans, enacting Environmental Management Plans, developing ICSPs, and/or engaging in the on-going implementation of projects and programmes supportive of sustainability.

It is important to note that, while municipalities have the full support of the AMO's toolkit and its training sessions, there is evidence that they have, and are, facing several barriers in the achievement of the sustainability objectives: (a) economic challenges – difficulty in affording the work involved with the process; (b) human resources limitations; and (c) staff turnover – in particular among senior staff and those in leadership positions, as well as council changes.

In relation to the achievement of a collaborative approach, all the signatories have developed a highly functioning relationship supported by the oversight committee despite their disagreements during the negotiation of the Agreement. First, the governance structure in Ontario has influenced the achievement of this objective. Second, Toronto and the AMO are dealing for the first time directly with the Government as administrators of a federal program, which has increased the nature and type of exchanges between them. In the case of Toronto, this new partnership is building the City's capacity and professionalism, changing employee morale and even enhancing its sense of responsibility to make the relationship successful. Third, Ottawa, and all of the other municipalities in Ontario, deal directly with the AMO for the administration of the funds

and, as a result, their relationship with the Association has developed and/or improved. On the other hand, this means that they have very limited contact with the Federal government. Finally, due to the limited role that the Province plays in the administration of the program its relationship with the AMO and the municipalities has not changed in any significant way. Although it could be argued that having given consent to the particular provisions of the Ontario Agreement reflects a new level of respect for municipalities as independent, duly elected governments that are fully capable of administering public funding with efficiency, transparency and accountability.

Principal factors affecting policy outputs and impacts (both those relevant to the policy design and those related to the policy implementation)

The design of a policy and the way it is implemented ultimately affects policy outputs and outcomes both in positive and negative ways. This research found that, in the case of the Gas Tax Fund, there were several factors that positively affected policy outputs and impacts. First, the objectives of the program were aligned with the infrastructure needs and objectives of the municipalities. This means that municipalities did not have to get creative with the use of the money and had projects meeting the eligibility requirements ready to go, as they were only waiting for funding. As a result, while there is a clear progressive increase in the expenditure of the resources, the program was implemented quickly and projects started to be funded right after the first transfer. The time frame of the expenditures was also affected by the factor of

expediency in the delivery of the funds. By receiving the funds on time, municipalities have been able to make their planned expenditures in a timely manner.

Second, the principle of flexibility had many positive implications for policy outputs and outcomes. Since municipalities can choose the specific projects funded with the allocated resources, policy outputs meet their priorities instead of those of the federal or provincial government. In the case of upper and lower tier governments, the flexibility allows: (a) upper tiers to support lower tiers by transferring all, or portions of, their allocation, which means they can fund larger projects; (b) upper and lower tiers to partner to fund joint projects; and (c) upper tiers to fund projects of regional interest. These transfers and expenditures result in outputs that are more beneficial for the parties involved. In the case of Ontario, due to this flexibility, the AMO was able to make the case for the inclusion of Local Roads and Bridges to the eligible project category in the provincial Agreement. Even though these expenditures might not be as desirable from an environmental perspective, they have been meeting the municipalities' most pressing infrastructure need.¹

Third, federal oversight - in the form of incrementality clauses, detailed list of eligible projects and expenditures, and strong reporting requirements - provided the right control measures to ensure municipal compliance with the program objectives. Fourth,

¹ Between 2005 and 2008 more than half of the allocated resources (58%) in the Province were spent on projects under this category.

the principle of predictability and the possibility to bank the resources for a determined period were also found to be an important positive influence on outputs. With a predictable source of funds that can be banked over time, municipalities are better able to do long term planning, which means that they are not rushing to fund projects out of fear that the funding will run out. In addition, municipalities are able to fund projects in the order of priority that has been established in their plans. As a result, investments will be strategic. On the other hand, the banking of the resources has a potential negative effect for the annual measurement of the impact of the program. If municipalities bank their resources, policy outputs will not be directly related to the size of the transfer each year.

