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Assessing Quality of Life for Clients of Langs Farm Village Association: A Case for Inclusion of the Social Determinants of Health Approach in Addressing Quality of Life in a Community Health Centre Setting

By

Annette A. Penney

Honours in Psychology, Memorial University of Newfoundland, 2003

THESIS

Submitted to the Department of Psychology
in partial fulfillment of the requirements
for the Master of Arts degree
Wilfrid Laurier University
2006

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July, 2006

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Abstract

In my master's thesis research I investigated the relationship between participant inclusion in Langs Farm Village Association, a local community health centre, and quality of life. A quality of life survey which I developed based on prior research conducted by the Canadian Policy Research Network (2001) was administered to 130 individuals, 65 participants who attended a program and/or service at Langs (Langs group), and 65 participants who did not (non-Langs group). Results of multivariate ANOVA indicated group differences of statistical significance on four out of eleven subscales of my quality of life survey. Community residents who participated in a program or service at Langs Farm Village Association reported higher quality of life on three out of eleven survey subscales. I have described and explained factors associated with quality of life for Langs' participants related to these survey results. I concluded that quality of life can be improved for community residents (especially those who are most vulnerable or at-risk) who access programs and/or services at Langs. My findings are discussed in terms of addressing the social determinants of health through a community health centre setting in order to improve quality of life for its participants and patients.

Standpoint and Epistemology

My Interest in the Study of Health Care

My very first exposure to academic research in the area of health care issues and health care delivery specifically, came in 1999 when I took a philosophy course in medical ethics at Memorial University of Newfoundland. Although heavily weighted towards bioethics, this course included components on issues of health care reform, technology in medicine, medicalization of society, resource allocation, justice in health care, population health, the Canadian health care system and values, delivery of health care, and trends in community care. At this time I was living in rural Newfoundland and was enrolled in the course via distance education, which meant we had bimonthly teleconference sessions. I became one of the most vocal members of these sessions; it was through this experience that my passion for health care issues began its development.

Our biggest assignment for this course was to design a feasible reform to the health care system in Canada. An undertaking of this dimension forced me to be very critical of the way health care services are delivered in our country and to investigate alternatives in other countries (I chose Israel and the UK). The investigation of alternatives led me to examine health care delivered through community clinics. However, it was not this one particular assignment that made all the difference for me but rather, the level of critical thought required combined with ethical considerations given to proposed changes that could be made within our system of health care.

One of the core values in the field of Community Psychology that I am deeply attached to is that of health and well-being. I am concerned about the health and quality of life of Canadians, especially for members of disadvantaged or marginalized groups. It is my

personal belief (and I admit it runs deep) that improved health status and quality of life can permeate all other areas of our lives allowing us to live fuller, more productive, and meaningful lives. It is my understanding that the manner in which we manage health care services and promote health and well-being needs drastic improvement and reforms. Thus it is this knowledge and my desire to engage with community organizations that work with their residents to help improve physical, social, emotional, and economic well-being that fuels my motivation around health care issues. I have a holistic view of health and well-being; I am a proponent of integrative health care services and I embrace the idea of addressing health care needs by encompassing the social determinants of health approach. For this masters thesis I have incorporated the population health promotion model into my way of framing the issues regarding health.

The readings I have done on Community Health Centres (CHCs) in Canada have led me to the understanding that many CHCs address health and well-being through a social determinants of health (SDOH) framework. The purpose of my study is to assess whether the use of a SDOH approach to delivering programs and services in a community health centre, as can be seen in the Langs model, equates with a higher self-reported quality of life for patients and participants of a CHC. Thus, it was my hypothesis that self-reported QOL of patients and participants who attended Langs for any program or service would be better (represented as higher scores on the survey subscales) as compared to residents from the same neighbourhoods who did not attend Langs. Secondary to this hypothesis was my attempt to explain whether or not the survey results indicate that the Langs model contains unique factors that account for or contribute to the hypothesized improved quality of life for their patients/participants. I interpreted distinct portions of the survey results with the

guidance and input of several Langs' staff, board members, and members of their Community Services Committee.

Methodology, Assumptions, and Biases

It was my intention to employ both quantitative and qualitative research methods in this study. As I continued to learn more about qualitative research, I have become attached to the idea that it must form an essential component of not only this study, but my future research work as well. Throughout the first two semesters at Wilfrid Laurier University (WLU), I experienced a serious struggle with my ingrained assumptions of how psychological research must be conducted. I have to admit that I arrived at WLU with a deep-seated attachment to positivistic principles that I found difficult to detach from to any degree. This loyalty made exploring other options painfully agonizing. Thankfully, I was fortunate to have faculty members in community psychology who, while sharing their knowledge, were very patient with me. This allowed me to go through my own developmental process. It was this process that enabled me to accept other methodologies and research methods on my own terms at a pace that suited me.

This "research" growth experience has been a painful one for me for several reasons but most markedly I was concerned about engaging in research that would be deemed by other social science researchers as scientifically unsound. Heaven forbid I should put myself in a position where I would be criticized by a group of my peers because I had not clung to the positivistic premises of scientific objectivity. The effort it required for me to get where I am academically (returning to school as a mature student and single mother of three) made it even more difficult to accept the idea that there may be other methods and models to study human behavior and the social structures affecting our lived experiences. I was taught and

trained as an undergraduate in such a way that it would be deemed near criminal to depart from my training to any degree.

Epistemology

My reflection on what I have studied in philosophy courses and my exposure to community psychology principles and values has made me realize even further: how we can know what can be known is obtainable through different methods. This epistemological concept falls in alignment with readings I have done on the multiparadigmatic approach to community research. One aspect of epistemology that was entirely new to me is the idea of who can know. Up until my enrolment in the Community Psychology program, I was under the impression that only the privileged academics and scholars could obtain "truth" (and there was always a search for one real truth). I now have a better appreciation and deeper understanding for the meaningful contributions that "participants" have to the accumulation of knowledge which, after all, is about them in the first place. It is my hope that the design of this study reflects that I have truly encompassed this belief and embraced it as a value in my research.

Primary Health Care Delivery in Ontario

Models of Health Care Delivery

Currently in Ontario, primary health care services are delivered through a number of models. The most common model is the Fee-For-Service (FFS) model whereby self-employed physicians (either solo or in a group practice) bill the Ontario Health Insurance Plan (OHIP) for each procedure or consultation they perform. OHIP predetermines the fee schedule and insured individuals are covered for primary health care services (e.g. doctor visits, hospitalization, chronic care, surgical procedures, long-term care) through this plan. However, not all primary health care services are covered under OHIP; in recent years the Ministry of Health and Long-Term Care discontinued OHIP coverage for ambulance trips, chiropractic treatment, and eye examinations. FFS physicians themselves determine what kinds of services they will provide, their hours of operation, and how many patients they will serve. Most family doctors in Waterloo Region are FFS physicians (B. Davidson, personal communication, August 09, 2006).

Other models of networks of family doctors in Ontario include Health Service Organizations (HS0s), primary care networks (PCNs), Family Health Networks (FHNs) and Family Health Groups (FHGs). With the exception of HSOs who are funded solely by capitation, these networks of doctors work either solo or in group practices and have a funding agreement with the Ministry of Health and Long-Term Care (MOHLTC). The funding agreements are a mix of capitation or altered fee-for-service with some additional fees and/or modifications. The majority of HSOs are physician-owned with the remained either community or university-sponsored. There are approximately 52 HSOs across Ontario; Grandview Medical Centre is an example of an HSO serving the Cambridge area. As part of

a pilot project in the late 1990s, 13 PCNs were set up which are now referred to as Family Health Networks and are accepted by the MOHLTC. FHNs require a minimum of five family doctors while FHGs require a minimum of three to serve patients during extended appointment hours. Telephone health advisory service and on-call services are available at both FHNs and FHGs and at present there are approximately 30 FHNs and four FHGs in Ontario (B. Davidson, personal communication, August 09, 2006).

In March, 2006 legislation was passed by Queen's Park which allowed for the establishment of Local Health Integration Networks (LHINs). The aim of the Ministry of Health and Long-Term Care was to devise a plan that will involve LHINs in: providing shorter wait times to access the health care system; helping Ontarians to become healthier; and arranging for better access for Ontario residents to doctors and nurses. This management of health care at the local level is intended to build on successes already in existence in Ontario by integrating services and collaborating at the community level (MOHLTC, 2006b). One of the goals for LHINs is to place patients at the centre of the Ontario health care system by involving people at the community level. LHINs in Ontario will resemble regional health authorities such as those in the province of British Columbia where a network of hospitals, clinics, health units, and residential facilities are all managed under one authority. LHINs will be different from regional health authorities in that they would not be providers of direct services nor would their existence require changes (e.g. consolidation) to the governing structures (boards) of existing health organizations. Also, LHIN boundaries would be permeable for patients; patients would not be limited in their choices of physicians and medical and acute services by geographical boundaries (MOHLTC, 2006b).

Community Health Centres

Community health centres began in the mid-1970s in Ontario as an experimental pilot with the first community health centres (CHCs) receiving funding through capitation payments from the Ministry of Health. By the early 1980s CHCs were accepted as part of mainstream health care services and the Association of Ontario Health Centres (AOHC) was incorporated on November 30, 1982. Since that time, CHCs have received the governmental support required to experience tremendous growth; there are currently 54 CHCs, several smaller satellite CHCs and 10 Aboriginal Health Access Centres in Ontario. A community health center is a nonprofit community-governed organization that provides primary health care, health promotion, and community development services for individuals, families and communities (AOHC, 2002; MOHLTC, 2006; Shah & Moloughney, 2001). Although CHCs are appropriate for the entire population (Sutherland, 1990), very often it is a priority for these health centres to serve disadvantaged populations and communities who face access barriers. These groups can include members of low-income families, isolated elderly people, street youth and homeless people, ethnic and racial minorities (especially new immigrants and refugees), and remote under-serviced communities (AOHC, 2002; Shah & Moloughney, 2001).

Community health centres offer a diverse range of programs and services. They are especially noted for their multidisciplinary team-based care providers. These teams are made up of salaried health care providers covering a broad range of professions that may include physicians, nurse practitioners, optometrists, dieticians, chiropractors, physiotherapists, family counselors, social workers, and community developers. Coordination of health care providers in a single setting means that there is much less fragmentation and duplication of

services than is encountered in traditional primary care (AOHC, 2002; Romanow, 2002; Shah & Moloughney, 2001; Sutherland, 1990). The shared patient record also saves the community health centre a significant amount of money (Sutherland, 1990).

Although the health care services provided by community health centres are designed to meet the unique needs of each of their local communities, most CHCs provide comprehensive primary care (including mental health care), health promotion, education and illness prevention services, and share a focus on community development and capacity building (AOHC, 2002; Shah & Moloughney, 2001). Broader health determinants are addressed, and in this regard, primary care delivery is most often combined with other social services. The social services available address community residents' needs associated with employment, education, environment, and poverty. For instance, it is not uncommon to find programs for preschool children, youth, teen mothers, single parents, and seniors in a local CHC. These programs can be social, spiritual, educational, or recreational in nature (Langs, 2003a) and often build community capacity by addressing broader health determinants.

Prevention, health promotion, and holistic approaches to health issues and policy development are dimensions of the population health model (AOHC, 2002; WHO, 2003). On a practical level, prevention is practiced within community health centres through specific strategies to improve access to health needs such as immunization and cancer screening (most notably pap smears). Health promotion, according to the Ottawa Charter (1986), is:

> the process of enabling people to increase control over, and to improve, their health. To reach a state of complete physical mental and social well-being, an individual or group must be able to identify and to realize aspirations, to satisfy needs, and to change or cope with the environment.

This type of health promotion can be seen through the interventions that are in place in community health centres that address smoking and management of chronic conditions such

as HIV, asthma, obesity, and diabetes (AOHC, 2002; Orford, 1992; Romanow, 2002). Various studies support the positive outcomes of health promotion and prevention programs that increase compliance with medication regimes, lead to better monitoring of chronic and acute conditions, and increase self-management of illness. Since health promotion programs tend to integrate the ecological approach, interventions are more likely to be person-centered, holistic, values dominant, and determinants based (Catford, 1999).

Increasing the development of communities is a fundamental mandate of community health centres and in this regard, strategies are designed to address the unique capacity needs of the community it serves. Common capacity building strategies address housing and in some areas homelessness (development of tenant associations, building affordable housing), food security (community gardens, links to food banks), education and employment needs (alternative school programs, after-school homework assistance, job banks, resume workshops), and community safety issues (crime prevention seminars). This is achieved by providing residents with programs and services to increase skills, knowledge and experience (AOHC, 2002). Although not quite as common, water and air quality issues are also addressed through some CHCs (AOHC, 2002; Langs, 2003b; Shah & Moloughney, 2001). Community development initiatives include establishing partnerships for service provision with both new and existing health and social service providers to increase access to services and programs locally (Langs, 2003b).

Board membership of community health centres is one means through which opportunities are offered for residents to contribute in a meaningful manner in their communities. Although the board members of these health centres may differ in the way they are chosen, in all cases there is an emphasis on representing the community and the patients

and participants, rather than simply the needs of the healthcare providers (AOHC, 2002; Orford, 1992; Sutherland, 1990). Community board governance and accreditation allows for voluntary involvement of residents and community stakeholders, which results in a high degree of accountability to the community it serves. Residents are involved in policy selection, program development, and executive decision-making. Inclusion, participation, and increased control means that the programs and services provided are more likely to represent the values and priorities of the community, to be more appropriate and culturally sensitive, and to be superior administratively. By acknowledging that each community has a great deal of expertise and experience, participation reduces the sense of powerlessness. A body of research on social inequality exists demonstrating that lack of control contributes to poor outcomes for both lower and middle classes (Keating & Hertzman, 1999; Marmot & Wilkinson, 2006; Wilkinson, 1996). Thus, increasing participants' control of quality of life through involvement in local community health centres is likely to result in better health outcomes.

Community health centres are seen as desirable by a significant group of governments and individuals, however, the numerous benefits to members of interprofessional health care teams should be mentioned as well. For instance, rather than spending time performing tasks that could otherwise be carried out by other health professionals, each health care provider spends the majority of her or his time involved in tasks for which they are the most qualified. Because of this maximization of skills for the health care provider, there is a reciprocal increase in professional satisfaction. Physicians particularly are allotted more time with each patient, which can improve the quality of care provided and health outcomes. As with other community health centres across Canada, the clinical staff in Ontario CHCs is paid by salary

versus the traditional fee-for-service system. On a practical level, benefits for health care providers in community health centres include paid holidays, sick leave with pay, paid educational leave, regular working hours, and much less administrative responsibility (Shah & Moloughney, 2001; Sutherland, 1990).

Currently in Ontario there are 54 community health centres, 10 aboriginal health access centres and 10 satellite CHCs. There is a $75 million commitment from the Ontario Liberal government to expand the CHC network by an additional 22 new CHCs and 17 satellite CHCs between 2006 and 2008 (AOHC, 2006; MOHLTC, 2006a). Services in Ontario CHCs are designed to meet specific needs of defined communities especially for those individuals and families who face access barriers (e.g. members of linguistic, cultural or racial groups; individuals with low incomes; those who are homeless and the elderly) in accessing a full range of primary health care services. This also includes people living in northern and rural communities and communities where there are many people living with a high risk of ill health. The emphasis on the health promotion approach and capacity building means that Ontario CHCs work with communities and the people in them to strengthen their capacity to take more responsibility for their health and well-being. This is achieved by providing educational advice and through access of resources provided by community agencies who have partnered with local CHCs.

The web site of the Association of Ontario Health Centres (2006) lists some of the programs and services that can be found in a typical CHC in Ontario. Health promotion programs can include: smoking cessation workshops; asthma health promotion; nutrition workshops; and diabetes education. Programs addressing basic needs can include: housing security and homelessness; food security; and access to employment. For those CHCs who

serve larger immigrant populations there are programs designed to support immigrants and refugees, multi-lingual programming on various topics and ESL preparation. Programs for families may include: parenting support groups; breast feeding support; childbirth preparation; bike safety; and community kitchens and gardens. CHCs recognize the need for specialized services for at-risk populations and sometimes provide programs to address: stress management; anger management; self-esteem issues; violence prevention; and community justice conflict resolution. There are always separate programs geared for the specific needs of seniors, youth, women, and children.

Both federal and provincial levels of government could find CHCs attractive foremost because of economics (efficiency, cost-effectiveness and cost-containment). Community health centres have lower per-capita costs (lower volume of visits per person per year), decreased drug use by its participants, lower surgical volumes, and fewer visits to hospital emergency rooms. Operation costs of CHCs are lower than other models of primary care delivery (FFS, HSOs) due to their higher utilization of nurse practitioners and the employ of salaried physicians only. Nurse practitioners (NPs) cost much less than physicians (starting at 50% less) and CHCs tend to use significantly more NPs than any other modality of primary care (Yalnizyan & Macdonald, 2005). With regards to salaried doctors, there is evidence to suggest that salaried physicians use fewer unnecessary services such as referrals to other specialists compared to FFS doctors which results in a reduction of operational costs (Gosden, Forland, Kristiansen, Sutton, Leese, Guiffrida, Sergison, & Pederson, 2001).

CHCs seem to manage to reduce the number of hospital visits by their patients resulting in a savings to the health care system regionally and provincially (Yalnizyan & Macdonald, 2005). One researcher found that when comparing populations that are similar in nature,

patients in the United States who used CHCs for their primary care had reduced hospitalization rates of approximately 25 percent. Apparently this reduction in hospitalization rates could equate to hundreds of millions of dollars in savings (Freeman, Kiecolt, & Allen, 1982).

Along with the impressive capacity to reduce costs, CHCs can contribute to better health through the emphasis on preventative health care and their ability to provide preventative health care services. Physicians who work at CHCs are encouraged to participate in continuing education which may also play a role in improving prevention methodology. Additionally, due to the multidisciplinary nature of health care providers situated in CHCs and the resource options available, preventative care is achieved through immunization recalls, conducting pap tests and monitoring of hospitalization patterns of their patients (Yalnizyan & Macdonald, 2005). There is evidence of better health outcomes overall as community treatment teams are effective at improving clinical status and reducing hospitalization (AOHC, 2002; Shah & Moloughney, 2001).

Principles and Values of Community Psychology: Relationship to the Existence, Development, and Promotion of Community Health Centres

When considering issues of health from any perspective, it is fundamental to first establish what is meant by health and health care services, because there is a fair degree of variation between the medical model and other nontraditional models. To examine health from within an ecological context, the approach I take is one that that encompasses holism, individual and collective well-being, social justice, and broad determinants of health. For the purpose of this thesis study, I have adopted both sections of the World Health Organization's

definition of health. Section 1 defines health as being "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity". Section 2 concerns itself with "the spirit of self-reliance and self determination" and "the overall social and economic development of the community" (AOHC, 2002; WHO, 2003). The meaning of health is further expanded to acknowledge the inextricable linkage between spiritual, emotional, and physical well-being (Romanow, 2002).

To adequately ascertain which health care services should be delivered, assessment of need is essential. The population health promotion model dictates that health care needs are found by combining factors that affect our health (determinants of health) and population health, the science that investigates the underlying causes of determinants of health (Public Health Agency of Canada, 2006). The contemporary broader determinants of health are seen as a more reliable measurement of status and maintenance of health. Widely agreed upon determinants of health include early age and education, employment and working conditions, income and income distribution, social status, education and literacy, physical environment, housing, social support networks, biology and genetics, health services, gender, and age (AOHC, 2003; Keating & Hertzman, 1999; Mentnech, Ross, Park, & Benner, 1995; Raphael, 2004a; Shah & Moloughney, 2001; Sutherland, 1990; WHO, 2003).

Income (and income inequality) and social status, which include employment status and level of income, have been shown to affect health outcomes. Many studies, some of which I will discuss later in this paper, have demonstrated that the larger the gap between lower and higher incomes, the greater the differences in health status (AOHC, 2002; Orford, 1992; Raphael, 2004b) and quality of life. Education and level of literacy are linked with health outcomes, and there exists a positive correlation between level of education and level of

income (there is also an interaction of these two variables). Furthermore, people with less education experience more psychological stress as a result of the increased severity of their daily stressors. This vulnerability to daily stressors has been shown to contribute negatively to physical and mental health outcomes (Grzywacz, Almeida, Neupert, & Ettner, 2004). Under the population health promotion model, physical environment is defined as including the quality of the air we breathe and the water we drink. Not surprisingly, it also includes safe housing and communities, access to roads, and work environments. People who have healthy workplaces and more control over working conditions have been shown to have better health outcomes (Orford, 1992; Romanow, 2002; WHO, 2003).

Since men and women suffer from different diseases at different stages in life, age and gender are included in determinants of health (Lindsay & Almey, 2006; Raphael 2004a) as well as is race, all of which affect access to health services (WHO, 2003). Although not formally included as being predictors of health, the role of some personal behaviors frequently mentioned in the literature as having an effect on health include physical activity, smoking, alcohol consumption, nutritional habits, and stress management (AOHC, 2002; WHO, 2003).

Community psychology utilizes an ecological approach whereby there is an emphasis of people in the context of the social systems they are subjected to, or a part of (Nelson & Prilleltensky, 2004). Community psychologists believe that it is important to assess human environments (Linney, 2000; Moos, 2003; Orford, 1992; Shinn, 1996) and their effects on the people in them. According to research on social determinants of health, there is evidence to support the notion that physical and psychological environmental factors influence level of well-being (Nelson & Prilleltensky, 2004). It is likely that for the most part, community

psychologists would accept the population health promotion approach to health and quality of life issues, especially since it includes the social determinants of health in addressing health and quality of life. Within this model, there is a broader view of health and quality of life that is not based solely on factors that are individual in nature. Rather, practitioners of this model are compelled to move away from engaging in victim blaming, especially of disadvantaged people (Ryan, 1976).

The population health promotion approach, supported by the World Health Organization (2003), the Romanow Commission (2002), and the Public Health Agency of Canada (2006) wisely take into consideration the fact that poverty is a principle factor in illness inasmuch as poverty is shown to cause pathology (Mirosky & Ross, 1989). Poverty is more than a lack of money; it is "experience associated with hunger, illness, inadequate housing, illiteracy, human rights abuses, and social marginalization" (Narayan, Chambers, Shah, & Petesch, 2000). Therefore, a view of health outcomes and quality of life that takes into account measures required to reduce poverty (e.g., employment strategies, low-cost housing, child support) (Roy, Williams, & Dickens, 1994), is more likely to be successful in improving health and quality of life. Improvements in both health and quality of life are important to community psychology and those who practice in it.

When surveyed, Canadians expressed prevention and quality of life as being qualities of health care that have the highest value to them (Roy et al., 1994). Qualities of the social environment have been shown to be important contributing factors of determinants of health as well. Human beings are deeply affected by their social relationships and healthy, stable, close relationships are known to contribute to mental and emotional well-being. An inclusive social environment can confer a sense of belonging and a sense of community. The definition

of social environment also broadens from a focus on individuals to include properties of neighborhoods and communities (Orford, 1992) and is considered essential to well-being by community psychologists.

Community health centres fall in line with three important precepts for community psychologists – inclusion, transformative change, and empowerment. Firstly, CHCs remove barriers to access of disadvantaged populations in urban settings and geographically dispersed populations in rural and under-serviced areas (Shah & Moloughney, 2001). Secondly, since transformative change is seen by some community psychologists as the level requiring more attention (E. Bennett, personal communication, October 02, 2003), this level of change to the structure of health care could be seen if CHCs represented a larger proportion of health care service delivery. Finally, because CHCs advance social determinants of health through community action, there is an opportunity for an increase in personal and collective power (Williams & Labonté, 2003).

Principles of community psychology can be seen within a CHC because citizen participation, inclusiveness, capacity building, accountability, respect for human diversity, prevention and early intervention are reflected in the CHC setting (AOHC, 2002; Shah & Moloughney, 2001). Ideally, community health centres meet ethical standards of distributive and social justice, equality, and equity (taking into account differing needs of individuals and groups in society). The values of individual and collective well-being, health, holism, social justice, and self-determination that are essential to many practicing community psychologists are often reflected in the day-to-day operations of many of these health centres.

It is a common view that in order to enjoy optimal health, citizens need opportunities to meet their physical, mental, spiritual, and social needs. This is made possible in a CHC

environment where principles of social justice and equity abound, and relationships and services are built on mutual respect and caring as opposed to power and status (Shah & Moloughney, 2001). Interprofessional rivalry is decreased as the health care providers who work within a CHC are seen as equals, thereby reducing power conflict, and power is better adjusted between patient and health care professional. From a community psychology perspective, it is highly probable that CHCs are not as likely to perpetrate and may to some degree mitigate oppression, because there is shared power, inclusion of diversity, and a focus on well-being of individuals and communities.

Because CHCs are organizations nested within communities and take into account the value of culture to the people in them, cultural relativity and diversity are integrated principles with a positive impact on their patients and participants. Community health centres can been viewed as community psychology principles in practice as the services and programs take place within a relevant social context, or one close to it (Orford, 1992). At the same time, CHCs are operated in such a way that there is no pressure to adhere to dominant cultural narratives or pressure to impose them on the community (Rappaport & Seidman, 2000). Community health centres encompass two levels of community as defined by community psychology: a geographical area, and community as a network of social interaction and support (Heller, 1989; McMillan & Chavis, 1986; Nelson & Prilleltensky, 2004).

Canadians view the opportunity to participate in the establishment of public policies as a basic principle of democracy (Abelson, 2001; Nelson & Prilleltensky, 2004; Roy et al., 1994). Community-centered models start at the community level and ask what is needed in order to produce effective intervention (Wandersman, 2003). Involving participants in the

many aspects of the operations of CHCs in a collaborative manner encompasses the spirit of an ecological approach and the community psychology principle of working *with* people rather than *on* people (Trickett, 1986). Also, reform processes in the health sector require participation of citizens (Ritas, 2003), making implementation of more community health centres a realistic opportunity for cooperative involvement of community residents all across Canada.

Quality of Life and the Social Determinants of Health

After spending some months reviewing literature on quality of life studies and the social determinants of health, I have discovered that there exists an overlap in usage of the terms 'quality of life' and 'social determinants of health.' Interestingly, both of these concepts share common components and themes which initially can lead to some confusion while at the same time creating opportunity for engaging intellectual investigation. Although there are differences in some of the terminology used for each concept depending on the investigative perspective chosen, quality of life and social determinants of health share common themes. Additionally, improvements in components or dimensions of either QOL or SDOH have similar outcomes: better health and improved life satisfaction for the population concerned. I would assert that any action taken to affect a social determinant of health for a group of people will also affect quality of life in the direction that the SDOH has been changed (negatively or positively).

Defining Quality of Life

The term 'quality of life' is a complex concept with differing meanings and emphasizing different aspects amongst social science and health researchers (Raphael, Renwick, Brown, & Rootman, 1996). Relatively unknown 15 years ago, quality of life research has become an important component of assessing clinical outcomes and 1000 new 'quality of life' articles are indexed annually (Muldoon, Barger, Flory, & Manuck, 1998). It has been suggested that quality of life (QOL) relates only to material circumstances and how people feel about these circumstances (McDowell & Newell, 1996). This is demonstrated in the self-assessment of several regional, provincial, and national community-driven quality of life projects in Canada

where residents identified economic, environmental, social (programs), and health indicators as the most important contributors to their QOL (Legowski, 2000).

However, other quality of life research does go beyond the traditional measurement of economic categories and basic physical needs to stress the importance of a sense of purpose and the personal satisfaction and happiness aspect of QOL (Cobb, 2000). This can be measured on an individual level or a broader community level (Bramston, Pretty, & Chipuer, 2002). In 2000 the importance of personal relationships to quality of life was highlighted by Canadians in a national quality of life indicators project managed by the Canadian Policy Research Network (CPRN). This project involved 40 groups (28 urban, 12 rural) of Canadian citizens in 21 different towns and cities from nine provinces (N = 346) who self-identified quality of life indicators. Out of a total of 17 priority areas identified, "family, friends, and connections" was an emerging theme for all groups. This particular theme includes the subthemes of family well-being, intimate connections, reduced social isolation, family economic security, and family coping (Michalski, 2001; Wyman, 2001).

Yet another segment of quality of life research has focused on psychosocial factors such as pain, functional impairments, financial burden, and the effects that illness and treatment of illness have on an individual's daily life. This area of research is termed "health-related quality of life" (Muldoon et al., 1998). There has been a preponderance of this type of medical-based and health-based research for which assessment tools can include measurements for physical functioning, role limitations due to physical and/or emotional health problems, social functioning, existence of pain, levels of energy/fatigue, emotional well-being, and general health perceptions (Bowling, 1997; Hays & Morales, 2001; Muldoon et al., 1998; Skevington, 1999).

The definition of quality of life will depend on the values of the researcher and the facets of this concept one wishes to assess. As a general guide in the early stages of my study (not to be confused with operationalization), I chose quality of life as defined by the World Health Organization Quality of Life Group (WHOQOL) as:

> "an individual's perceptions of their position in life, in the context of the culture and value systems in which they live, and in relation to their goals, expectations, standards and concerns. It is a broad ranging concept, affected in a complex way by the person's physical health, psychological state, level of independence, social relationships and their relationship to salient features of their environment" (Skevington, 1999).

Measuring Quality of Life in Canada

There are many reasons why measuring quality of life is important. It is relevant for government departments who need to use their funds more effectively for social programs, road construction, delivery of health care services, education etc. This requires ongoing evaluation of existing programs. Quality of life information can make vital contributions to inform policy development and change for regions and provinces as well as increase awareness and attention to issues relevant to vulnerable populations.

Although there has been controversy amongst researchers about which domain is the most import to measure, objective functioning measures are usually separated from those of subjective well-being. It has been argued that people cannot observe their own happiness or satisfaction directly which necessitates the need for direct measures combined with subjective measures (Cobb, 2000). When measuring quality of life a researcher must decide whether or not he or she is interested in objective functioning -- usually comprised of physical and/or mental domains -- or subjective well-being which involves asking individuals

themselves how they perceive their health status and various aspects of their QOL. It has been argued that quality of life cannot be measured with objective tests because QOL is a subjective experience (Skevington, 1999). Thus, a multidimensional subjective appraisal of QOL includes an individual's (perception of their) state of health along with other non-medical aspects of their lives. This appraisal can include questions about their physical environment, culture, safety and security, social support networks, education, social program availability and usage, and spirituality to name a few.

Social indicators are seen to help clarify the definition of quality of life (Cobb, 2000) but very often the words indicators, variables, facets, and components are synonymous with contributors of, or contributors to QOL. Legowski (2000) has performed a comprehensive review of participatory regional, provincial and national social indicator and quality of life projects conjointly for the Canadian Policy Research Network; Ms. Legowski uses the terms "social indicator" and "quality of life indicator" interchangeably. The research projects she reviewed sought to determine factors that influence the lives of community residents such as environment, health, education, culture, leisure, and social services. Within these factors (constructs) are specific variables (concepts) identified as contributors to quality of life, commonly referred to in the literature as indicators.

Quality of Life Measurement Projects in Canada

Regional level. According to the group's report, the Hamilton-Wentworth Vision 2020 project began in 1997 as a regional quality of life project designed with the intention to measure, learn more about, and improve their sustainable community on an on-going basis. This indicators work was seen as giving residents an overall view of the social, economic and environmental factors that were interacting in their community. The identified indicators

were noted as being factors affecting quality of life for community residents, however, no mention was made of assessing outcomes. A tangible outcome of this project was the creation of a sustainable community decision-making guide which was developed by the staff working group. The guide outlined indicators for self-identified theme areas such as water quality, waste management, air quality, transportation, land use, education, and personal well-being.

For a community psychology student such as myself, I noted several interesting and valuable components of the Hamilton-Wentworth Vision 2020 project. For example, as a result of the partnerships built with community organizations during the project, new programs were developed for children and youth. The decision-making guide, which was later approved by the Municipal Affairs Minister in Ontario, assisted staff of the regional government to evaluate all proposed and existing policies, programs, and projects. Additionally, community resident involvement continued after the sustainable development strategy had been completed (Legowski, 2000; Vision 2020 Hamilton, 2006). I felt that this project was not a suitable one for me to use as a guideline because of the limited number of areas identified as contributors to quality of life compared to those identified in the SDOH literature. Also this project was based on identifying indicators which can predict QOL and I was interested in assessing outcomes.

Provincial level. One of the goals of The Newfoundland and Labrador Strategic Social Plan and the Community Accounts Project was to create a strategic social plan to help guide the funding and planning of Newfoundland and Labrador's social programs. One component of this social plan was the identification of key social and economic indicators for each of 400 of Newfoundland and Labrador communities. In collaboration with the projects' steering

committee, local groups used these indicators to determine where to focus energy and resources for at-risk communities (those having 10 key indicators below the 25th percentile of all communities). Additionally, the key indicators were used by the Department of Health and Community Services to implement new programs for youth at risk in communities with the greatest need (Community Accounts, 2006; Legowsky, 2000).

From a community psychology perspective one of the most impressive components of this provincial project was the numerous formats used to receive input including: public meetings; one-on-one drop-in sessions; private meetings with government employees; invitational meetings with key stakeholders; formal presentations; and round table discussions with private individuals and a variety of group representatives. Input was received from women's groups, literacy workers, social assistance recipients, rural development councils and zone boards, consumer survivors, disabled individuals, child protection teams, and family resource centres (Legowski, 2000). Although social and economic indicators were identified through this project, there was emphasis on outcomes as well. One of the goals of the Community Accounts project (2006) was to provide objective evidence that would permit government to measure progress (on the indicators) in Newfoundland communities. An additional purpose of identifying indicators was to develop a tool that could explore potential cause-effect relationships between various indicators; it was hoped that this would provide a basis for understanding the root causes of social problems which could be of great interest to many community psychologists studying health or quality of life issues.

I did take the time to examine the various indicator groups which included: education; resource/wealth; environment; labour market; production; demographics; income; social;

health; and household spending. This "system of accounts" highlighted relationships between the indicator groups which are purported to have an impact (jointly) on the well-being of Newfoundlanders. There existed a multitude of concepts within each indicator group along with an abundant amount of corresponding data which was collected on communities in Newfoundland. Due to the complexity of this system of accounts I felt I was unable to tease out key concepts within each indicator group that would be applicable to my population of interest. I once again noted the absence of QOL domains reported in the SDOH literature. I also felt that in order to design a measurement tool of my own I should explore indicators from QOL projects that didn't narrowly focus on one particular population. For these reasons I chose not to use this project as a conceptual basis for my study.

National level. From 1990 to 2002 the Federation of Canadian Municipalities (FCM) collected QOL indicator data from 20 communities across Canada to form the FCM Quality of Life Reporting System (QOLRS). This system was intended to reflect and bring awareness to issues affecting quality of life in Canadian municipalities. According to the FCM (2005), this method of monitoring quality of life would ensure that municipal government has the opportunity to play a strong role in public policy formulation in Canada.

The QOLRS is comprised of 62 indicators which are categorized under: affordable housing; civic engagement; community and social infrastructure; education; employment; local economy; natural environment; personal and community health; personal financial security; and personal safety (FCM, 2005). The QOLRS continues to be used as a tool for municipal governments and/or communities to monitor and respond to both social and economic change. Due to the comprehensive municipality descriptions, the QOLRS is seen

as having the potential to direct common goals amongst policymakers, the cross-sector public, and private bodies (FCM, 2005; Legowsky, 2000).

