Title: Planning for future successes among rural volunteer driver programs: Understanding local preferences of prospective users and drivers

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## **ABSTRACT**

Many rural citizens depend solely on their automobiles to meet their needs, but the health effects of aging can make driving impossible over time. Volunteer driver programs can be a solution where no alternatives exist, yet available tool-kits offer limited guidance for community data collection, analysis and interpretation of results, making success difficult to predict. The TRB AP060 Paratransit Committee at the TRB Annual Meeting in 2007 proposed a national research effort in this area to study "the factors...contribut[ing] to the success of volunteer driver programs in different settings".

This paper presents stated preferences from prospective users and volunteers regarding anticipated factors critical to the success of a rural volunteer driver program focused on medical appointments. An extensive engagement campaign among a rural area of 21,000 in New Brunswick, Canada returned 68 positive responses to involvement with the program (28 as users only, 7 as drivers only, 17 as volunteers only, and 16 with multiple roles). Most respondents were female and aged 25-65. The majority (82% and 79%) of prospective users felt it was important or very important to access local and regional medical appointments, respectively, while 40% felt the same for shopping trips. The majority (59%) of prospective drivers felt it was important or very important to be paid for mileage, while 23% felt the same about receiving a charitable receipt for their donation. Next steps include further research to predict ridership and volunteer supply, trip preferences, and policy development to address operational concerns, such as insurance.

## **INTRODUCTION**

Many citizens in rural areas are wholly dependent on their automobile to meet their transportation needs given a lack of other acceptable alternatives, such as public transportation. A number of factors, such as the health effects of aging, can restrict or eliminate someone's ability to independently meet transportation needs with their automobile. One approach to bridge the gap between a lack of formalized services in lower density markets and instances where friends and family cannot provide assistance is through the development of volunteer Several examples of tool-kits exist to help guide prospective program driver programs. developers, however, there is limited information describing their application in the rural context. While there is some rural research that describes the demographic and socioeconomic attributes of the users of these programs (1), there is less understanding of the attributes of the programs themselves that ultimately attract users and volunteers. This was recognized by the AP060 Paratransit Committee of the TRB at the TRB Annual Meeting in 2007 which proposed a national research effort to study "the factors which contribute to the success of volunteer driver programs in different settings", and remains a research need to present day (2).

This paper describes elements of research exploring the feasibility of establishing a non-emergency medical-based volunteer driver program serving a rural area of approximately 21,000 people in the Province of New Brunswick, Canada. It presents stated preference results from prospective users and volunteers with respect to operational and other factors anticipated to be critical to the development and ultimate success of a rural volunteer driver program.

# **Background**

In its Research Needs Statement, the AP060 Paratransit Committee highlighted the importance of volunteer driver programs to serve communities where "traditional transit and paratransit strategies are cost-prohibitive", such as rural areas (1). The Committee's statement also indicated that the Beverly Foundation, a non-profit organization devoted to enhancing "mobility and transportation for today's and tomorrow's older population" (3) has a database with almost 400 volunteer driver programs in a variety of settings, averaging 18 years of operation.

Volunteer driver programs in the United States are characterized by the provision of transportation to specific demographic groups (seniors or low income in particular) by a volunteer driver typically under the auspices of a non-profit group or social service organization. The Beverly Foundation (4) found that the majority of programs for older adults in the United States serve seniors and people with disabilities (75%), serve rural areas (69%) and do so with volunteer-owned vehicles (91%). These programs do so at lower costs than paratransit services (\$37.94 per ride compared to \$7.73 per ride for volunteer programs) and have the benefit of crossing jurisdictions, travelling to multiple jurisdictions, and serving "hard to serve areas". Given the aging population in many rural areas, successful volunteer driver programs may facilitate the transition of medically-at-risk older drivers to passengers in rural areas and contribute to improving road safety since increased collision rates among the oldest rural drivers (when compared to their urban counterparts) have been attributed in part to the lack of rural alternatives (5).