This research also found that, besides banking of the resources, there were several factors that negatively affected the outputs, impacts and their measurement. First, infrastructure expenditures usually represent a significant investment, and the size of the investment will impact both the level of services provided by the infrastructure and the size and range of the infrastructure itself. This means that for small municipalities the size of the Gas Tax Fund allocation is not significant enough to afford transformative investments or to warrant the administrative burden associated with the reporting requirements. Second, considering the emphasis of the program's funding objectives on sustainable infrastructure, the inclusion of the popular Road and Bridges category might be diminishing its potential environmental benefits and hindering the achievement of expected outcomes.

Third, for the measuring of the program's impact, time is a problem in many instances. For example: (a) large scale infrastructure projects are usually long term projects; (b) rolling stock purchases are usually made a year in advance of the delivery and sometimes even more, as is the case with the Toronto Bombardier Rocket trains, which the City started funding in 2006 but delivery is not expected until 2009-2011; and (c) for transit investments in particular, achieving ridership improvements as a result of better service takes time. This means that measuring the environmental impact of these investments will not be possible in the short or medium term. As a result, any evaluation of the program or outcomes report at a specific point in time looking at the trade-off between the level of investment and the measurable impact might be distorted. Fourth, for the fulfillment of the ICSP requirement, time is also an issue. Developing a proper sustainability plan is a process that takes a long time because, among other things, they need to balance social, environmental, economic, and cultural interests, and they require several rounds of consultation. As a result, again, the measuring of the achievement of this policy objective in the short or medium term might not be possible.

CONTRIBUTIONS AND LIMITATIONS OF RESEARCH

The dissertation's findings contribute to academic research and to the larger community concerned with public policy and fiscal federalism by addressing the knowledge gap left in the existing academic research evaluating the establishment of current transfer payment arrangements in Canada and their impact. They illuminate the

influence of contextual factors in policy development in general, the challenges of transfer payment implementation, and the relation between stated goals and actual outcomes.

For this dissertation, all reasonable efforts were made to ensure the methodology was robust. This included the use of multiple lines of evidence to acquire, verify, and corroborate the information. However, there are limitations with all empirical research. In this case, the key limitations were: (a) access to Gas Tax Fund information from the City of Ottawa; (b) the number of cases studies; and (3) issues with the Financial Information Return (FIR) data set. Getting access to the City of Ottawa's employees, after the first round of interviews in 2009, was very difficult and the information provided was superficial. To address this challenge, an extensive document review of non-Gas Tax city documents and third party reports was undertaken. Because only two cases studies could be completed in the context of this study the potential impact of size and/or the provincial policy framework on the findings cannot be addressed.

In terms of the data, there were several limitations. First, while an econometric analysis that included more years before and after the implementation of the Gas Tax Fund would have been desirable, municipal restructuring before 2000 and modifications to the FIR reporting schedules in 2009 limited the time frame of the study between 2001 and 2008. Second, while having additional variables in the regression would have also

been desirable, the variables that were needed were not available in the format required in the FIR. Third, relying on the FIR is problematic because the information is entered by the individual municipalities and there is no mechanism in place to ensure that the data are complete and error free. Since the research revealed that some municipalities had misreported their Gas Tax Fund allocation in the wrong schedule and/or the wrong column a different source for this specific data was chosen.

FURTHER AREAS OF RESEARCH

This dissertation is one of the first major academic pieces of research focusing on current transfer payment arrangements in Canada and their impact. As such, it is a starting point for a possible far-reaching research agenda that could focus on an in-depth comparative analysis of other Canadian or international infrastructure transfer programs. Additionally, in relation to the Flypaper effect, further empirical work based on data from other Canadian transfers or from a different province could confirm the tentative findings of this dissertation. Avenues for future research related to the Gas Tax Fund might include comparative exploration of the implementation of the program by smaller municipalities or by municipalities in a different province.

APPENDIX A

INTERVIEWS' SUPPORTING DOCUMENTS

INTRODUCTION

As noted in Chapter 1, this study used both qualitative and quantitative research methods of inquiry which included the use of econometrics, and two case studies. The first section of this appendix focuses on the primary research conducted, which consisted of 40 semi-structured interviews and 8 personal communications with 41 key informants.¹ The second section focuses on identifying research issues and limitations.

INTERVIEWS

The interviews were completed in Ottawa, Toronto, Vancouver, Victoria, and Kelowna in-person and/or over the phone, and the personal communications were done via email between 2007 and 2011. Participants in the research were primarily federal and municipal government employees, as well as key public and private policy actors. Table 27 below provides a summary of the interviews and personal communications.