The QOLRS had a manageable number of thematic areas (11 in total), however, the individual indicators under each thematic area did not always seem appropriate or feasible for my study. For instance under the local economy theme, the indicators included: business and consumer bankruptcies; hourly wages; change in family income; and building permits. I was more interested in finding out how the financial situation of Langs' residents affected their quality of life. Additionally the emphasis of this reporting system was on economic and environmental factors; surprisingly not one out of the 62 indicators identified personal happiness and satisfaction or social networks and personal relationships as contributors to QOL for Canadians. For these reasons I chose to abandon this national level project as a possible contributor to the development of my quality of life measurement tool.

National level. The Canadian Policy Research Network (CPRN) is a non-profit organization whose mission is to create knowledge and lead public dialogue and debate on social and economic issues important to the well-being of Canadians. CPRN currently operates four research networks in the areas of family, health, public involvement and work. The QOL project used for my study came from the citizen's dialogues section of the public involvement network of CPRN. The quality of life project that I chose as a conceptual basis for designing my measurement tool was a cross-Canada study which was overseen by CPRN and began late in 1999.

The citizen involvement project *Asking Citizens What Matters for Quality of Life in Canada* undertook the task of asking Canadian citizens about what they believed contributed to their quality of life. The intention was to create a national quality of life indicator

prototype that reflected the range of issues that truly mattered to Canadians. By the fall of 2000, 350 Canadians had taken part in 40 different dialogue groups in 21 towns and cities across Canada and discussed what mattered to them in terms of quality of life. The results of those dialogues led directly to the production of a prototype set of national quality of life indicators. The prototype consisted of 17 thematic areas all of which had five sub-themes (see table in Appendix L). In consultation with the executive director and manager of community services at Langs, the most important and relevant themes for the Langs' population were agreed upon for my measurement tool. Thus my survey included 11 subscales designed to measure self-reported quality of life of participant's: culture; work; community; social programs and conditions; family, friends, & connections; health and health care; person well-being; environment; economy; infrastructure and transport; and education (see survey in Appendix G).

The main reason I chose CPRN's project was because I thought the thematic areas would be most relevant to the Langs' community. I felt that since the thematic areas were chosen by Canadians citizens and represented the ideas of urban and rural residents, that there was a greater likelihood that Langs' community residents would share in these ideas. I also valued the enormous participatory component of this CPRN project; the research methods complemented my own research design emphasizing participation from key stakeholders (in this case Langs' staff and community residents). I developed a measurement tool of my own because most of the quality of life projects I examined were identifying indicators which are predictors of QOL whereas I was interested in assessing outcomes. Although the study *Asking Citizens What Matters for Quality of Life in Canada* was also an indicators (predictor)

project, one of the goals was to create appropriate indicators for measuring quality of life (Michalski, 2001) which I felt made it appropriate for my master's thesis research.

Social Determinants of Health

> "I'll tell you what will keep this community healthy, and what will keep me healthy – a job, a place to live, a roof over my head and someone to love me."
> (Community forum on Changing Health Needs (1994). Department of Health, Government of Newfoundland and Labrador).

As early as 1974, our federal government recognized the role that environmental and economic factors play in determining and maintaining good health (Lalonde, 1974). Some health researchers have recognized that societal factors, not lifestyles or medical choices are the major contributors to health, well-being, and quality of life (Labonté & Penfold, 1981). An extensive body of research on economic and social conditions indicates that one of the most important life conditions that determines whether or not we stay healthy or become ill, is level of income (Raphael, 2003a, 2003b). Poverty affects health since income provides the prerequisites for health (shelter, food, warmth, the ability to participate in society). Also, poverty can cause stress and anxiety which further damages health. Furthermore, lower income limits peoples' choices and diminishes options for changes in behaviour (Benzeval, Judge, & Whitehead, 1995 as cited in Raphael, 2004c).

Statistics Canada estimated that in 1996, 23% of years of life lost for all causes prior to age 75 in Canada could be attributed to income differences (Raphael, 2004c). According to some researchers, even when controlling for all other variables (smoking, weight, access to health care), health outcome varies with social class (Marmot, Shipley, & Rose, 1984). A working paper by Labonté and Penfold (1981) outlined the following data which indicate the primacy of income level as a predictor of health (p. 7):

- Death rates in cities are 50 to 100% higher in poverty neighbourhoods.
- Low-income families are four and a half times more likely to report poor health than are upper-income families.
- There is a positive relationship between poverty and poor health in children.
- Low-income groups demonstrate far greater disease-inducing lifestyles than do upper-income groups.
- Infant mortality (often used as a prime indicator of the general health of a population) is positively correlated to low income. Death from all causes was correlated with poverty.
- Hypertension (a risk factor in heart and kidney disease, stroke and other cardiovascular diseases, and death) is twice as prevalent in lower-income groups as in upper-income groups.
- There is a positive correlation between lower social class/income and increased incidence of mental disease.

Along with level of income and income distribution, the other 'social determinants' of health include the issues of: early childhood education and care, education, employment and working conditions, food security, access to health services, housing, social exclusion and social safety net (Raphael, 2004b). It is probable that fetal origins of adult health will be included as a SDOH in the future since evidence is accumulating on the social determinants of embryo and fetus health which in turn later affect adult health (Gisselmann, 2006; Wadsworth & Butterworth, 2006).

> "The main determinants that will likely shape our health and life span are the ones that affect society as a whole." (Romanow, 2004).

Early life. It has long been recognized that good health in early life forms the foundation of health in adult life. The social factors that are seen to be the most important contributors in early years to health are those associated with physical growth and emotional support. Health in early life begins with the mother's health in the prenatal years and continues throughout pregnancy. The quality of early life is influenced for children who live in low-income households (Raphael et al., 2003b). Children who experience prolonged exposure to poor socioeconomic environments have an increased risk to health. Children in Canada who belong to families with the lowest incomes have the worst health outcomes. Thus for families at risk, providing additional health and social services to these families produces beneficial outcomes that are permanent (Browne, 2006). It has been suggested that the environmental influences produced as a result of higher socioeconomic position interact with developmental processes to create and support physical and mental health in children (Wadsworth & Butterworth, 2006).

Early childhood education and care (ECEC) is a term used to describe "an integrated, multifunctional approach to policies and services that are inclusive of all children and parents, regardless of employment or socioeconomic status" (Friendly & Browne, 2002, p. 2). Proponents regard ECEC as a determinant of health because of the proven life-long effects that programs designed for early intervention have on an individual's life. ECEC programs provide intellectual stimulation that promotes cognitive development and social competence that in turn, produce positive effects that persist into later life. In a longitudinal study on one particular ECEC program in the U.S., outcomes included better school performance and lower juvenile crime rates. Individuals who participated in the program

since infancy had much higher earnings as adults, as did their mothers (Masse & Barnett, 2002).

In 1962 in Michigan, an experimental preschool project was designed to assess the effects of early educational intervention on children experiencing social and economic disadvantage. This longitudinal project involved 123 African American children who scored very low on the Stanford-Binet IQ scale and whose parents reported a low socioeconomic status. Of these children, 58 were randomly assigned to a group that received a high-quality preschool program at ages three and four and 65 were assigned to a group that received no preschool program (Schweinhart, Montie, Xiang, Barnett, Belfield, & Nores, 2006). Recently published long-term results of this project state that the program group outperformed the no-program group on highest level of schooling completed. At the age of 40, significantly more of the program group was employed than the no-program group with the program group having higher median annual earnings. These results would suggest that high-quality preschool programs for children living in poverty not only contribute to their social and intellectual development in childhood, but to their success in school and employment later in life (Schweinhart et al., 2006).

Education. In the research literature, educational attainment is associated with almost every measure of population health. Public schooling is seen to communicate the values of fairness, respect, and social justice that are shared among Canadians. Research has demonstrated that low levels of education affect health and equate to poor health and well-being. For instance, nongraduates from high school are more likely to be jailed, and 85% of income assistance is spent on people who have not completed high school (Ungerleider & Keating, 2002). Compared to nongraduates, high school graduates: use preventative medical

services 1% more frequently; make 2% fewer multiple visits to doctors; have 23% better knowledge of health behaviours; have 13% better general health status; and have 26% better family functioning (Federal, Provincial & Territorial Advisory Committee on Population Health, 1999).

Although level of education is typically positively associated with income (Gambin, 2002; Muller, 2002; Statistics Canada, 1999), in a 1990 health survey conducted by the Ontario Ministry of Health, educational attainment and household income were separately shown to be strongly correlated with health status (Roberge, Berthelot, & Wolfson, 1995). For the most part however, research that has addressed the impact of level of education on health and quality of life most often does not separate the predictors of education and income due to their intricate relationship. Since employment earnings for Canadians increase with the number of years of education (Federal, Provincial, & Territorial Advisory Committee on Population Health, 1999) it is likely that the positive health outcomes observed with higher incomes are the same for higher levels of education. To assess the impact of education on health outcomes then, we are directed to examine the effects of income on health. What is known is that the effects of education can have life long impacts as educational attainment is inversely related to physical disability in older age (McMunn, Breeze, Goodman, Nazroo, & Oldfield, 2006).

Employment and working conditions. A large body of literature exists on the detrimental mental and physical health impacts of unemployment and job insecurity (Jahoda, 1982). In her research using the 2001 Newfoundland Adult Health Survey data, Gambin (2002) examined employment status and found that being unemployed increased the probability of poorer health. Recent research on longitudinal data show that men and women who are

unemployed demonstrate a higher level of ill health and mortality, show higher rates of self-reported health, and experience damage to psychological health. Poverty (seen as a direct link to financial strain), unemployment as a stressful life event (which increases persistent levels of anxiety), and changes in health behaviours when employment ceases, are all argued as links to causation of poor health (Bartley, Ferrie, & Montgomery, 2006).

When discussing employment as a determinant of health, job insecurity is most often seen as the primary problem of employment. According to Tremblay (2002), job security or insecurity is "something a person feels, given his or her personal job situation and the overall economic situation" (p. 1). Feeling insecure about employment can be a source of stress and undermine social support networks (WHO, 1999). Job security is essential to the well-being of employees; contributes to participation in social life, self-esteem, and personal development; and is a source of loyalty, commitment, and increased motivation (Tremblay & Rolland, 1998).

When discussing the working conditions of employment and the relationship to health, most often researchers cite job and employment security, the physical conditions at work, the pace of work, perceived control in the workplace, and amount of time worked (Jackson & Polanyi, 2002). These components of conditions at the workplace can often lead to increased levels of stress, negatively affecting psychological and physiological stress. There has been a noted change in the nature of work as well since fewer jobs are entirely physical in structure but have more mental and emotional challenges or demands (Marmot, Siegrist, & Theorell, 2006).

Conditions of work have been related to a barrage of health complaints including gastrointestinal disorders, musculoskeletal disorders, and even psychiatric conditions such as

depression (Theorell, 2000). When employees who experienced psychosocial job conditions had their blood pressure levels at work compared with their blood pressure levels during other parts of the day and night, a positive relationship was discovered between job strain and blood pressure. When attempting to ascertain causation, researchers examine biology and the effects an adverse job environment can have on biochemical and endocrinological factors. Backed by extensive empirical evidence, several theoretical models including the effort-reward and demand-control models explain the elevated risk of stress related diseases (e.g. coronary heart disease) in compromised working environments. At present adverse health outcomes of modern patterns of work and employment are not well understood by researchers (Marmot et al., 2006).

Food security and nutrition. It is well known from previous history in underdeveloped countries that malnourishment is related to mortality (Wadsworth & Butterworth, 2006). In the modern climate of north American life it is not the unavailability of food alone that contributes to ill-health, but rather the inaccessibility by some of good nutrient-dense (and more expensive) foods. In Europe, diet-related risk factors are the prominent cause of premature mortality with 41% of total disability adjusted life years lost as a result of cardiovascular disease, type II diabetes and cancers, all of which are said to have nutrition as their major determinant (WHO, 2004).

Food insecurity has been defined as "the inability to acquire or consume an adequate diet quality or sufficient quantity of food in socially acceptable ways, or the uncertainty that one will be able to do so" (Davis & Tarasuk, 1994). Not having quality food means that people are unable to get the nutrients they need for good health. According to Rainville and Brink (2001), one quarter of low income families in Canada eat less food, and half of low income

families have reduced quality of food. In real terms, people experiencing food insecurity are more likely than food-secure people to suffer from multiple chronic conditions such as heart disease, diabetes, high blood pressure, and food allergies. In addition, inaccessibility to proper foods affects management of these diseases that sometimes require dietary changes (Che & Chen, 2001). Like many other determinants of health, availability of food and quality of diet is linked to income (Raphael, Anstice, Raine, McGannon, Rizvi, & Yu, 2003). Adults and children who experience food insecurity may also suffer psychological and social consequences such as social exclusion, distress, and depression (Tarasuk, 2002).

Housing. The literature directed specifically at housing is limited perhaps because like employment and education, it is inextricably linked to income. Epidemiological studies point out the obvious health risks for people who live in poor housing where there is inadequate lighting, heating, ventilation, piped clean water, and where risks exist for more vulnerable persons (e.g. elderly or disabled) (Stafford & McCarthy, 2006). In Canada, housing health effects have been associated with the presence of lead, asbestos and radon, poor heating systems, and lack of smoke detectors (Hwang, Fuller-Thomson, Hulchanski, Bryant, Habib, & Regoeczi, 1999).

The Ottawa Charter for Health Promotion (1986) recognized that shelter is a basic prerequisite for health (Bryant, Chisholm, & Crowe, 2002) and there is agreement that several components of housing that affect health include affordability, suitability, and adequacy (p. 1). When addressing the issue of affordability, if rents are too high, it becomes difficult to cover necessities of life such as food (which can then lead to food insecurity). High housing costs also means there is not enough money for active recreation, children's social programs, transportation to work, clothing, and school supplies - all of which can

directly or indirectly affect health. Unfortunately adults are not the central recipients of housing-related stress as research indicates that the parents' financial and psychosocial distress is correlated with increased stress for the children as well (Bryant, 2004; Bryant et al., 2002).

Income and income distribution. Of all of the research in existence on the various social determinants of health, perhaps the most extensive literature exists on income, its distribution, and inequality. The reason for this abundance of research is that level of income influences and interacts with every other social determinant to produce a particular level of health. It is not just absolute income alone that affects a person's health. The perception an individual has about their financial circumstances can impact health as well (Gambin, 2002). When there is either a low level of household income or unstable sources of income for a family, material deprivation ensues. Material deprivation is known to increase exposure risks to negative events including poor environmental conditions at home and work, poor housing, and lack of quality food which contribute to compromised human development over the lifespan (Raphael et al., 2003b).

The association between level of income and health status is firmly established in the literature and is demonstrated repeatedly in Canadian studies (Rogers, 2005; Statistics Canada 2002). In a secondary analysis of 1978 Canada Health Survey data, Hay (1988) explored the relationship between socioeconomic status and health status for 2000 male principal income earners. While controlling for age, when the effects of education, occupational status, and family income were tested separately, income was consistently the best correlate of (mental and physical) health status. In 2003, researchers analyzed data of 6456 adults from the 1994 Canadian National Population Health Survey with similar results.

Low household income was consistently associated with poor health: as household income decreased, the probability of reports of lower levels of self-reported health status increased. Additionally, household income was strongly associated with health status over time and was the best predictor of future health status (McLeod, Lavis, Mustard, & Stoddard, 2003). In a cross-sectional health survey conducted in Ontario in 1990 of 17,578 males and 20,480 females over the age of 25, income was also associated with significant health differences (Roberge et al., 1995).

Health variances between populations are not primarily based on genetics; rather it has been shown that causes of ill-health are largely socio-environmental. For instance, unhealthy behaviours are generally highly concentrated at the lower end of the socioeconomic spectrum. When discussing inequalities in health, Evans (2002) states that if unhealthy behaviours were merely a matter of personal choice, then we might expect to find them randomly distributed across the population which they are not. The mechanisms whereby income may affect health are extremely straight forward and easily understandable. Income (or lack thereof) triggers reactions in the social environment and responses in individuals themselves. It is these responses that are the real pathways to ill-health. Money mitigates the stresses of life itself by allowing one to mobilize extra resources in order to cope with these stresses (Evans, 2002) and increase options to support healthy behaviours.

Social exclusion. According to Edward-Galabuzi and Labonté (2002), social exclusion describes, for the most part,

> "the structures and dynamic processes of inequality among groups in society. These inequalities are seen to arise out of oppression related to race, class, gender, disability, sexual orientation, immigrant status and religion. Social exclusion refers to the inability of certain groups to fully participate in Canadian life due to structural inequalities (access to social, economic, political, and cultural resources)" (p. 1).

The four major sources of social exclusion are civil society, social goods, social production, and economics. Racialized groups suffer the greatest social exclusion which equates with multiple risks to their well-being including: a double digit income gap; unemployment rates two to three times higher than average; deepening levels of poverty; differential access to housing leading to neighborhood segregation; disproportionate contact with the criminal justice system; and higher health risks (Edward-Galabuzi & Labonté, 2002, p. 3). Research headed by Dennis Raphael for the North York Heart Health Network (2001) on major causes of heart disease showed that low income and social exclusion were established to be determinants of heart disease causation, rather than specific lifestyle factors of diet, activity, and tobacco use alone. Additionally, exclusion arising from lack of resources has substantial effects on the psychological well-being of those who have limited access to social support (Whelan, 1993).

Social support networks. Research concerning personal relationships and health has dealt with both the structural and functional aspects of social support and social networks. Social networks include: an individual's contacts; the number and frequency of contacts; duration of time individuals have known each other; the extent to which individuals are similar to each other, and the density of the network. Social support refers to types of support – emotional, instrumental (tangible resources), appraisal or informational (affirmation and feedback), and the positive and negative aspects of this support (Berkman & Glass, 2000). It is well noted in the literature that people who lack social networks and support are more likely to suffer from poor physical and mental health and more likely to die prematurely (House, Landis, & Umberson, 1988; Melchior, Berkman, Niedhammer, Chea, & Goldberg, 2003)

Perhaps one of the earliest investigations into personal relationships and health occurred in the mid-nineteenth century in France. In 1853 William Farr linked life expectancy with marital status after examining death rates for single, married, and widowed women and men (Wyke & Ford, 1992). This type of association between health and marital status continues to be supported in the research as lower mortality rates persist for married individuals (men more particularly) compared to those who are single, divorced, or widowed (Gove, 1973; Roberge et al., 1995; Travato & Lauris, 1989; Wyke & Ford, 1992). This outcome is consistent over time for death of unmarried people due to chronic diseases such as neoplasms (tumors) and cardiovascular diseases (Trovato & Lauris, 1989), and for self-reported risk factors of mortality including high blood pressure and cholesterol, and impaired respiratory function (House et al., 1988). Because successful social support mediates the impact of economic stress, low levels of social support have been found to have a more negative effect on the psychological health of those living in poverty.

A review of research of various periods in the life cycle continues to support the theory that social support is a mediator of life stress and improves quality of life (Helgeson, 2003; Melchior et al., 2003). During pregnancy, birth and early life, periods of hospitalization and recovery from illness, stressful life events, employment termination, and aging and retirement, social support acts as a protective aid. Social support has been categorized to mean that a person feels that she or he is either: cared for and loved; esteemed and valued, or belongs to a network of communication and mutual obligation (Cobb, 1976).

Several theoretical models have been suggested to account for the association between social support networks and health. With regards to marriage, the social causation model proposes that there are material benefits to this type of relationship, making individuals less

vulnerable to the effects of stress. Being part of a marital relationship is seen as having a prevention benefit in that people refrain from indulging in risky negative health behaviours such as smoking, excessive drinking, and driving fast: health is seen to be dependent upon marital status. The health selection model, on the other hand, suggests that less healthy people are less likely to get married than healthy people and are less able to maintain relationships if they were to get married: marital status is seen to be dependent upon health (Wyke & Ford, 1992).

Mechanisms to explain the action of social support on health include a direct effect and the buffering effect. Explanations of the direct effect state that social isolation, or the positive effects of support, has direct effects on the health of individuals. Practice of positive health-related behaviours as a result of supportive encouragement is suggested as one of the direct ways in which health can be affected. Rather than exerting a direct impact on health, the buffering effect mechanism is said to moderate the impacts of acute and chronic stressors on health (Stansfield, 2006). An extensive body of research exists on the "fight-or-flight response" that provides an explanation of the biological pathway through which the buffering effect operates. Acute stressors stimulate the adrenal system; hormones (adrenaline and noradrenaline) are then secreted to prepare the metabolic systems for action thus increasing lipid and glucose levels (Stansfield, 2006). The cumulative strain on the body of these processes may lead to illness, whereas social relationships can modulate the stress response on the body which is supportive of health (Seeman & McEwen, 1996).

Gender. Although not technically a "social" determinant of health, gender is an important determinant of health to consider because it interacts with many of the other social determinants of health to actually influence health (Raphael, 2004a) and quality of life. A

considerable body of work has focused on the relationship between the responsibilities arising from multiple role occupancy and the effect on health and well-being. For the most part, health and quality of life is compromised more for women compared to men due to their engagement in multiple roles such as partner/spouse, parent (of a child of any age living at home), carer (5 hours or more a week of unpaid work), and paid worker over the life course (Evandrou & Glaser, 2004). For women, life has become an act of balancing paid work, family life, and caring responsibilities all of which together take a toll on physical and social-well being. Evandrou & Glaser (2004) examined a study assessing functional ability (activities of daily living) of men and women in Britain in the 1990's whereby indicators of physical health were tracked over a life course. It was discovered that when controlling for age, education, social class, health, marital status and housing tenure, functional ability was compromised for the women with multiple roles when one of the roles occupied was that of "parent."

Extensive data collection of factors affecting the lives of women and men in Canada was undertaken by Statistics Canada in the year 2000 with a comprehensive report released a few years later outlining the changing roles of women and men in Canada (Statistics Canada, 2003). From this research, important information has been revealed highlighting the status of women in Canada and the relationship between the social determinants of health and quality of life for Canadian women. Women constitute a rather large segment of vulnerable groups in Canada. For instance, of the senior population in Canada, 57% of the population aged 65 and older are women and 70% of all people over the age of 85 are women. Women also continue to make up the large majority of lone parents and a growing proportion of Canadian women are living alone (Statistics Canada, 2003).

In 1999, 55% of all women over the age of 15 were engaged in paid employment which is up from 42% in the year 1976. A mere 10% of employed men in Canada work less than 30 hours per week compared to 28% of women. Women currently account for almost half of the total workforce in professional fields including doctors, dentists, and business and financial professionals (Statistics Canada, 2003). These are jobs which require a higher investment of time from women while at the same time many simultaneously occupy multiple roles as partners, parents, and carers.

According to Statistics Canada (2003), when employed, Canadian women are still largely responsible for looking after their homes and families. This additional dedication of time and energy toward household duties means less time for women to care for themselves and engage in health-promoting and social activities. The effect of occupying multiple roles on dimensions of quality of life for women (namely physical and social well-being) has already shown to be negative (Evandrou and Glaser, 2004). The average earnings of full-time employed women continue to be substantially lower than those of Canadian men as women earn only 73% of that of what men make. Paid employment reduces options for social engagement and leisure activities which affects quality of life. As previously discussed, level of income is strongly associated with health status over time and is the best predictor of future health status (McLeod, Lavis, Mustard, & Stoddard, 2003).

Current State of Research

What is known to date about the social determinants of health by both health and social science researchers is that when compromised, any one social determinant of health has negative effects on health and quality of life. It has been well established that not only do the social determinants of health (SDOH) cluster together to culminate in disadvantage, these

factors also accumulate and interact over the life course (Power, Matthews, & Manor, 1998; Syme, 2004; van de Mheen, 1998). A British 1958 birth cohort study showed the cumulative and interactive effects of social determinants as increased risks. Researchers followed children born in one particular week in the year 1958 throughout their childhood and to the age of 33. Girls and boys born into families at the bottom of the class hierarchy were much more likely to be exposed to material, psychosocial, and behavioural risks while growing up than those in the higher classes (Power & Matthews, 1997).

To demonstrate the effects of the SDOH on health, well-being and quality of life it would be worthwhile to view the Toronto Charter for A Healthy Canada. In 2002 at a SDOH conference in Ontario it was determined by Canadian researchers from York University's School of Health Policy, the Canadian Institutes for Health Research and Health Canada that a main objective in the area of study of SDOH was to explore the implications of compromised social determinants on the health of Canadians. It was suggested by this group of researchers that in order to address these implications and improve the health of Canadians, recommendations for policy direction would be required. From this conference, the Toronto Charter for a Healthy Canada was developed (Raphael, 2004a). This charter provides an accounting of the knowledge accumulated to date on the SDOH along with preliminary policy recommendations (Raphael, 2006a) as follows:

The Toronto Charter for A Healthy Canada

Whereas the evidence is overwhelming that the health of Canadians is profoundly affected by the social and economic determinants of health, including – but not restricted to – early life, education, employment and working conditions, food security, health care services, housing, income and its distribution, social exclusion, the social safety net, and unemployment and employment security; and

Whereas the evidence presented at the conference clearly indicates that the state and quality of these key determinants of health are linked to Canada's political, economic and social environments and that many governments across Canada have not responded adequately to the growing threats to the health of Canadians in general, and the most vulnerable in particular; and

Whereas these social determinants of health are also human rights as defined in the *Universal Declaration of Human Rights* and the *International Covenant on Economic, Social and Cultural Rights*, which Canada is obliged to protect and promote; and

Whereas the evidence presented indicates that investments in the basic social determinants of health will profoundly improve the health of Canadians most exposed to health threatening conditions – the poor, the marginalized, and those Canadians excluded from participation in aspects of Canadian society by virtue of their living conditions – therefore providing health benefits for all Canadians; and

Whereas the evidence presented to us has indicated the following to be the case:

1. **Early childhood development** is threatened by the lack of affordable licensed childcare and continuing high levels of family poverty. It has been demonstrated that licensed quality childcare improves developmental and health outcomes of Canadian children in general, and children-at-risk in particular. Yet, while a national childcare program has been promised, 90% of Canadian families with children lack access to such care.
2. **Education** as delivered through public education systems has helped to make Canada a world leader in educational outcomes but our education systems are now at risk due to funding instability and poorly developed curriculum in many provinces. These conditions may weaken the trend toward greater number of students graduating despite evidence that those who do so show significantly better health and family functioning than non-graduates.
3. **Employment and working conditions** are deteriorating for some groups – especially young families – with potential attendant health risks. One in three adult jobs are now either peripheral or precarious as a result of increasing contracting out of core jobs and privatization of public employment. These jobs are often temporary, with low pay and high stress. Precarious working situations are directly related to the weakening of labour legislation in many jurisdictions. These changes threaten the gains made by workers in the past, jeopardizing their health and well-being.
4. **Food security** among Canadians and their families is declining as a result of policies that reduce income and other resources available to low-income Canadians. In Canada, food insecurity exists among 10.2% of Canadian households representing 3 million people. Monthly food bank use is 747,665 or 2.4% of the total Canadian population, which is double the 1989 figure; 41% of the food bank users or 305,000 are children under the age of 18.
5. **Health care services** can become a social determinant of health by being reorganized to support health. Many examples of effective – but all-too-rarely implemented – means of preventing deterioration among the ill through chronic disease management and rehabilitation are available. Screening that has been carefully assessed for its effectiveness can support

health. Preventing disease in the first place by promoting the social and living conditions that support healthy lifestyles has also been neglected. While the Romanow Report reaffirmed the principles of the Canada Health Act, missing were strong statements about the important roles public health, health promotion, and long-term care play in supporting health.

6. **Housing shortages** are creating a crisis of homelessness and housing insecurity in Canada. Lack of affordable housing is weakening other social determinants of health as many Canadians are spending more of their income on shelter. More than 18% of Canadians live in unacceptable housing situations and one in every five renter households spent 50% or more of their income on housing in 1996, an increase of 43% since 1991.
7. **Income and its equitable distribution** have deteriorated during the past decade. Despite a 7-year stretch of unprecedented economic growth, almost half of Canadian families have seen little benefit as their wages have stagnated. Governments at all levels have let the after-tax-and-transfer income gap between rich and poor grow from 4.8:1 in 1989 to 5.3:1 in 2000. The growing vulnerability of lower-income Canadians threatens early childhood, education, food security, housing, social inclusion, and ultimately, health. Low-income Canadians are twice as likely to report poor health as compared to high-income Canadians.
8. **Social exclusion** is becoming increasingly common among many Canadians. Social exclusion is the process by which Canadians are denied opportunities to participate in many aspects of cultural, economic, social, and political life. It is especially prevalent among those who are poor, Aboriginal people, New Canadians, and members of racialized – or non-white – groups. As our racialized composition grows, it is unacceptable that these groups earn 30% less than whites and are twice as likely to be poor. These trends contribute to social and political instability in our society.
9. **Social safety nets** are changing in character as a result of shifting federal and provincial priorities. The 1990s have seen a weakening of these nets that constitute threats to both the health and well-being of the vulnerable. The social economy may provide opportunities for community organizations to provide services in more democratic, transparent and community-sensitive ways. It may be, however, unable to meet emerging needs without further burdening caregivers in the community, many of whom are women, or inadequately compensating them.
10. **Unemployment** continues at high levels and **employment security** is weakening due to the growth of precarious, unstable, and non-advancing jobs. Higher stress, increasing hours of work, and increasing numbers of low-income jobs are the mechanisms that link employment insecurity and unemployment to poor health outcomes. Unionized jobs are the most likely to help avoid these health-threatening conditions.
11. **Canadian women, Aboriginal people, Canadians of colour, and New Canadians** are especially vulnerable to the health-threatening effects of these deteriorating conditions. This is most clear regarding income and its distribution, employment and working conditions, housing affordability, and the state of the social safety net.

It is therefore resolved that:

Governments at all levels should review their current economic, social, and service policies to consider the impacts of their policies upon these social determinants of health. Areas of special importance are the provision of adequate income and social assistance levels, provision of affordable housing, development of quality childcare arrangements, and enforcement of anti-discrimination laws

and human rights codes. It is also important to increase support for the social infrastructure including public education, social and health services, and improvement of job security and working conditions;

Public health and health care associations and agencies should educate their members and staff about the impacts of governmental decisions upon the social determinants of health and advocate for the creation of positive health promoting conditions. Particularly important is these associations and agencies joining current debates about Canadian health and social policy decisions and their impacts upon population health;

The media should begin to seriously cover the rapidly expanding findings concerning the importance of the social determinants of health and their impacts upon the health of Canadians. This would strike a balance between the predominant coverage of health from a biomedical and lifestyle perspective. It would also help educate the Canadian public about the potential health impacts of various governmental decisions and improve the potential for public involvement in public policymaking; and that

Immediate Action

As a means of moving this agenda forward, the conference recommends that Canada's federal and provincial/territorial governments immediately address the sources of health and the root causes of illness by matching the $1.5 billion targeted for diagnostic services in the Romanow *Report on the Future of Health Care in Canada* and allocating this amount towards two essential determinants of health for children and families: 1) affordable, safe housing; and 2) a universal system of high quality educational childcare; and

Long-Term Action

Similar to governmental actions in response to the *Acheson Inquiry into Health Inequalities in the United Kingdom*, the federal government should establish a *Social Determinants of Health Task Force* to consider these findings and work to address the issues raised at this conference. The *Task Force* would operate to identify and advocate for policies by all levels of government to support population health. The federal and provincial governments would respond to these recommendations in a formal manner through annual reports on the status

of these social determinants of health.

So Resolved, this December 1, 2002, in Toronto, Canada, and Ratified, February 10, 2003

To summarize then, research in the area of social determinants of health has indicated that these determinants have a direct impact on health; social determinants predict the greatest proportion of health status variance; they structure health behaviours; and they interact with each other to produce health (Raphael, 2004b, 2004c, 2004d).

Langs Farm Village Association and the Determinants of Health Approach

Named after Thomas Langs, a Mennonite farmer who originally owned what was then a densely populated subdivision, Langs Farm Village Association (Langs) is a neighbourhood organization that began in 1978 by a group of residents, service providers, and volunteers. This group included representatives from the Public School Board, the City of Cambridge, South Waterloo Housing Authority, the Public Health Unit, the Children's Aid Society, Waterloo Regional Police, and Preston Mennonite Church (history and characteristics of Langs see Appendix A). The community center, which began in a townhouse in 1980 with four summer students operating recreation programs, now operates a Community Health Centre, a Family Resource Centre, Youth and Teen Community Centre, Adult Community Programs, and has an independently owned pharmacy onsite.

Langs' staff is comprised of an executive director, an administration team, a social work/counseling team, a clinical team, and a community services team. Langs also has six onsite community partners (e.g. physiotheraphy, Lutherwood, speech pathology) and many off-site partners (e.g. YMCA, Kids Ability, Counselling Centre of Cambridge North Dumfries, Cambridge Self-Help Food Bank, Community Health Department, and

Physiotherapy Associates of Cambridge) and has assisted in the establishment of the North Dumfries Satellite site (see Team Organization Chart in Appendix C). Funding for the operation of Langs is provided by the City of Cambridge, Human Resources Development Canada, Ontario Ministry of Health & Long Term Care, Regional Municipality of Waterloo, Preston Mennonite Church, Waterloo Regional Housing Authority, United Way of Cambridge and North Dumfries, local service clubs and churches, and through their own fundraising efforts.

The priority population that is serviced by Langs includes groups identified as high risk such as low-income families, single parent families, youth and teens, seniors, and persons from a multicultural heritage. As is typical for many clients of CHCs in Ontario (Shah & Moloughney, 2001), many residents in the community have expressed feelings of isolation and have experienced access barriers to health and social services. These feelings of isolation have occurred because over the years both health care and social services have been located in the Galt section of Cambridge rather than the Preston section. Residents reported that using public transit to access these services in Galt was difficult. Since access to the Langs' residential area is gained by first driving through an industrial site, it is seen to further exacerbate feelings of isolation from the rest of Cambridge (Langs, 1994).

Demographics

Located in north central Cambridge, Langs is comprised of three subneighbourhoods (Coronation Hill, Brent Park, Hilborn) and services Preston Heights as well, which has two subneighborhoods (John Erb, Cyrus Park). Detailed demographics from the Statistics Canada's 2001 census report are included in Appendix D.

Programs and Services

Programs and Services

Service for clients of Langs is based on a health promotion philosophy with an emphasis on community empowerment. Langs has a high level of involvement from community residents in the identification of needs, and in the planning and implementation of programs and services to responds to these needs (Langs, 1994). A description of the current programs and services can be found in Langs' 2006 Summer Newsletter (Appendix E).

Throughout my thesis research I have worked with the executive director of Langs, its manager of community services, and several support staff with relative ease. I discovered very early in the process that my work was warmly welcomed at the facility. Perhaps this is due in part to the long history of affiliation that faculty and students of the Community Psychology programme at Wilfrid Laurier University (WLU) have had dating back to the early 1980s. Volunteers from the community, Preston Mennonite church members, the Public School Board, and faculty and students from the Community Psychology Department of Wilfrid Laurier University believed that Langs would play a preventative role in the neighborhood (Davidson, 1996). This type of a preventative approach is in alignment with founding concepts that have guided the work of community psychology (Nelson & Prilleltensky, 2004).

Community Psychology faculty members at Wilfrid Laurier University helped to facilitate the Langs Farm Project including some of its program initiatives. Dr. Ed Bennett served on the initial steering committee with diverse community settings. At that time, the Langs Farm Project served as an impetus for developing a resource exchange relationship between WLU and the Waterloo Region School Board. When Wilfrid Laurier hired Drs. Geoff Nelson and Richard Mason, one of the contractual expectations was the intention of

WLU to provide part time consultation service in the Cambridge area. In exchange for this, Dr. Jim Dudeck, Head Psychologist with the Waterloo Region Board co-taught a couple of courses at WLU. Geoff Nelson consulted at the William G. Davis and Coronation Schools while Richard Mason primarily consulted with the Langs Farm Project. Over the years, a number of Laurier undergraduate and graduate students have worked in the Langs Farm project doing summer work, practica and thesis work, particularly in the early years. It is believed that the community work programs have had a meaningful influence on these students (E. Bennett, personal communication, June 19, 2006).