There does not appear to be a clearinghouse for volunteer driver program information in Canada akin to the Beverly Foundation in the United States, though there are many volunteer driver programs in Canada. Some have specific mandates (e.g. seniors to medical appointments); some are faith or charity-based. Others are tied to national charities, such as the

Canadian Cancer Society, therefore are aimed at serving individuals afflicted with a particular disease rather than a demographic group.

One of the most high-profile volunteer driver programs to develop in the United States is the Independent Transportation Network of America (ITN America) founded by Katherine Freund (6). It serves seniors aged 60 years and older and people with visual impairments through the use of private automobiles and volunteer and paid drivers, 24 hours per day, seven days per week (7). It employs innovative techniques to pay for rides, such as allowing volunteers to earn ride credits for themselves or others, and also has a sophisticated computer system to organize and monitor travel behaviour. The most common trip types taken are for medical purposes (41%). Its successful affiliates are currently only in the United States, though efforts were made to replicate the model in Canada.

# Volunteer driver programs in the Canadian transportation policy landscape

Unlike the United States, Canada does not have a Federal Highway Administration or Federal Transit Administration; transportation policy and planning relating to highways or transit are typically made at the provincial or municipal level. Some provinces have their entire population covered by some type of municipal structure, while others only have part of the population living in municipalities. The rest of the population falls under provincial jurisdiction, which is significant in these provinces because transit is Canada is typically delivered only by municipalities. Outside of municipalities, volunteer driver programs may be the only mechanism to address the challenges of transportation disadvantaged individuals, hence the need to better understand their success factors.

The Province of New Brunswick, Canada (population: 750,000, located near Maine), has nearly 50% of its population living in rural areas (8), and the majority of those rural residents (250,000) live outside of municipalities and are not served by transit. Consequently, the most popular form of transportation in New Brunswick is the automobile, with 89% of New Brunswickers travelling to work by automobile either as a driver or passenger (9).

In recognition of the lack of transportation alternatives in rural areas, the Economic and Social Inclusion Corporation (ESIC) of New Brunswick was tasked by the New Brunswick Government to support the development of community transportation alternatives, such as a volunteer driver Dial-a-Ride program (10). This has been facilitated through local partnerships with 12 Community Inclusion Networks (CINs), non-profit groups committed to community development and/or poverty reduction. These networks were chosen to represent 12 regions to ensure geographic coverage of the province.

While many volunteer driver models exist, such as ITN America, one model that had been successfully operating in one county in rural New Brunswick prior to ESIC's Dial-a-Ride initiative is a charitable organization called the Charlotte Dial-a-Ride. Volunteer drivers are paid mileage and clients are "members" of the organization. It serves a primarily rural coastal county of 27,000 citizens and has currently 134 members and 42 volunteer drivers (11). Note that "counties" in New Brunswick are geographic not municipal entities. Members are primarily over the age of 65 years and are female. Similar to ITN America, the most popular trip usage is for medical appointments (41% of all trips) (12), even though the service is available for all trip types. While one national charity (Canadian Red Cross) offers a volunteer driver program in some communities in New Brunswick, unlike the Charlotte Dial-a-Ride, it does not offer intercity service or compensate its volunteers. Efforts have been ongoing to replicate the model among other regions in New Brunswick, but to date only one initiative proceeded to the

deployment stage in 2011, only to cease operation shortly thereafter having provided only 121 total rides to 15 members (13). Some the reasons for the failure of the program included:

- Difficulty in recruiting volunteer drivers
- Inability of some prospective drivers to be insured as volunteer drivers by their respective companies
- Too large of an initial service area with too few drivers
- Pledged, but not guaranteed funding
- Incomplete operational policies (i.e. drivers with pet allergies matched with clients with pets)

In 2012, a community group in Sussex, New Brunswick (pop. 4,310, total with surrounding areas 20,855) sought to reproduce the Charlotte Dial-a-Ride in its community to serve those unable to independently secure transportation to medical appointments. It branded the initiative "Driving Toward Health". It commissioned this study to develop an implementation strategy for a volunteer driver program that was to explore the perspectives of prospective users, volunteers and supporters and develop operational considerations and estimated costs and benefits. The research effort intended to build on existing data sources and approaches with results that would be tailored to the needs of the community.