¹ Some of the key informants were interviewed several times over the course of the research.

Table 27: Summary of Interviews and Personal Communications

SOURCE	2007	2008	2009	2010	2011	TOTAL
AMO	2	-	3	1	1	7
UBCM	-	1	-	-		1
FCM	1	-	-	-	1	2
OTTAWA	-	-	8	-	3	11
TORONTO	-	-	9	-	1	10
KELOWNA	-	2	-	-	-	2
VANCOUVER	-	4	-	-	-	4
INFRASTRUCTURE CANADA	4	-	1	-	4	9
ONTARIO MINISTRY OF MUNICIPAL AFFAIRS AND HOUSING	-	-	-	2	-	2
TOTAL	7	7	21	3	10	48

The duration of each interview ranged from 45 to 90 minutes. If prior approval was given by the interviewees notes were taken and audio was recorded. As explained to the participants, the purpose of the recording was to have an accurate record of the discussion, but the responses were not used for direct personal attribution. Instead, each participant in the research was assigned a number that was used to identify the source of the information in the dissertation, making the interview confidential and anonymous. As such, there were no perceived risks to the interviewees' participation in this research study. The participants were asked a range of questions pertaining to the Gas Tax Fund in the areas of municipal funding for infrastructure, governance structures and

administration, accountability, and commitments. During the interview, the participants could decline answering any question(s).

Below is the letter of information sent to potential government departments/interviewees to introduce them to the research, the consent form that interviewees were required to sign when they agreed to participate in the research, and sample interview questions.

Letter of Information**Canada's Capital University**

Date: _____

Dear _____ ,

My name is Erika Adams, and I am a PhD candidate at the School of Public Policy and Administration at Carleton University. I am conducting research for my dissertation, under the supervision of Professor Allan Maslove from the School of Public Policy and Administration, and I am writing to request participation of [insert department] in a research project examining the transfer and administration of the federal Gas Tax Funds.

My research seeks to evaluate: (1) whether the transfer affected municipal operations, (2) whether the transfer had an incremental impact in municipal infrastructure spending, and (3) the extent to which the key objectives of the program, and the commitments accepted by the municipalities in the signed agreements, have been met.

While similar in topic, this research is independent from the Gas Tax research project, in which your department might have participated, funded by Infrastructure Canada being conducted by the Carleton CURE research team, in which I am involved.

Based on their involvement in the program, I would greatly appreciate having an opportunity to interview [insert name, or position of key individuals]. The interview would take no more than 45 minutes and, if prior approval is given by the interviewees, I will write notes and use an audio recorder. The purpose of the recording is to have an accurate record of the discussion, but the responses will not be used for direct personal attribution. Instead, each participant in the research will be assigned a number, which will be used to identify the source of the information in the dissertation, in order to ensure anonymity.

There are no perceived risks to the interviewees' participation in this research study. During the interview, the participant may decline answering any question(s), and he/she may withdraw agreement to participate up to 60 days after the interview takes place. In this case, the participant may request the destruction of all data relating to his/her participation.

I will maintain all data collection instruments (notes and/or voice recordings taken during the interviews) in my personal computer, which is password protected, and I will not share them

with any third-party participants. The only other person that will have access to my files is my supervisor. Aggregate data from this research project may be used in a future research project.

I anticipate being in [insert city] on [insert date]. My questions will focus on the impact of the gas tax on the municipal operations and spending decisions. Findings from the research will be forward to participants upon the completion of my dissertation via email.

I hope that [insert department] will be able to support this important research project and look forward to hearing from you.

Sincerely,

Erika Adams
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This research has been reviewed and approved by the Carleton University Research Ethics Committee. For ethics concerns or complaints, you may contact Prof. Antonio Gualtieri, Chair, Carleton University Research Ethics Committee, Tel: 613-520-2517; e-mail: ethics@carleton.ca

Informed Consent Form

Canada's Capital University

Date: _____

INFORMED CONSENT FORM

I, _____ have been invited to participate in a research project that is being carried out by Erika Adams, under the supervision of Professor Allan Maslove from the School of Public Policy and Administration, for the completion of her dissertation as a PhD candidate at the School of Public Policy and Administration at Carleton University.