Rationale for Conducting This Study

It was my original intention to design a master's thesis study that assessed health outcomes for participants and patients of Langs, a local community health centre. Since I did not have access to objective measures of health (blood test results etc.) and given that quality of life is a dimension of health, I thought it would be manageable to attempt to assess quality of life outcomes. Based on my literature review and interviews I conducted with individuals experienced in the operation of CHCs, it was obvious that not only was there very little research conducted on CHCs in Ontario and across Canada, there was no research conducted on outcomes for their patients and participants. In one CHC evaluation study (Shah & Moloughney, 2001) conducted for the MOHLTC, it was noted that extensive reviews of the literature found that studies addressing CHC effectiveness have largely been descriptive in nature and have failed to assess cost-effectiveness due to methodological problems. Although the Shah & Moloughney study comprehensively describes the CHC program in Ontario and makes recommendations for developing performance measures, quality of life is not mentioned as one of the outcome measures to be considered. Substantial research projects

funded by Health Canada involving other aspects of CHCs (best practices; community engagement) have only begun this year. It is the view of Loralee Gillis, Manager of Research and Evaluation at the Association of Ontario Health Centres (AOHC), that the Ontario government emphasizes both outcome and cost-effectiveness research of the various models of primary health care, however, currently cost-effectiveness research has been given priority.

According to a study conducted for the AOHC in 2005, there is a lack of recent research examining the cost-effectiveness of all of the various models of primary health care in Ontario *and* Canada. The cost-effectiveness research that had been conducted in the past focused solely on costs without any attention to measuring outcomes. This research is dated and viewed with skepticism as most of it has not been published in peer-reviewed journals. There appears to be agreement that a real need is seen for studies that evaluate all of the various models of health care delivery (L. Gillis, personal communication, August 10, 2006; Yalnizyan & Macdonald, 2005). To fill the research gap, it was recommended by Yalnizyan & Macdonald (2005) that effectiveness studies be conducted that examine: the experience of patients/participants; the experience of providers; and analysis of patient outcomes across different models. Survey instruments were suggested as the best tool in which to assess patient and provider experiences.

On the other hand, a large body of research *does* exist on the social determinants of health. This research has addressed the effects on health when these determinants are compromised or diminished for members of Canadian families. SDOH literature has included valuable evidence from programs that have worked to successfully address these various social determinants (Masse & Barnett, 2002; Schweinhart et al., 2006). However, there

doesn't appear to be any literature available on addressing the SDOH through a CHC model or assessing QOL outcomes for community residents when changes are made to any of the social determinants. This was confirmed by a group of researchers who examined the existing studies on income and income distribution as one of the determinants of health in Canada. It was their finding that there is a lack of longitudinal studies of the impact of income-related issues upon health across the life span; a lack of linked data bases that allow complex analyses of how income and related issues contribute to health and well-being; and very little inter-disciplinary work available that identifies pathways mediating the income and health relationship (Raphael, Macdonald, Colman, Labonté, Hayward, & Torgerson, 2005). The researchers of another project developed specifically to identify research gaps and future opportunities in research related to income and health in Canada came to similar conclusions: very little research has been done to understand the role that the broader determinants play in health and no adequate measures are available to assess the impact of social determinants on health (Raphael, Labonté, Colman, Hayward, Torgerson, & Macdonald, in press).

In 2003, York University partnered with the Canadian Council on Social Development and GPI Atlantic, Canadian Auto Workers CUPE National, and the Canadian Labour Congress to conduct research which would consider the origins of inequalities in income distribution and resource allocation. It was also the goal of this team of collaborators to assess the effects of income inequalities on the health of individuals and communities. Unfortunately the proposal was declined by the funding agency, the Canadian Institutes of Health Research. In the same year there was a community-university research alliance with the Association of Ontario Health Centres formed with the intention of submitting a research

proposal to the Social Sciences and Humanities Research Council of Canada. Two of the goals of their proposed research was to identify societal and community determinants of health and well-being and understand the role that community health centres play in promoting the health and well-being of urban and rural populations. Again this proposal was declined by the funding agency (D. Raphael, personal communication, August 14, 2006).

For the most part, the literature available on quality of life studies in Canada seems to have focused on identifying the contributors to health and QOL rather than measuring outcomes. This can be seen in projects such as Hamilton-Wentworth's Vision 2020, Newfoundland and Labrador Strategic Social Plan, and the Federation of Canadian Municipalities Quality of Life Reporting System. Most of the standardized measurement tools that address QOL issues measure health-related quality of life which examines how individuals function on various levels including: physical health status and function; psychological status and well-being; social interactions; and various components of economy and personal economic status (Raphael et al., 1996). The most widely used health-related QOL measurement tools are produced by Rand Health for which there is a strong emphasis on measuring QOL for individuals suffering from various diseases (e.g. HIV/AIDS, kidney disease, aging etc.).

The purpose of my study was to engage in meaningful research with community members to assess QOL of patients and participants who attended Langs for any program or service as compared to residents from the same neighbourhoods who did not attend Langs. Since I had decided that it was important to examine the subjective appraisal of QOL and health, receive input on what community residents believed contributed to their own QOL and the QOL measures available were not suitable for my study, it was essential that I

develop my own measurement tool. In collaboration with Langs' staff and community residents I developed a QOL survey intended to measure 11 quality of life constructs including: culture; work; community; social programs and conditions; family, friends and connections; health; personal well-being; environment; economy; transport and infrastructure; and education. Quality of life is defined as higher survey scores on each of the individual subscales. It was my desire to use my QOL outcome measure to assess the effectiveness of CHCs (specifically the Langs model) to impact quality of life for their participants and patients. It was my hope to begin to fill the gap in studies of CHCs; specifically in the area of outcome research. Finally, it was important to me to use the research results to advocate for CHCs that serve vulnerable populations.

Methodology

Research Approach and Methods

Community psychology adherents believe that to best understand the world we need to include and appreciate multiple, local contexts and stories, while obtaining rich detail about such stories (Banyard & Miller, 1998). We value participation and collaboration to describe reality from the perspective of those who have traditionally been excluded from the producers of research (Kirby & McKenna, 1989), namely, the participants (referred to in some community health centres as participants and in some cases, patients).

I am in agreement with Susskind (1985) when he asserts that a discipline is not defined by a specific set of research methods. In keeping with Susskind's assertion, I utilized quantitative and qualitative research measures in obtaining the data. This type of combination is considered complementary and enables a more complete picture to be painted of issues

related to health and psychology (Marks, Murray, Evans, & Willig, 2002). Also, it is this combination approach that ensures that the methods used are those that permit direct investigation of the questions (Mayer, 2003) that I, as a researcher, chose to address. I hypothesized that participants in the study group (participants of Langs) would report better quality of life than those of a community comparison group which was measured in terms of higher scores on the quality of life survey.

Training Community Members as Co-researchers

> "Empowering the less powerful people in a society is ….. a major, explicitly-stated goal of participatory researchers and evaluators." (Whitmore, 1991)

***Principles of community psychology*:** In accordance with participatory research literature, a key to empowerment is participation, which in itself is a developmental process. By training community members, along with empowering these individuals there is a greater likelihood of producing knowledge and action directly useful to the community (Reason, 1994); in this case Langs Farm Village Association. Inclusion of community members in a meaningful way also allowed me the opportunity to promote community psychology values for personal well-being of the trainees such as self-determination, and caring and compassion. I am in agreement with the researchers on the quality of life project of the Canadian Research Policy Network (upon which my own measurement tool is based), who indicate that striking a balance between the participatory and the technical in community indicator work is "doing it right" (Legowski, 2000).

Purpose of training: As a researcher encompassing community psychology principles, it was my desire to implement the principle of citizen participation in practice. I achieved involvement of community residents by giving back to the Langs community in a tangible way: through equipping community members with new skills and putting money back into

the community by providing the researchers with a modest income of approximately $250. These skills have not only empowered these individuals, but have had a practical application as well: involvement as a member of the research team can be added to a resume and I can act as a reference when seeking employment in the future. Although not an explicit goal when designing this study, the opportunity to train community members had a side benefit of empowering me through engagement in the mentoring process.

Purpose and Objectives of This Study

- Accumulate and increase knowledge that can contribute to better quality of life (and eventually health outcomes) for the public, especially to those groups of people who are disadvantaged or experience barriers to health care access.
- Apply my deep personal value for self-determination, caring and compassion, and individual, relational, and collective health and well-being through the execution of health-related research.
- Investigate the possible role that the social determinants of health have on the quality of life of community members.
- Enhance stakeholder empowerment through participatory research that values true collaboration and demonstrates shared power.
- Allow voices of Langs' participants an opportunity to be heard concerning factors that influence their health and quality of life.
- Use information gathered to advocate and promote the value of community health centres (the Langs model specifically), to our provincial government in Ontario. One of the recommendations made by Dennis Raphael in his 2004 presentation at the Toronto East General Hospital was to "lobby government

to maintain the community and service structures that help to maintain health and well-being." Accordingly, I will be ensuring that George Smitherman, the Minister of Health and Long-term Care and Gerry Martiniuk, the MPP for Cambridge receives a copy of my research results.

- Add value to the setting at Lang's Farm Village Association through my research association.
- Supply existing CHCs with relevant research to further or promote their cause. Results of this study can serve as adjunct data for a funding proposal or strategy for communities wishing to establish a CHC.
- Increase theoretical and practical knowledge about community health since this research could identify the primary determinants of individual and community health (Raphael, 2004e).

Method

Participants

Using the Sample Power program it was determined that for an alpha of 0.05, an effect size of 0.25, and power of 0.81, the sample size required for this particular study was n = 65 for both the study group (Langs' clients) and the comparison group (community residents who do not attend Langs for any program or service). Originally, participants were obtained for both the study group and comparison group through random selection of streets and households in the Langs' catchment area. Participants for this study were recruited in stages. In the first phase of data collection, I used the random sampling function of the data analysis option in Microsoft Excel® to choose streets and households (explained on p. 60). A list was generated for each street (Appendix F) and participants were surveyed door-to-door by research team members. However, this sampling method soon became problematic for a number of reasons: residents in specified houses or apartments were sometimes not at home on the particular night they were chosen to be surveyed; and if a resident chose to decline participation, that house on the list would have to be replaced with another one, compounding the workload with the constant updating of surveying lists, the time required to deliver them to Langs, and revisitation on that street.

In the second phase of recruitment, a cluster random sampling technique was used whereby the nth house (in this case any one out of every three houses) was chosen to participate. In the final phase of data collection, research team members entered various programs at Langs including *Early Years* and *Take a Break*, and the Langs' Resource Center to recruit the remaining study participants required to complete the research.

Out of 130 participants, 79.2% were from Canada while 20.8% of the participants listed another country as their country of origin. Over half (11.5%) of the participants from other countries were from England, Guyana, India, and Pakistan. The age category with the highest number of participants was the 28-32 group; 38.5% of the participants were somewhere between the ages of 28-37; 16.9% were from 38-42; and 9.2% were between the ages of 23-27. The relationship status of the participants in this study included 76.9% who were married or in a committed relationship; 10.8% were single; 7.7% were separated or divorced; and 3.8% were widowed. Forty percent of the participants live with their partner/spouse/significant other and a dependant (either children and/or parents); 25.4% live with a partner only; 15.4% live with a dependant only; 13.8% live alone; and 3.8% live with other family members or friends. The greatest number of participants reported an annual household income of more than $70,000 (36.9%) while 20% of participants reported a household income of $50,000-$70,000; 19.2% reported their household incomes to fall below $30,000, and 17.7% of the participants earned a household income of $30,000-$50,000.

The majority (41.5%) of non-Langs' participants were between the ages of 28-37. The average age of Langs' participants was likely higher compared to the non-Langs' group since 40% of the participants in the study group were between the ages of 28-42 (table 1).

Table 1

Age Characteristics for Study Participants

Age Category	Langs	Non-Langs
18 – 22	3.1%	3.1%
23 – 27	10.8%	7.7%
28 – 32	18.5%	21.5%
33 – 37	16.9%	20.0%
38 – 42	21.5%	12.3%
43 – 47	6.2%	9.2%
48 – 52	3.1%	7.7%
53 – 57	4.6%	6.2%
58 – 62	3.1%	0.0%
63 – 67	4.6%	7.7%
68 and older	7.7%	4.6%

(n = 65 for each group)

Eighty three percent of the Langs' group participants were from Canada and 17% reported another country as their country of origin. Out of the 17% who were from other countries, approximately one third were from England and Guyana combined. The non-Langs' group contained more participants who were born outside of Canada as 25% reported being born in another country and 75% reported Canada as their country of origin. Half of the non-Langs' participants born in other countries were from a combination of England, Guyana, and India. For both groups, other countries where participants were born outside of Canada included China, Colombia, England, Germany, Guyana, Kazakhstan, India, Mexico, Pakistan, Portugal, U.S.A, Trinidad and Tobago, Vietnam, Scotland, South America, and Romania.

Of the Langs' participants, 69.2% reported being married or in a committed relationship compared to 84.6% of the non-Langs' group. Participants of the Langs' group reporting to be separated or divorced accounted for the second highest ranking with 12.3% while only 3.1% of the non-Langs' group fell into this relationship status category. Single participants accounted for 10.8% of the Langs' and non-Langs' groups while there were 7.7% of the Langs' group who were widowed and no participants in that category in the non-Langs' group. In the Langs' group, 58.5% lived with their partner/spouse/significant other or their partner and dependants compared to 72.3% in the non-Langs' group. In the Langs' group 13.8% lived with a partner without dependants while the non-Langs' group had three times (36.9%) as many participants living with a partner only. Single parents living with children comprised 21.5% of the Langs' group and only 9.2% of the non-Langs' group. Almost 17% of the Langs group and 11% of the non-Langs' group lived alone while 3.1% of the Langs' group and 4.6% of the non-Langs' group lived with other family or friends.

With regards to income, a considerably larger percentage of participants in the Langs' group belonged to the lowest income category (below $30,000) compared to the non-Langs' group. In the Langs' group, 44.6% of the participants belonged to the two highest income categories compared to 69.3% of the non-Langs' group (table 2).

Table 2

Income Level for Study Participants

Income level	Langs	Non-Langs
Below $30,000	30.8%	7.7%
$30,000 - $50,000	20.0%	15.4%
$50,000 - $70,000	16.9%	23.1%
Above $70,000	27.7%	46.2%

(n = 65 for each group)

Materials

To assist in addressing self-reported quality of life I designed my own quality of life survey. The survey contained a qualitative component in the form of three open-ended questions at the beginning followed by 55 close-ended questions using a Likert-type answer scale. Based on the national quality of life research completed by the Canadian Policy Research Network (CPRN), my questionnaire included 11 subscales designed to measure self-reported quality of life of participants': culture; work; community; social programs and conditions; family, friends, and connections; health and health care; person well-being; environment; economy; infrastructure and transport; and education (Appendix G). Two consent forms accompanied each survey (Appendix H); one to be given to the participant and one to be kept for my records.

A poster announcing the research was designed and placed throughout the community and at Langs (Appendix I), and research announcement postcards were mailed to 130 households that had been randomly selected to participate in the study (Appendix J).

Procedures

Entry into the Research Setting: I first met with Langs' executive director Bill Davidson in the spring of 2004 to communicate my research interest in the community and gave him a brief depiction of the potential research. I then spent the summer of 2004 designing my study and on August 16, 2004 met with Bill to deliver a copy of my thesis proposal and have a more in-depth discussion of the research possibilities. After my thesis committee meeting on August 23rd I met again with Bill to welcome his feedback on the proposed research design.

On January 10, 2005 I attended my first monthly meeting of Langs' community services committee. I introduced myself and gave a very brief and preliminary description of my

research interest at Langs. The positive response I received from members of the committee was very encouraging. On January 17th, Langs' Volunteer Coordinator Andrea Neilson gave me a thorough tour of the facilities and introduced me to each staff member including the clinical staff in the health centre. Andrea had been working at Langs for three years and is very knowledgeable not only about the Langs' staff and their associated job functions, but also about the diverse range of Langs' programs and services. Since I was going to have (limited) access to information about Langs' participants and programs, Andrea notified me that I would be required to sign a volunteer confidentiality agreement (Appendix K). I was then presented with a form for a police check which I was to complete and bring to the Cambridge police station. Langs pays for the cost of police checks ($10) for all volunteer applicants; mine was generously paid for as well.

In order to obtain a more comprehensive understanding of the Langs' model and observe local norms of conduct, I felt it would be useful to attend various programs and acquire personal experience with them. I selected at least one program for each distinct age group and submitted a request for approval to attend these programs to Bill Davidson. During the weeks of January 17th and 24th I attended: *Retired and Ready* (adults 50+); *Early Years Drop-in* (parent/caregiver and children 0-6); *Run For Life* (adults); *Youth and Teen Drop-in* (5-11 & 12-17); *Super Snackers Sr.* (7-10); *Take A Break* (adult women); *Breakfast Club* (JK-grade 8); and *Cooking Healthy Together* (adult). In order to familiarize myself with streets in the Langs' neighbourhoods, in February I accompanied a community worker and a volunteer on their monthly community outreach. Outreach work involved speaking with community residents while delivering Langs' monthly newsletter.

On February 7th, 2005 I submitted a revised thesis proposal to the Research Ethics Board at WLU and attended my second monthly meeting of the community services committee (CSC). At this particular meeting I presented a condensed version of my research design. On March 7th I once again attended the CSC monthly meeting. At this meeting I put forth a request for volunteers to form a consultative "work group" to my study and explained the functions of such a group. [Bill Davidson suggested that I not use the term advisory group in the event members would assume this meant they got to have more input than was really necessary.] I was seeking committee members who had extensive knowledge of the Langs' neighbourhoods and who were willing to provide feedback at specific times throughout the research process.

Development of the Measurement Tool: During the summer of 2005 I researched standardized quality of life surveys and various quality of life projects quite extensively. All of the quality of life projects I examined focused on the identification of indicators of quality of life as opposed to measuring QOL outcomes. Since it was my goal to measure outcomes I eventually came to the realization that I would need to develop my own measurement tool. As a conceptual basis for my survey I decided to use results from the Canadian Policy Research Network's indicator's project entitled, "Asking Citizens What Matters for Quality of Life in Canada." This project was carried out in a participatory manner which resembled the way I wanted to conduct my research as well. Also, I felt that the groundwork was already done and I could successfully convert the QOL indicators from this project into QOL outcome measures.

The Canadian Policy Research Networks (CPRN), under the guidance of Dr. Joseph H. Michalski of the Department of Sociology at Trent University, conducted this research

between October 11-26, 2000 and results were published in April of 2001. Part of this project involved having CPRN's research group visit every province in Canada and ask Canadian citizens (through a random sampling method) what they considered to be contributors to their quality of life. This public dialogue process took place in 28 urban settings and 12 rural areas. In total, 346 Canadians participated in the 40 public dialogue discussions with 8.7 participants per group. The results of this project produced 17 thematic areas (QOL domains); each thematic area included five subthemes (concepts). These themes and subthemes were concepts that reflected some of the social determinants of health that I thought once converted into QOL measures, would be relevant for Langs' residents. In choosing this project as a conceptual framework for my measurement tool, I considered Wyman's (2001) final report of CPRN's Quality of Life Indicators project. Wyman noted the strength of consistency in identified QOL priorities from individuals and groups in both the pre and post dialogue questionnaires.

Throughout the development of my measurement tool I sought input from the executive director of Langs (Bill Davidson), the manager of community services (Kerry-Lynn Wilkie), and members of their community services committee who were part of an advisory-working group. On July 5th I delivered packages (Appendix L) to Bill Davidson and Kerry-Lynn Wilkie consisting of background material on CPRN's quality of life indicators project. I provided Bill and Kerry-Lynn with a synopsis of some of the main themes that emerged from the dialogue process (Appendix L) for their perusal with the intention of receiving feedback at a later date.

When contemplating which thematic areas to include in my survey I examined a historical review of social indicators in the United States (Cobb & Rixford, 1998). These

authors stated that comprehensiveness may be the enemy of effectiveness and suggested when developing a measurement tool that it would be wise to use a smaller number of priority indicators. Taking this into consideration I concluded that it was impossible to use all 17 of the thematic areas identified by Canadians for CPRN's Quality of Life Indicators Project; I would have created a survey too lengthy to interest potential participants and accumulated copious amounts of data that could present challenges in analysis. In consultation with Langs' executive director and manager of community services I chose to develop 11 subscales referring to areas we considered most relevant for the Langs' population: health; education; environment; social programs and conditions; personal well-being; economy; work; community; friends, family, and connections; and infrastructure and transport. The development of my survey questions entailed wording each item in a way to best target the existence of specific QOL measures for study participants. For instance I asked "Do you feel that you have _____." as opposed to, "Do you think that _____ contributes to your QOL?" By providing an answer scale that gave opportunities for participants to answer to what extent specific QOL contributors existed in their lives from "not at all" to "an extreme amount," I felt that I would be measuring QOL outcomes.

I anticipated that because participants were drawn from within the same neighbourhoods, these individuals would match on key demographic variables such as age, income, country of origin, and household composition (living arrangements and relationship status). To confirm (or dispute) this assumption, there were six questions addressing essential demographic concerns.

In order to obtain original personal input from study participants, I included three open-ended questions pertaining to individual quality of life. The first question (Q1) simply asked,

"In your own words, can you tell me what the term quality of life means **to you**?" Question two (Q2) asked, "Can you list three things that you feel contribute to **your** quality of life?" The final open-ended question (Q3) asked participants to rank the items in question 2 in order of importance (1 = most important, 3 = least important). Being mindful of the possibility that participants could be influenced by the survey content and/or affected by priming, I placed these questions at the beginning of the survey. I submitted the first draft of the quality of life survey to Bill and Kerry-Lynn in August of 2005.

On September 15th I once again met with Bill and Kerry-Lynn; on this occasion they had pertinent feedback to divulge to me with regard to wording of the survey questions. Because of their extensive experience with, and knowledge of Langs' residents, Kerry-Lynn and Bill were aware of specific language that would be most appropriate (and understandable) for survey participants. The valuable input I received allowed me to make changes to the wording (but not the meaning) of 19 survey questions. For instance in the section of the survey pertaining to 'community,' the original wording of one of my questions was, "Do you feel connected to other people in your community?" Langs suggested that I change this to, "Do you know your neighbors on a personal level?" I later revised this question to read, "Do you know your neighbors personally?" My thesis supervisor Dr. Terry Mitchell was an enormous resource in guiding me to devise five questions referring to various aspects of culture and assisted me in an overall fine tuning of the measurement tool.

Once I finished the development of what I considered to be a fairly solid measurement tool, I presented copies to the three volunteer members of the study's workgroup. The feedback I received was extremely positive; one member suggested a different option for responding to one of the demographic questions. I agreed that his suggestion was an

improvement over the existing response and promptly implemented the change. The other two members seemed to have carefully considered the survey and were very pleased with it in its present form. For the purpose of assessing survey completion time, I piloted the survey with 10 family members and friends of various age groups and educational backgrounds. The average time to complete the survey was 12 minutes which I deemed to be reasonable.

Ethics: Wilfrid Laurier University's Research Ethics Board (REB) required all students conducting research with human participants to follow proper ethical guidelines throughout the research process. On February 04, 2005 I signed and submitted a 17 page document, *Request for Ethics Review of Research Involving Human Participants* to the REB. This was accompanied by a *Confirmation of Supervisor's Review* form which was signed by my thesis supervisor Dr. Terry Mitchell. On February 15, 2005 I received preliminary approval from the chair of the REB to conduct my study. At this time I had not yet fully developed my measurement tool and in June, 2005 submitted the: participant consent form; researcher's pledge of confidentiality and professionalism; list and resumes of research team members; identification tag for research team members; research team training outline; research team training materials; researcher's script for door-to-door surveying; community poster; household research announcement postcard; household research thank you card; and quality of life survey. These materials were submitted along with a *Request for Ethics Clearance of a Revision or Modification to a Previously Approved Application to Conduct Research with Human Participants* to the REB.

Since I was going to have (limited) access to information about Langs' participants and programs, I was notified by the coordinator of volunteer services that I would be required to sign a volunteer confidentiality agreement (Appendix K). I entered a number of Langs'

programs as an observer (and sometimes I participated); at the start of each program I was either introduced by the group leader or I introduced myself. I explained that I was conducting a quality of life study and wanted to have hands-on experience with the programs that Langs offers so that I could enhance my understanding of each program. I also communicated that there would be no mention of people's names in my notes while making observations. I made it a point to assure group members that any personal information shared during the program session would be kept confidential. Very early on in the research process I had also made a verbal agreement with Langs' executive director regarding confidentiality of participant's personal information.

To ensure that all information (answers to survey questions and content of conversations) collected from community residents and any observations made while in or near resident's homes was kept confidential, all research team members agreed to the terms and signed a Researcher's Pledge of Confidentiality and Professionalism. Having researchers sign a pledge of confidentiality is something I learned during my practicum from Dr. Janos Botschner at the Orchard Park Institute of the Canadian Mental Health Association. The pledge outlines the role of the researcher in the data collection process and specifies what is required from them in terms of confidentiality and professional code of conduct. Consequences for not adhering to this agreement were also included in the pledge; in the case of my study it would have meant termination of employment and a resultant loss of pay.

To protect the research team members themselves, there was a commitment from me on this agreement to treat all research team members with respect and dignity, and to manage anticipated risk and address safety issues. Risk and safety issues were covered in the research team training I conducted in October, 2005. Anticipated risk included situations whereby a

research team member feels uneasy (which may not be explainable – it could be a feeling of uneasiness or an instinct that something is just not right without any evidence). I advised all of the research team members that under any and all circumstances where this may present itself (feeling of uneasiness) that they were not to approach residents in that particular household and I would not require an explanation from them.

Additional risky situations that were negotiated and addressed amongst the research team included safety issues such as: scary or loud barking dogs on or near a property; visible intoxication or inappropriate behaviour by a community resident; and cold or stormy weather conditions. Again, team members were not required to go on the property where there were animals that they were uncomfortable with. Should an intoxicated community resident offer to participate in the study, they were to be politely declined and researchers were not expected to conduct door-to-door surveying in cold or inclement weather conditions. It was mandatory for all surveying to be conducted in pairs and I suggested we remain visible to each other as much as possible. All pairs of team members were to carry cell phones; if they didn't have access to one, Langs made one available to us that we could sign out each night. I also made sure that research team members did not conduct door-to-door surveying on their own streets where they were known by their neighbours. The intention was to prevent possible biases by participants when answering survey questions and to protect the privacy of community members.

To protect the rights of any Langs' community residents who chose to participant in my study, informed consent was obtained before surveys were either completed or left to be completed later and mailed in. Participant's were assured confidentiality and anonymity as well as the right to have access to the results of the study, once completed. I made a

commitment to all interested research participants who wished to receive a copy of the results of the study (representing them and the results in language that they would understand) by obtaining either their email address or home mailing address for which I could later use to contact them. One copy of the consent form was left with the participant and I kept one signed copy. I currently have possession of all of the signed consent forms which are located in a locked filing cabinet drawer. Since there was no deception involved in the data collection phase (researcher's identities were visible; the object of the study was not misrepresented), debriefing was not a necessary component of ethics for this study.

In order to protect the integrity of the data through statistical analyses, I chose to seek assistance when choosing appropriate statistical tests and when interpreting test results. I was extremely fortunate to receive statistical help from Dr. Mindi Foster and Dr. Bob Gebotys in WLU's psychology department. I also consulted with a psychology doctoral student Greg Gunn who was an enormous help to me.

Research Team Recruitment and Training: I placed a job ad seeking research team members in Langs' Spring 2005 newsletter. It was included as a separate insert that was distributed in early March to approximately 1500 households and 200 businesses in the community (Appendix M). For additional exposure the job ad was posted in the Resource Center by one of Langs staff as well. Rather than have job applicants mail in their resumes, a temporary guest voice mailbox was set up at Langs in order that potential applicants could leave voice mail messages for me.

Bill Davidson contributed indispensable input regarding the qualifications I should look for when hiring the research team members. Bill suggested fundamental assets would include: previous surveying experience; knowledge of the community; currently residing in

the community; familiar or involved with Langs' services; good verbal and written communication skills; and a minimum of grade 12 or equivalent life experience. Because of the cultural diversity in the Langs' neighbourhoods and the possible language barriers we could encounter, Bill offered the use of a Langs' peer worker who speaks five languages should we require her services. Additionally, Bill proposed the idea of having a member of the community services committee assist me in the interviewing process; Kerry-Lynn recommended Bhupi Rajput (resume in Appendix N). With her extensive business and marketing experience, Bhupi proved herself to be an excellent partner in the interviewing and hiring processes. In fact I was so impressed with Bhupi's skills that I asked if she would consider accepting one of the research team positions. After discussing this opportunity with her husband, Bhupi later accepted the job.

It was important to me that Bhupi have equal input in the interview and hiring processes. I made every effort to include her in all aspects including the composition of interview questions and ensuring that Bhupi asked a fair proportion of the questions during the interviews. Throughout the weeks of March 28th and April 4th Bhupi and I conducted the interviews and hired three people for the research team together (resumes in Appendix O). Once the research team was hired I held preliminary team meetings on May 8th and May 26th; agendas were given out at each meeting and we began each session with a check-in. Bill Davidson requested job descriptions for the research team members along with the total number of research hours anticipated. After receiving this information, Bill informed me that Langs would be willing to contribute $1000 toward employment costs of the research team.

Research team training began mid-October, 2005. The training of research team members took place in Langs new multipurpose room for two hours per day over a three day period.

Academic topics included basic community principles and values and ethics in conducting research involving human participants. All research team members were given handouts which included: training outline; contact information for all research team members; purpose and objectives of my quality of life study; community psychology principles and values adopted from Nelson & Prilleltensky (2004); a surveying script; an example of a QOL survey (WHOQOL-100); the participant consent form; Langs' employee timesheets; and two copies of the Researcher's Pledge of Confidentiality and Professionalism (Appendix P).

During the first day of training on October 14th all team members individually introduced themselves and gave background information on their affiliation with Langs. Following introductions, I presented a project overview stating the goals and objectives of my study and explained the research design using language that I felt was understandable for all team members. Principles and values of community psychology were then presented and an opportunity was given to ask questions with regards to what was covered thus far. During the second part of the training on day one we covered ethics in social science research and highlighted areas of Wilfrid Laurier University's ethical guidelines for conducting research using human participants.

Day two of training involved the practical aspect of door-to-door surveying. We discussed interviewing skills (listening, tracking, paraphrasing and summarizing) and then practiced role playing. I felt it was important for the research team to become comfortable with the surveying procedure and materials; I felt that role-playing would boost their confidence when approaching community residents. We spent time as a group contemplating possible problematic scenarios (e.g. rudeness, racism, barking dogs) that could occur while surveying; solutions were suggested by research team members to overcome these issues. In

order to minimize the possible impact of social desirability (Sommer & Sommer, 1997) when answering questions, I thought it would be more appropriate for team members to not conduct surveying on their own streets where they were known by their neighbors.

On the third and final day of training we revisited ethics and discussed privacy and confidentiality issues. Several of the research team members who had previous surveying experience in the community shared practical insights and we practiced how we would administer the surveys. The second part of the training involved personal safety issues. We perused a safety plan that established personal safety of the research team as a priority. The ground rules included: surveying in pairs only; carrying cell phones at all times; and not feeling compelled to surveying at a house or apartment where a level of uneasiness was present. The team members then read and signed the Researchers Pledge of Confidentiality and Professionalism (Appendix P) and kept a copy for themselves. Due to involvement with income support programs, two of the research team members required job offer letters which I later supplied (Appendix Q). The training period ended with excitement as I took digital photographs of each team member individually for their photo identification tags (Appendix R).

Commencement of Community Research: In October, 2005 I contacted a Langs' staff member in charge of community outreach whom I knew to have extensive knowledge of the streets in the Langs' neighbourhoods. This individual provided me with an MS Excel® file containing a list of all residences visited in the Langs' community as well as a detailed map of the Langs' catchment area. I devised a master list of existing households on these streets by cross-referencing with the 2005 Vernon Directory at the Kitchener-Waterloo library. I submitted my final listing of houses and apartments in the Langs' catchment area to

Microsoft Office Trainer Sanjeev Rajput (resume in Appendix S). Sanjeev was responsible for entering all of the households from the list I provided into a Microsoft Excel® file and from there he developed a macro which when activated, would randomly select line numbers with a corresponding street address (example in Appendix T). The macro randomly selected households without giving weight to number of households on individual streets; thus I chose to abandon this method of random selection. Instead I implemented stratified sampling (sampling each subpopulation/street individually). This method is considered advantageous when there are considerable differences in the subpopulations (2001 census reveals differences in household income within the Langs neighbourhoods). Each stratum (subpopulation/street) consisted of one street and random selection was applied within each stratum by executing a random selection function in MS Excel®. I calculated proportions for each street to select households in each stratum. This ensured that the sample was more representative of the study population.

Once I had obtained a random sample of households for each street, I notified the community households chosen through the mail with announcement postcards (Appendix J). I then grouped households geographically and devised street lists to be used for surveying by the research team (Appendix U). In November the study was introduced to the community through an announcement in a local newspaper, *The Cambridge Reporter*, and several posters (Appendix I) placed throughout the neighbourhood. On November 18th surveying began and continued sporadically (due to weather conditions) until the middle of December.

A surveying system was set up in the photocopying room at Langs where all supplies were organized and labeled, and a checklist was posted on the wall. The checklist ensured that pairs of researchers had all of the supplies they required before going door-to-door.

Supplies included: clipboards; photo identification; surveys; consent forms; large self-sealing envelopes; self-addressed stamped envelopes; entry forms for a Zehrs gift card draw; and pens. Participants were given two options for completion of the survey: on the spot (which qualified them to enter the draw for one of several $25 gift cards from a Zehrs grocery store) and mail-in for which stamped, self-addressed envelopes were provided. We decided the best nights for surveying were Mondays to Thursdays and we usually went from 6:30-8:30 pm. Each night after completing the door-to-door surveying, I met the researchers at the Langs' parking lot to pick up completed surveys and secure them.

The second week of January, 2006 I held a meeting of the research team. At this meeting I explained that since we were experiencing great difficulty finding people at home with the selection method we were using, we would be implementing a new systematic sampling method. This method entailed attempting to obtain one participant out of every three homes on each street. This method, which had been used by Langs in the past when conducting their own research, was shared with me at a community services meeting. Having already calculated how many houses we needed on each street gave me a guideline to use for the new street surveying lists. The new surveying lists were exactly the same as the original set with the exception of house numbers which were now omitted (Appendix U). The new sampling method allowed researchers to obtain the required number of participants on each street without being restricted to specific houses.

On January 18, 2006 I approached participants of the *Pathways to Employment* program seeking an individual to fill a position on the research team. One of our team leaders would be undergoing surgery making her unavailable for a few weeks and the time frame was becoming a central focus for me. With a new team member recruited, our surveying resumed

mid-January in full force. As a test to find out if more people were at home during the day as opposed to evenings, one of the research team members and I surveyed during the day on two separate occasions. We quickly discovered that daytime was not a more suitable time. In order to expedite the data collection process, by the end of January I made changes to the surveying protocol. Potential participants were no longer given options for completing the survey; we simply asked residents if they would like to complete a mail-in survey. By using this procedure we were able to significantly increase the number of people willing to complete surveys.