# **METHODOLOGY**

The goal of this study was to compile as much community, user and volunteer information as practicable in order for the non-profit client to make an informed decision about the feasibility of "Driving Toward Health" in the Town of Sussex and its surrounding area. It included reviews of census data, one-on-one interviews with key community stakeholders, the solicitation of feedback from physicians, health professionals, local businesses, churches and service clubs, and surveys of potential users and volunteers. A key aspect of feasibility was considered to be the ability to attract potential volunteers and meet the needs of potential users, the results of which are profiled in this paper. Given the challenges with the reproducibility of the Charlotte Dial-a-Ride model in other regions of New Brunswick, special attention was given to a better understanding of the views among prospective users, volunteers and supporters in terms of the operational and organizational characteristics of a rural volunteer driver program. These views are the subject of this paper.

# **Tool kit review**

There are numerous tool-kits available to assist with the launching of a volunteer driving program, such as through the Beverly Foundation (14) and the CTAA (15). The University of Alberta Medically-At-Risk Driving Centre is involved with a number of initiatives in Alberta for rural alternative transportation systems and has posted several resources on its website to inform potential development including a thorough guide by the Edmonton Seniors Coordinating Council (16). The Charlotte Dial-a-Ride in New Brunswick has made publicly available its business plan (17) and its operational review (11), both of which informed the development of the study.

The tool-kits appeared consistent in their approaches that initial stages of program development require collecting local data and engaging community stakeholders early on. While some provide clear guidance and a logical progression for planning, implementing and

evaluating the program, there appears to be little guidance regarding the methods for community data collection in the earliest stages, and most importantly, the analysis and interpretation of the data. For example, the Beverly Foundation tool-kit includes a community survey which seeks individual user attribute and ridership data, but is unclear how to isolate a respondent's transportation need by trip type. Hanson and Hildebrand (18) found that the participants in their convenience sample reported certain trip types were easier to independently find alternatives for than others, with "medical trips" perceived to be the most difficult. Routine medical trips may have a fixed appointment start time, but the end time may not be clear at the outset, which may contribute to someone feeling as if they are "inconveniencing" their driver.

## Census data review

Data from the publicly available elements of the 2011 and 2006 Census of Canada (19,20) were used to profile the 15 individual communities within the study area. Research in rural Finland (21) reports that "older persons living singly, women, persons with impaired health and low economic resources, and the rural elderly tend to be particularly at risk of losing their abilities to move about." It was hypothesized that communities with the highest proportions of their population reflecting those attributes, in concert with attributes such as higher population density and existing propensity to use driving alternatives, would demonstrate the highest interest in non-emergency medical transportation:

- Children aged 14 years and younger
- Adults aged 65 years and older
- Lone parent families
- One person households
- Apartments and row houses
- Percentage of the population living in low income
- Percentage of the population not being a vehicle "driver" as a primary mode of transport to work

## Sampling methodology

Surveys of potential stakeholders and users were completed employing "non-probability" sampling, including convenience sampling, which can give useful results but "not amenable to sampling theory" (22). It was not expected that random sampling or a mail-out survey would produce better responses than convenience sampling, especially given the target population was considered unlikely to respond to unsolicited surveys and the mail out would have exhausted the consulting budget. The non-profit client had well-established working relationships with several other groups whose members or clients would have been likely users or volunteers within a volunteer driving program; consequently their participation likely increased response rates among those most likely to participate in "Driving Toward Health".

# Qualitative data collection

One-on-one interviews with key stakeholders provided valuable qualitative information regarding their interest and participation. A synthesis of these interviews was used to determine if there were common themes among different stakeholders, as well as eliciting selective themes important to certain stakeholders. Facilitated focus groups were also employed at a community round-table to elicit common interests and issues with respect to "Driving Toward Health".