My participation in this project will involve responding to interview questions pertaining to the Gas Tax Fund in the areas of municipal funding for infrastructure, governance structures and administration, accountability, and commitments. There are no perceived risks to my participation in this study. The interview is expected to last no more than 45 minutes, and during the interview, I may decline answering any question(s).

If I give prior approval, I understand that the interview might be recorded electronically and written notes will also be made. I understand that the purpose of the recording is to have an accurate record of the discussion, but the responses will not be used for direct personal attribution. Instead, in order to ensure my anonymity, I will be assigned a number which will be used to identify my comments in the dissertation.

My participation in this research is voluntary. I may withdraw agreement to participate up to 60 days after the interview takes place and have data relating to my participation withdrawn.

I understand that data collection instruments (notes and/or voice recordings taken during individual interviews) will be maintained by the researcher and will not be shared with any third-party participants. Data will be secured in her personal computer, which is password protected. Only the researcher and her supervisor will have access to the files. Aggregate data from this research project may be used in a future research project.

I understand, while similar in topic, this research is independent from the Gas Tax research project, in which I might have participated, funded by Infrastructure Canada being conducted by the Carleton CURE research team, in which Erika Adams is involved.

For my participation, I will receive the findings from the research via email upon the completion of the project.

I understand that this project has been reviewed and approved by the Carleton University Research Ethics Committee. For ethics concerns or complaints, I may contact Prof. Antonio Gualtieri, Chair, Carleton University Research Ethics Committee, Tel: 613-520-2517; e-mail: ethics@carleton.ca

Signature of Researcher

Date

Signature of Participant

Date

Contact Information:

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Sample Of Interview Questions – For interviewees in the bureaucratic spheres of the municipal governments

Municipal Funding for Infrastructure:

- 1) **Thinking about your other sources of funding for infrastructure: How important is the GTF for the funding of your projects?**
 - ✓ Impact on the way infrastructure projects are financed
 - ✓ The importance/impact of being able to pool, bank and used the funds as collateral to borrow money

Governance Structures & Administration:

- 2) **As part of the research I have looked at the formal governance structures of the GTF as set-out in the agreements, but I would like to know how does it really work from your perspective?**
 - ✓ Impact of the arrangement on the administration of the GTF
 - ✓ Challenges/benefits
 - ✓ Impact on the relationship between the 3 levels of government
 - ✓ In Ontario:
 - Reason for choosing the AMO arrangement
 - Impact on the relationship of the municipality with AMO
 - Impact on the role of the association
- 3) **How are the GT funds allocated to eligible projects, i.e. who makes the decision and how are these decisions made?**
 - ✓ Do the ‘eligible project’ categories found on the agreements meet the municipal’s infrastructure needs?
- 4) **What are the administrative implications of the GTF for your municipality?**
 - ✓ Overhead costs for administration, reporting and communications
 - ✓ Compared to other federal infrastructure programs
- 5) **What has been the impact of the Gas Tax money allocated to your municipality?**
 - ✓ Long-term investment planning
 - ✓ The focus of the projects, i.e. increase in ‘green’ infrastructure projects
 - ✓ The timeframe of the projects, i.e. funding projects that would not have been pursued in the absence of these funds

- ✓ Addressing the municipal infrastructure debt, backlog, and future needs

Accountability:

6) What are your thoughts on the accountability framework of the GTF?

- ✓ Accountability of the municipality to the provincial and federal government
- ✓ Accountability of the municipality to its constituents
- ✓ Objectives of the program fulfilled

Commitments:

7) In relation to the requirement to develop an Integrated Community Sustainability Plans (ICSPs):

- ✓ Municipality has one
- ✓ Process and cost of developing it
- ✓ Impact on the identification of infrastructure priorities
- ✓ Impact of citizen engagement

8) How would you assess the impact of the GTF on the process of drafting the municipality's five year capital plan?

- ✓ More financial resources available
- ✓ More/different projects expected to be completed

Last Comments:

9) Is there anything else you would like to comment on, that I did not touch on in the interview? - Is there anything that you would like to add?