On February 8th I mailed thank you postcards (Appendix V) to 130 community residents who had either completed surveys at the door or accepted a survey for mail-in. The goal was to first thank community residents for their participation in the study and secondly, increase the response rate by asking for a return of their completed surveys if they had not yet done so. By March 21st I had 42 completed surveys for the Langs' group and 56 for the non-Langs' group. It took one more night of surveying to accomplish our goal of obtaining the 13 remaining surveys required for the non-Langs' group. Two other researchers entered Langs' programs to obtain the remaining 24 surveys required for the Langs' group. To honour the great work done by my research team I concluded our work together with an awards luncheon held at Langs' community kitchen on April 24th. A home cooked meal was provided, and thank you cards and certificates of appreciation (see Appendix W) were distributed to each researcher. I invited three staff members who had been extremely helpful to me throughout the research process at Langs to join us for lunch. Each staff member received a small gift and a thank you card.

Measures: Better quality of life was defined as higher scores on each of the survey subscales; each of the 11 subscales (55 questions in total) were analyzed individually. The 55 quantitative survey questions were scored on a Likert scale with the values of: 0 (not applicable or did not answer); 1 (not at all); 2 (not much); 3 (a moderate amount); 4 (very much) and 5 (an extreme amount). These values were changed for coding answers to question 31 *("In the past 4 weeks have feelings of sadness bothered you?")* to: 0 (not applicable or did not answer); 1 (an extreme amount); 2 (very much); 3 (a moderate amount); 4 (not much); and 5 (not at all). Possible scores on the subscales ranged from 0 to 25, with higher scores indicating better quality of life. The main constructs measured included: health; education; environment; social programs and conditions; personal well-being; economy; work; community; friends, family, and connections; and infrastructure and transport.

I included three open-ended questions pertaining to participant's quality of life. The first question (Q1) simply asked, "In your own words, can you tell me what the term quality of life means to you?" Question two (Q2) asked, "Can you list three things that you feel contribute to your quality of life?" The final open-ended question (Q3) asked participants to rank the items in question 2 in order of importance (1 = most important, 3 = least important). Being mindful of the possibility that participants could be influenced by the survey content through priming, I placed these questions at the beginning of the survey.

Data Analysis: For quantitative analysis into SPSS, surveys were individually identified with a participant number (P1, P2, P3…) and Likert scale answers were coded for accurate input into the statistical program. Subscale scores and the total score were calculated as well. The qualitative analysis consisted of inputting answers to Q1 and Q3 into NVivo® (Richards,

1999) for thematic content. Nodes (coding categories) were divided individually and coding reports printed for the Langs and non-Langs groups separately.

Results

Quantitative data analysis: A multivariate ANOVA was performed on eleven dependent variables associated with quality of life: culture, work, community, social programs/conditions, family, friends, and connections, health, personal well-being, environment, economy, transportation and infrastructure, and education (see table 3 for results). The independent variable was Langs group membership; SPSS multivariate ANOVA was used for the analyses. The MANOVA revealed a significant multivariate difference between the Langs' and the non-Langs' group, $F(11,113) = 3.58$, $p < .05$ (Pillai's trace = 0.259, $p = 0.000$). Univariate Fs that were significant were for the subscales of: culture, work, community, and social programs and conditions. Means and standard deviations are listed in table 4.

Table 3

Univariate Analysis of Variance

Source	SS	DF	MS	F	Sig of F
Culture	113.49	1	113.49	5.52	.020*
Work	108.70	1	108.70	3.96	.049*
Community	178.42	1	178.42	24.21	.000*
Social Programs/Conditions	71.90	1	71.90	5.14	.025*
Family, Friends, & Connections	9.09	1	9.09	.63	.429
Health	1.38	1	1.38	.19	.660
Personal Well-being	4.23	1	4.23	.37	.547
Environment	1.89	1	1.89	.36	.552
Economy	3.36	1	3.36	.35	.556
Transportation & Infrastructure	28.78	1	28.78	2.79	.097
Education	7.95	1	7.95	.43	.513

* Significant at the .05 level.

Table 4

Means for Study Subscales

Subscale	Mean	SD
Culture		
Langs	12.95	4.38
Non-Langs	11.15	4.62
Work		
Langs	11.92	6.77
Non-Langs	14.89	5.97
Community		
Langs	16.05	2.96
Non-Langs	13.98	2.83
Social Programs & Conditions		
Langs	14.98	4.03
Non-Langs	13.60	3.53
Family, Friends, & Connections		
Langs	17.62	3.99
Non-Langs	18.82	4.00
Health		
Langs	16.03	2.88
Non-Langs	16.14	2.54
Personal Well-being		
Langs	16.23	3.97
Non-Langs	17.35	3.20
Environment		
Langs	16.20	2.58
Non-Langs	16.97	2.24
Economy		
Langs	15.49	3.67
Non-Langs	16.52	2.98

Transportation & Infrastructure		
Langs	17.18	3.49
Non-Langs	17.17	3.49
Education		
Langs	15.82	5.43
Non-Langs	16.23	3.81

Reliability: To test the internal consistency of the survey, reliability was measured using Cronbach's alpha coefficient. Each dimension (subscale) of the survey contained five items (alpha coefficients listed in Table 5). Internal consistency was obtained for the culture (r=.86), work (r=.92), family, friends and connections (r=.81), personal well-being (r=.83), and education (r=.77) subscales. According to the test statistic, both the social programs/conditions and transportation and economy subscales were questionable; community, health, environment, and transportation and infrastructure subscales had poor internal consistency.

All of the survey subscales posed five questions each regarding various concepts of that particular subscale. The contribution that culture made to participant's QOL (Cronbach alpha = .86) was assessed by asking questions about: opportunities to participate in cultural activities; actual engagement in cultural activities; self-identification with one's culture; and affiliation in one's culture. The contribution that work made to participant's QOL (Cronbach alpha = .92) was assessed by asking questions regarding: job security; wages and benefits; employment opportunities; job satisfaction; and training and upgrading. The contribution that community made to one's QOL (Cronbach alpha = .56) was assessed by asking questions regarding: neighbourhood safety; participation in activities related to a spiritual belief system; awareness of Langs' programs and resources; opportunities for engagement in community volunteer activities; and personal knowledge/friendships of neighbours.

The contribution that social programs and conditions made to participant's QOL (Cronbach alpha = .65) was assessed by asking questions regarding: programs for children and youth; support programs for basic needs; affordable housing; income gap between households in the community; and daycare facilities in the neighbourhood. The contribution

that family, friends and connections made to participant's QOL (Cronbach alpha = .81) was assessed by asking questions about: satisfaction with family relationships; satisfaction with personal relationships (significant other); satisfaction with support from family and friends; and household financial stability. The contribution that health made to participant's QOL (Cronbach alpha = .34) was assessed by asking questions regarding: accessibility to primary health care services; satisfaction with physical health overall; feeling down (sad); engagement in physical or social activities that enhanced health; and universal health care coverage. The contribution that personal well-being made to participant's QOL (Cronbach alpha = .83) was assessed by asking questions regarding: opportunities for leisure activities; opportunities to enjoy oneself; access to good food; sense of control; and personal satisfaction. The contribution that environment made to participant's QOL (Cronbach alpha = .53) was assessed by asking questions regarding: cleanliness of neighbourhood; water quality; air quality; garbage removal and recycling; and toxic waste created by small businesses.

The contribution that the local economy made to participant's QOL (Cronbach alpha = .64) was assessed by asking questions relating to: access to employment opportunities; healthy economy and economic growth; small business support; sufficient income to meet needs; sufficient income to participate in community activities. The contribution that transportation and infrastructure made to participant's QOL (Cronbach alpha = .56) was assessed by asking questions regarding: access to affordable transportation; public transit; transportation restrictions; community walking paths and trails; and the contribution of transportation to quality of life. Finally, the contribution that education made to participant's QOL (Cronbach alpha = .77) was assessed by asking questions regarding: public school

system accessibility; satisfaction with the public school system; post-secondary education accessibility; opportunities for upgrading or taking a course; and the contribution of education to quality of life. It was anticipated that because participants were drawn from within the same neighbourhoods, these individuals would match on key demographic variables such as age, income, country of origin, and household composition (living arrangements and relationship status). To confirm (or dispute) this assumption, there were five questions addressing essential demographic concerns including: age; country of origin; relationship status; living arrangements; and household income.

Table 5

Reliability Statistics for Survey Subscales

Subscale	Alpha Coefficient
Culture	.862
Work	.924
Community	.558
Social Programs/Conditions	.649
Family, Friends, & Connections	.807
Health	.335
Personal Well-being	.825
Environment	.533
Economy	.640
Education	.769
Transportation & Infrastructure	.560

Validity: Factor analysis results demonstrated that several of the factors were measuring more than one construct with survey items (variables) loading highly on two or more factors (see Appendix X for rotated component and correlation matrices for this factor analysis). All of the items for the family, friends and connections and the personal well-being constructs loaded highly onto factor 1. All of the items for the work construct loaded highly onto factor 2; all items for the culture construct loaded highly onto factor 3. Factor 4 had a number of items loading highly onto it from a combination of three constructs: two items from economy; two items from transportation and infrastructure; and three items from the education construct. With the exception of one item in the community construct (Q14), all other items loaded highly onto factor 5; question 14 loaded highly onto factor 6. All items from the environment construct loaded highly onto factor 6 with the exception of Q43 which loaded highly onto factor 4.

Only two items from the education construct loaded highly onto factor 7 with the remaining three items (Q56, Q57, Q58) from this construct loading highly onto factor 4. Three out of five of the items from the economy construct loaded highly onto factor 8 with Q47 from this construct loading highly onto factor 6 and Q48 loading well onto factor 4. Three items from the social programs and conditions construct loaded highly onto factor 9 with the exception of Q19 which loaded highly onto factor 5 and Q23 which loaded moderately high onto factor 5. Two items for the transportation and infrastructure construct (Q50, Q51), and two items from the personal well-being construct (Q37, Q38) loaded highly onto factor 10. Two items from the health construct (Q29, Q33) loaded highly onto factor 11 as did one item from the transportation and infrastructure construct (Q53). An examination of

the implications of factor analysis results and recommendations for refinement can be found in the discussion section.

An exploratory factor analysis with principal component analysis was used to investigate the correlation and interrelationships among survey items within each of the 11 subscales. Because the items were designed to measure 11 separate domains expected to correlate, 11 factors were originally specified and varimax rotation was used to produce an interpretable solution. After rotation, the first factor accounted for approximately 18% of the variance. The second factor accounted for approximately 9% of the variance; all 11 domains combined accounted for approximately 63% of the variance.

Next, a secondary exploratory factor analysis with principal component analysis was conducted with the extraction criteria of eigenvalues over 1 to investigate other possible alternative structures. Sixteen factors were extracted with eigenvalues over 1 and after rotation, the first factor accounted for approximately 18% of the variance. The second factor accounted for approximately 9% of the variance; all 16 domains combined accounted for approximately 73% of the variance.

To determine the possible presence of interactions for the Langs' group between predictor variables (age, country of origin, relationship status, living arrangements, and household income) and outcome variables (QOL scores on the subscales of culture, community, and social programs and conditions), linear regression analysis was conducted. No interaction effects were found.

Qualitative data analysis: Computer-assisted qualitative data analysis using NVivo® data management software was used for a thematic content analysis. The goal was to code the qualitative data from Q1 and Q3 in the measurement tool in an attempt to ascertain

possible existence of themes within and between the two study groups. Question 1 asked participants to tell us in their own words, what the term 'quality of life' meant to them. Question 3 asked participants to rank the three items listed in question 2 as contributors to their quality of life in order of importance. Percentages were computed associated with responses for Q3. Ninety-five percent of participants responded to Q1 while 93% responded to Q3.

Microsoft Excel® was used to conduct a content analysis of the themes within and across both groups. Examining the results of both groups as a whole, the factor stated most often as meaning quality of life (Q1) to residents (outlined in Table 6) was health (38%). The factor receiving the second largest proportion of participants' response was income (28%), followed by family (23%), happiness (23%), and environment ranking fifth (18%). The factor that Langs' participants stated most often as meaning quality of life to them was health (31%), followed by income (29%), happiness (29%), environment (19%) and family (17%). The factor that non-Langs participants stated most often as meaning quality of life to them was health (42%), followed by family (29%), income (27%), happiness (18%), and environment (18%).

Table 6

Percentage of Participant Responses to Question 1

Factor	Total	Langs	Non-Langs
Community	4 (n=5)	2 (n=2)	5 (n=3)
Education	8 (n=10)	10 (n=6)	6 (n=4)
Employment	8 (n=10)	6 (n=4)	10 (n=6)
Environment	18 (n=22)	19 (n=11)	18 (n=11)
Family	23 (n=28)	17 (n=10)	29 (n=18)
Friends	11 (n=14)	7 (n=4)	16 (n=10)
Happiness	23 (n=28)	29 (n=27)	18 (n=11)
Health	36 (n=44)	31 (n=18)	42 (n=26)
Health Care	7 (n=9)	7 (n=4)	8 (n=5)
Income	28 (n=34)	29 (n=17)	27 (n=17)
Leisure	7 (n=9)	6 (n=4)	8 (n=5)
Nutrition	3 (n=4)	2 (n=1)	5 (n=3)
Safety	9 (n=11)	10 (n=6)	8 (n=5)
Spirituality	1 (n=1)	2 (n=1)	0 (n=0)
Stress	3 (n=4)	2 (n=1)	5 (n=3)
Values	12 (n=15)	14 (n=8)	11 (n=7)

Langs (n=58); non-Langs (n=62)

Examining the results of both groups as a whole, the factor stated most often as contributing to quality of life of residents (Q2 & Q3) (outlined in Table 7) was family and friends (67%). The factor receiving the second largest proportion of participants' response was health (40%), followed by income (38%), employment (27%), and miscellaneous (16%). The factor that Langs' participants stated most often as a contributor to quality of life was family and friends (64%). The factor receiving the second largest proportion of Langs' participants' response was income (37%), followed by health (36%), employment (24%), and environment ranking fifth (20%). The factor that non-Langs' participants stated most often as a contributor to quality of life was family and friends (69%), health (45%), income (38%), employment (31%), and miscellaneous ranking fifth (17%). The miscellaneous category included items such as luck, taxes, transportation, travel, pets, freedom, peace, honesty, and positive-thinking people.

Both the Langs' and non-Langs' groups identified family and friends, income, and health as the top three contributors to quality of life. There was a difference in the ranking of these factors by the two groups as income was ranked more importantly (second most frequently occurring response) for the Langs group compared to ranking third for the non-Langs' group. The difference in the second and third rankings of most frequently occurring responses for the Langs' group was barely negligible (37% for income and 36% for health) whereas the differences in second and third rankings for the non-Langs' group was more distinct (45% for health and 38% for income). A chi-square test was computed to examine whether or not group differences existed for responses to Q2 and Q3. The chi-square goodness of fit test statistic obtained did not meet the critical value required therefore it was determined that no group differences were detected.

Table 7

Percentage of Participant Responses to Questions 2 and 3

Factor	Total	Langs	Non-Langs
Community	5 (n=6)	5 (n=3)	5 (n=3)
Education	11 (n=14)	17 (n=10)	6 (n=4)
Employment	27 (n=34)	24 (n=14)	31 (n=20)
Environment	20 (n=25)	20 (n=12)	20 (n=13)
Family & Friends	67 (n=83)	64 (n=38)	69 (n=64)
Happiness	11 (n=14)	12 (n=7)	11 (n=7)
Health	40 (n=50)	36 (n=21)	45 (n=29)
Health Care	5 (n=6)	5 (n=3)	5 (n=3)
Income	38 (n=47)	37 (n=22)	38 (n=25)
Leisure	13 (n=16)	10 (n=6)	15 (n=10)
Nutrition	4 (n=5)	2 (n=1)	6 (n=4)
Safety	7 (n=9)	5 (n=3)	9 (n=6)
Spirituality	2 (n=3)	0 (n=0)	5 (n=3)
Stress	2 (n=2)	3 (n=2)	0 (n=0)
Values	1 (n=1)	2 (n=1)	0 (n=0)
Miscellaneous	16 (n=20)	15 (n=9)	17 (n=11)

Langs (n=59); non-Langs (n=65)

Secondary data sources: Quality of life scores were higher for the Langs' group compared to the non-Langs' group on three out of eleven survey subscales which included: culture; community; and social programs and conditions. To gain insight on why this may have been the case, I invited a group of key informants to a PowerPoint® presentation of the research project and results to assist with the interpretation of the findings. It was a goal of mine in the research design stage to promote participation and collaboration by seeking input on interpretation of the results from key members of the Langs' community. Additionally, as a community psychology student it was important to me that I remain accountable to the Langs' community by returning to disseminate my research findings. Key informants at my presentation on June 16th included: Langs' executive director Bill Davidson; the community services manager Kerry-Lynn Wilkie; the secretary of community services; four members of the community services committee; three members of the board of directors; and all four members of my research team. For personal support, Alison who is a former community psychology classmate and my husband Mark were present, as was my nine-year old daughter, Alexia. Alexia was only two years old when I started my university education and I felt it was important for her to see that all of the readings, research, and paper writing I have done actually have practical applications. I also wanted her to comprehend that my master's thesis research was about people.

With the exception of staff members, most of the key informants present had multiple roles at Langs. I believe that this characteristic added great depth to their understanding of the mechanisms at work that improve quality of life for Langs' participants and patients. One key informant for instance, was a member of the community services committee, a patient, a peer worker, a program participant and a volunteer. Another key informant was a program

participant and the community nutritional worker. Many of the key informants represented a specific role (e.g. board member) but in many cases were also Langs' participants and/or patients. The presentation session was tape recorded by Bhupi, one of my research team members, who provided me with a typed transcription a few days later.

After an explanation of the research design and methods, I presented the findings to the key informants one section at a time. I then posed specific questions on the individual results sections. I began with a description of the participants in the study (age, relationship status, living arrangements, household income). According to my data, the Langs' group of participants included more: single parents; significantly more families living in poverty; and more people either separated, divorced, or widowed compared to the non-Langs' group. The response from one key informant about these results was, *"People who have a lot going on in their life would seek help and would look for support like Langs, whereas people in committed relationships have each other for support."* Another informant responded, *"This just tells me that people who have been through a traumatic experience – separated, divorced or widowed, are taking better advantage of the services and support being offered here. When you have more married people, they have more integrated support of their families. This community here is now a replacement, or supplements the family unit of people that belong here."* I asked the group of informants if they were surprised by the number of participants in the non-Langs' group who are living with partners without dependants (36.9% compared to only 13.8% in the Langs' group). One individual responded, "*This was no surprise because the support Langs offers is for families or individuals who need help of some kind – whether it be financial, bus tokens, food bank, social support, etc."*

For each subscale where quality of life scores were higher for the Langs' group compared to the non-Langs' group, I presented a PowerPoint slide listing the components of the particular concept that was measured. I then asked key informants what they thought it was about Langs that contributed to the findings for each subscale. With regards to the culture subscale the components measured included: identification; affiliation; opportunity; and engagement. When I asked the key informants if Langs offers any programs or services that have cultural significance, five people simultaneously responded, *"Yes, they do."* One member of the group added, *"The Multicultural Cooking program."* I then asked if there were any other programs where different cultures may be discussed and received the response, *"We take it into Take A Break, where people come in with their cooking and even their traditions and everything, which is a great idea."* Another person replied, *"It's also brought into children's programs. My girls are from China, so for Chinese New Year we had crafts, etc."* Another informant insightfully commented, *"Most programs that we have at Langs is an immersion of cultures. Different people come in and learn things about them. Even though things are not taught, just by being together they learn about each other's cultures."* It was added by another group member (that), *"In Early Years, we have people discussing the different ways that people handle their children. It's never put out that you're wrong because it's from your culture. We allow people to talk about how they were raised or how cultural rituals allow for that and we find ways to learn from each other."*

The enthusiasm in the responses from the group prompted me to ask the group if they felt there is an acceptance of diversity at Langs to which everyone responded simultaneously, *"Oh yes!"* An additional comment on acceptance of diversity came from one informant stating (that), *"In the older adult programs that I attend, they have different things to do with*

our cultures so if we come from Germany or Ireland, and stuff like that. So, it's very interesting to find out about everybody else's background as well as telling them about your own." The last comment on the diversity issue came from a staff member stating, *"For example, we have a number of people coming from Newfoundland and there is that family and social adaptation. You tend to bring your friends and family to your program if that is an important part of your culture. That definitely fits with our programs and services."*

The subscale where the largest group differences in survey scores occurred was the community subscale. This subscale included measurements for safety, spirituality, programs and resources, volunteer opportunities, and connectedness. I remembered that one of the programs at Langs' was the *Spiritual Discovery Group*, however, I was perplexed by how Langs could affect an individual's spirituality. Therefore, the first question I posed to the group referenced the spirituality measurement. I asked what was thought that Langs offered in terms of programs or services that could impact the spirituality or belief systems of participants (and thus improve their quality of life). One key informant indicated (that), *"In the past years, we have done a variety of things. We've had the Spiritual Discovery program, and we've had strong connections with various faith groups. At one point the pastor of the Mennonite Church married someone in the community and (he) has also performed funerals. So there is a strong link from that perspective. There are some informal connections because they hold events (at the church) such as the spaghetti night where everyone is welcomed and it doesn't matter about their faith. They've even done funerals for families who can't afford one."*

Creating a safe community had been one of Langs' strategic directions for 2001-2004 and was an important issue for them. The importance of safety was also established by a focus

group participant two years earlier when she/he stated that safety influences health (Langs, 2004b). In order to address the safety component of the community subscale I asked the group what they thought it was *specifically* about Langs that makes people feel safe. Responses included, *"I think the people and the confidentiality here with the staff here because even in a group discussion, everything discussed stays in that room. For example before a program starts, we have to sign a confidentiality agreement to honour and respect each other. I think that is important."* One interesting response came from an informant who discussed a local traffic study stating (that), *"There is a traffic study being conducted in the area because the local community has found traffic to be dangerous near the schools. Meetings are held and members participate, answer questions, ask questions, and get the opportunity to speak their minds. At the end of every meeting we get to fill out a questionnaire which is sent to the study group. This is important because it affects us all."* The final response regarding safety was that, *"There are also kids' safety workshops – we were shown how to use car seats correctly and the importance of wearing bike helmets."*

Although the volunteer opportunities component of the community subscale did not receive much discussion, it was agreed amongst members of the group of informants that there are plenty of opportunities for volunteering at Langs. Every year there are 200+ volunteers at Langs and depending on the month (and which programs are being offered) there can be anywhere from 50-80 volunteers per month. The majority of Langs' volunteers are adults between the ages of 25-50 and there are approximately 60 youth volunteers (12-18 years of age) annually (A. Neilson, personal communication, June 29, 2006). With the involvement of this many Langs' participants there are opportunities for positive benefits for those engaged in volunteerism. In fact, results of the 2004 Satisfaction Survey indicated that

80-85% of survey participants who were Langs' volunteers were "very satisfied" with the opportunities to: learn new skills; contribute in a meaningful way; and meet new people (Langs, 2004a). Responses from focus group participants indicated that the aspects of volunteering that held importance for them the most included: the connection to others, the development of skills (and in some cases to gain employment skills), a sense of contribution, and feeling their involvement meant the organization had direct input from the community. Focus group participants also reported that volunteering builds self-esteem and self-confidence (Langs, 2004b). Further emphasizing the importance of volunteerism in Langs' 2004 e-survey was feedback provided by the Cambridge and Regional Partners who regarded volunteers one of the community strengths (Langs, 2004c).

The concept of connectedness was measured specifically in the community subscale, however, the importance of social networks and social support to Langs' participants and patients was consistently communicated by key informants throughout my presentation. This was evidenced by comments including, *"The Langs' group have a better quality of life because of social networks and support"* and *"They (Langs' participants) meet people (through) volunteering and this increases your feeling of belonging and being connected."* It appears as though the sharing of personal effects (clothing), contributing valuable time and energy through volunteerism, enrolling children and youth in Langs' programs, and participating in adult programs themselves (to either gain employment skills or simply to connect with others), provides opportunities to establish, develop, and strengthen personal relationships.

The final subscale to be discussed with the group of key informants at the presentation was that of social programs and conditions. This subscale's components for measurement

included: children and youth, basic needs, affordable housing, wealth distribution, and daycare. The group agreed that Langs offers many ongoing programs for children and youth (e.g. *Breakfast Club*, *Lunch Drop-in*, *Early Years Drop-in*, *Leader-in-Training* and summer, March break and P.A. day programs). There is a broad range of regular programs for all ages as well as specialty programs such as: the diabetes educational program; a wellness program for older adults; a healthy living program; and individual, family, and couples counseling. One key informant noted that, *"Also there is no cost associated with the programs and if there is one, it's very minimal and they can afford to have their children in programs and if they can't afford it, subsidies are available."* This comment is in alignment with results from the 2004 Satisfaction Survey whereby 87.3% of survey respondents stated that they did not experience barriers (e.g. accessibility, transportation, costs) to using Langs' programs and services (Langs, 2004a). With regards to the daycare measure, one informant indicated that in addition to the child daycare at Langs there is also daycare available in the neighbourhood. *"The Kinsman Centre is a licensed daycare which is next to Coronation (Public) School, so that may influence the response from the surveys"* (Q23. Do you feel that there are adequate daycare facilities for you and the families in your neighbourhood?).

Continuing with the social programs and conditions subscale findings I asked the group what Langs could offer that would affect participant's basic needs. *"Well there is a clothing giveaway four times a year"* one person responded. Also (that), *"The clothing giveaway in programs is also informal. Someone will say, 'You know I don't need this anymore, do you want to take it?' People aren't afraid of giving or taking (kid's clothes) regardless whether they are in the low income or high income. As parents, we know kids rarely wear out their clothes."* Another informant then stated (that there are), *"Links to the food bank. We have the*

Langs' bus that takes people to the food bank and brings them home" adding, *"help is here if people need to go to the grocery store so that you don't have to pay for the taxi or the bus."* One person indicated that there was an outreach worker whose job it is to assist Langs' participants with access to food (e.g. grocery vouchers) when needed. The outreach worker also helps families with shelter, clothing, counseling, child care, and transportation.

With regards to the housing component of the social programs and conditions subscale, although there was no input from the group of informants, Langs' executive director later provided insight as to how Langs' programs or services could impact housing for community residents. Bill informed me that Langs offers referrals and links to housing programs; this includes helping residents fill out application forms and assisting them with the process of applying for subsidized housing. In order to make the service more accessible to families in the community, Lutherwood (a not-for-profit organization that provides mental health, employment, and seniors services to residents throughout Waterloo region), which is one of Langs' community partners, sends a housing worker onsite at Langs. Finally, Langs provides services of the medical clinic to the homeless population (B. Davidson, personal communication, July 07, 2006).

What can be concluded by the results of my quality of life study is that Langs is an important community resource for affecting quality of life for community residents who take advantage of the programs and services it offers. Thus, it is my view that the mediating characteristic of Langs that affects resident's quality of life is how the social determinants of health are addressed through its programs and services. By focusing on the social determinants of health approach at the community level, Langs successfully ameliorates the conditions that negatively impact quality of life for its participants and patients.

Discussion

It could be reasonably asserted that overall, the Langs' group of survey participants was a more vulnerable group compared to the non-Langs' group due to the status of their relationships, living arrangements, and household incomes (Statistics Canada's low income cut-off for a family of four in 2005(a) was $27,190). Yet despite Langs' participants reporting substantially more widowed, separated and/or divorced persons (20% versus 3% for non-Langs), more single parents (21.5% versus 9.2% for non-Langs), and more people living in poverty (30.8% with an annual household income of less than $30,000 compared to only 7.7% for the non-Langs' group), Langs' participants reported higher quality of life than those in the non-Langs' group on three out of 11 survey subscales including: culture; community; and social programs & conditions. Participants in the non-Langs' group reported higher quality of life than those in the Langs' group only on the work subscale. When considering that the work subscale posed questions about: job security; wages and benefits; employment opportunities; job satisfaction; and training and upgrading and that the non-Langs' participants reported higher household incomes, this is not so perplexing. It is likely that more of the non-Langs' participants are employed and have higher paying jobs making the questions on the work subscale more applicable to their employment situations.

According to the social causation model, health is seen to be negatively affected by changes in marital status. Because of the decrease in material resources brought about through dissolution of marriage, the health (and likely quality of life) of separated and divorced persons is negatively affected (Wyke & Ford, 1992). When considering the number of widowed, separated and divorced people in the Langs' group of participants, the survey results are interesting to say the least. I would not have been surprised if the Langs' group

reported poorer QOL considering that they have less income, fewer material resources, and quite possibly more stress.

Seven out of eleven survey subscales did not indicate any group differences (of statistical significance). These seven subscales included: education; personal well-being; environment; economy; transportation and infrastructure; health; and family, friends, and connections. When analyzing these results my initial reaction was to attribute lack of group differences to poor internal consistency for the individual subscales. However, a review of Cronbach's alpha coefficients for the subscales did not confirm my assumption; group differences that were statistically significant were indicated for two subscales with questionable to poor reliabilities and no group differences were found on three subscales with good to excellent reliabilities (see p. 63 for alpha coefficients). Questioning the concept of internal consistency and its existence in surveys led me to conduct a limited investigation of scale reliabilities of quality of life and health related surveys. From this investigation I made an alarming discovery: many of the standardized measurement tools for health and quality of life demonstrate fair to poor reliability yet they continue to be used in current research. For instance, in a test-retest of the *Rand Social Health Battery*, overall coefficients ranged from 0.55 to 0.68; the *Four Single-Item Indicators of Well-Being* survey demonstrated overall coefficients in the 0.07 to 0.57 range; the *Health Perceptions Questionnaire* had two subscales with poor reliability (0.59 and 0.60); and alpha coefficients of subscales on the *Duke Health Profile* ranged from 0.55 to 0.78 (McDowell & Newell, 1996).

Considering that both groups of participants for my study were drawn from the same neighbourhoods in Cambridge, perhaps it should not be so surprising to me that there were no group differences on the subscales for education, environment, economy, transportation

and infrastructure. After all, these community residents have their children attend the same schools; they are exposed to the same environmental conditions (quality of water and air); they receive the same waste management services (garbage disposal and recycling); they pay approximately the same amount for basic needs (groceries and electricity); they have use of the same walking paths and trails; and they have access to the same public transit system.

With regards to the personal well-being and family, friends and connections subscales, I find the lack of differences between the two groups difficult to explain. Especially considering that the Langs' group of study participants consisted of more: single-parent families; individuals who were separated or divorced; people who were widowed; single individuals; and more people surviving on low incomes. The differences in means for these subscales were barely negligible to modest (see p.92). I thought it would be more likely that these participants would report compromised quality of life; particularly on the personal well-being subscale. This subscale posed questions about opportunities for leisure activities; opportunities to enjoy oneself; access to good food; sense of control; and personal satisfaction. Upon further reflection it occurred to me that it is possible that the programs and services offered by Langs may affect quality of life for it's participants and patients on these dimensions to bring them (almost) up to par with their neighbours.

Family and friends was reported as the number one contributor to quality of life by both groups (Langs – 64%; non-Langs – 69%) and was ranked first overall (67%). Once again the importance of personal relationships to quality of life is evident as 19% of the Langs' group and 29% of the non-Langs' group (23% overall) reported family as meaning 'quality of life' (Q1), once more indicating that study participants shared similar values. If study participants

did indeed share similar values it could provide a partial explanation for lack of group differences on the family, friends, and connections subscale.

The lack of significance on the health subscale could partially be explained by the perception that the Langs' and non-Langs' groups share similar health care experiences and values. This notion of commonalities and shared values is illustrated again through an examination of the responses to the qualitative survey questions. When survey participants were asked to list the three things that contributed to their quality of life in rank order (Q3), health received the third largest number of responses for the Langs' group (36%); it received the second largest number of responses for the non-Langs' group (45%); and was ranked second overall (40%). Additionally, when participants were asked what the term 'quality of life' meant to them (Q1), 31% of the Langs' group and 42% of the non-Langs' group (36% overall) mentioned health. The chi-square goodness of fit test added additional support for the idea of shared values as no group differences for the open-ended questions were detected. My health subscale was not solely concerned with health status; questions were posed about the health care system (Q29 – access; Q33 – universal health care). In a review of Langs' 2004 Satisfaction Survey the idea that community residents in the Langs' catchment area share similar values emerges in their views on health care standards. The survey indicated that Langs' health centre patients reported similar frustrations of primary care service delivery across Canada: long wait times for regular and urgent appointments and a lack of continuity in care from primary caregivers (Langs, 2004a; Romanow, 2002).

It is likely that through an affiliation with Langs a "psychological sense of community" is created. That is, participants are benefiting from membership in the community, fulfillment of their needs, and a shared emotional connection (McMillan & Chavis, 1986). This sense of

community and sense of belonging which is mediated and promoted by Langs through the programs and services it offers has been linked to self-reported general health, mental health, and well-being in others (Davidson & Cotter, 1991; McMillan & Chavis, 1986; Statistics Canada, 2005).

Since Langs serves many low-income and working poor families who experience chronic stress arising from lack of resources, there are obvious benefits than can be derived from the social support and social networks available at Langs. Social support has been shown to buffer against the psychological consequences of economic stress which can in turn affect health and well-being (Whelan, 1993). This may also explain at least in part (connectedness measure) the differences observed in the quality of life scores between the Langs' and non-Langs' group on the community subscale.

Limitations of the Study

Measurement tool. My first attempt at measuring quality of life for community residents in the Langs' catchment area indicated a positive relationship between Langs' group membership and quality of life scores. However, a stronger relationship may have been detected had I measured amount of time spent attending a program and/or receiving services at Langs. It is quite plausible that the longer the involvement or affiliation a community resident has with Langs, the greater the benefit to that resident. Lack of validity and reliability for the survey could have affected the strength of the results as well. Weak validity (11 factors accounted for only 63% of the variance) could be a result of two things: not having designed the measurement tool specifically for the Langs' population, and error in development of particular questions.

In future, a more thorough development of the subscales would be warranted with the hope that improved internal consistency and validity would result in a measurement tool that consistently accesses the five specific concepts of each of the QOL constructs (subscales). Additionally, it occurred to me that by utilizing concepts solely from a national quality of life project, I very likely omitted measuring facets of QOL that were representative of the concerns of residents living in the Langs' neighbourhoods. This could have been avoided, at least partially, had I piloted the measurement tool and made appropriate revisions before conducting the complete study. Unfortunately a pilot was not possible due to time constraints.

Validity. Factor analysis results demonstrated that several of the items were measuring more than one concept with survey items (variables) loading highly on two or more factors. By examining the rotated component matrix I dropped questions whose factor loadings were lower than .300 and reran the factor analysis. This increased total variance only modestly from 63% to 68%. An examination of the results of my original factor analysis directed me to consider certain adjustments to the measurement tool itself should I wish to revise it and use it again in the future. For instance, all items with the exception of one (Q14) from the community subscale loaded highly onto factor 5. Q14 from the community subscale (*In the past 4 weeks, have you felt that the neighbourhood you live in is safe?*) loaded highly onto factor 6 with four items from the environment subscale. It is likely that the idea of neighbourhood safety is related to other environmental concepts; I would move Q14 to the environment subscale since this item addressing the concept of neighbourhood safety may be more relevant to the environment construct.