# **Survey methodology**

A single survey was used to solicit preference and interest information among potential volunteers, users and drivers. This was to provide an opportunity for individuals to see themselves as contributors to the effort as well as users of the service, rather than as a participant in one of three mutually exclusive options. Survey questions were generally organized around a 5-point Likert-type scale to rate likelihood and importance (23), and also included stated preference responses. Questions soliciting detailed personal information (such as income, marital status, employment status) were deliberately excluded from the survey. While this reduced the overall number of variables for comparison (and validation against external datasets, such as the census), it was to minimize non-response and respect the privacy of respondents. Potential participants were invited to provide their name and contact information if they consented to being on a list of potential users and drivers and to be contacted by the non-profit client in the future.

## **RESULTS**

# **Community profile**

Sussex and Area has a population of approximately 21,000 encompassing 15 incorporated and unincorporated communities, including the Town of Sussex (4310) which is the commercial and service centre for the region. The economy of Sussex and Area is dominated by agriculture and resource extraction, including potash mining. Statistics Canada Census data from 2011 were first reviewed for all 15 communities individually, (including the Town of Sussex) presented in aggregate form for "Sussex and Area", and then placed in context with New Brunswick provincial data in Table 1.

**TABLE 1 Descriptive Statistics of the Study Area** 

	Town of Sussex	Sussex and Area	New Brunswick
Total Population	4310	20855	751170
% aged 0 to 14 years	15.8%	16.5%	15.1%
% aged 15 to 64 years	62.3%	66.3%	68.4%
% aged 65 years and over	21.9%	17.2%	16.5%
Lone-parent families as a % of all families	21.3%	13.0%	16.1%
One-person households as a % of all households	35.7%	25.1%	26.0%
Apartments and row houses as a % of all housing	34.8%	10.2%	30.9%
Total labour force	1730	8555	323070
% of labour force using car, truck, van, as driver as primary mode to work	69.6%	82.5%	77.9%
% of labour force using car, truck, van, as passenger as primary mode to work	13.3%	9.3%	11.2%
% of labour force using public transit as primary mode to work	0.0%	0.2%	2.0%
% of labour force walking or biking as primary mode to work	16.2%	6.4%	7.3%

Low income statistics from the 2011 Census are not yet available at the community level, therefore before tax low income percentages data from the 2006 Census were used. Percentages are only available at the community level (not Sussex and Area). Assuming the relative size of each community in Sussex and Area did not change between 2006 and 2011, the weighted average percentage of the population in low income was approximately 23% for the Town of Sussex and 14% for the region in 2006. This was slightly higher than for New Brunswick. The Town of Sussex was the only community among the 15 in the study area that had higher than the provincial population percentages for all of the relevant census attributes profiled.

# **Survey response**

A total of 96 surveys were returned, yielding a total of 68 useable responses. A total of 28 surveys were returned where the respondent did not indicate whether they were a potential user, driver or a volunteer involved with the operation or fundraising support of the agency. The majority of respondents were from the Town of Sussex, with the remainder coming from other municipalities or the rural areas outside of the Town (Table 2). While the Town of Sussex accounts for approximately 21% of the population of the study area, responses from the Town account for 61% of all responses. The observed geographic distribution of respondents is significantly different at 5% from the expected population distribution, suggesting responses from the Town of Sussex are over-represented in the sample. The majority of respondents were female and between the ages of 25-65. Chi-squared tests on the data show that at 5% significance there is no significant difference between the age distribution of respondents and the study area as a whole, but there is a significant difference between the distribution of male and female respondents, suggesting females are over-represented in the sample as a whole.

TABLE 2 Number of Survey Responses by Age, Gender, and Geographic Area

	Age Group				
	<25		25-65	65+	Grand Total
Responses by Location					
Town of Sussex		1	30	10	41
Other communities in Sussex and Area		2	20	4	26
Not stated		0	0	1	1
Responses by Gender					
Female		3	37	6	46
Male		0	11	9	20
NA		0	2	0	2
Total		3	50	15	68

The data in the following table describe how respondents self-identified in the survey. A total of 76% respondents indicated they would be either a user only, driver only or volunteer only, with the remaining 24% reporting multiple interests. A total of 9 individuals saw themselves as potential users and drivers both (including some who would volunteer as well).