Sample Of Interview Questions – For interviewees in the Municipal Associations

Municipal Funding for Infrastructure:

- 1) How would you assess the role of the GTF in addressing the municipal infrastructure debt, backlog, and future needs?**

Governance Structures & Administration:

- 2) How does the governance of the GTF work from your perspective?**

- ✓ Reason for choosing the AMO/UBCM arrangement
- ✓ Challenges/benefits

- 3) What has been the impact of administering the Gas Tax on your association in relation to:**

- ✓ Overhead costs for administration and reporting
- ✓ Your relationship with your members and/or the three levels of government
- ✓ Your role as a municipal association

- 4) Is AMO/UBCM involved in other similar arrangements for federal funding programs? If so, how does the structure of the GTF differs?**

Accountability:

- 5) What are your thoughts on the accountability framework of the GTF?**

- ✓ Accountability of the association to the three levels of government
- ✓ Objectives of the program fulfilled

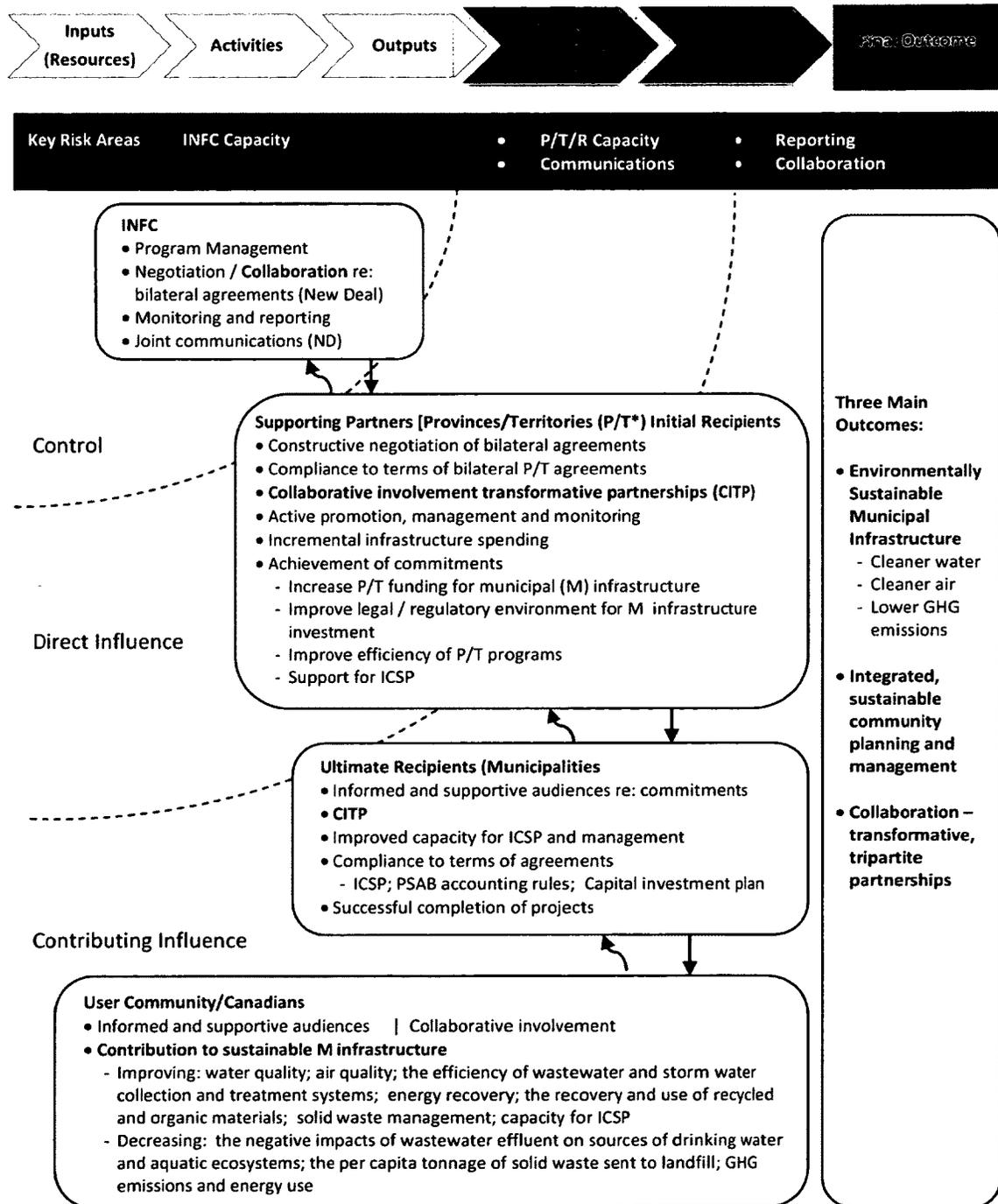
- 6) Have there been any issues with municipalities being unable to keep up with the reporting requirements for the GTF?**