In one instance all of the items from the family, friends, and connections and personal well-being subscales loaded highly onto factor 1. Since both constructs for factor 1 measured various concepts related to personal aspects of relationships and well-being, I would rewrite the questions and create a new subscale which would hopefully resolve this issue. Three items from the social programs and conditions subscale (Q20, Q21, Q22) loaded highly onto factor 9 along with one item regarding leisure time (Q34) from the personal well-being subscale. Since Q34 loaded onto another factor with other items from the personal well-being subscale, this item is measuring more than one construct. In this case Q34 needed to be tweaked to better access the concept of leisure activities.

Question 19 from the social programs subscale (*In the past 4 weeks have you felt that there are a sufficient number of programs available to children and youth in your community?*) loaded highly onto factor 5 with other items from the community subscale. Q23 of the social programs and conditions subscale (*Do you feel that there are adequate daycare facilities for you and the families in your neighbourhood?*) loaded modestly high onto the questions in factor 5 as well. Since Q19 asks about programs in the community and Q23 asks about daycare facilities in the community, it would be best for me to revise this item by combining both of these concepts (children and youth programs along with daycare facilities) with another item in the community subscale. I would then attempt to measure a different dimension of social programs and conditions by rewriting Q19 to replace the previous item that was combined with the community subscale.

With regards to the health subscale, one item which was related to physical health satisfaction (Q30) loaded highly onto factor 10. It may be best for me to eliminate Q30 by combining this item with another personal well-being item from factor 1 since the constructs

are closely related; I would then rewrite another question to replace it on the health subscale. Q29 (health care access) and Q33 (free health care and improved health) from the health subscale loaded highly onto factor 11 along with one item from the transport and infrastructure subscale (Q53). Q31 (feelings of sadness) and Q32 (engagement in physical or social activities) from the health subscale did not load highly onto any factor therefore I would drop these items from the subscale and tweak the questions in order to better access their particular concepts of the health construct.

All items from the personal well-being subscale loaded highly onto factor 1. Q37 (sense of control) and Q38 (overall personal satisfaction) loaded highly onto factor 10 as well indicating that these items are measuring more than one construct. These questions need to be rewritten in an attempt to better access the particular concepts under the personal well-being construct. All items from the environment subscale loaded highly onto factor 6 with the exception of Q43 which loaded highly onto factor 4. Rewriting a question to replace Q43 on the environment subscale and replacing the concept to be measured would probably be my best course of action. Three questions from the economy subscale loaded onto factor 8. Two more questions could be written to replace Q47 & Q48 to better reflect dimensions of economy that are relevant to Langs' community residents (as opposed to the current concepts which may be more related to employment and income than economy).

The transport and infrastructure subscale had two questions loading highly onto factor 10 and one loading onto factor 3. In future I would consider replacing this construct entirely. In CPRN's project, "transport and infrastructure" was ranked 15th out of 17 indicators in terms of importance as a QOL contributor. This ranking would indicate that it is not considered important to Canadians as affecting quality of life and may not be relevant for Langs'

residents as well. I am concerned that this determinant is not yet well researched or understood as a review of the SDOH literature revealed only one article discussing the effect of "transport" on health (McCarthy, 2006). In this article the aspects of transport that are examined and considered to affect health and well-being include: exercise benefits of cycling; the effect of air pollutant emissions on respiratory health; and the exposure by age to accidents for pedestrians, cyclists, and drivers of vehicles. These are not the transport concepts that I attempted to access; further investigation is required into this SDOH. Only two items from the education construct loaded highly onto factor 7 with the remaining three items (Q56, Q57, Q58) from this construct loading highly onto factor 4. This would indicate that a revision in the dimensions of the education construct is required to produce better interrelationships amongst these survey items.

Although factor analysis can give direction to aspects of my survey that require revising to improve construct validity, it is only one part of the solution for improving the measurement tool. When I first decided to use CPRN's Quality of Life Indicators Project as the conceptual basis for my study, I contacted the writer of the study's major report paper, Dr. Joseph Michalski. I asked if I could have access to more detailed information about the project; most particularly the coding methods and perhaps even the actual coding reports. I was informed that the data was all packed away from a recent move and was not accessible at that time. It was my impression that knowing exactly what types of data were coded under the themes and subthemes would help me to devise my own survey questions. Without this key information I linked what I knew about specific elements of SDOH with QOL concepts to the various subthemes from CPRN's project. I then devised questions that I hoped would access these specific QOL domains. However, as demonstrated by the results of my factor

analysis, it is almost certain that some of my survey items didn't pose questions in a manner that targeted the intended dimension of a construct. As an example, under the "social programs and conditions" theme with the subtheme "housing affordability," my survey asked, "Are you aware if there is affordable housing in your area?" (Q21). It is likely that the participants in CPRN's project identified affordable housing as a contributor to quality life whereas I simply asked if it existed in their community. The difference here lies in identifying the existence of a particular contributor to quality of life outcomes in one's neighbourhood, versus measuring the availability and usage of this QOL contributor for my study participants and the resultant effect on their QOL. After I had collected my data I once again contacted Dr. Michalski requesting more information, without success. It was my hope at that time that I could use information from CPRN's project to assess the strengths and weaknesses of my QOL measurement tool.

Reliability. As with many original measurement tools, mine lacks reliability on several of the survey subscales (poor internal consistency was indicated by low Cronbach alphas for community, health, environment, and transport and infrastructure subscales). In order to have a high level of reliability it is suggested that a subscale should be measuring only one dimension of a single construct. In questionnaires that measure health for instance, it is noted that it would not be reasonable to expect a high level of internal consistency if the measurement covers several dimensions of health (McDowell & Newell, 1996). Each of my survey subscales attempted to measure five dimensions of 11 individual constructs which could mean that the likelihood of obtaining perfect internal consistency on all subscales is near impossible.

My study was quasi-experimental and an appropriate community comparison group was chosen. However, as in much of community research there is always the issue of other influences or confounding factors that could have contributed to quality of life of my study's participants. It is near impossible to control for *all* factors. Thus, there is the issue of possible pre-existing differences between the Langs' and non-Langs' groups that I was not aware of that could be factors contributing to improved (or a deterioration of) quality of life. A more in-depth examination of the population would be required in order to clarify whether unknown variables are masking potential effects.

Excluded information. It would have been helpful to have known the sex of participants in this study. Unfortunately this was not an oversight on my part but rather a conscious decision to exclude what I thought at the time to be irrelevant information. My undergraduate education taught me that it was becoming politically incorrect to compare males and females in studies because by doing so, we would be asserting a belief that one sex must be superior (in some way) over the other. What I neglected to comprehend was that most of the studies referred to in my undergraduate education measured a particular aspect of cognition or behaviour as opposed to an individual's health status affected by social and economic conditions. I had already begun administering my survey and was conducting another review of the literature when I discovered my error in omission: differences (and the causes of these differences) between men and women's health had been established in health-related research (Grant, 2004; Statistics Canada, 2003). For instance, it is known that when either an immediate or extended family member (e.g. senior parent) becomes ill, it is the woman in a household who most often cares for the sick individual. This enormous amount of time and energy dedicated toward caring for a family member detracts from the health and quality of

life of the woman doing the caring by taxing her own physical and social health and well-being (Evandrou & Glaser, 2004). I now realize that defining the sex of participants could have been useful and rendered relevant findings.

My research investigated the differences in self-reported quality of life between community residents in Cambridge who attended a local community health centre (Langs) for programs and/or services and those who did not. The findings indicated differences in the quality of life for survey scores on three subscales: culture, community, and social programs and conditions. I believe that this research is the beginning of interesting discoveries about how community health centres can impact quality of life for participants and patients, and how the social determinants of health are addressed through the Langs model. It is my view that I have begun the process of developing a survey to measure quality of life in a CHC setting that with refinement, a strengthening in the measurement tool can be achieved. This is a project that I can continue myself or can be future work for another researcher or graduate student.

A large body of research has noted the detrimental effects of compromised social and economic determinants on the health of Canadians, especially for groups of people who are more vulnerable and at-risk. Although the mechanisms or pathways through which these determinants work are not yet well understood, it has been well established that they do indeed affect health. The role of the SDOH on health has also been stated in a report on the health of Canadians by Health Canada (1998). In this report it was clearly stated that in the case of the determinants of health that they examined such as poverty and unemployment, the influence on health is direct and negative. Therefore, it would be reasonable to assert that if changes are made to improve any of these (and other) determinants, positive changes in

health and quality of life would be realized. Although the findings of my research are preliminary and should be interpreted cautiously, I feel confident that I assessed the (positive) role that Langs plays in the quality of life of its participants and patients by addressing the social determinants of health through their programs and services. Higher quality of life scores for the Langs' group was found on three survey subscales; the meaning of these results was interpreted with input from key informants in the Langs' community.

Conclusion

My master's thesis research experience has been a deeply meaningful one resulting in great insights for me as an individual and a community researcher. I took great pleasure in having the opportunity to put various community psychology principles and values into action for the first time. I discovered first-hand the value of community research and the enormous amount of knowledge contained within communities. I was impacted by the commitment of members of the Langs' community to my research and to each other. This was an experience I will not soon forget.

It is somewhat humourous for me to look back through the research process and remember how many times I excitedly proclaimed, "This is my *favourite* part of the research!" When I was designing the study, that was my favourite part; when I interviewed and hired the research team with a community member, that was my favourite part; when I trained the research team, that definitely had to be my favourite part. Then the time came to interpret the survey results and that surely was my favourite part (especially when I discovered that my hypothesis had been supported).

In early July, 2006 I attended the Langs' annual picnic with my nine-year old daughter, Alexia. When I walked onto the public school grounds where the picnic was being held I was greeted with a hug and wonderful enthusiasm from several Langs' participants I knew so well: my research team members. As I walked around with my daughter to participate in the activities, I experienced comfort at the sight of many familiar and friendly faces. Community residents carried on conversations with me as if I had been part of their community for years. By now I had become knowledgeable about the lives of many of Langs' participants. I knew whose husband just had surgery, how many children were in particular families (and in some cases knew the children), who was excited about their new job and who was looking for one. During my time at Langs I also experienced the feeling of loss when one of the great supporters of my research, a member of the community services committee, passed away.

As I drove home from Langs' annual picnic I experienced one of those rare eureka moments while contemplating my research experience. For many months I studied intently and read journal articles about various aspects of quality of life, community health centres, the social determinants of health, and community psychology. I observed psychological sense of community in action and watched as it was created right in front of me. What I failed to realize, however, was that while observing and writing about aspects of connectedness and sense of community, I had become an active participant in the process myself. I had experienced first-hand how it feels to be accepted, welcomed, and a part of a community – the Langs' community.

My research investigated the differences in self-reported quality of life between community residents in Cambridge who attended a local community health centre (Langs) for programs and/or services and those who did not. I believe that the results suggest that

Langs offers protective factors which buffer the negative effects of either living alone, living in poverty, raising children as a single parent, living as a widow, or any combination of these factors. The results of this research are important for a number of reasons. Firstly, the results reinforced my initial hypothesis that Langs is positively impacting the lives of the community residents it serves by improving their quality of life. Secondly, although somewhat preliminary, this evidence can be provided to other groups wishing to establish a CHC in their community; it could be a source of background information for their proposal to the government. Interested local community health centres can replicate Langs' success in affecting quality of life for their participants and patients through the implementation of strategies, programs, or services that fit the population they serve.

I believe it is apparent from the results of this study that Langs is affecting quality of life by providing programs and services that address the social determinants of health. We know from the literature that the social factors that are seen to be the most important contributors to health in early years are those associated with physical growth and emotional support (Raphael et al., 2003). More specifically, programs in early childhood that provide intellectual stimulation have been shown to promote cognitive development and social competence that in turn, produce positive effects that persist into later life (Friendly & Browne, 2002). Children and youth, and daycare were two components of the social programs and conditions subscale measured in my quality of life survey. In this regard Langs offers a wide variety of programs for children and youth that support young growing bodies and minds (e.g. *Early Years Drop-In, Breakfast Club, Super Snackers Jr. & Sr.,* after school homework help) that have the potential to boost health in the early years and affect long-term quality of life.

Other components of the social programs and conditions subscale included measurements for basic needs (food and housing). Like many other determinants of health, availability of food and quality of diet are linked to income (Raphael, Anstice, Raine, McGannon, Rizvi, & Yu, 2003b). When considering the issue of amount and quality of food for families living in poverty in the Langs' population (30.8% of participants reporting a household income of less than $30,000/year), we know that lack of quality food means that people are unable to get the nutrients they need for good health. According to Rainville and Brink (2001), one quarter of low income families in Canada eat less food, and half of low income families have reduced quality of food. In real terms, people experiencing food insecurity are more likely than food-secure people to suffer from multiple chronic conditions such as heart disease, diabetes, high blood pressure, and food allergies thus impacting quality of life. To address issues of quantity and quality of food, Langs provides fresh fruit and vegetables at an affordable cost through: the *Good Food Box* program; access to food through the provision of grocery store vouchers; and rides to the Cambridge Self-help Food Bank. Langs offers dietician and nutritional services as well as programs designed to deal with specific food-related health problems such as diabetes and weight control issues. It is through these programs and services that Langs is able to impact the food insecurity determinant of health and affect quality of life for community residents.

The Ottawa Charter for Health Promotion (1986) recognized that shelter is a basic prerequisite for health (Bryant, Chisholm, & Crowe, 2002) and there is agreement that several components of housing that affect health include affordability, suitability, and adequacy (p. 1). When addressing the issue of affordability, if rents are too high, it becomes difficult to cover necessities of life such as food (which can then lead to food insecurity).

Langs addresses the affordability aspect of housing by providing referrals and links to housing programs; this includes helping residents fill out application forms and assisting them with the process of applying for subsidized housing. It is reasonable to assert that Langs alleviates the stress (to some degree) associated with lack of resources by assisting families with basic needs such as food and shelter. I would suggest that this offers an explanation for the higher quality of life scores for the Langs' participants on the social programs and conditions subscale in my survey.

The community subscale of my quality of life survey contained measurements for: participation in programs and availability of resources, volunteer opportunities, and connectedness, all of which relate to some aspect of social support networks. Social support refers to types of support – emotional, instrumental, appraisal or informational, and the positive and negative aspects of this support (Berkman & Glass, 2000). Social networks include: an individual's contacts; the number and frequency of contacts; duration of time individuals have known each other; the extent to which individuals are similar to each other; and the density of the network. It is well noted in the literature that people who lack social networks and support are more likely to suffer from poor physical and mental health and more likely to die prematurely (House, Landis, & Umberson, 1988; Melchior, Berkman, Niedhammer, Chea, & Goldberg, 2003).

According to a well-established body of SDOH literature, health, well-being, and quality of life can be improved for the most at risk populations by addressing the root causes of ill-health and declines in QOL. For the purposes of my master's thesis research, the concept for QOL was derived from CPRN's Quality of Life Indicators Project (2001) and included measurements for five components each of: culture; work; community; social

programs and conditions; family, friends, and connections; health; personal well-being; environment; economy; transportation and infrastructure; and education. The purpose of this research was to determine whether or not differences in quality of life (which would be represented as higher scores on the survey) existed for community residents who attended Langs versus those of a comparison group of neighbourhood residents who did not attend Langs. Self-reported quality of life for the Langs group was better than the non-Langs group on three dimensions of the survey including: culture, community, and social programs and conditions. As a result of these findings I believe that Langs is the mediating factor in improved quality of life for the community residents who take advantage of the programs and services that this CHC offers. Langs successfully reaches the most socially and economically vulnerable members of the community: those who are single, divorced, widowed, and who live in low-income families. By the very nature of the programs and services provided to address the social determinants of health, Langs ameliorates the social and economic conditions affecting health and quality of life for its participants.

Since local neighbourhood resources are more relevant for people with lower incomes (Cohen, Mason, Bedimo, Scribner, Basolo, & Farley, 2003), the results of my study are encouraging. Although we may not yet be equipped to eradicate poverty, in the meantime we can intervene at the community level to affect quality of life and health for Canadians. This can be achieved by accessing primary health care, social, and economic programs and services delivered by community health centres such as Langs.

Implications for Future Research

According to the Ontario Medical Association, the number of Ontario residents who do not have a family doctor has risen to 1.2 million. This statistic alone indicates that there is a

need for more community health centres in Ontario. I believe there is also necessary to sustain the CHCs and the satellite CHCs currently in existence. To ensure that these CHCs continue to receive funding from the government, evaluative research is essential; this would need to include cost-effectiveness *and* outcomes research. It is the intention of the CHC program in Ontario to incorporate performance indicators into their future service agreements. These performance indicators will generate quantifiable information about program objectives including: accessibility; coordination of care; wellness and prevention; holistic approaches; and capacity building (Shah & Maloughney, 2001). What is missing from this scenario is inclusion of the measurement of health and quality of life outcomes for Ontario CHC users. CHC programs and services may perform very well in terms of cost-effectiveness, however, I think it would be valuable to measure the impact of these services on the individuals who receive them. In 2002, the Association of Ontario Health Centres posed the question, *"Community health centres – are they the best kept secret in health care?"* It is my view that my QOL research partially answered this question in the affirmative. However, the only way we can truly know is to conduct further research.

Although correlation is seen as evidence of some causal process (Evans, 2002), it does not clearly identify causation. Thus, it may be beneficial to definitively establish what the unique factors are in the Langs CHC model that account for, or contribute to, the improved quality of life for its participants and patients. Identifying these unique factors could be accomplished by building on my master's thesis research. By using a study design that includes a considerable qualitative component, rich details can be obtained from the users of Langs' programs and services that could help to distinguish these factors. Additionally, by

conducting comparison research in several other Ontario community health centres, the factors that set Langs apart from other CHCs could be identified.

Analysis of answers to the open-ended questions has demonstrated to me that Langs' community residents share similar values when they reported the top three contributors to their quality of life (Q2, Q3). The factor that both groups of participants reported most often as a contributor to quality of life was family and friends (Langs - 64%; non-Langs – 69%). Income received the second largest proportion of responses for the Langs' group (37%) and the third largest proportion of responses for the non-Langs' group (38%). Health received the third largest proportion of responses as a contributor to QOL for the Langs group (36%) and the second largest proportion of responses for the non-Langs' group (45%). When I looked at these results and compared them to the quantitative results, I was reminded of a huge banner that hangs on the wall of my daughter's school: *"We are all different. We are all the same."* There are observable differences in demographics and specific domains of quality of life between the two groups, yet there are similarities as well. In hindsight, it occurred to me that I neglected to seek input on the subscales where no group differences were found. Rather I sought and received input only on the subscales where QOL scores were higher for Langs' participants (culture, community, social programs and conditions). It is my assertion that had I presented (the five domains of) each construct (subscale) to the key informants in June, 2006 I would have been in a better position to tease apart the similarities and differences between the two study groups. In future I would ask for input from key informants on all QOL measures. In this way I could attempt to more fully understand all of contributors to better QOL and determine how and why study groups are similar.

Based on my master's thesis research I have begun formulating a *Community Psychology Model of Quality of Life* that I would like to continue to develop. It would be my hope that once completed, this QOL model could further inform our understanding of the quality of life construct from an ecological perspective. Finally, if presented with the opportunity, I would like to further research the relationship between the social determinants of health and quality of life. Carrying out my thesis research triggered a curiosity about SDOH-QOL that I don't currently have the time to explore. As a preliminary exercise I devised a table (Table 8) comparing the concepts of QOL identified by Canadians in CPRN's 2001 Quality of Life Indicators project (Wyman, 2001) with the social determinants of health most commonly identified in the literature (Raphael, 2004a). The purpose of constructing this table was to demonstrate that SDOH and QOL are both multidimensional constructs with shared components.

Table 8

Commonalities of QOL Contributors and SDOH Concepts

Quality of Life	Social Determinants of Health
1. Education	1. Education, literacy
2. Income	2. Income and its distribution, income security
3. Family, friends, connections, personal relationships, social support	3. Social support networks
4. Early childhood education	4. Early childhood education and care
5. Employment	5. Employment and working conditions, Unemployment, and employment security
6. Nutrition, food/diet, personal well-being	6. Food security
7. Social programs/conditions	7. Housing, housing affordability
8. Health, health care services and access	8. Health, health care services and access
9. Environment, community	9. Environment, community
10. Culture	10. Race, ethnicity
11. Economy	11. Economy

Dissemination Plan

It is my goal to have approximately 100 copies of a small booklet printed (10 pages) in order to share my research experience and results. This will include sending a copy of the booklet to specific people who have displayed an interest in my project and people and/or organizations that can benefit in some way from the results. I can also include the booklet with my resume when applying for jobs in the future.

The executive director at Langs had informed me some time ago that a synopsis of the research and results could be posted on Langs' web site. Bill is also going to approach the Association of Ontario Health Centres about placing a link to my study on their web site. In this way, interested parties can obtain either a copy of the booklet or a more comprehensive report depending on their needs. I also plan to submit an application to present at the: 2007 conference of the Canadian Psychological Association in Ottawa; the 2007 Quebec-Ontario Conference in Community Psychology; and the 2007 conference of the Association of Ontario Health Centres. I think this is an effective way to share information (namely my research results) with large groups of people and improve my presentation skills at the same time.

To ensure that all of those involved in the project and the residents of the community have the opportunity to learn about the research results, I will be supplying a copy of my printed booklet to all individuals who were involved in the project (research team members, key Langs' staff) and placing a notification to the general through a public service announcement in the Cambridge newspaper. Since the Regional Municipality of Waterloo Department of Public Health has a Health Determinants Planning and Evaluation Unit, I will send them a copy of my booklet as well. Community and research organizations I have

targeted to receive my booklet so far include the Wellesley Institute, the Canadian Policy Research Network, and the Federation of Canadian Municipalities. Finally, with Dennis Raphael's permission I will post a synopsis of my research and the findings on the Social Determinants of Health listserv. In this way I can share with colleagues and interested individuals or organizations will have contact information for me should they require more comprehensive information.

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Appendix A

The Benefits of Community Development at Langs Farm Village Association

THE BENEFITS OF COMMUNITY DEVELOPMENT AT LANGS FARM VILLAGE ASSOCIATION

Bill Davidson

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Characteristics of Langs Farm Village

Langs Farm is a densely populated neighbourhood with a high concentration of social and economic needs. Research studies conducted have identified the area to be one of high family distress with above average numbers of youth, social assistance recipients, single parents, and residents living in assisted housing. The average family income in the Langs Farm community is 20% lower than the Cambridge average and a high proportion of residents do not have a high school education. The target area is made up of two assisted housing projects, a large number of townhouse units, apartment buildings, a few semi-detached homes and a senior citizens complex. Another significant risk indicator in the Langs Farm community is social isolation. Many residents in the community must rely on public transportation in order to access services located in central parts of the city. Childcare is also a barrier to participation for many families who have four or more children. Other areas for concern include: neighbourhood improvement; safety; lower than average labour force participation; high percentage of multicultural families; high mobility; and a lack of access to health care services.

Overview of Services

In the Langs Farm community development model, the principle, "community based", refers to where services are delivered. Langs Farm currently operates two community centres, a Family Resource Centre and a Youth and Teen Community Centre that provide a vehicle for social integration and community participation. What makes these centres particularly unique is the fact that they are located in the same townhouse complex where people live. The Family Resource Centre acts as the main office and a homebase for a variety of preschool and adult programs that reduce personal isolation, create mutually supportive environments and promote wellness. Preschool programs provide stimulation, encourage healthy child development and enhance school readiness. Adult and parenting programs use a self help approach to increase competence and self esteem.

The association's Youth and Teen Community Centre is unique to Waterloo Region. The centre originated as a Youth Drop-In Centre in a storefront facility and evolved to become a multi-service centre with a variety of social, educational and vocational programs. The centre is now located in a townhouse that is provided in-kind by the local Housing Authority. Unstructured programs such as drop-in times at lunch, afterschool and evenings have engaged in excess of over one hundred different youth a week. The centre is furnished with a foozeball table, pool table, microwaves, televisions, computers, and casual furniture. The informal environment of this centre combined with the feeling that the group has its own space, creates an atmosphere of trust and acceptance. Once youth have participated in unstructured programs they are also more receptive to other types of services. These types of programs have included: Making Choices, a life skills program for preteens; Stay In School and Alternative Education programming that decreases the likelihood of dropping out of school; Work Encounters a program funded by the federal government to introduce teens to work experience; the Breakfast Club and Super Snackers that encourage healthy eating habits and good nutrition. Other more structured recreation programs such as: Gym Drop-In, Youth Nite Out, and summer playground programs are operated out of schools.

Prevention

Prevention is "an active, assertive process of creating conditions and or personal attributes that promote the well being of people" (Lofqquist, 1983 pg 2). Langs Farm fulfills its prevention mandate in two ways: by creating leadership opportunities for residents to increase their self esteem and self confidence; and by providing education programs within a recreation/leisure framework that reduce stress and the likelihood that greater problems will develop. Robert Schmidt of Waterloo Regional Police comments on the economic benefits of providing prevention programming: "We've noticed a considerable delinquency decrease in the Langs Farm area since the community centre opened" (Langs Farm Village Association and Lutherwood, 1988). Social support, leadership development and providing accessible resources are vehicles that provide positive social, emotional, cognitive and practical supports required to reduce the impact of living in a high risk community.

Social Support

Social support is an essential feature of the enabling process in the Langs Farm model. Change in lifestyles, family structure and social values have led to a weakening of primary support networks. Individuals and families, young and old are experiencing increasing levels of stress and are struggling in isolation with a sense of helplessness. The professionalism of human services makes it difficult for community residents to access helping agencies because of feelings of intimidation, as well as the barriers of cost, childcare and transportation. Therefore, the organization works with the assumption that participation in neighbourhood based programs makes the environment less stressful for families and children.

Supports can be formal or informal and can include: providing home visits, childcare or transportation, information or material aid. Basic personal and family needs are also addressed by the process of resource counselling in which residents are linked to other neighbours, churches and agencies, by association staff. One resident describes how the organization meets her social support needs: *"Langs Farm has been great. I don't know how I'd get along without Langs. I get really down in the dumps sometimes, so I come here and I feel better. My kids like it too."* Involvement in the neighbourhood organization has helped to restore a sense of belonging in the community and facilitates a return to the traditional helping networks of friends, families and neighbours. Langs Farm has also been able to expand its original catchment area to integrate two neighbourhoods, which has resulted in the creation of social networks among people from different economic backgrounds. This has also helped to eliminate the perception of services for the rich and the poor and reduce the negative stigma associated with the target area. It has been the experience of the neighbourhood organization that the development of a social support network empowers residents to take on leadership roles within the organization, which will be discussed in the next section.

Leadership Development

Residents also receive social support through their volunteer work. As an example, Sylvia has been involved with the neighbourhood organization for seven years. She began by bringing her children to preschool programs and doing some volunteer work in programs. Eventually she joined a committee which oversees these programs and she now serves on several committees and facilitates a Take a Break program, as well as a coffee morning for neighbourhood parents. Sylvia

describes her experience as positive: *"I live here. I need to be with adults. It's hard to be with little kids all day long. I've worked lots of long hours as a volunteer and I've had lots of good and different experiences."* Leadership development is the most critical component of the enabling cycle and can be described as a systematic, evolutionary process. Outreach conducted by door knocking, or by establishing personal contact with a parent like Sylvia who has a child in a program, is the first step in the organizations's continuum. The model strives to build on the strengths and capacities of individuals which becomes evident in leadership development. Volunteers often take on small tasks initially such as delivering the association's newsletter or answering the telephone. Once volunteers feel comfortable in the organization they take advantage of the opportunities to develop increased communication, problem solving and decision making skills and then are ready to take on new challenges. From experience, the association has identified two courses of action in which volunteers progress through a series of stages to develop leadership skills. Many residents choose to become involved in a service capacity, which may range from assisting with a program, to taking full responsibility for its planning and implementation. Others may become involved with committee work which provides them with the necessary skills to become a board member. Often, board members are approached to become consumer representatives on other committees or boards such as the Community Action Program for Children and the local Housing Authority. Some residents have even taken on both roles.

Since the implementation of this model in 1993, volunteer involvement has continued to increase. In 1994/95, 150 different residents contributed 7,258 volunteer hours to the association, representing an increase of 15% over two years. The organization, like its community partners has also had some success with the use of peer workers. Peer workers have taken on a variety of roles including conducting outreach, obtaining F-class license to drive the association's van, operating special events such as clothing swaps and leading programs. In some of these instances, peer workers have gone on to become employees of the association, which is a goal of the model. While residents can become involved at any point on the continuum, it has been the experience that the residents who succeed to this level have progressed through the various phases of the community development process.

Community Partnerships

Another benefit of the Langs Farm model is its ability to work in partnership with other systems. The neighbourhood organization has a strong history of collaborative planning and programming with other service providers such as the City of Cambridge, schools, the Community Health Department and the Community Opportunities Development Association (CODA). Through the provision of a rent free townhouse unit, the South Waterloo Housing Authority recognizes the significant role the association plays in supporting families who occupy their subsidized housing units. The City of Cambridge provides funding for a part time recreation worker to provide accessible programming for children, youth and teens who otherwise have limited opportunities to participate in recreation programs. The municipality has developed a Support Services Policy to Neighbourhood Associations which has been adopted by City Council. Councillor Karl Kiefer, acknowledges the benefits of this approach: *"I know that because of the hard work and enthusiasm of the association volunteers and workers that much more money has been saved by the City than it has invested."* Local school support is evidenced in many ways. School principals sit on committees or the Board of Directors. Schools promote the neighbourhood organization programs to their students; provide space in their school newsletters, conduct parent interviews at the community centre and provide the use of gymnasiums in kind for

youth programs. Staff of the Behaviour Resource Team of the Waterloo County Board of Education have worked collaboratively with neighbourhood organizations to develop joint funding proposals; provide support for at risk students and plan professional development opportunities.

A strategic direction of the association is to establish partnerships with agencies and organizations to maximize resources and diversify services. To this end, the leadership development model facilitates community partnerships that are participant directed, as opposed to being professionally prescribed. When a potential partnership is identified, it is proposed to the organization's program committee. Often representatives from other agencies are asked to appear as a delegation to the committee to describe the partnership. Residents are then able to ask questions about the agency's approach to service delivery and how the agency will overcome barriers such as cost and childcare. Once accepted by the committee, partners are asked to enter into an agreement with the neighbourhood organization.

The decentralization of services ensures that residents have access to a wide spectrum of programs and an increased knowledge of what is available in the community. Agencies also experience an increased receptivity to their services when their work is combined with the neighbourhood organization. For example, teens in the neighbourhood have developed a different perception of the Waterloo Regional Police, through their involvement in joint sports activities. Police officials have recognized this work as an effective way to meet the objectives of community based policing. Residents now recognize that the mandate of Family and Children's Services extends beyond child welfare by combining resources to implement joint summer and March Break programming.

Service providers have also come to rely on partnerships with neighbourhood organizations as a valuable way to reach participants. Joan completed her high school education through a self study program offered by the school board at the community centre. Betty, a single mother of two children was successful in obtaining employment with the help of Langs Farm. Through volunteering as a receptionist and with the Breakfast Club, her self confidence and self esteem improved. The availability of Opportunities Planning (a program operated by the Community Development Association to help individuals on social assistance find or create employment) and a Job Kiosk located in the centre combined with a supportive environment, enabled Betty to find work. (Cambridge Neighbourhood Organization, 1996)

Today, no partnership opportunity is overlooked by the association. The development of community partnerships has been instrumental in the organization's success in launching new initiatives such as the Community Economic Development Project and the Community Health Centre.

Community Economic Development

The social support needs of individuals cannot be viewed in isolation of economic needs. The Langs Farm Community Economic Development Project is a joint initiative with the Community Opportunities Development Association with the goal of creating job opportunities or developing a community owned business. A Community Economic Development (CED) Advisory Committee consisting of residents, service providers and neighbourhood staff gives direction to the project. While the process is still in the preliminary stages, much has been

accomplished including: the design and implementation of 135 CED surveys and 137 market research surveys; a successful public meeting involving 50 residents; the implementation of a variety of workshops and a used toy sale. The next step in the project is to offer community residents life skills, computer training and small business development workshops through the establishment of an Employment Resource Room in the community centre.

Community Health Centre

Recently the association was successful in its application to the Ministry of Health to establish a Community Health Centre. The need for neighbourhood based health care services was identified in the association's strategic plan. To develop the proposal, the association invited a variety of community partners including the District Health Council, the Waterloo Regional Health Unit, Cambridge Memorial Hospital, the YWCA and residents. A summer student was employed and with assistance from community residents completed a community health needs assessment. Participants were engaged in a process to define a variety of community health centre programs and services to meet the goal of "providing a range of health care services to neighbourhood residents including health promotion, disease and illness prevention, education and treatment services."

The Community Health Centre will be staffed with a physician, nurse practitioner and health promotion co-ordinator. In addition, the centre will provide residents with access to a variety of specialized services such as nutrition counselling, foot care clinics and a back exercise program. The centre, like other Langs Farm programs, will engage optimum involvement from residents and community partners to develop a holistic model of health care services.

Summary

The success of Langs Farm and the benefits achieved from the model would not be possible without the support of a variety of funders, community partners and most importantly residents. The many years committed to the process and the vast array of participant driven service, demonstrate that community development truly works. The return on investment, while qualitative in nature, indicates the effectiveness of such a model. The current challenge faced by the association is to design and implement an evaluation process that measures the cost benefit of neighbourhood based programs.

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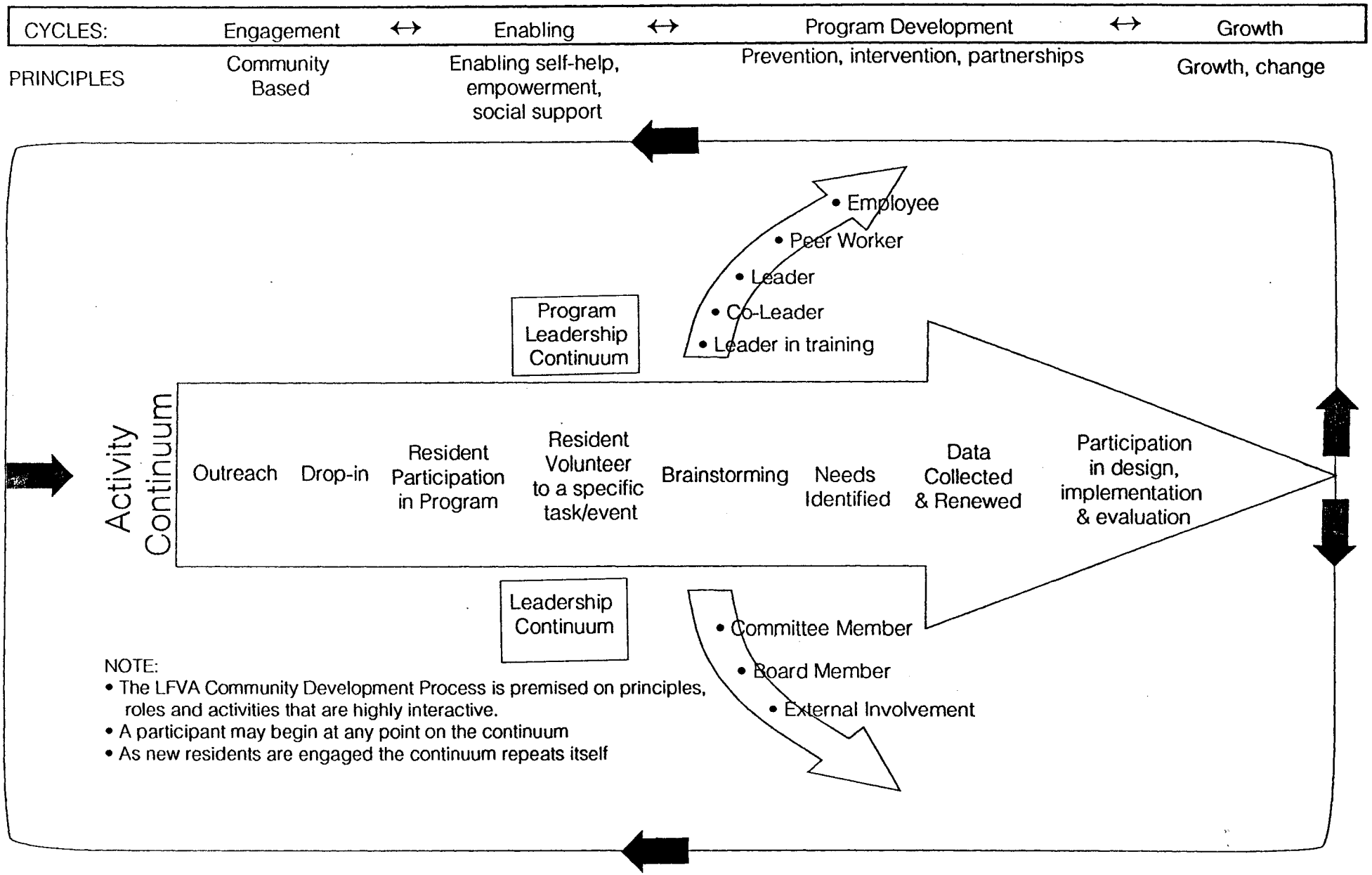
Langs Farm Village Association - Community Development Process



NOTE:
- The LFVA Community Development Process is premised on principles, roles and activities that are highly interactive.
- A participant may begin at any point on the continuum
- As new residents are engaged the continuum repeats itself

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Appendix B

Langs Farm Village Association Web Pages

Langs Farm Village Association

- About the LFVA
- Community Health Centre
- Community Services
  - Family Resource Centre
  - Youth & Teen Centre
  - The Resource Centre
  - Adult Programs
- Volunteer Positions
- Newsletters
- Staff Directory
- Contact Information
- Links

About the Langs Farm Village Association

Langs Farm Village Association is a neighbourhood organization that was formed in 1978 by a group of residents and agencies who were concerned about the community.