TABLE 3 Self-identified roles of prospective participants in a volunteer driver program

	Responses	Percentage
User Only	28	41%
User and Driver	5	7%
User and Volunteer/Supporter	1	1%
Driver Only	7	10%
Driver and Volunteer	6	9%
User, Driver and Supporter	4	6%
Volunteer/Supporter Only	17	25%
Total useable responses	68	100%

# **Prospective user preferences**

A total of 38 individuals indicated they would have interest in being a user of "Driving Toward Health". Prospective users were given an opportunity to rate the importance of three trip types to assist with focusing the vision of "Driving Toward Health":

- Using the program for medical appointments within the Town of Sussex (locally)
- Using the program for medical appointments at the Saint John Regional Hospital (80 km away), which is the primary centre for cancer treatments, heart health, etc.
- Using the program for shopping or other trips

There appeared to be a clear endorsement of the initiative for use in medical appointments, with 79%-82% stating it was important or very important to use the program for medical appointments in Saint John and Sussex, respectively. Approximately 40% felt it was important or very important for the program to be used for shopping or other trips.

The majority of prospective users anticipated using the program on a monthly or less frequent basis for both health destinations. A total of 3 respondents intended to use it weekly for both locations. The remainder of responses included timeframes such as "one every few months" or "as needed".

TABLE 4 User preferences for frequency of use

	Daily	Weekly	Monthly	Rarely/ Never	Other/ NA	Total (n=38)
Frequency of use for medical purposes within Sussex Town limits	0%	8%	42%	32%	18%	100%
Frequency of use to the Saint John Regional Hospital	0%	8%	26%	50%	16%	100%

Note that columns may not add to 100% due to rounding

The data in the following table describe the prospective user preferences regarding operational and organization characteristics of a volunteer driver program. "Users" in this case also includes those who saw themselves having multiple roles (i.e. user and driver, etc). The majority felt it was important or very important to use volunteer drivers to keep costs low, and to know their driver. Most felt it important to be picked up at home, as well as having access to a vehicle with

a car seat for children. Responses were split about the importance of having a wheelchair accessible vehicle and whether a user could donate their time in exchange for ride credits.

TABLE 5 User preferences regarding operational and organizational characteristics

	Very important or important	Moderately important	Of little importance/ unimportant	Don't know/NA	Total (n=38)
Using Volunteer Drivers	61%	189	% 8%	13%	100%
To know your driver	66%	139	% 18%	3%	100%
Wheelchair accessible vehicle	50%	89	% 26%	16%	100%
Access to a vehicle with car seat for children	58%	119	% 26%	5%	100%
To be picked up at home	79%	119	% 8%	3%	100%
To be able to donate time, resources or vehicles in exchange for ride credits	45%	169	% 16%	24%	100%

Note that columns may not add to 100% due to rounding

# **Prospective driver preferences**

A total of 22 individuals indicated they would be potential drivers, and of those 22, only 11 were available to drive on weekday (when medical appointments are likely to take place). The majority of prospective drivers felt it important or very important that volunteers be compensated for their mileage and for volunteers to receive training. Aside from the paid mileage, they felt it was of less importance for volunteers to receive other types of compensation such as charitable receipts, earning credits through donations or exchanging their support for rides.

TABLE 6 Views of prospective drivers on program organizational characteristics

	Very important or important	Moderately important	Of little importance/ unimportant	Don't know/NA	Total (n=22)
Volunteers to be paid mileage	59%	14%	14%	14%	100%
For other volunteers to earn credits for donating time and effort	32%	27%	14%	27%	100%
To have volunteer training	64%	14%	5%	18%	100%
To receive a charitable receipt for your donation	23%	32%	27%	18%	100%
Exchange support or donation for rides	27%	23%	32%	18%	100%

Note that columns may not add to 100% due to rounding

A total of 28 individuals indicated they would be "volunteers or supporters" (not drivers). Their preferences mirror those of the prospective drivers.

# **Community perspectives**

Approximately 25 people attended a transportation roundtable meeting at a local middle school. Following opening remarks, attendees were organized into four groups of 4-6 people for a facilitated focus group session involving volunteers from the non-profit client. Groups were invited to provide feedback in four "rounds" of 15 minutes guided by pre-developed questions.