- 7) How would you assess the process of completing the annual reports required under the GTF agreements?**

Last Comments:

- 8) Is there anything else you would like to comment on, that I did not touch on in the interview? - Is there anything that you would like to add?**

APPENDIX B - LOGIC MODEL



Source: Adapted from Infrastructure Canada (2009c, 1-1)

APPENDIX C

LIST OF APPROVED OUTCOME INDICATORS FOR EACH ELIGIBLE PROJECT CATEGORY

Table 28: List of Approved Outcome Indicators for Each Eligible Project Category

PUBLIC TRANSIT – Expected Outcome: Cleaner air/reduced	
Project Type	Indicator
Conventional Transit	<p>Ridership</p> <ul style="list-style-type: none"> • Number of conventional passenger trips per person in the service area in a year • Change over time in passengers per revenue hour <p>Capacity</p> <ul style="list-style-type: none"> • Change over time in amount of service <p>Fleet Renewal</p> <ul style="list-style-type: none"> • Change in the: number of alternative fuel buses, litres per passenger km, average age of fleet, average operating speed, percentage of fleet that uses alternative fuels or are hybrids • Service interruption per 1000 service hours annually <p>Other Transit Infrastructure</p> <ul style="list-style-type: none"> • Increased lane Kms: of dedicated ROWs, HOV lanes, express bus lanes • Change in percentage of fleet with: electronic fare card systems, bike racks, and better connectivity with other transport routes
Para transit	<ul style="list-style-type: none"> • Change in percentage of: transit fleet accessible to wheelchairs, transit fixed facilities accessible to wheelchairs; and surface/subway routes with automated stop announcement
Active transportation	<ul style="list-style-type: none"> • Change in the number of: bike racks, km of bike lanes, improved/new sidewalk

SOLID WASTE – Expected Outcome: Cleaner air/cleaner water/reduced GHGs	
Waste diversion	<ul style="list-style-type: none"> • Change in the: tonnes of residential solid waste diverted from landfill; and number of households participating in organics collection or recycling
Landfill gas recuperation	<ul style="list-style-type: none"> • Change in the number of m3 of methane gas collected per hour as indicated in the Air Certificate of Approval.
Remediation at waste site	<ul style="list-style-type: none"> • Work undertaken to comply with Ministry of Environment issued Certificate of Approval.
WATER – Expected Outcome: Cleaner water	
Drinking water purification and treatment systems	<ul style="list-style-type: none"> • Change in percentage of test results that showed adverse water quality or exceeded maximum concentrations as prescribed by regulation • Improvement in drinking water quality as articulated in testing compliant with Ontario Regulation 170/03 under the <i>Safe Drinking Act</i> • Volume of water (m3) treated to a higher level after the investment improving the water quality and reducing contaminants in the water
Drinking water supply/ Drinking water distribution systems	<ul style="list-style-type: none"> • Weighted number of days when a boil water advisory issued by the medical officer of health, applicable to municipal water supply, was in effect • Number of water main breaks per 100 kilometres of water distribution pipe in a year • Average age (in years) of water distribution pipes • Metres of new/rehabilitated water distribution pipe installed
Water metering	<ul style="list-style-type: none"> • Change in the number of households with water meter