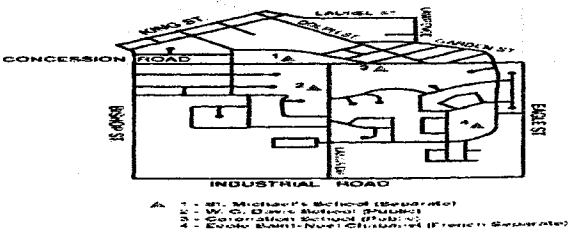
Our Mission:
Langs Farm Village Association promotes the enrichment and well-being of residents by providing high quality, supportive, and accessible programs and services for all ages.

Our Vision:
Working together to build healthy communities where residents are valued and supported.

What We Believe:

- a person's health and well being are impacted by factors such as income, housing, education and social support
- each person's knowledge, skills and experience enrich our community
- the health and well being of community residents is enhanced by their involvement in the community
- shared ownership and responsibility for the community is achieved through positive relationships among residents, staff and volunteers
- our services are welcoming, flexible and responsive to the changing needs of our community
- working together with volunteers, staff and community partners facilitates easier access to services in neighbourhood

Community Services - any community resident who lives between Industrial Drive and Concession Road and Bishop and Eagle Streets, has first priority. If



Langs Farm Village Association

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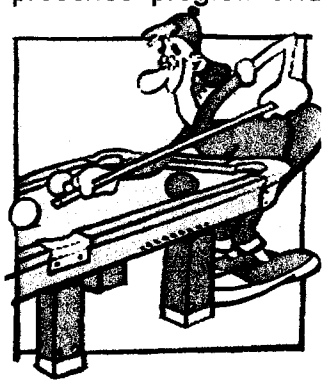
Community Services

Family Resource Centre

The Family Resource Centre offers a variety of programs and services for children aged birth to 6 years and parents and caregivers. The Family Resource Centre is located at 887 Langs Drive, Unit #1. Our family resource programs allow you to meet other parents and caregivers, learn helpful parenting tips, socialize with other adults and use the toy and resource lending libraries. You can also take advantage of our preschool program and parent/caregiver and tot drop-in program. For more information about programs and services offered by the Family Resource Centre, call 653-1470.



Youth and Teen Centre

At the Your & Teen Centre you can drop in and hang out with your friends or sign up for a variety of programs. We are located at 581-E Langs Drive. The centre offers you the opportunity to:

- Hang out with friends
- Listen to music
- Do homework
- Play foosball and pool
- Use the computer
- Talk with a youth worker

After-school, PD Day and school break programs are offered with different themes targeted for specific age groups. Leaders-In-Training and employment services counseling help to prepare young adults for the workin world. There are even drop-in programs for breakfast and lunch through the week. For more information about programs and services offered by the Youth and Teen Centre, including drop-in hours, please call 653-1263.

The Resource Centre

The Resource Centre is a multipurpose centre designed to make it easy for you to access a variety of services:

- Learn computer skills
- Get help writing your resume
- Use the computer, copier, fax, and telephone

Langs Farm Village Association

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Community Health Centre

Our Community Health Centre is located at 887 Langs Drive, Unit 1. We offer a wide variety of services to residents of the Langs Farm area. Our staff of physicians and nurse practitioners can be visited for regular family checkups, physical exams, the treatment of illness, prenatal examinations, support for those with special needs, and other services.

Our health promoters and community workers help promote good mental, social and physical health within the community by offering workshops on important health topics, and general wellness information on a one-to-one basis. They can provide support to individuals and families who are dealing with health care problems. By working with participants, they also help to create change in the community.

With the help of specialists, community partners and community health centre staff, we also offer:

- Counseling services for individuals, couples and families
- Dietitian and nutrition services such as healthy eating programs and weight control
- Breast feeding consultation services and support for moms and babies
- Access to midwives
- Programs for older adults
- Community outreach by peer workers
- Speech-language pathology services to preschoolers
- Social work services

Langs Farm Village Association
Building a Healthy Community

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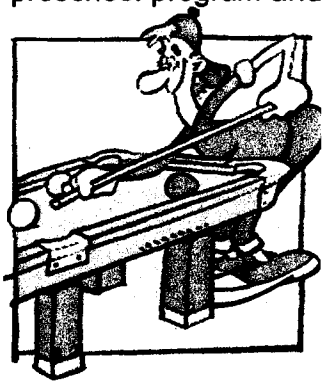

Youth and Teen Centre

At the Your & Teen Centre you can drop in and hang out with your friends or sign up for a variety of programs. We are located at 581-E Langs Drive. The centre offers you the opportunity to:

- Hang out with friends
- Listen to music
- Do homework
- Play foosball and pool
- Use the computer
- Talk with a youth worker

After-school, PD Day and school break programs are offered with different themes targeted for specific age groups. Leaders-In-Training and employment services counseling help to prepare young adults for the workin world. There are even drop-in programs for breakfast and lunch through the week. For more information about programs and services offered by the Youth and Teen Centre, including drop-in hours, please call 653-1263.

The Resource Centre

The Resource Centre is a multipurpose centre designed to make it easy for you to access a variety of services:

- Learn computer skills
- Get help writing your resume
- Use the computer, copier, fax, and telephone

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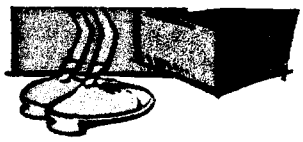
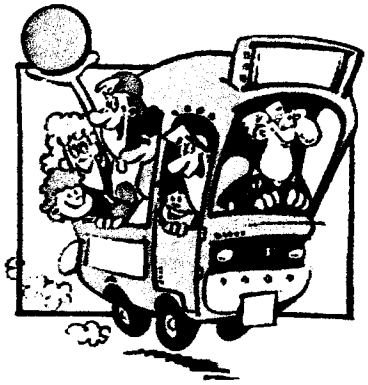


- Access the job bank
- See an employment counselor
- Get information about services, activities and support in the community

The Resource Centre is located at 887 Langs Drive, Unit #4A. For more information about programs and services offered through the Resource Centre, call 653-1182.

Adult Community Programs



Langs Farm offers a range of activities for adults including social, spiritual, educational and recreational programs. These programs are offered at a variety of locations and times throughout the week. Check out our newsletter for more information.

At our adult programs you can:

- Meet new people
- Socialize with other adults
- Develop new skills
- Learn helpful parenting tips
- Improve your health

For more information about the programs and services that are offered by Langs Farm Village Association, call our Main Office at 653-1470.

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Langs Farm Village Association

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Staff Directory

	Voice Mail (653-1470)	E-mail	Location
Bill Davidson *Executive Director*	# 236	billd@langs.org	Community Health Centre
Andrea Neilson *Volunteer Co-ordinator*	# 232	volcord@langs.org	Community Health Centre
Bridget Shea *Outreach Worker*	# 235	bridgets@langs.org	Resource Centre
Carol Culham *Clinical Assistant*			Community Health Centre
Cecile Lemieux *Medical Secretary*	# 335	cecile@langs.org	Community Health Centre
Charlene Winger *Social Worker*	# 308		Community Health Centre
Chris Dissanayake *Physician*			Community Health Centre
Gareth Milligan *Physiotherapist*			Community Health Centre ***Physiotherapy Associates of Cambridge***
Hallie Streith *Nurse Practitioner*			Community Health Centre ***North Dumfries Community***
Heather Landells *Social Worker*	# 293		Community Health Centre
Heather Papp *Families in Transition Support Worker*			Resource Centre ***Lutherwood***
Ian Ford *IT/Data Management Co-ordinator*	# 303	ian@langs.org	Community Health Centre
Jeanette Gray *Social Worker*	# 244		Community Health Centre
Jo-Ann Vickers *Nurse Practitioner*			Community Health Centre
Judy Applebee *Community Services Secretary*	# 347	recept@langs.org	Community Health Centre
Kate Calija *Administrative Assistant*	# 237	katec@langs.org	Community Health Centre
Kathryn Bennett *Family Physician*			Community Health Centre
Kendra Newman *Mentoring Co-ordinator*	# 231		Community Health Centre

Kerry-Lynn Wilkie *Health Promotion Co-ordinator*	# 234	kerrylynnw@langs.org	Community Health Centre
Kit Bresnahan *Seventh Inning Teacher*	# 321		Youth & Teen Centre
LeeAnne Kane *Receptionist*	# 333	LeeAnne@langs.org	Community Health Centre
Leslie Carson *Dietitian*	# 297	leslie@langs.org	Community Health Centre
Lisa Harlock *Clinical Co-ordinator*	# 348	lisah@langs.org	Community Health Centre
Marietta Minett *Social Worker*	# 226		Community Health Centre
Marijke Evans *7th Inning Youth Worker*	# 342	marijke@langs.org	Youth & Teen Centre
Pam Rafter *Nurse Practitioner*			Community Health Centre
Paula Carere *Nurse Practitioner*			Community Health Centre
Ronda Roy *Early Years Worker*	# 286		Community Health Centre
Rosalie Gascho *Registered Nurse*			Community Health Centre
Sabrina Kelly *Youth Employment Counsellor*			Resource Centre ***Cambridge Career Connections***
Sandra Ayerst *Community Youth Worker*	# 339	sandra@langs.org	Youth & Teen Centre
Sharon Miedema *Medical Secretary/Team Leader*	# 343	sharonm@langs.org	Community Health Centre
Shelly Johnston *Employment Counsellor*			Resource Centre ***Lutherwood***
Sherry Jain *Physician*			Community Health Centre
Siobhan Callaghan *Physician*			Community Health Centre
Sue Leal-Schnarr *Corporate Secretary*	# 240	corpsec@langs.org	Community Health Centre
Tammy Saunders *Community Worker*	# 228		Resource Centre
Teresa Lee *Community Youth Worker*	# 338	teresa@langs.org	Youth & Teen Centre

Locations

Community Health Centre
887 Langs Drive, Unit #1
Tel: 653-1470

Youth & Teen Centre
581 Langs Drive, Unit E
Tel: 653-1263

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Resource Centre
887 Langs Drive, Unit #4A
Tel: 653-1182

Family Resource Centre
887 Langs Drive, Unit #1
Tel: 653-1470

Preston Heights Community Group
350 Linden Drive
Tel: 650-2971

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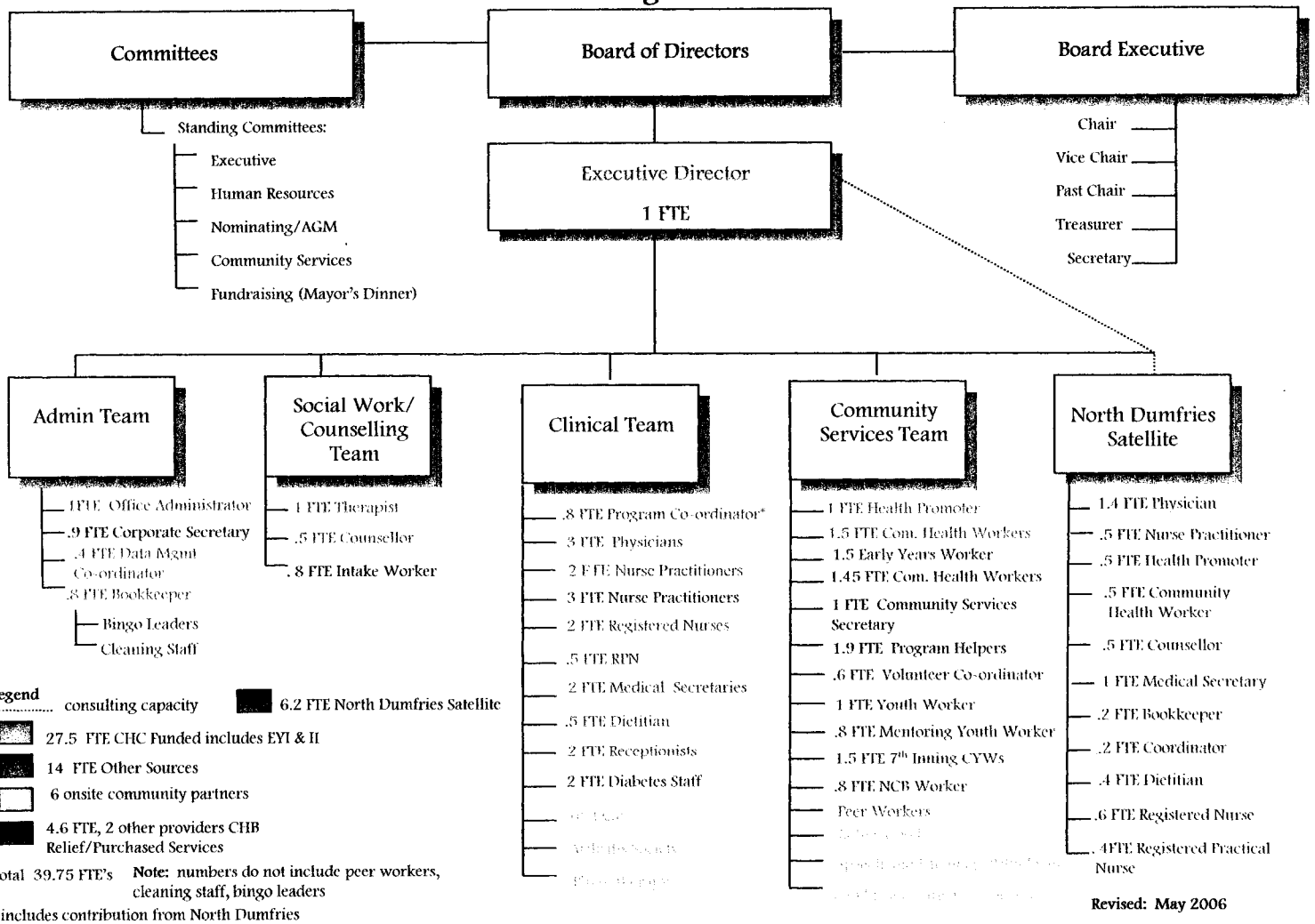
Appendix C

Team Organization Chart for Langs Farm Village Association

Langs Farm Village Association
Team Organization Chart



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Appendix D

2001 Census for Cambridge, Langs, Preston Heights, Downtown Preston, and Preston Profiles

Cambridge, Langs, Preston Heights, Downtown Preston, and Preston Profiles, 2001 Census

Prepared by Dan Vandebelt, 5nov03

Data Source: 2001 Census, Statistics Canada

Note: Statistics Canada randomly rounds counts to one of the nearest multiples of five to maintain confidentiality. As a result, of this and because of sampling and summing of sub-areas, smaller counts may not be exact and should be used with care.

Population	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Population, 2001	110372		4300	3.9%	3768	3.4%	1824	1.7%	19180	17.4%
Both sexes, total										
0-4	*7235*	*6.6%*	*315*	*7.3%*	*235*	*6.2%*	*95*	*5.2%*	*1155*	*6.0%*
5-9	*8245*	*7.5%*	*300*	*7.0%*	*305*	*8.1%*	*110*	*6.0%*	*1285*	*6.7%*
10-14	*8420*	*7.6%*	*270*	*6.3%*	*330*	*8.8%*	*95*	*5.2%*	*1220*	*6.4%*
15-19	*7830*	*7.1%*	*270*	*6.3%*	*290*	*7.7%*	*100*	*5.5%*	*1195*	*6.2%*
20-24	*7090*	*6.4%*	*285*	*6.6%*	*225*	*6.0%*	*140*	*7.7%*	*1215*	*6.3%*
25-54	*50400*	*45.7%*	*1890*	*44.0%*	*1720*	*45.6%*	*880*	*48.2%*	*8635*	*45.0%*
55-64	*8985*	*8.1%*	*370*	*8.6%*	*280*	*7.4%*	*165*	*9.0%*	*1715*	*8.9%*
65-74	*6530*	*5.9%*	*235*	*5.5%*	*200*	*5.3%*	*100*	*5.5%*	*1345*	*7.0%*
75+	*5645*	*5.1%*	*380*	*8.8%*	*155*	*4.1%*	*155*	*8.5%*	*1505*	*7.8%*
65+	*12175*	*11.0%*	*615*	*14.3%*	*355*	*9.4%*	*255*	*14.0%*	*2850*	*14.9%*
Male, total					*1160*	*30.8%*	*400*	*21.9%*	*4855*	*25.3%*
Female, total										
Total number of census families in private households	31385		1240		1085		465		5375	
Total couple families by family structure and number of children	26695	*85.1%*	1055	*85.1%*	875	*80.6%*	340	*73.1%*	4475	*83.3%*
Married couples	23420	*87.7%*	900	*85.3%*	750	*85.7%*	230	*67.6%*	3750	*83.8%*
Without children at home	8435		345		255		110		1605	
With children at home	14985		560		500		120		2185	
1 child	5050		260		175		50		855	
2 children	6805		225		215		30		880	
3 or more children	3130		70		100		25		395	
Common-law couples	3275	*12.3%*	155	*14.7%*	135	*15.4%*	105	*30.9%*	730	*16.3%*
Without children at home	1625		75		45		65		350	
With children at home	1650		85		85		40		360	
1 child	855		15		20		15		135	
2 children	590		35		30		10		105	
3 or more children	210		30		35		10		90	
Total lone-parent families by sex of parent and number of children	4695	*15.0%*	190	*15.3%*	200	*18.4%*	135	*29.0%*	910	*16.9%*
Female parent	3950	*84.1%*	145	*76.3%*	180	*90.0%*	105	*77.8%*	740	*81.3%*
Male parent	745	*15.9%*	50	*26.3%*	15	*7.5%*	30	*22.2%*	155	*17.0%*
Lone parent families total (both sexes of parents)	*4695*		*195*		*195*		*135*		*895*	
1 child	*2745*		*120*		*120*		*105*		*605*	
2 children	*1540*		*45*		*70*		*30*		*265*	
3 or more children	*405*		*40*		*10*		*0*		*60*	
Total number of children at home	38880		1405		1405		450		5995	
Under 6 years of age	8915		395		330		125		1480	
6-14 years	14880		490		585		165		2250	
15-17 years	4820		185		175		50		700	
18-24 years	6875		210		250		45		1025	
25 years and over	3390		140		95		70		610	
Average number of children at home per census family	1.2									
Average number of persons per census family	3.1									
Total number of persons 65 years and over	11055		430		315		265		2480	
Number of non-family persons 65 years and over	3970	*35.9%*	190	*44.2%*	95	*30.2%*	160	*60.4%*	985	*39.7%*
Living with relatives	740	*18.6%*	10	*5.3%*	20	*21.1%*	10	*6.3%*	105	*10.7%*
Living with non-relatives only	160	*4.0%*	0	*0.0%*	0	*0.0%*	25	*15.6%*	25	*2.5%*
Living alone	3065	*77.2%*	165	*86.8%*	75	*78.9%*	135	*84.4%*	835	*84.8%*
Number of family persons 65 years and over	7090	*64.1%*	240	*55.8%*	220	*69.8%*	110	*41.5%*	1510	*60.9%*

146(b)

Housing	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Total tenant and owner hhlds	*39245*		*1530*		*1190*		*890*		*7460*	
Tenant households in non-farm, non-reserve private dwellings	11280	*28.7%*	470	*30.7%*	370	*31.1%*	620	*69.7%*	2815	*37.7%*
Tenant households spending 30% or more of household income on gross rent	4215	*37.4%*	180	*38.3%*	95	*25.7%*	250	*40.3%*	1000	*35.5%*
Owner households in non-farm, non-reserve private dwellings	27965	*71.3%*	1060	*69.3%*	820	*68.9%*	270	*30.3%*	4645	*62.3%*
Owner households spending 30% or more of household income on owner's major payments	4545	*16.3%*	175	*16.5%*	190	*23.2%*	40	*14.8%*	735	*15.8%*

Income	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Total - All census families	31385									
Average 2000 family income $	70396									
Total - All private households	39260									
Average 2000 household income $	64849									
Total population 15 years and over in private households by incidence of low income in 2000	108825		4160		3500		1780		18530	
Low income	10960	*10.1%*	465	*11.2%*	530	*15.1%*	360	*20.2%*	2240	*12.1%*
Other	97865		3700		2975		1420		16295	
Incidence of low income in 2000 %	10.1									

Education	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Total population 20 years and over by highest level of schooling	77275		2995		2555		1445		13960	
Less than grade 9	7395	*9.6%*	340	*11.4%*	180	*7.0%*	120	*8.3%*	1350	*9.7%*
Grades 9 to 13	29640	*38.4%*	1235	*41.2%*	950	*37.2%*	600	*41.5%*	5890	*42.2%*
Trades certificate or diploma	9020	*11.7%*	395	*13.2%*	245	*9.6%*	225	*15.6%*	1690	*12.1%*
College	19300	*25.0%*	715	*23.9%*	775	*30.3%*	330	*22.8%*	3315	*23.7%*
University	11920		310		455		180		1775	
Without degree	3875	*5.0%*	110	*3.7%*	140	*5.5%*	65	*4.5%*	610	*4.4%*
With bachelor's degree or higher	8040	*10.4%*	185	*6.2%*	305	*11.9%*	110	*7.6%*	1140	*8.2%*

Labour Force	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Total population 15 years and over by labour force activity	85110		3270		2825		1535		15115	
In the labour force	60690	*71.3%*	2305	*70.5%*	2070	*73.3%*	935	*60.9%*	10350	*68.5%*
Employed	57450	*94.7%*	2240	*97.2%*	1920	*92.8%*	870	*93.0%*	9815	*94.8%*
Unemployed	3240	*5.3%*	80	*3.5%*	135	*6.5%*	65	*7.0%*	540	*5.2%*
Not in the labour force	24420	*28.7%*	960	*29.4%*	765	*27.1%*	600	*39.1%*	4780	*31.6%*
Participation rate	71.3									
Employment rate	67.5									
Unemployment rate	5.3									
Population 15-24 years - Labour force activity	14870		565		500		220		2370	
In the labour force	10785	*72.5%*	420	*74.3%*	335	*67.0%*	150	*68.2%*	1770	*74.7%*
Employed	9560	*88.6%*	405	*96.4%*	285	*85.1%*	130	*86.7%*	1555	*87.9%*
Unemployed	1230	*11.4%*	10	*2.4%*	35	*10.4%*	20	*13.3%*	175	*9.9%*
Not in the labour force	4080	*27.4%*	155	*27.4%*	160	*32.0%*	80	*36.4%*	620	*26.2%*
Participation rate	72.5									
Employment rate	64.3									
Unemployment rate	11.4									
Population 15 years and over in private households with children at home	37970		1475		1345		445		5930	
In the labour force	31140	*82.0%*	1270	*86.1%*	1120	*83.3%*	300	*67.4%*	4815	*81.2%*
Employed	29940	*96.1%*	1215	*95.7%*	1025	*91.5%*	275	*91.7%*	4580	*95.1%*
Unemployed	1200	*3.9%*	35	*2.8%*	85	*7.6%*	20	*6.7%*	205	*4.3%*
Not in the labour force	6830	*18.0%*	215	*14.6%*	225	*16.7%*	140	*31.5%*	1130	*19.1%*
Participation rate	82									
Employment rate	78.9									
Unemployment rate	3.9									

146(c)

Diversity	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Total population by immigrant status and place of birth	109010		4160		3740		1820		18815	
Total immigrants by selected places of birth (with top five in Cambridge listed below)	22515	20.7%	935	22.5%	665	17.8%	265	14.6%	2980	15.8%
Portugal	5340		150		15		10		255	
United Kingdom	4660		95		145		80		655	
India	1030		60		20		0		90	
Italy	745		15		20		20		75	
United States	735		55		0		10		105	
Non-permanent residents	295		0		10		0		20	
Total recent immigrants by selected places of birth (with top five in Cambridge listed below)	1820	8.1%	60	6.4%	50	7.5%	25	9.4%	240	8.1%
India	340		10		0		0		20	
Pakistan	145		0		0		0		0	
United Kingdom	105		0		0		0		0	
United States	95		15		0		0		15	
China, People's Republic of	85		0		0		0		20	
Total population by visible minority groups	109010		4160		3745		1830		18835	
Total visible minority population	9935	9.1%	550	13.2%	465	12.4%	110	6.0%	1745	9.3%
Total population by mother tongue	109010		4170		3735		1825		18810	
Single responses	107735	98.8%	4065	97.5%	3690	98.8%	1815	99.5%	18620	99.0%
English	87675	81.4%	3250	80.0%	3145	85.2%	1610	88.7%	16155	86.8%
French	1715	1.6%	115	2.8%	55	1.5%	25	1.4%	290	1.6%
Non-official languages (with top five in Cambridge listed below)	18345	17.0%	700	17.2%	505	13.7%	175	9.6%	2190	11.8%
Portuguese	6875		155		25		10		325	
German	1145		75		55		30		330	
Italian	1030		15		25		10		90	
Spanish	890		65		75		30		260	
Polish	850		60		50		25		190	
Total population by home language	109010		4165		3740		1820		18835	
Single responses	97330	89.3%	3630	87.2%	3480	93.0%	1695	93.1%	17400	92.4%
English	91685	84.1%	3430	82.4%	3345	89.4%	1630	89.6%	16900	89.7%
French	175	0.2%	0	0.0%	0	0.0%	0	0.0%	10	0.1%
Non-official languages (with top five in Cambridge listed below)	5470	5.0%	190	4.6%	140	3.7%	60	3.3%	500	2.7%
Portuguese	2250		45		0		15		75	
Vietnamese	360		15		0		0		15	
Spanish	285		20		15		10		55	
Punjabi	285		35		10		0		45	
Chinese, n.o.s.	245		10		15		0		35	

Mobility	Cambridge	%	Langs	%	Prest Heights	%	Dtwn Preston	%	Preston	%
Total population 1 year and over by mobility status 1 year ago	107645		4120		3705		1815		18620	
Non-movers	91985	85.5%	3325	80.7%	3120	84.2%	1480	81.5%	15790	84.8%
Movers	15650	14.5%	795	19.3%	595	16.1%	330	18.2%	2825	15.2%
Non-migrants	9930	63.5%	445	56.0%	355	59.7%	220	66.7%	1830	64.8%
Migrants	5725	36.6%	340	42.8%	240	40.3%	110	33.3%	990	35.0%
Internal migrants	5235	91.4%	330	97.1%	215	89.6%	120	109.1%	935	94.4%
External migrants	480	8.4%	20	5.9%	15	6.3%	0	0.0%	55	5.6%
Total population 5 years and over by mobility status 5 years ago	101800		3860		3490		1710		17620	
Non-movers	55180	54.2%	1975	51.2%	1800	51.6%	805	47.1%	9670	54.9%
Movers	46620	45.8%	1870	48.4%	1685	48.3%	905	52.9%	7945	45.1%
Non-migrants	28460	61.0%	1040	55.6%	1105	65.6%	580	64.1%	5255	66.1%
Migrants	18160	39.0%	845	45.2%	575	34.1%	330	36.5%	2700	34.0%
Internal migrants	16185	89.1%	775	91.7%	500	87.0%	300	90.9%	2430	90.0%
External migrants	1980	10.9%	70	8.3%	70	12.2%	30	9.1%	285	10.6%

Langs 2001 Age Profile (by Dissemination Areas)

Sources:

-- 2001 Census by Statistics Canada.

Date Created:

7 April 2003

Created/Processed by:

Dan Vandebelt, Social Planner Social Planning Council of Cambridge and North Dumfries

Comments:

-- See accompanying Dissemination Area map for boundaries.

Sex (3): Total - Sex

	35300489	35300490	35300491	35300492	35300493	35300494
Total - Age	**580**	**590**	**1480**	**585**	**405**	**650**
0-4	20	55	165	25	20	35
Under 1	5	20	35	5	5	5
1	0	5	40	5	5	5
2	5	10	30	5	5	5
3	5	15	25	0	5	5
4	10	10	35	10	5	10
5-9	35	50	135	30	25	35
5	5	10	25	5	5	10
6	10	10	35	5	5	5
7	10	15	15	5	5	5
8	5	10	30	5	5	5
9	5	10	20	10	5	0
10-14	35	55	95	45	25	30
10	5	5	15	15	5	5
11	5	10	40	5	10	5
12	10	20	15	5	5	5
13	5	5	15	5	10	5
14	5	10	10	15	0	10
15-19	45	55	55	35	40	45
15	5	15	10	5	10	5
16	15	5	15	5	10	5
17	5	10	10	5	5	15
18	5	10	5	10	10	15
19	5	10	10	10	10	10
20-24	10	60	100	35	35	30
20	5	10	15	5	10	5
21	0	5	10	5	5	5
22	0	10	15	5	10	10
23	5	15	25	5	5	10
24	0	15	40	10	10	5
25-29	10	35	220	30	20	30
25	5	15	40	5	5	10
26	0	10	45	5	5	10
27	5	10	45	5	5	5
28	0	5	45	5	5	5

	29	0	5	45	5	0	5
30-34		25	55	180	40	25	35
	30	5	10	45	5	5	10
	31	10	15	35	5	10	5
	32	5	5	35	5	5	5
	33	0	10	30	5	5	10
	34	10	10	35	15	5	5
35-39		30	40	155	50	25	50
	35	5	10	30	10	10	5
	36	5	5	30	10	5	10
	37	5	5	30	10	5	10
	38	10	15	30	15	5	5
	39	5	5	25	15	5	10
40-44		25	55	95	40	20	60
	40	5	15	25	10	10	10
	41	0	5	20	10	5	15
	42	10	10	20	5	5	15
	43	5	15	10	10	5	10
	44	5	5	15	5	5	10
45-49		20	30	70	55	55	55
	45	5	10	15	10	10	15
	46	5	5	15	10	15	15
	47	5	10	15	10	15	5
	48	5	5	10	5	10	10
	49	5	5	10	15	5	5
50-54		20	40	55	50	30	40
	50	5	10	10	10	5	0
	51	5	5	15	5	5	5
	52	0	10	15	10	10	10
	53	5	10	5	5	5	10
	54	5	10	10	10	10	10
55-59		10	25	35	35	30	55
	55	5	5	5	5	5	10
	56	5	5	10	5	0	15
	57	0	5	5	5	0	10
	58	0	5	10	10	10	5
	59	0	5	0	10	5	10
60-64		15	20	35	40	30	45
	60	0	5	10	10	5	10
	61	0	0	5	5	5	10
	62	0	5	15	5	5	5
	63	5	0	0	10	5	5
	64	5	0	5	10	5	10
65-69		15	15	15	25	10	45
	65	0	5	0	5	5	15
	66	0	5	5	5	0	5
	67	5	5	0	5	5	5
	68	5	0	5	5	0	10
	69	5	5	0	5	0	5
70-74		30	0	10	25	10	20
	70	10	5	0	5	0	10
	71	5	0	0	5	0	0

Total Langs Estimate	Langs Pop by Age Category as a % of Total	Waterloo Regional Municipality	Cambridge	Camb Pop by Age Category as a % of Total
4290		**438515**	**110370**	
320	7.5%	27960	7230	6.6%
75		5195	1320	
60		5585	1455	
60		5660	1425	
55		5695	1520	
80		5825	1505	
310	7.2%	31215	8245	7.5%
60		6150	1625	
70		6140	1660	
55		6145	1595	
60		6180	1645	
50		6600	1715	
285	6.6%	31820	8420	7.6%
50		6415	1690	
75		6590	1800	
60		6285	1645	
45		6085	1600	
50		6445	1690	
275	6.4%	30810	7835	7.1%
50		6345	1645	
55		6290	1645	
50		6185	1570	
55		5885	1495	
55		6110	1475	
270	6.3%	31105	7090	6.4%
50		6235	1480	
30		6310	1415	
50		6300	1400	
65		6125	1360	
80		6135	1435	
345	8.0%	30865	7600	6.9%
80		6240	1480	
75		6065	1475	
75		6235	1600	
65		6075	1500	

60		6250	1545	
360	8.4%	33405	8380	7.6%
80		6750	1675	
80		6485	1585	
60		6755	1685	
60		6490	1635	
80		6920	1795	
350	8.2%	38400	10060	9.1%
70		7300	1840	
65		7775	2035	
65		7905	2045	
80		7720	2085	
65		7700	2055	
295	6.9%	36600	9350	8.5%
75		7805	2005	
55		7525	1930	
65		7225	1870	
55		7090	1835	
45		6955	1710	
285	6.6%	31985	7980	7.2%
65		6655	1705	
65		6725	1665	
60		6350	1600	
45		6295	1525	
45		5950	1485	
235	5.5%	28230	7030	6.4%
40		5830	1480	
40		5745	1390	
55		5515	1345	
40		5745	1470	
55		5390	1340	
190	4.4%	20765	4995	4.5%
35		4355	1085	
40		4285	1020	
25		4250	1010	
40		4085	985	
30		3785	885	
185	4.3%	16025	3995	3.6%
40		3545	875	
25		3345	830	
35		3140	800	
25		3020	760	
35		2970	725	
125	2.9%	14090	3475	3.1%
30		2935	700	
20		2860	730	
25		2685	655	
25		2790	690	
20		2820	700	
95	2.2%	13080	3055	2.8%
30		2725	655	
10		2675	600	

20		2605	630	
25		2570	590	
25		2510	585	
115	2.7%	10630	2580	2.3%
15		2325	560	
35		2285	565	
25		2165	520	
20		1955	470	
30		1900	465	
125	2.9%	6365	1635	1.5%
30		1685	445	
25		1525	365	
15		1220	295	
15		1010	280	
20		930	245	
95	2.2%	3510	980	0.9%
20		895	255	
20		795	235	
10		685	180	
15		625	175	
15		500	140	
45	1.0%	1295	350	0.3%
20		405	110	
15		300	70	
10		255	70	
0		195	50	
10		145	45	
10	0.2%	315	85	0.1%
5		115	30	
0		70	20	
0		50	15	
5		40	15	
5		35	10	
0	0.0%	40	10	0.0%

Appendix E

2006 Summer Newsletter for Langs Farm Village Association

Langs Farm Village Association
Summer Newsletter 2006

A United Way Member Agency

Word From the Chair

With the warmer weather, we are counting down the days until Summer! There are many new programs this year for you and your family, including Kindergarten Readiness, summer adult programs and more trips! Mark your calendars – our annual picnic has been scheduled for July this year!