Each group had comments, concerns and questions regarding the operational aspects of the service, including insurance considerations. Most groups indicated that the service would have benefits for individuals who seek increased independence and are concerned about being a burden on others or finding a ride. Some groups saw benefits for individuals in terms of improved health and quality of life. Some of the cons discussed included the potential time burden on volunteers and concerns about how to fund the service, including potential cost burdens on users and volunteers.

All four groups believed that the community at large would support the concept and that specific user groups would make use of it. All groups also indicated that success is contingent on the concept effectively promoted throughout the region to eligible groups.

The majority of groups indicated that users would expect to have access to a safe vehicle. Groups also indicated that people with babies or children, or users with disabilities would also expect to be able to use the service. Some groups indicated that users would expect certain operating conditions relating to the driver and to the vehicle (ie. a clean driving record, proper insurance, no scents policy, no alcohol, etc.). One group indicated the users would likely expect to be able to coordinate their various appointments and to use the service in a non-health emergency situation.

All groups indicated that volunteers should be compensated for the mileage they incur in support of "Driving Toward Health". A couple of groups also indicated that meal expenses should be considered, especially if the travel requires being away from home during meal times. There were also groups that suggested other perks, such as gas gift cards or coffee shop gift cards as a way to encourage volunteering. Some groups also highlighted having a public acknowledgement of the volunteer's effort, such as through a banquet and/or a letter of appreciation. Some groups discussed how a volunteer effort such as this could contribute to fellowship and a sense of belonging.

Additional comments related to operational ways to make volunteering more appealing, such as having a single entity coordinate existing volunteer groups, having access to a reputable auto service centre, a clear set of rules and expectations, having a photo ID, or the ability to claim expenses through income tax.

Groups developed a number of expectations relating to the driver's suitability to drive, the suitability of the vehicle for carrying passengers, operational considerations (i.e., no scents, no profanity, etc), guidelines for the interaction between drivers and passengers. One group suggested a minimum time commitment while another discussed weather safety protocol.

The questions and concerns brought up through the roundtable discussion were synthesized into a table of operational policies necessary to address the concerns.

TABLE 7 Summary of operational considerations identified through roundtable discussion

Hear Dollar	Age requirement	Do they have a specific age for drivers/users?
User Policy	User eligibility	Are there specific eligibility requirements to be a user?
	Liability	How much liability insurance do drivers have to carry?
	insurance	
	License	Any type of license restriction or endorsement?
	Bad weather	What do they do in bad weather?
Cofoty and	policy	-
Safety and		What types of background checks are required for
Security	Volunteer check	volunteers?
	ID cards	Do volunteers require ID cards?
	Application	Does the organization have an application process?
	process	
	First aid training	Are drivers required to have first aid training?
	Transporting	What is their policy on transporting youth?
	youth	
	Wheelchair	Is the service wheelchair accessible?
	accessible?	
	Other trips	Can drivers deviate from the planned trip route?
		Is there a restriction on the number of passengers
	Client limits	(other than vehicle capacity)?
Operational	Time	Is there a specified time commitment required of
Policy	commitment	drivers?
	Scent policy	Do they have a no scents/pets policy?
	Operating hours	What are the office operational hours?
	Notice to book	How much in advance do people need to book rides?
	drive	
	User pay	Do users have to pay?
	Taxi back up	Are taxis enlisted if a drive is unable to be provided?
	Booking policy	Is there a prioritization process for booking?
Code of	Written code of	Is there a written code of conduct for drivers?
Conduct	conduct for	
	drivers	
Volunteer	Paid mileage	Are volunteers paid mileage?
benefits	Meals?	Do volunteers get paid meals?
	Perks	Are there other perks for volunteers?
Other		Are there other considerations regarding their service
considerations		that should be included?

## **DISCUSSION**

#### Limitations of the data

Given the sampling techniques, it was not possible to assess the representativeness of the data with any certainty. Data do not exist to identify what proportion of the population in this instance could be expected to be potential users. Since this project was to evaluate the transferability of the Charlotte Dial-a-ride model to Sussex and Area, it was possible to explore the reasonableness of the findings by comparing to figures from the Charlotte Dial-a-Ride which operates in a similarly sized rural region and has done so successfully for several years.