COMMUNITY ENERGY SYSTEMS - Expected Outcome: Cleaner air/ reduced GHGs	
Building Retrofits	<ul style="list-style-type: none"> Amount of Kilowatt-Hours (kWh) saved by undertaking the work
Energy Generation	<ul style="list-style-type: none"> Amount of Kilowatt-hours (kWh) generated off the grid
Retrofits for oil /propane/natural gas heated buildings	<ul style="list-style-type: none"> Amount of fuel saved by undertaking the work (m3)
New energy efficiency buildings	<ul style="list-style-type: none"> Certified to what level of the Canada Green Building Council LEED? (i.e. certified, silver, gold, platinum)
WASTE WATER – Expected Outcome: Cleaner water	
Wastewater systems, including sanitary and combined sewer systems, separate storm water systems	<ul style="list-style-type: none"> Change in the: percentage of wastewater test results that indicated that waste water discharge objectives were not met; number of wastewater main backups per 100 km in a year; percentage of wastewater estimated to have by-passed treatment; and sewage treatment level; percentage of beach closure days Number of : current households on municipal wastewater collection whose wastewater will be treated to a higher quality; kilometres of wastewater systems separated from storm water systems; Improvement in level of treatment plants (i.e., primary to secondary to tertiary) Metres of: new/rehabilitated wastewater distribution pipe installed; new/rehabilitated storm sewer pipe Average age (in years) of distribution pipes prior and after the investment Volume of wastewater (m3) treated to a higher level after the investment improving the water quality and reducing contaminants Work done as required by the Ministry of Environment's Certificate of Approval

ROADS & BRIDGES - Expected Outcome: Cleaner air/ cleaner water / reduced GHGs	
Resurfacing road at appropriate lifecycle	<ul style="list-style-type: none"> • Reduced energy required (measured in mega joules (MJ)) • Municipal data required: length of project, width of pavement, area of intersections, current traffic volume, pre-work pavement smoothness, milling to existing asphalt surface, distance to dump site and return for trucking milled asphalt, base lift of Hot Mix Asphalt with RAP (mm), % RAP, surface lift of Hot Mix Asphalt (mm), post work pavement smoothness.
Recycling asphalt vs. mill and overlay	<ul style="list-style-type: none"> • Reduced energy required (MJ) • Municipal data required: length of project, width of pavement, area of intersections, current traffic volume, pre-work pavement smoothness, cold-in-place recycling (mm), surface lift of Hot Mix Asphalt (mm), post work pavement smoothness.
Eliminating bridge load restrictions	<ul style="list-style-type: none"> • Reduced energy required (CO₂kg/day and CO₂kg/year) • Municipal data required: length of road closed and detour route for heavy trucks; current traffic volume; pre-work, detour route, and post-work pavement smoothness.
Reducing construction timelines (bridge work with detours)	<ul style="list-style-type: none"> • Reduced energy required (CO₂kg total) • Municipal data required: length of road closed to traffic, length of detour route for bridge closure, number of days road closed to traffic, current traffic volume, pre-work pavement smoothness, pavement smoothness of detour route.
Minimizing traffic delays by installing turning lanes	<ul style="list-style-type: none"> • Reduced energy required (CO₂kg/day, CO₂kg/year) • Municipal data required: length of road under consideration; number of cars, light trucks, and of heavy trucks on average delayed; number of seconds on average vehicles delayed; number of occurrences per hour; number of hours per day delays occur; current traffic volume; pavement smoothness.
Minimizing traffic delays by installing traffic lights	<ul style="list-style-type: none"> • Reduced energy required (CO₂kg/day, CO₂kg/year) • Municipal data required: number of seconds, on average, vehicles delayed on side road during peak hours and off peak hours; current traffic volume on side road and main road; signal timing, red light indication in main and side road.

Maintain gravel road as gravel	<ul style="list-style-type: none"> • Reduced energy required (MJ) • Municipal data required: total length to be resurfaced, tones of granular A applied per km, average surface width of unpaved roads, average distance from pit to quarry, stabilization – tonnes of CaCl per km, average distance to calcium supply depot, current traffic volume
Vehicle Purchase or Replacement	<ul style="list-style-type: none"> • Change in vehicle fuel consumption (L/100km) • Fuel Type (Diesel, Gasoline, Natural Gas, etc.)
Ditching	<ul style="list-style-type: none"> • Metres of ditching completed
Winter Control Infrastructure	<ul style="list-style-type: none"> • Change in the number and capacity of sand/salt storage sites • Percentage of sand/salt piles covered and type of coverage

Source: (AMO, 2009a)

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