This Spring, the Second Annual Cambridge Mayors Gala event was held with over 200 people in attendance. The Mayor's Community Award, for their contribution to the Cambridge Community was awarded to COM DEV. For more information on COM DEV and their contribution to the Cambridge community, please see inside. The event raised over $30,000 in funds through the silent auction, ticket sales and donations, while recognizing five corporate nominees. The funds raised will support youth programs at four Cambridge neighbourhood organizations that coordinated the event. Thank you to all community members and businesses that supported this event through volunteering, donating a prize item and attending the event.

If you have stopped in lately, you would have seen more changes underway. Langs Farm has just finished a renovation of our Main Reception and Waiting Room areas. We now have more space in the Waiting Room for patients, especially during flu shot season! We have also upgraded our computer systems, as more medical information is becoming electronic.

We are pleased to announce a new partnership: The School of Optometry at the University of Waterloo. On the last Friday of every month, students from the School of Optometry will be on-site for scheduled eye exam appointments. Appointments need to be scheduled in advance, by calling 888-4477.

This will be my last "Word from the Chair" as I am stepping down from my role as Chair. I have greatly enjoyed chairing the Langs Board and have been continually impressed with the staff, volunteers and the Langs community. Thank you for making my term so rewarding and enjoyable.

Sincerely,
Fred Wagner, Board Chair

Our Locations.....

Community Health Centre
887 Langs Drive, Unit #1
653-1470

Resource Centre
887 Langs Drive, Unit #4
653-1182

Youth and Teen Centre
581-E Langs Drive
653-1263

Summer Clothing Giveaway

Jump into summer this year by stopping by the Resource Centre for the clothing giveaway.
Wednesday, June 21st
from 4-6:30 pm
The Resource Centre will be accepting clothing donations June 12-15 ONLY.
For more information contact the Resource Centre
653-1182

Langs Farm Village Association
24th Annual General Meeting
Friday, June 16, 2006

Reaching Out, Celebrating Diversity

Location: Fairview Mennonite Centre Auditorium
515 Langs Drive, Cambridge
A light lunch will be provided

Time: 11:00 am-1:00 pm
RSVP to 653-1470 ext 240

Childcare available at Preston Mennonite Church
Call Suzanne at 653-1470 ext 286 to book

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Protecting Your Privacy at LFVA

LFVA is working hard to ensure that the privacy of each patient, participant and staff member is protected. There are several ways to reduce the risks. Examples of these safeguards include:

- Escorting visitors while they are on the premises
- Volunteers and staff wear photo identification
- Using computer passwords and virus protection as well as locking file storage areas to secure personal health information
- Controlling access to and maintaining proper storage of medical records
- Ensuring that only those that need access have access to information
- Ensuring that everyone follows procedures to protect your privacy

For more information on privacy, please contact Julie Gillespie, Privacy Officer, LFVA 653-1470 ext. 302

Frequently Asked Questions!

If someone calls in to Langs Farm asking if I have an appointment will you tell them?

No, it is our policy that if someone calls in asking for you, we will not give out that information. We will take a message and make sure that you are aware that someone has called for you so that you may contact that person. However, if you let us know upon arrival that someone will be calling to confirm you are ready for a ride home, you have given us permission to confirm that for you.

Will LFVA release my personal health information without my permission?

No, LFVA will not release any information without your consent. If a request is made for your personal health information, for example from an insurance company or the police, Langs Farm will inform you. You will be asked to fill out a form providing your consent, if you choose to provide it.

Community Early Years and Parenting Programs

NEW

Kindergarten Readiness

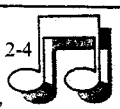
This program is for children entering JK/SK this September and seeks to prepare children and parents for the transition to Kindergarten.

Kindergarten Readiness will be every Wednesday morning 9:00 to 10:45 am and Wednesday afternoons 1:00-2:45 pm from July 5th to August 23rd. The program will offer activities to prepare your child for kindergarten such as learning routines, sharing and problem solving. Parents must stay on site. Program cost is $2 a week. Pre registration is necessary. Spots are limited. For more information call Suzanne at 653-1470 ext. 286.

Young Parent Cooking Healthy Together

Do you want to learn more about healthy food choices and cooking methods? This 6 week program for parents under the age of 24, will give you hands on cooking experience and a chance to meet other parents. Eating the prepared meal will be a part of the program. The cost is $2.00 per week with no cost for the last week. Free childcare provided. Pre-registration is necessary for the program and childcare. For more information call Sandra at 653-1470 ext. 231.

ABC Music and Me



This program is for children 2-4 years of age. Each week the children will learn songs, stories and activities. The program runs Mondays from 10:00-10:45 a.m. $2.00 per week. Parents must remain on site. Registration is limited. For more information contact Sandra PS at 653-1470 ext. 231

How can an Outreach Worker help your family?

Is your family struggling with food or doesn't have the extra money to take the bus to get to an appointment? Do you want to go back to school to upgrade your education so you can get a better job, but just can't find the extra money? Or is your child wanting to participate in a summer program or camp activity? Call Crystal at 653-1470 ext 235 for information on support with food, clothing, shelter, childcare, and more.

Stories in the Park

Join Langs Thursday evenings during the summer a local park (not yet determined) around 6:30 pm and share story time with your child. Each week a new author will be introduced as well as fun activities.

Fathers Day Event

Bring your father, grandfather, uncle and enjoy some time together. We will have activities, craft and pizza for you.

When: **June 19th, 2006 from 5:30-7:30 pm** FREE

Registration is required, call Suzanne at 643-1470 ext 286 for more information.

Spotlight on Mayor's Community Award Recipient

COM DEV

COM DEV is the largest designer and manufacturer of space components and subsystems in Canada. COM DEV builds advanced technology equipment in its facilities. The company supplies space and defense contractors throughout the world.

COM DEV is a company that believes in making a world of difference. While their satellite products are helping improve lives in many ways, their people strive to make the world a better place in the local communities where they live and work. They help neighbours become healthier and better able to cope with challenges through their donations to community hospitals and the United Way. They believe that an investment in education provides lasting rewards. COM DEV is involved in many different ways in helping to nurture and teach the worlds talented and skilled leaders of tomorrow. They help better educate and inspire students by supporting high school and college programs. They help universities and colleges excel by sponsoring advanced research. Through their personal efforts, they help children become more socially integrated by supporting local sports teams.

COM DEV states that, "Our people believe that its not just what we make, its the way we live our lives and the values we share that contribute to making the world a better place for everyone. At COM DEV, our products and our people are at the core of where we have been and where we are going."

Community Youth Programs

Monday Night Drop-In
Come to the youth centre for crafts and games every Monday.
5-11 years 6:00-7:30 pm
12-17 years 7:30-9:00 pm

Teen Drop-In
Youth aged 14-17 years can come hang out at the Youth and Teen Centre on Wednesday evenings from 7-9 pm. Check the bulletin board for weekly outings. Cost for outings will depend on the price of the outing.

Morning Sports
Tuesdays & Thursdays
9:30—10:30 am
Cost: $10 for the season
Youth Aged 5-7 years
Coronation School Baseball Diamond
T-ball, Soccer, Soccer Baseball and more

Friday Night Drop In at the Youth and Teen Centre
11-13 years 6:00-7:30 pm
14-17 years 7:30-9:00 pm

Adventure Playground

Youth aged 5-7 years
Mon-Fri 1-3:30 pm
Cost is $10/week and $8/per week for each additional child from same family
Exciting activities, indoors and out, crafts, games, water fun and outings.
Coronation Public School

Pre-Teen Down-to-Earth
Youth aged 11-13 years
Tues, Wed & Thurs
1-3:30 pm Cost $8/ week
This summer program will include off site and on site environmentally focused activities.
At the Youth & Teen Centre

Morning Soccer
Monday and Wednesday
9:30-10:30 am
Youth aged 8-10 years
William G. Davis School field
Cost is $8 for the season

Summer Playground

For youth 8-10 years
Mon-Fr 1-3:30 pm
Cost is $10/week and $8/ week for each additional child from the same family.
Crafts, games, weekly outings and a weekly swimming trip
William G Davis School

Leaders In Training

Are you between the ages of 12-15 and interested in volunteering as an LIT with children aged 5-10 years?
Gain valuable experience this summer assisting with planning and supervision of youth programs.
Meetings take place Mondays 4-5 pm at the Youth & Teen Centre.
If interested contact Keely at 653-1263.

The Community Champions Mentoring Program is designed to "help young people reach their fullest potential by fostering community connectedness and the development of individual strengths." In order to achieve this goal, each *Champion (11-15 years old)* is matched with a *Mentor (18+)* for 10-12 hours per month for a one-year period. *Volunteer Coaches (18+)* from the community will support the matches through a minimum of one monthly group activity.

We are presently looking for Champions, Mentors and Volunteer Coaches. For more information, to make a referral or application, please contact Rachel at 653-1470 ext 304.

Preston Mennonite Church Summer Bible School is for children ages 5 to 12. The theme this summer is "JESUS FRIENDS." It will be held Monday to Friday, August 14 to 18, in the evening from 5:30 to 8:00 pm and includes a light supper. For more information contact the Preston Mennonite Church at 653-5171.

	PROGRAM	AGE GROUP	DAY	TIME	LOCATION	COST
EARLY YEARS	Summer Outdoor Playgroup	Parent/Caregivers Children 0-6	Tuesday and Thursday	9:00—11:00 am	Coronation Public School	$2.00 per family donati
	Early Years Drop-In	Parent/Caregiver Children 0-6 Children 2-6 Children 0-2	Monday Wednesday Friday	9:00-10:45 am	CHC	No cos
	Kindergarten Readiness (8 week program)	Children entering JK/SK in Sept 2006	Wednesday	9:00-10:45 am	CHC	$2.00 a week
	ABC Music and Me	Children 2-4 years	Monday	10:00-10:45 am	CHC	$2 per session
YOUTH & TEEN	**Summer Program Registration for those living inside the Langs Farm boundaries** If you live on a street within the boundaries of Eagle Street to Concession Drive to Bishop Street to Industrial Blvd, then **Summer Program Registration** is June 19-21 at the Youth and Teen Centre from 2:30-5 pm. **Evening Registration** at the Resource Centre June 21 from 5-7 pm. **For those living outside Langs Farms boundaries registration is** June 22 & 23 at the Youth & Teen Centre 2:30-5 pm. 20% down payment is required at the time of all registrations, cash only please. ***Be sure to register your child for a playground program during Registration Week (June 19-23) and receive the first week of that program (July 4-7) FREE*** ***Registration days will be offered at Coronation Public School and St. Michael's. Please call 653-1263 for dates*** **Summer Program Ages**—Children starting SK in the fall but are not yet 5 years can be registered for summer programs. Pre-teen refers to youth 11-13 years of age. Teen refers to youth 14+ years of age					
	Morning Soccer	8-10 years	Monday and Wednesday	9:30—10:30 AM	Wm G. Davis School Field	$8.00 per summe
	Morning Sports	5-7 years	Tuesday and Thursday	9:30—10:30 AM	Coronation School Baseball Diamond	$10.00 p summer
	Adventure Playground	5-7 years	Monday-Friday	1:00-3:30 PM	Coronation Public School	$10.00 per wee $8.00 for additio child in fami
	Summer Playground	8-10 years	Monday-Friday	1:00-3:30 PM	St Michael School Gym	$10.00 per wee $8.00 for additional child in fami
	Preteen "Down to Earth" Program	11-13 years	Tuesday, Wednesday, and Thursday	1:00-3:30 PM	Youth and Teen Centre	$8.00 per wee
	LIT Training (Application deadline is June 9)	12-15 years	Monday	4:00-5:00 PM	Youth and Teen Centre	No co
	Monday Night Drop-In	5-11 years 12-17 years	Monday	6:00-7:30 PM 7:30-9:00 PM	Youth and Teen Centre	No co
	Teen Outings	14-17 years	Friday	Varies	Youth and Teen Centre	Varies with activit
	Teen Drop-In	14-17 years	Wednesday	7:00-9:00 PM	Youth and Teen Centre	No cos
	Friday Night Drop-In	11-13 years 14+ years	Friday	6:00-7:30 PM 7:30-9:00 PM	Youth and Teen Centre	No co
ADULT	Take a Break Summer	Adult Women	Wednesday (see insert for more information)	1:00-3:00 pm	CHC	Suggested contribu tion $1.00/adu (Extra $2.00 fee o craft days, outings

Summer Programs run July 4th— August 11th. No Programs on Monday, August 7th

Appendix F

Computer-Generated Random Selection Street List

Line Selection Number	Street Address
6	815 - #5 Barbara Court
7	815 - #6 Barbara Court
9	815 - #8 Barbara Court
31	819C Barbara Court
36	821C Barbara Court
47	14 Chateau Crescent
52	38 Chateau Crescent
62	82 Chateau Crescent
66	102 Chateau Crescent
81	115 Chateau Crescent
87	12 Chrysler Crescent
92	32 Chrysler Crescent
99	68 Chrysler Crescent
101	80 Chrysler Crescent
106	104 Chrysler Crescent
127	95 Chrysler Crescent
134	1420 Fairview Road
138	1350 Fairview Road
142	1312 Fairview Road
152	1209 Fairview Road
160	1269 Fairview Road
175	1449 Fairview Road
179	542 Grimms Drive
198	404 Hadfield Court
202	512 Hyannis Court
220	1148 Kathlene Court
241	717 Kummer Crescent
249	733 Kummer Crescent
251	737 Kummer Crescent
262	761 Kummer Crescent
264	702 Kummer Crescent
291	591D Langs Drive
287	589C Langs Drive
282	587F Langs Drive
299	593D Langs Drive
1194	599B Langs Drive
278	587BLangs Drive
294	595C Langs Drive
284	587H Langs Drive
1225	950 Langs Drive
1240	590 Langs Drive
297	593B Langs Drive
1237	610 Langs Drive
1206	639 Langs Drive
299	593D Langs Drive
1233	640 Langs Drive
293	595B Langs Drive
303	583D Langs Drive

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1207	641 Langs Drive
1206	639 Langs Drive
309	599A Langs Drive
315	599G Langs Drive
1198	617 Langs Drive
1232	820 Langs Drive
1214	711 Langs Drive
1197	611 Langs Drive
232	36 Livingstone Crescent
242	47 Livingstone Crescent
344	55 Livingstone Crescent
357	1229 Longfield Court
472	72 Masterson Crescent
474	80 Masterson Crescent
547	545 Mortimer Drive
550	557 Mortimer Drive
551	561 Mortimer Drive
553	567 Mortimer Drive
560	597 Mortimer Drive
568	661 Mortimer Drive
570	669 Mortimer Drive
571	673 Mortimer Drive
574	701 701 Mortimer Drive
575	705 Mortimer Drive
576	709 Mortimer Drive
580	508 Mortimer Drive
586	526 Mortimer Drive
592	544 Mortimer Drive
595	566 Mortimer Drive
597	574 Mortimer Drive
598	582 Mortimer Drive
600	591 Mortimer Drive
604	610 Mortimer Drive
606	618 Mortimer Drive
619	685 Mortimer Drive
620	686 Mortimer Drive
587	530 Mortimer Drive
611	642 Mortimer Drive
626	626 Mortimer Drive
775	405 Old Newbury Lane
781	423 Old Newbury Lane
782	427 Old Newbury Lane
785	435 Old Newbury Lane
786	445 Old Newbury Lane
801	505 Old Newbury Lane
807	529 Old Newbury Lane
815	406 Old Newbury Lane
820	424 Old Newbury Lane
830	458 Old Newbury Lane
836	486 Old Newbury Lane
840	544 Old Newbury Lane
809	541 Old Newbury Lane
	Old Newbury Lane
856	789E Patterson Place
861	793A Patterson Place

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871	793K Patterson Place
872	793L Patterson Place
884	799E Patterson Place
890	807A Patterson Place
891	807B Patterson Place
896	6 Providence Drive
905	861 Shannon Drive
1012	1052 Valentine Drive
1027	1218 Valentine Drive
1032	1248 Valentine Drive
1050	735 - #1 Walter Street
1054	735 - #5 Walter Street
1055	735 - #6 Walter Street
1078	735 - #29 Walter Street
1079	735 - #30 Walter Street
1086	791G Walter Street
1092	809C Walter Street
1108	30 Watch Hill Lane
1113	46 Watch Hill Lane
1116	58 Watch Hill Lane
1123	25 Watch Hill Lane
1147	1114 Langs Circle
1148	1150 Langs Circle
1158	995 Langs Circle
1166	1027 Langs Circle
1173	1087 Langs Circle
1174	1093 Langs Circle
1178	1123 Langs Circle
1182	1147 Langs Circle
1185	1165 Langs Circle
1187	1177 Langs Circle

Appendix G

Quality of Life Survey

Q1. In your own words, can you tell me what the term "quality of life" means **to you**?

Q2. Can you list 3 things that you feel contribute to **your** quality of life?

1.

2.

3.

Q3. Would you rank order these 3 items in order of importance? For instance 1 = most important, 3 = least important

1.

2.

3.

	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
Q4. In the past 4 weeks, are opportunities to engage in your own cultural practices important to you?	○	○	○	○	○
Q5. In the past 4 weeks, have you engaged in activities that were associated with your culture?	○	○	○	○	○
Q6. Do you identify closely with your culture?	○	○	○	○	○
Q7. Are you closely affiliated with members or groups of your culture?	○	○	○	○	○
Q8. During the past 4 weeks, would you say you wish you had more opportunities to pursue your cultural interests?	○	○	○	○	○
Q9. During the past 4 weeks, have you felt that you have a fair amount of job security?	○	○	○	○	○
Q10. Do you feel you have fair wages and benefits at your current job?	○	○	○	○	○

	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
Q24. In the past 4 weeks, have you felt happy and satisfied about the relationships with your family?	○	○	○	○	○
Q25. Do you feel satisfied with your personal relationships, especially with your significant other/partner?	○	○	○	○	○
Q26. Do you feel satisfied with the support you get from your friends?	○	○	○	○	○
Q27. Do you feel that there is financial stability within your immediate family?	○	○	○	○	○
Q28. Do you feel satisfied with the support you get from your family?	○	○	○	○	○
Q29. In the past 4 weeks, have you felt that you have adequate accessibility to primary health care services?	○	○	○	○	○
Q30. Are you satisfied with your overall level of physical health at this time?	○	○	○	○	○
Q31. In the past 4 weeks have feelings of sadness bothered you?	○	○	○	○	○
Q32. In the past 4 weeks have you engaged in physical or social activities that you felt enhanced your health?	○	○	○	○	○
Q33. Do you feel that having free coverage to primary health care services contributes to improved health?	○	○	○	○	○
Q34. In the past 4 weeks do you feel you have had adequate opportunities for leisure activities?	○	○	○	○	○
Q35. In this same period of time, do you feel you have had the time to enjoy yourself?	○	○	○	○	○
Q36. Do you feel you have adequate access to good food?	○	○	○	○	○
Q37. Do you feel a sense of control in your life?	○	○	○	○	○

Q52. Do you feel that your community has satisfactory paths and trails for walking?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○
Q53. Do you feel that access to adequate and affordable transportation contributes to quality of life?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○
Q54. In the past 4 weeks, have you felt that you and your family have adequate accessibility to the public school system?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○
Q55. Do you feel that the quality of education (public school system) in your community is satisfactory?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○
Q56. Do you feel that you and your family have access to post-secondary education (e.g. university, college)?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○
Q57. Do you feel that you have opportunities to upgrade your education or take a course?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○
Q58. Do you feel that access to affordable post-secondary education contributes to quality of life?	Not at All	Not Much	A Moderate Amount	Very Much	An Extreme Amount
	○	○	○	○	○

Appendix H

Participant Consent Form

PARTICIPANT CONSENT FORM

About this Study

This study is regarding quality of life for community residents of Preston, particularly those who live between Industrial Drive And Concession Road, and Bishop and Eagles Streets. The survey includes questions about how you feel about various aspects of your own quality of life including health care, access to education and transportation, recreation and leisure activities, your work, and your community. By identifying what contributes to quality of life, we can help to make life better for others and determine what factors need attention for you and your neighbors. This study is being conducted as partial requirements of a masters degree in Community Psychology at Wilfrid Laurier University in Waterloo. The results will be reported in my masters thesis, possibly in professional journals, at conferences, and may be used by Langs Farm Village Association. All information will be analyzed on a group basis and no individual responses will be identified. If you are interested in finding out more information with regards to the results of this study, please provide your mailing address on Page 2 below your signature. A summary of the final results of the study will be mailed to you within the next couple of months.

If you have any questions regarding this study, you may contact me personally, Annette A. Penney, at **Annette_Penney@rogers.com** or by calling me at 505-6725. You can also contact my thesis supervisor Dr. Terry Mitchell at **tmitchel@wlu.ca** or by calling her at 884-0710, ext. 2052.

Your Rights and Protection

Participation in this survey is **voluntary** and risk is **minimal.** You will not have to answer any questions that you do not want to for any reason, and you can stop the process with the interviewer whenever you like. The entire process will take between 10 and 15 minutes. Should you choose to withdraw from participating in this study, your access to programs or services at Langs Farm Village Association will not be affected. If you choose to withdraw, simply destroy your survey on the spot.

What you say in response to the questions asked will remain **confidential**. Nothing that can identify you personally (your name or address for instance) will be associated with your survey.

Your name or any other identifying information will not be associated with quotations I may use in any reports or publications that may result from this research. Your answers will be put together with those from interviews with other individuals (I expect approximately 130 participants) before they are reported. None of this information will be linked to you personally. The only people who will have access to

the completed surveys are myself and my thesis supervisor, Dr. Terry Mitchell. Completed surveys will be kept by me for a period of seven years after which time they will be shredded.

Researcher's Pledge

As the primary researcher on this project, I commit to treating you with respect and dignity. You will be treated with honesty, integrity, openness, and straightforwardness including the assurance that you will not be unknowingly deceived during this survey. Your personal welfare will be protected and promoted and no harm will come to you as a result of your participation in this survey. When this research project has been completed, you may be informed of the results in a clear and concise manner that is understandable for you.

_____ _____

Researcher's Signature Date

Participant's Consent

I have read and understand the above information. I have received a copy of this form. I agree to participate in this study.

_____ _____

Participant's Signature Date

Would you like to be informed of the results of this study?

☐ No thank you

☐ Yes, please mail (or email) results to me at: _____

_____

This project has been reviewed and approved by the University Research Ethics Board at Wilfrid Laurier University. If you feel you have not been treated according to the descriptions in this form, or your rights as a participant in research have been violated during the course of this project, you may contact Dr. Bill Marr, Chair, University Research Ethics Board, Wilfrid Laurier University, (519) 884-0710, extension 2468.

Appendix I

Research Announcement Poster

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LAURIER
Canadian Excellence

Announcing: Research in Your Community

Throughout the months of October and November, 2005, a quality of life study will be conducted in your community. This research will be supervised by a masters student from the community psychology programme at Wilfrid Laurier University in Waterloo.

This research concerns quality of life issues for community residents of Preston; particularly those who live between Industrial Drive And Concession Road, and Bishop and Eagles Streets.

During the next two months, a research team member with identification may present herself at your door. She will be asking you to volunteer to complete a survey which can benefit your community. We appreciate your help in this regard, however, you are free to decline participation.

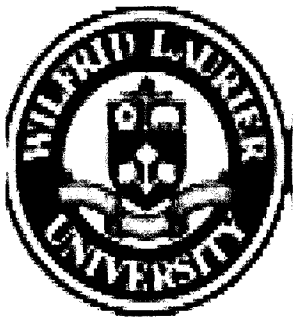
Thank you!

FOR MORE INFORMATION, PLEASE CONTACT:

Primary Researcher: Annette A. Penney
Phone: 519-505-6725
Fax: 519-746-7605
Email: Annette_Penney@rogers.com

OR

Thesis Supervisor: Dr. Terry Mitchell
Phone: 519-884-0710, ext. 2052
Email: tmitchel@wlu.ca



Appendix J

Research Announcement Postcard

Announcing Research in Your Community!!!

During the months of November & December, 2005, a quality of life study will be conducted in your community. This research is being supervised by a masters student from Wilfrid Laurier University.

Your household has been randomly selected to participate in this study. A research team member with photo identification will be by asking you to complete a survey. We appreciate your help in this regard, however, you are free to decline participation.

Feel free to contact me should you have any questions or concerns. You can call me at 505-6725 OR email me at Annette_Penney@rogers.com.

Annette A. Penney, B.A. (Hons)
Masters Student, Community Psychology
Wilfrid Laurier University

LAURIER
Canadian Excellence

75 University Avenue W.
Waterloo, ON N2L 3C5

Appendix K

Volunteer Confidentiality Agreement for Langs Farm Village Association

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VOLUNTEER CONFIDENTIALITY AGREEMENT

This agreement made this_____ day of _____, 20_____

BETWEEN:

LANGS FARM VILLAGE ASSOCIATION
-AND-

As a volunteer (board/committee member or program volunteer), I understand that all information directly or indirectly acquired through my involvement with Langs Farm Village Association, is to be kept strictly confidential. This would include all business related to the agency (i.e. financial information, personnel issues related to staff, and participant/ family information).

A breach of this oath of confidentiality may result in my being asked to resign my position as a volunteer with the agency.

SIGNED IN THE PRESENCE OF:

_____ _____

VOLUNTEER **WITNESS**

Revised March 2000
Revised August 2004

Appendix L

Contents of Package Delivered to Langs' Staff on July 05, 2005

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Ms. Kerry-Lynn Wilkie
Community Services Manager
Langs Farm Village Association
Cambridge, ON

05 July, 2005

Hi Kerry-Lynn:

My apologies for taking so long to get this documentation to you! I would like to take a moment to explain the contents of your package in the order they are found inside the envelope.

- Research Team Training Outline. This is a proposed outline for topics of training for the research team. Straight forward enough I believe. I have included everything I think each individual coresearcher will need in terms of knowledge and skills to be a part of this important research. If you have questions about any of the components, or you feel that I may have missed something, please make a note of it and we will discuss it at a future meeting I will have with yourself, Jennifer Lockman, Horst Marshall, Ed Pfeiffer, and Bill Davidson.

- Outline of the results of a research project entitled "*Asking Citizens What Matters for Quality of Life in Canada*." The Canadian Policy Research Networks, under the guidance of Joseph H. Michalski, Department of Sociology at Trent University, conducted this research between October 11-26, 2000; the results were published in April of 2001. In simple terms, what occurred is that a research group visited every province in Canada and asked Canadian citizens (through a random sampling method) what they considered contributed to "quality of life." This public dialogue process took place in 28 urban settings and 12 rural areas. In total, 346 Canadians participated in the 40 public dialogue discussions with 8.7 participants per group. I have provided you with a synopsis of some of the main themes that emerged from the dialogue process; I consider these categories important contributors to "quality of life." I would like you to ponder these categories and at a later date and time, give me your input as to whether or not these would be considered important to residents of the neighbourhoods Langs services and if so, how important are they?

- Thematic areas table. The dialogue group discussion results of the above mentioned research project were coded into thematic categories of which you will find a complete list in a table format on this larger sheet. Please peruse all thematic areas (there are 17 in total) and make a note of which areas you feel may have importance to residents of Lang's neighbourhoods.

- WHOQOL-100 (UK Version). This is a quality of life measurement tool (WHOQOL = World Health Organization Quality of Life) that was designed by a researcher in England for the World Health Organization (WHO). The definition of "health" that I have adopted for the purpose of my research project is the definition of health stated by the World Health Organization. For this reason, I thought I would look at a survey that WHO has used to measure quality of life. I would very much like to have your input on not only the content of this measurement tool, but also the format as well. For instance, do you think a likert scale is a good way to have residents of Lang's neighbourhoods answer survey questions? (e.g. not at all; not much; a moderate amount; very much; an extreme amount).

That is about all of the information I will bombard you with at the moment. The purpose of what I have provided is to get you to think about what exactly contributes to quality of life for Langs participants and residents of the neighbourhoods that Langs services. Once you have done this, I can get together with yourself, Jennifer, Horst, Ed, & Bill and we can discuss this in detail. After I have considered input from all of you and I can determine which components to include in a measurement tool (e.g. primary health care services; education etc.), I will begin to develop the actual measurement tool which will eventually become a survey.

Please do not hesitate to contact me should you have any questions whatsoever. All of your questions are important to me and I would like for you to be clear about what you are reading rather than wait until we have a meeting.

Thank you for volunteering to participate in this research project Kerry-Lynn. Your time and input is very important to me and appreciated more than I can put into words. Together we can all work on a project that I hope will have great meaning not just for Lang's Farm Village Association, but for community health centres all across our great country as well.

Kindest regards,

Annette A. Penney, B.A. (Hons)
Masters Student, Community Psychology
Wilfrid Laurier University

Asking Citizens What Matters for Quality of Life in Canada

Results of the Canadian Policy Research Network's Public Dialogue Process
October, 2000

Quality of Life Indicators Project

1. Political rights and general values
   - Freedom
   - Importance of human or civil rights (Canadian tradition of acceptance and celebration of diversity in all ways)
   - Democracy

2. Health
   - Health care system
     a. Access to health care (universal health care)
     b. Wait lists for procedures
     c. Access to more timely interventions
     d. Significance of mental health (work-related stress affects mental health)
     e. Accountability within the health care system at all levels
     f. Health promotion and prevention (emphasis on prevention and wellness)

3. Education
   - Accessibility to a free, universal system of education
   - Lifelong learning

4. Environment
   - Water quality
   - Air quality
   - Toxic waste (creation of, disposing of)
   - Waste management (e.g. recycling practices)
   - Responsible management of natural/renewable resources
   - Access to the outdoors

5. Social Programs/Conditions
   - Social support systems adequate to respond to and meet basic human needs
   - Availability, affordability, & quality of daycare/childcare programs
   - Availability of youth programs
   - Housing affordability (social housing programs)

6. Personal Well-Being
   - Personal well-being in general
   - Time use and balance (e.g. balancing work and domestic responsibilities)
   - Sense of being in control of one's life
   - Leisure and recreation (some linked recreation to health issues)

7. Community
   - Having a healthy community (not universally defined or accepted)
     a Safety within the community or public safety in general
     b Social cohesion
   - Volunteer opportunities and civic engagement
   - "It takes a village to raise a child."

8. Economy and Employment
   - Economic security
     a Job security
     b Employment opportunities
     c Rates of compensation
   - Small business support
   - Cost of living (e.g. affordable housing)

Table 2: Total Groups Discussing Selected Quality of Life Issues and Prevalence of Sub-Themes across 40 Groups

	THEMATIC AREAS	GROUPS	TOTAL # VOTES	SUB-THEME NUMBER 1	SUB-THEME NUMBER 2	SUB-THEME NUMBER 3	SUB-THEME NUMBER 4	SUB-THEME NUMBER 5
1	Political Rights/ General Values	40	206	Civic involvement (21)	Civil or human rights (16)	Autonomy (11)	Democracy (10)	Freedom (8)
2	Health	39	206	Accessibility (24)	Physical health (17)	Mental health (13)	Health prevention and promotion (13)	Universal system (13)
3	Education	39	177	Accessibility and/or universality (22)	Quality (17)	Primary/secondary schools (14)	Post-secondary education (12)	Lifelong learning (11)
4	Environment	38	189	Clean, healthy (35)	Water (24)	Toxic waste (11)	Waste management (7)	Renewable natural resources (5)
5	Social Programs/ Conditions	38	173	General support programs (19)	Basic needs (15)	Housing affordability (15)	Wealth distribution (14)	Daycare (10)
6	Personal Well-Being	36	102	Personal well-being in general (18)	Time use and balance (16)	Leisure and recreation (12)	Food/diet (7)	Self-respect or dignity (7)
7	Legal or Justice System	35	96	Safe communities/ public safety (28)	Crime rate (10)	Security (9)	Policing (7)	Justice system (5)
8	Economy	34	110	Employment (17)	Living wages (17)	Economic growth (13)	Small business support (9)	Cost of living (6)
9	Work	31	67	Job security (12)	Wages and benefits (10)	Employment opportunities (9)	Meaningful work or job satisfaction (7)	Training and upgrading (7)
10	Community	31	44	Healthy communities (10)	Spirituality (10)	Programs and resources (8)	Volunteer opportunities (7)	Civil society (4)
11	Seniors and Children	30	64	Child and/or youth programs (19)	Eldercare (6)	Healthy child development (5)	Time/attention for children (5)	Access to health care in retirement (4)
12	Government	29	99	Taxes/fiscal policies (14)	Honesty or public trust (12)	Accountability and efficiency (7)	Quality and leadership (5)	Balanced business Policy (5)
13	Family, Friends, and Connections	25	39	Family well-being (11)	Intimate connections (6)	Reduced social isolation (5)	Family economic security (4)	Family coping (4)
14	Information (Media)	23	29	Public education (10)	Technology and computer access (6)	Research and information (6)	Media access or independent media (6)	Media accuracy (4)
15	Infrastructure and Transport	23	12	Infrastructure (16)	Affordable transportation (5)	Public transit (3)	Paths and trails (1)	
16	Diversity and Multiculturalism	19	17	Cultural diversity (13)	Cultural sharing and exchanges (5)	Obligations to Native peoples (3)	Regional differences (2)	Immigration policies (1)
17	Cultural Pursuits	10	11	Cultural activities (6)	Funding or support for the arts (5)			

Table note: "Total votes" refers to the number of participants (out of 346) who voted for some facet of a theme in identifying their priorities. The numbers in parentheses after each sub-theme refer to the total number of groups (out of 40) that discussed that particular sub-theme

154 (c)

154(f)

ID_____

WHOQOL-100

UK VERSION

Department of Mental Health

World Health Organisation

Geneva

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Permission to use the UK instrument must be obtained from Professor Suzanne Skevington, WHO Centre for the Study of Quality of Life, University of Bath, Bath, BA2 7AY, UK (s.m.skevington@bath.ac.uk)

The UK WHOQOL-100

Instructions

Please read this carefully

This questionnaire asks how you feel about your quality of life, health and other areas of your life. Please answer all the questions. If you are unsure about which response to give to a question, please choose the best one you can. There are no right or wrong answers. Your answer will be kept strictly confidential. Please keep in mind your standards, hopes, pleasures and concerns. We ask that you think about your life in the **last two weeks**.

For example, thinking about the **last two weeks**, a question might ask:

How much do you worry about your health?

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

You should circle the number that best fits how much you have worries about your health over the last two weeks. So you would circle the number 4 if you worried about your health "very much", or circle number 1 if you have worried "not at all" about your health. Please read each question, assess your feelings, and circle the number on the scale for each question that gives the best answer for you.