The Charlotte Dial-a-Ride has a membership of 134 for a county population of 26,549, indicating that approximately 0.5% of the population are members. Of the 38 respondents who indicated an interest in being a user of the system in Sussex and Area, 25 were from the Town of Sussex. Given the community engagement exercises were centred in the Town of Sussex, it is likely the outlying areas were underrepresented; therefore the ratio of potential users to population was explored for the Town of Sussex only. A total of 25 potential users from a population of 4310 represents approximately 0.6% of the population that are interested in being a user of the system, nearly the same proportion as for the same model in a similarly sized rural area. This is an interesting observation that may only be coincidental; however it warrants further study to determine whether it is possible to develop rider estimates using census data for a volunteer program such as this. These values do appear to be reasonable and within the same order of magnitude as suggested by a report for TRB (24) indicating that 1.3% of Americans are transportation disadvantaged in a way that delays their medical treatment. Equivalent data do not appear to be available in Canada.

# **Commentary on survey participation**

The higher participation from residents of the Town of Sussex than the outlying areas could be because the community has higher than provincial and regional averages in population characteristics where one may associate with greater interest/demand for alternative transportation:

- Individuals aged 0 to 14 years
- Individuals aged 65 years and over
- Lone-parent families
- One-person households
- Apartments/row houses (higher density than single family dwellings)
- Incidence of low income
- Mode of transportation to work is not as a car driver

The Town of Sussex is home to many of the outreach organizations, service clubs and faith-based groups, seniors groups and other which one would expect the most interest among prospective users.

It should also be noted that the surveys had notably higher participation from women than men. This is consistent with membership and ridership figures from the Charlotte Dial-a-Ride, while also consistent with other literature regarding participation in alternative transportation (25).

# Commentary on the roundtable session

The roundtable session permitted interested individuals to identify specific concerns regarding the program, namely the operational considerations. While numerous tool-kits exist (which do describe operational considerations), employing a "ground-up" approach where citizens identified their particular concerns upfront permitted those concerns to be investigated and responded to directly, which may contribute to increased stakeholder buy-in as the program progresses.

The liability insurance issue was prevalent in all stakeholder meetings, which is consistent with the broader observations of Hendricks and Audino (26). An insurance agent interviewed for this work indicated that insurance companies in New Brunswick do not have consistent rules regarding insuring volunteer drivers, in some cases requiring drivers to be insured as a taxi.

#### Other limitations

The most crucial limitation of this work is that "Driving Toward Health" is still is its early stages of development, therefore is it not known whether addressing the issues and preferences as outlined will translate into a successful program. At the time of the submission of this paper, the program has not been launched. Nevertheless, the information collected provides a valuable and detailed insight into a program in its infancy, providing lessons.

## **CONCLUSIONS**

This paper provides preference information among potential users and drivers for a prospective non-emergency medical transportation in a rural area of New Brunswick, Canada, but data such as these do not appear to be readily available among the tool-kits aimed at the development of volunteer driver programs. The issues identified by the AB060 paratransit committee appear to be as relevant today as when they were proposed and local research such as this reiterates the need for national data collection. The numerous tool-kits available to assist non-profit and other groups have detailed useful information, but there still can be challenges when it comes to interpreting and analyzing data for the development of volunteer driver programs.

# **Next steps**

Limited information exists regarding the potential uptake of volunteer driver programs, both from a user and volunteer perspective. Additional research efforts could build on or explore some of the promising (but not statistically proven) findings including:

- Developing a model to predict ridership and volunteer supply using census data, and validating against the attributes of areas that have successfully operating volunteer programs
- Identifying the factors which encourage participation among users and volunteers
- Exploring the user preference for medical transportation over transportation for shopping and other trips
- Developing broader policies to address operational concerns (i.e. consistent volunteer driver insurance rules)

Additional research questions could include:

• Is it possible to predict where a volunteer driver program will be successful?

• Is it possible to use census and geographic data to identify what type of volunteer driver program (such as medical-based) could be successful?

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