Thank you for your help, please turn over page

The following questions ask about **how much** you have experienced certain things in the last two weeks, for example, positive feelings such as happiness or contentment. If you have experienced these things an extreme amount, circle the number next to "An extreme amount". If you have not experienced these things at all, circle the number next to "Not at all". You should circle one of the numbers in between if you wish to show that your answer lies somewhere between "Not at all" and "Extremely". **Questions refer to the last two weeks.**

1. **How much do you worry about pain or discomfort?** (F1.2)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

2. **How difficult is it for you to handle pain or discomfort?** (F1.3)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

3. **How much do you feel that pain prevents you from doing what you need to do?** (F1.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

4. **How easily do you get tired?** (F2.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

5. **How much are you bothered by fatigue?** (F2.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

6. **To what extent do you have difficulty sleeping?** (F3.2)

None at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

7. **How much do sleep problems worry you?** (F3.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

8. **How much do you enjoy life?** (F4.1)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

9. **How positive do you feel about the future?** (F4.3)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

10. **How much do you feel positive about your life?** (F4.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

11. **How well are you able to concentrate?** (F5.3)

Not at all	Not much	Moderately	Very well	Extremely
1	2	3	4	5

12. **How much do you value yourself?** (F6.1)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

13. **How much confidence do you have in yourself?** (F6.2)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

14. **How much do you feel inhibited by your looks?** (F7.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

15. **Is there any part of your appearance which makes you feel uncomfortable?** (F7.3)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

16. **How worried do you feel?** (F8.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

17. **How much do feelings of sadness or depression interfere with your everyday functioning?** (F8.3)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

18. **How much do feelings of depression bother you?** (F8.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

19. **To what extent do you have difficulty in performing your routine activities?** (F10.2)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

20. **How much are you bothered by limitations in performing everyday living activities?** (F10.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

21. **How much do you need medication to function in your daily life?** (F11.2)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

22. **How much do you need medical treatment to function in your daily life?** (F11.3)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

23. **How much does your quality of life depend on the use of medical substances or medical aids?** (F11.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

24. **How alone do you feel?** (F13.1)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

25. **How well are your sexual needs fulfilled?** (F15.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

26. **How bothered are you by difficulties in your sex life?** (F15.4)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

27. **How safe do you feel in your daily life?** (F16.1)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

28. **To what extent do you feel you are living in a safe and secure environment?** (F16.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

29. **How much do you worry about safety and security?** (F16.3)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

30. **How comfortable is the place where you live?** (F17.1)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

31. **How much do you like where you live?** (F17.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

32. **To what extent do you have financial difficulties?** (F18.2)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

33. **How much do you worry about money?** (F18.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

34. **How easily are you able to get good medical care?** (F19.1)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

35. **How much do you enjoy your free time?** (F21.3)

Not at all	Not much	Moderately	Very much	An extreme amount
1	2	3	4	5

36. **How healthy is your physical environment?** (F22.1)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

37. **How concerned are you with the noise in the area where you live?** (F22.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

38. **To what extent do you have problems with transport?** (F23.2)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

39. **How much do difficulties with transport restrict your life?** (F23.4)

Not at all	A little	A moderate amount	Very much	An extreme amount
1	2	3	4	5

40. **How fed up do you feel?** (F8N)

Not at all	A little	A moderate amount	Very much	An extreme amount
1	2	3	4	5

The following questions ask about **how completely** you experienced, or were able to do certain things in the last two weeks, for example activities of daily living like washing, dressing or eating. If you have been able to do these things completely, circle the number next to "Completely". If you have not been able to do these things at all, circle the number next to "Not at all". You should circle one of the numbers in between if you wish to show that your answer lies somewhere between "Not at all" and "Completely". **Questions refer to the last two weeks.**

41. **Do you have enough energy for everyday life?** (F2.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

42. **How much are you able to accept your bodily appearance?** (F7.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

43. **To what extent are you able to carry out your daily activities?** (F10.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

44. **How dependent are you on medications?** (F11.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

45. **To what extent do you get the kind of support from others that you need?** (F14.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

46. **How much can you count on your friends when you need them?** (F14.2)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

47. **To what degree does the quality of your home meet your needs?** (F17.2)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

48. **To what extent do you have enough money to meet your needs?** (F18.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

49. **How available to you is the information that you need in your day-to-day life?** (F20.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

50. **To what extent do you have the opportunities for acquiring the information that you need?** (F20.2)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

51. **To what extent do you have the opportunity for leisure activities?** (F21.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

52. **How much are you able to relax and enjoy yourself?** (F21.2)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

53. **To what extent do you have adequate means of transport?** (F23.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

The following questions ask you to say how **satisfied, happy or good** you have felt about various aspects of your life over the last two weeks, for example, about your family life or you energy level. Decide how satisfied or dissatisfied you are with each aspect of your life and then circle the number that best fits how you feel about this. **Questions refer to the last two weeks.**

54. **How satisfied are you with the quality of your life?** (G2)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

55. **In general, how satisfied are you with your life?** (G3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

56. **How satisfied are you with your health?** (G4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

57. **How satisfied are you with your energy?** (F2.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

58. **How satisfied are you with your sleep?** (F3.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

59. **How satisfied are you with your ability to learn new information?** (F5.2)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

60. **How satisfied are you with your ability to make decisions?** (F5.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

61. **How satisfied are you with yourself?** (F6.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

62. **How satisfied are you with your abilities?** (F6.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

63. **How satisfied are you with the way your body looks?** (F7.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

64. **How satisfied are you with your ability to perform daily living activities?** (F10.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

65. **How satisfied are you with your personal relationships?** (F13.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

66. **How satisfied are you with your sex life?** (F15.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

67. **How satisfied are you with the support you get from your family?** (F14.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

68. **How satisfied are you with the support you get from your friends?** (F14.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

69. **How satisfied are you with your ability to provide for, or support others?**(F13.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

70. **How satisfied are you with your physical safety and security?** (F16.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

71. **How satisfied are you with the conditions of your living place?** (F17.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

72. **How satisfied are you with your financial situation?** (F18.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

73. **How satisfied are you with your access to health services?** (F19.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

74. **How satisfied are you with the social care services?** (F19.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

75. **How satisfied are you with your opportunities for acquiring new skills?** (F20.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

76. **How satisfied are you with your opportunities to learn new information?**(F20.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

77. **How satisfied are you with the way you spend your spare time?** (F21.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

78. **How satisfied are you with your physical environment e.g. pollution, climate, noise, attractiveness?** (F22.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

79. **How satisfied are you with the climate of the place where you live?** (F22.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

80. **How satisfied are you with your transport?** (F23.3)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

81. **How happy do you feel about your relationships with your family?** (F13.2)

Very unhappy	Unhappy	Neither happy nor unhappy	Happy	Very happy
1	2	3	4	5

82. **How would you rate your quality of life?** (G1)

Very poor	Poor	Neither poor nor good	Good	Very good
1	2	3	4	5

83. **How would you rate your sex life?** (F15.1)

Very poor	Poor	Neither poor nor good	Good	Very good
1	2	3	4	5

84. **How well do you sleep?** (F3.1)

Very poor	Poor	Neither poor nor good	Good	Very good
1	2	3	4	5

85. **How would you rate your memory?** (F5.1)

Very poor	Poor	Neither poor nor good	Good	Very good
1	2	3	4	5

86. **How would you rate the quality of social services available to you?** (F19.2)

Very poor	Poor	Neither poor nor good	Good	Very good
1	2	3	4	5

87. **How satisfied are you with your level of happiness** (F4N)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

The following questions refer to **how often** you have felt or experienced certain things, for example the support of your family or friends, or negative experiences such as feeling unsafe. If you have not experienced these things at all in the last two weeks, circle the response "never". If you have experienced these things, decide how often and circle the appropriate number. So for example if you have experienced pain all the time in the last two weeks, circle the number next to "Always". **Questions refer to the last two weeks**.

88. **How often do you suffer pain?** (F1.1)

Never	Seldom	Quite often	Very often	Always
1	2	3	4	5

89. **Do you generally feel content?** (F4.2)

Never	Seldom	Quite often	Very often	Always
1	2	3	4	5

90. **How often do you have negative feelings, such as blue mood, despair, anxiety, depression?** (F8.1)

Never	Seldom	Quite often	Very often	Always
1	2	3	4	5

The following questions refer to any **work** that you do. **Work here means any major activity that you do. This includes voluntary work, studying full-time, taking care of the home, taking care of children, paid work, or unpaid work. So work, as it is used here, means the activities you feel take up a major part of your time and energy. Questions refer to the last two weeks**.

91. **How much are you able to work?** (F12.1)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

92. **To what extent do you feel able to carry out your duties?** (F12.2)

Not at all	Not much	Moderately	A great deal	Completely
1	2	3	4	5

93. **How satisfied are you with your capacity for work?** (F12.4)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

94. **How would you rate your ability to work?** (F12.3)

Very poor	Poor	Neither poor nor good	Good	Very good
1	2	3	4	5

The next few questions ask about **how well you were able to move around** in the last two weeks. This refers to your physical ability to move your body in such a way as to allow you to move about and do the things you would like to do, as well as the things that you need to do. **Questions refer to the last two weeks.**

95. **How well are you able to get around?** (F9.1)

Very poor	Poor	Neither good nor poor	Good	Very good
1	2	3	4	5

96. **How much do any difficulties in mobility bother you?** (F9.3)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

97. **To what extent do difficulties in movement affect your way of life?** (F9.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

98. **How satisfied are you with your ability to move around?** (F9.2)

Very dissatisfied	Dissatisfied	Neither satisfied nor dissatisfied	Satisfied	Very satisfied
1	2	3	4	5

The following questions are concerned with **your personal beliefs** and how these affect your quality of life. These questions refer to religion, spirituality and any other personal beliefs you may hold. Once again these questions refer to the **last two weeks.**

99. **How much do personal beliefs give meaning to your life?** (F24.1)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

100. **To what extent do you feel life to be meaningful?** (F24.2)

Not at all	Not much	Moderately	Very much	Extremely
1	2	3	4	5

101. **How much do your personal beliefs give you the strength to face difficulties?** (F24.3)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

102. **To what extent do your personal beliefs help you to understand the difficulties in life?** (F24.4)

Not at all	Not much	A moderate amount	Very much	An extreme amount
1	2	3	4	5

Please turn over

ABOUT YOU

We would like you to answer a few general questions about yourself: by **circling** the correct answer or by **filling in the space provided**.

What is your gender? **MALE / FEMALE**

What is your date of birth? ____/____/____ (day / month / year)

What is the highest education you have received? **None at all**
Primary School
Secondary School
Further Education e.g. Technical/Clerical
University

What is your marital status? **Single** **Separated**
Married **Divorced**
Living as married **Widowed**

How is your health?

(F9.1)

Very poor	Poor	Neither good nor poor	Good	Very good
1	2	3	4	5

Are you currently ill? **YES / NO**

If something is wrong with your health, what do you think it is? Please write your illness(s) or problems here_____

_____

Are you currently in paid work? **YES / NO**

What is your occupation?_____

THANK YOU VERY MUCH FOR YOUR HELP

Appendix M

Job Ad

155(a)

We're Hiring Community Residents!!!

Langs Farm, along with a graduate student from Wilfrid Laurier University, is conducting quality of life research in your community. For this project we are hiring a team of junior researchers. Previous surveying experience is an asset but not essential, and full training will be provided. We are seeking people who:

* Have a knowledge of the neighborhoods that Langs Farm services
* Live in the community
* Are familiar or involved with Langs programs and services
* Have very good verbal and written communication skills
* Have a grade 12 diploma OR equivalent life experience

This is a short-term job opportunity ideal for people seeking to supplement their income, currently between jobs, or looking to build additional job skills. Interested individuals please call **Annette** at Langs at **653-1470, ext. 350**.

Langs Farm is an equal opportunity employer

Appendix N

Resume for Bhupi Rajput

156(a)

789c Patterson Place 653 4729 (519)
Cambridge, N3H 2N2 bhupi@mehendhi.com
Ontario

Bhupi Rajput

Profile

A highly motivated, creative, computer literate individual, offering excellent interpersonal and organisational skills. I have a strong commercial awareness and offer a resolute personality with an ability to integrate quickly into an organisation and show initiative in making early contributions.

Work Experience

Langs Farm Village Association **Sept 05 – to date**

Volunteer in many different areas

- Secretary to the Community Committee and help with planning of Sub-Picnic Committee.
- Act as additional Interviewer for permanent and temporary staff.
- Help run Multicultural Cooking Group, brainstorming with the group for ideas for next session, type/organize all handouts, research material for the group.
- Help with researching material for different programs.
- Running henna workshops with the youth and teen centre.

Glaxo Smith Kline (head office) Greenford **April 04 – June 04**

Temporary PA

- Worked with 3 directors scheduling their diaries for meetings and appointments using Outlook
- Set up central database with contact details of directors, managers, executives and admin staff within the department.
- Responsible for all Power Point presentations, internal and external.

Thomas Pink **Heathrow Airport, T4** **Feb 03 – Sept 03**

P/T Sales Assistant

Selling top end quality men's and ladies shirts. Intense training and projects were completed to comply with company product knowledge. Other duties included; training new recruits, merchandising, dealing with queries and providing excellent customer service.

Prudential **Uxbridge** **May 01 – Sept 01**

Temp – PR/Admin

- Organising PR activities within the shopping centre to encourage more traffic.
- Dealing with public queries, administrative duties, organising charity allocation and private selling kiosks. General office duties.

Glaxo Smith Kline **Stockley Park, Uxbridge** **Nov 99 – May 00**

Contractor - Project Coordinator/Training Administrator/

- Project managed and set up new courses specifically designed for the science departments.
- Trained departmental administration staff in Word 97, PowerPoint 97 and FrontPage 97 Basic.
- Maintained the Intranet website using FrontPage.
- Scheduled employees onto appropriate training courses to meet their individual training requirements using an Access database and maintained sufficient stocks of courseware & training materials at each site.

Beauchamp Estates **Mayfair, London W1** **May 98 - Dec 98**

Trainer/Marketing Assistant

- Provided full marketing/advertising support for the residential and commercial departments.
- Initiated and upgraded company to MS Office 97 from 95 and subsequently trained all the staff from

junior to director level in the use of Word, Outlook, PowerPoint and Excel.

Self Employed **India** **Sept 97 – May 98**

Trainer

- Private tuition for children & adults (ages included 3 - 70) on a 1:1 basis only in Word 97, PowerPoint 97, Excel 97, basic Internet skills, using e-mail accounts with yahoo/hotmail and children's software packages.

Arthur Andersen (Financial Markets) **London EC2** **Jan 97 – Sep 97**

Market Researcher

- Initiated and coordinated a prospective and existing client database using Bloomberg's, Reuters, Internet and other media publications and resources within the division.

Allsop & Co **Knightsbridge, London SW7** **Mar 95 – Dec 1996**

Marketing/Advertising Executive

- Responsible for marketing/advertising including budgetary control, applicant reports, and production of marketing/advertising material.

Beauchamp Estates **Mayfair, London W1** **July 87 – Mar 95**

Advertising Manager & Trainer (1990-1995), **Marketing/Advertising Assistant** (1989-1990)

Secretary/PA to Marketing Director (1988-1989), **Assistant to PA** (1987 – 1988)

- Joined as an assistant to the marketing PA and progressed through the company to Advertising Manager.
- Had complete and sole responsibility for all marketing/advertising including budgetary control, applicant reports, and production of marketing material, advertising and media-relations. As well as evaluation of home and international publications to establish suitability for advertising. Organised events, seminars and exhibitions for property launches in UK, Far East and Russia.
- Complete responsibility for installation and training of staff in MS Office Suite 95 and recruitment of junior staff.

Other Information

Software/Applications Knowledge

Expert:	MS Word 97, PowerPoint 97 and Front Page 98/00. (Completed MS MOUS exams)
Intermediate:	Office 2000 Suite, Outlook 2000, Excel 97 (MOUS Exam Intermediate level), Lotus Notes, Lotus Organiser and Access 97. Bloomberg's and Reuters. Dreamweaver 4,
Comprehensive:	Word Perfect 5.1/6.0 for Windows, Ami-Pro 2.0 Flash 4, Fireworks 4, Photoshop 6

Education

1992 - 1995	BSc (Hons) Product Management - 2:1
1983 - 1986	B/Tec General Diploma in Business & Finance - Pass with Credits
	B/Tec National Diploma in Business & Finance - Pass with Distinctions
1978 - 1983	GCE O'Levels - Mathematics, English Language, Sociology, Chemistry, Biology, Typing, Office Practice, Needlecraft

Interests

Photography, reading, embroidery, cycling, swimming, hiking, horse riding, traveling, socialising, dancing, music, website design and management.

I successfully manage and run a business. I specialize in Indian bridal, informal or formal functions including; Xmas parties, children's Birthday parties, charity events, exhibitions and corporate events (clients include Microsoft, Peugeot Cars, Kilpatrick PR, British Airways, Warner Brothers, and Saudi Arabian Embassy @ The World Economic Forum, Davos, Switzerland). URL is http://www.mehendhi.com

Appendix O

Resumes for my Research Team Members

157(a)

Paula M. Whan

920 Winterhalt Ave.Cambridge, ON N3H 4J6
(519) 650-1859

Objective: An interesting position with a growing company.

Highlights:

- Effective problem solving skills.
- Conscientious; accurate at detail work.
- Work well independently and within a team.
- Aptitude for working with figures.
- Ability to work well under pressure.
- Strong interpersonal skills.
- Excellent telephone communication skills.
- Friendly, courteous, articulate
- Familiar with most office equipment.
- Bondable

Job Experience:

Outreach Support Worker **2005-present**
Langs Farm Village Association, Cambridge, ON

- Provide weekly outreach in the community.
- Create and update information flyers to hand out.
- Enter stats and other administrative tasks as needed.

Community Nutrition Worker **2005-present**
Langs Farm Village Association, Cambridge, Ontario

- Plan, implemented and facilitate programs.
- Create program content flyers.
- Purchase weekly groceries for various groups.

Daycare Provider **1998-present**
Cambridge, Ontario

- Organize daily creative activities and outings.
- Encourage independence, problem solving and social skill development.
- Prepare nutritious meals and snacks.
- Walk children to and from activities and school.
- Attend conferences and related childcare workshops.

157(b)

Paula M. Whan

Census Representative **2001**
Cambridge, Ontario

- Delivered census packages in my designated area.
- Edit returned questionnaires, follow up and complete those that failed editing.
- Track down and collected questionnaires not mailed back.
- Checked and updated map with new addresses and subdivisions.
- Handed in all materials, properly filled and on time.

Sales Representative **1995-1998**
London Life, Windsor, Ontario

- Reviewed, counseled, planned and implemented clients' financial strategies.
- Continually trained and updated skills.

Human Resources Coordinator **1994-1995**
Windsor Personnel, Windsor, Ontario

- Responsible for answering and transferring calls from up to 14 incoming phone lines.
- Data entry, prepared letters and reports as requested.
- Created, organized and kept updated a listing of resume applicants.
- Assisted in searching for qualified employees, set up interviews, supervised job skill testing, and contacted successful candidates and set up orientation day.
- Opened, sorted and distributed mail.

Volunteer:
Volunteer/Parent Council member **2002-present**

- Trained and managed volunteers during our annual fundraising drive.
- Attend council meetings, discuss and implement policy.

Education & Training:
Pathways to Employment Training Program **2005-present**

- Weekly employment training /skill development workshops.
- Team and leadership building program.
-

Community Nutrition Worker **Spring 2005**

- 12 weeks of nutrition and facilitator training.

References available upon request.

157(c)

Sherry McNeil
995 Langs Circle
Cambridge, Ontario
N3H 5E6
Home 519-650-2164 or Cell 519-241-1261

EDUCATION:	St. Benedict High School Grade 9 & 10	1966-1968
	St. Mary's high school Grade 11 & 12	1968-1970
	Conestoga College Secretarial Course Completed	1978-1979

EMPLOYMENT HISTORY:

J.S.P Printing Part-time	Cambridge, Ontario Driller and packager	2003-present
Langs Farm Assoc.	Cambridge, Ontario Survey	2002-2002
Rockwell Automation:	Cambridge, Ontario Assembly computer components	1978-1990

VOLUNTEER:

Langs Farm Association:	Cambridge, Ontario	2001-present

References Available Upon Request

Audra Willis

593-A Langs Drive Cambridge, Ontario ***(519) 653-4641*** 157(d)

Highlights of Qualifications

Outstanding communication and organizational skills
Experienced with Day Care / Drop In programs providing excellent customer service
Knowledgeable of all programs and services provided by Langs Farm Village Association
Computer literate including: Windows 95, 98, Word 7.0, Excel, and use of the Internet
Operate a multi line telephone system, scheduled appointments and take messages
Focused, reliable, punctual as well as motivated to complete assigned tasks
Past Survey experience within community
In receipt of Grade 12 Diploma

Relevant Skills & Experience

Breakfast Club Volunteer

- Supervise children from the ages of 5 to14 years
- Organize games, provide and receive medical forms
- Assist with nutritious food preparation
- Handle petty cash for program, and answer multi-line telephone system, taking accurate messages

Child Care Provider

- Supervise children from the ages of 0 to 6 years
- Interact with children, motivating, and encouraging them to learn new cognitive skills
- Facilitate a variety of stimulating activities with the children, assemble materials for projects and crafts
- Prepare nutritious snacks

Reception / Administrative Skills

- Actively involved with the breakfast club and the activities as well as collecting fees
- Interact with children in the centre, providing a safe and happy environment
- Provide one on one customer service daily, handle petty cash for registration & copying fees
- Word process, answer multi-line telephone system, transferring calls & taking messages
- Train and provide direction for new volunteers in all aspects of reception duties and in the resource centre as well as assisting clients with their job or program search
- Experienced with approaching clients, patients and participants on behalf of the centre and having them complete satisfaction surveys and bringing feedback to appropriate individuals

Customer Service Skills

- Conducted and assisted with completion of very extensive information surveys on behalf of Langs Farm Village Association

Employment & Volunteer Experience

Child Care Provider	Langs Farm Village Assoc., Cambridge, ON	Mar 2004-Present
Breakfast Club Volunteer	Langs Farm Village Assoc., Cambridge, ON	2001-Present
Reception/Admin	Langs Farm Village Assoc., Cambridge, ON	June 1999-Present
Community/Nutritionist	Langs Farm Village Assoc., Cambridge, ON	May-June 2000
Peer Worker	Langs Farm Village Assoc., Cambridge, ON	Mar-Sept 2000

Education & Training

High Five Program Certificate
Computer Troubleshooting Course
Microsoft Word 2000 Certificate
Duty To Report Certificate
Red Cross Emergency First Aid Certificate
Community Nutritionist Certificate

Ontario Secondary School Diploma, North Peel Secondary School, Brampton, ON

References available upon request

Appendix P

Research Team Training Outline and Contents

Research Team Training Outline

Day 1

Hour 1
- Introductions of all research team members, starting with myself.
- Project overview – goals, objectives, research design.
- Principles and values of Community Psychology.

Hour 2
- Ethics in social science research.
- **Wilfrid Laurier University's ethical guidelines for conducting research using human participants.**

Day 2

Hour 1
- Interviewing skills part 1 (listening, tracking, paraphrasing and summarizing).

Hour 2
- Role-playing of what will and what possibly can occur when we go door-to-door.

Day 3

Hour 1
- Back to ethics: risks, benefits, privacy & confidentiality issues
- Administering the surveys. Exactly how does this work?

Hour 2
- The safety plan. Going over personal safety issues.
- Signing of *Researchers Pledge of Confidentiality & Professionalism.*

Research Team Members
Annette A. Penney – Primary Researcher 151 Madison Avenue S. Kitchener, ON N2G 3M4 576-4665 / 505-6725 (cell) Annette_Penney@rogers.com
Bhupi Rajput – Team Leader 789C Patterson Place Cambridge, ON N3H 2N2 653-4729 / 212-2437 (cell) bhupi.rajput@rogers.com
Audra Willis – Team Leader 593A Langs Drive Cambridge, ON N3H 2N4 653-4641 audraspathway@yahoo.ca
Sherry McNeil – Team Leader 995 Langs Circle Cambridge, ON N3H 5E6 650-2164 / 241-1261 (cell) duchess995@yahoo.ca
Paula Whan 920 Winterhalt Drive Cambridge, ON N3H 4J6 650-1859 craft.time@sympatico.ca

Purpose and Objectives of Annette's Quality of Life Study

- Accumulate and increase knowledge that can contribute to better health outcomes and quality of life for the public, especially to those groups of people who are disadvantaged or experience barriers to health care access.
- Apply my deep personal value for self-determination, caring and compassion, and individual, relational, and collective health and well-being through the execution of health-related research.
- Emphasize the important role that the social determinants of health have on the quality of life and health outcomes of community members.
- Enhance stakeholder empowerment through participatory action research that values true collaboration and demonstrates shared power.
- Allow voices of Langs' clients an opportunity to be heard concerning factors that influence their health and quality of life.
- Use information gathered to advocate and promote the value of community health centres (the LFVA model specifically), to our provincial government in Ontario. One of the recommendations made by Dennis Raphael in his 2004 presentation at the Toronto East General Hospital was to "lobby government to maintain the community and service structures that help to maintain health and well-being."
- Add value to the setting at Lang's Farm Village Association through my research association.
- Supply existing CHCs with relevant research to further or promote their cause.
- This study can serve as adjunct data for a funding proposal or strategy for communities wishing to establish a CHC.

Annette's Rationale for Conducting This Study

In an effort to encompass the values and goals of community psychology while attempting to assess the impact of the social determinants of health on self-reported quality of life, I propose this methodology section of my masters' thesis research. Some of the goals of this particular research at Langs Farm Village Association fall in line with an ecological psychology perspective in that, discovering the relationship between human behaviour (related to self-reported quality of life) and the environment (at the community health centre) is of primary interest.

As was demonstrated in the People's Health Assembly held in Bangladesh (2000), there are organized actions and movements globally to address problems in health care through innovative community-based initiatives (Browne, 2001; PHM, 2000). In the United Nations report on human development (1999), it was stated that a healthy life contributes to an enabling environment for all peoples, one of the main purposes of human development (Gasman & Hart, 2003). A review by van de Ven (1996) of the concrete changes in the structure of health care systems internationally, indicates that one of the trends is toward universal, mandatory health insurance coverage. In van de Ven's estimation, the literature suggests that other countries in the world are seeking not only means to provide care and coverage, but are seeking reforms to their systems as well.

When recommending reform or intervention, it is important to focus on all levels of change: macro, meso and micro. By intervening at the appropriate level, we avoid neglecting the root causes of a problem (Rappaport, 1977 as cited in Orford, 1992), thereby avoiding "band-aid" solutions. The importance of macro level change cannot be denied as public policy change needs to take place in order to support the

implementation and continued survival of community health centres across Canada. Also, since policies directly impact health outcomes and quality of life for individuals and communities (Ritas, 2003), there are compelling arguments to advocate for policy change.

Scientists and public health experts agree that there must be better evidence-based interventions that reach out into the community (Wandersman, 2003). The implementation of more community health centres is not just a hypothesized intervention and reform to health care but is rather an evidence-based solution backed by the success of approximately 300 CHCs throughout Canada, 56 of them in Ontario alone (AOHC, 2002). CHCs blend a health determinants' approach with health promotion actions and work with several levels of society (individual, family, and community) (AOHC, 2002).

Some things are certain: there will continue to be a need to comprehensively address the health, economic, and social needs of high risk populations and those who face barriers to access to services that address these needs. As of December 2000 there were a total of 107 communities in Ontario classified as underserviced (shortage of 456 doctors in total). Research conducted for the Ministry of Health in the province of Ontario recommended that reform to the primary care system should result in "the creation of entities with characteristics similar to CHCs" (Shah & Moloughney, 2000, p. 43). A focus on the determinants of health approach at the community level results in action, thereby strengthening social support mechanisms (Mechanic, 2000 as cited in Romanow, 2002), an enviable approach already in practice in CHCs. Community health centres have the capacity to improve access to primary care, quality and continuity of care, and in many cases enhance the lives of their users.

Record Storage

A. *Thesis notes:* Categorized handwritten notes and journals, typed notes, online web log journal entries, and document analyses will be organized and stored in Eldon® plastic storage containers. These containers will be kept on-site at Langs in a room with limited access, in a locked filing cabinet. These documents will be made accessible in the future only through the approval of LFVA's executive director and myself.

B. *Thesis documents:* To facilitate storage and retrieval of thesis documents, an annotated bibliography of the documents will be created and stored in separate Eldon® containers and stored alongside the thesis notes on-site at LFVA. Thesis documentation may include but is not limited to: typed notes that are generated as a result of a focus group session, and copies of completed surveys.

C. *Tabular materials:* For additional security and backup, quantitative data including surveys will be scanned electronically and stored on digital CD-Rs. These CD-Rs will be secure and stored in the same Eldon® container as the thesis documents.

Potential Benefits to Participants, Patients, Overall Community

Development of an Advisory Group and Focus Group

A. *Principles of community psychology:* In community psychology we are not only accountable to our values, the profession, and ourselves, but to communities as well (Nelson & Prilleltensky, 2004). It is my view that by establishing both an advisory group and a focus group, I have an additional mechanism in place for *accountability* to the Langs community. The

guidance from an advisory group will help to ensure that the research I am conducting benefits the people it involves, and provides meaning to my actions since stakeholders are a compass in our pursuit of meaning (Nelson & Prilleltensky, 2004). Nelson & Prilleltensky (2004) recommend creating leadership structures with meaningful input and representation from various stakeholders as it has great value for the people, organizations and communities involved. I would also like to promote connection, interdependence, teamwork, relationships, and a sense of community through *inclusion* of key stakeholders in my research. Finally, it is my desire to foster empowerment of stakeholders (Papineau & Kiely, 1996) by involving community members considerably in this research.

B. *Objectives:* To give a context to the research and to add meaning and richness. I would like to allow the people who receive the services and programs and/or are involved in their development and implementation, the opportunity for participation and expression of their voice. Additionally, values of participation and collaboration are seen as being essential for respectful relationships (Nelson & Prilleltensky, 2004). Hopefully, members of the advisory group could help to make the research meaningful to *them* and enhance the confidence they already have about LFVA, the value it has for their community, and improve relational well-being. The focus group could give input into the interpretation phase, after data analysis has been complete. The members of these groups could contribute important understanding and insight. By checking my documents for instance, the groups could be a built-in check for

interpretations, accuracy, and appropriateness (Thesen & Kuzel, 1999). An advisory group could work to ensure that the interests of the Langs community are protected through exerting some control over the research process and giving me feedback through the different phases of the study. As insiders, these key stakeholders may help me gain access into their community and help to further my understanding of the community and its members. Involving key stakeholders maximizes utilization of research results (Papineau & Kiely, 1996). In this instance, perhaps the advisory group could assist with advancing my study by helping me to design a final product, disseminate outputs toward the end of the project, and work with me to act on particular recommendations of the study.

Training Community Members as Coresearchers

> *"Empowering the less powerful people in a society is ..... a major, explicity-stated goal of participatory researchers and evaluators."* (Whitmore, 1991)

A. *Principles of community psychology:* In accordance with participatory research literature, a key to empowerment is participation, which in itself is a developmental process. "Researchers can contribute to the creation of an environment where empowerment may occur." (Macaulay et al., 1998, citing Tavers, 1997 as cited in Thesen & Kuzel, 1999). By training community members, along with empowering these individuals, there is a greater likelihood of producing knowledge and action directly useful to the Langs community (Reason, 1994 as cited in Thesen & Kuzel, 1999).

Inclusion of community members in my research in a meaningful way will also allow me the opportunity to promote community psychology values for personal well-being of the trainees such as self-determination, and caring and compassion.

B. *Purpose of training:* As a researcher encompassing community psychology principles, I would like to implement the principle of citizen participation in practice. I can achieve citizen participation by giving back to the Langs community in a tangible way through equipping community members with new skills. These skills will not only empower these individuals, but will have a practical application as well (work done with me can be added to a resume; I can act as an additional reference for future employment). Although not an explicit goal, I recognize that an opportunity to mentor a community member has a side benefit of empowering me by being engaged in a mentoring process.

C. *Topics for training:* The academic component of training would include readings that are linked to specific objectives (a task or output). I would like the topics to cover (a) community psychology (Nelson & Prilleltensky, 2004); (b) research in the social sciences (Sommer & Sommer, 1997); and (c) door-to-door interviewing techniques. The readings would cover the essential meaning of these topics, and be geared to what I felt was reasonable for the trainee to comprehend. I would ensure that time was set aside to go over the articles and topics one at a time and answer any questions the trainee may have. This planned approach would be somewhat

flexible and would offer benefits to both the trainee and myself, with the emphasis on benefits to the trainee.

Community Psychology Principles and Values

Source: Nelson, G., & Prilleltensky, I. (2004). *Community psychology: In pursuit of liberation and well-being*. London: Palgrave MacMillan.

Defining community psychology:

- prevention and health promotion orientation
- strengths based approach
- addressing and modifying external conditions at several levels (micro, meso, but especially macro)

Values of Community Psychology

- ***Holism*** – the importance of focusing on us as a whole person, emphasizing our strengths. This is done in the context of the many relationships and environments in which we find ourselves.
- ***Health*** – is a state of physical, psychological, social, and material well-being. Health is more than the absence of illness for us; it is a positive state that includes a personal dimension, the relationships we have with others, and how we are in groups (e.g. community organizations, church groups, etc.).
- ***Caring*** – our compassion and support for others including our concern for their welfare.
- ***Self determination*** – having the opportunity and the power to direct our lives as we wish.
- ***Participation*** - where we play an active role in decision that affect our lives and we contribute to our communities in a meaningful way.
- ***Social justice*** – is when resources and obligations in our society are set aside in a fair and equal manner

Principles of Community Psychology

- ***Ecology*** - studying transactions between people and their environments; the person-environment fit. [I will explain this & how we understand people and their issues at multiple levels.]
- ***Prevention and promotion*** – prevention programs to promote well-being. [Give example of a school program and ask for team members if they can describe an example they have seen.]
- ***Community*** – psychological sense of community related to values of caring, compassion, and support for community infrastructures.
- ***Power*** – working "with" people and not "on" people to promote self-determination and control and thus aiding in empowerment.
- ***Inclusion*** – we value people's right to be different and not to be judged against one single standard; elimination of oppression and promotion of inclusion. Embracing diversity.
- ***Commitment and depowerment*** – a commitment from professionals to social change; sharing power and knowledge in order to develop more equal relationships.

Hello! My name is _____ . [*show identification tag*]

I am a member of a team conducting a quality of life study in your community. Did you receive our postcard in the mail? [*wait for response from resident*]

Would you have time right now to complete the survey with me? [*wait for response from resident*]

[If resident responds YES]

Thank you! This should take about 10 minutes.

Step 1: Informed consent. ["Before we can begin, I will need your consent to participate in our study. Could you please read this consent form and sign it? If there is anything on this form you don't understand, please ask me."] **{You will need to have the resident sign 2 copies of the informed consent form. Leave one with the resident, put the other in an envelope SEPARATE FROM THE COMPLETED SURVEY.}**

Step 2: Answer scale. [Pass the resident an index card with the likert scale on it, explaining that they choose their answers from this scale (after Q1-Q3 that is).]

[If resident responds NO]

"If you would like to participate but don't have the time right now, would you like me to leave the survey with you? There is a stamped, self-addressed envelope attached that you can use to drop the survey in the mail at your convenience."

If the resident declines this option, SMILE and please VERY POLITELY thank them for their time.

158(n)

LAURIER Research Office

October 13, 2005

Research Involving Humans

Faculty/Staff Listing
Documents
Forms

WLU Research Ethics Policy
Tri-Council Policy Statement On-Line Tutorial
Research Ethics Board Membership

Contact Us:

email: Research Involving Humans
phone: 519.884.0710
ext: 3131

All Research Involving Humans Contacts

WLU Research Ethics Policy

The Tri-Council Policy Statement on Ethical Conduct for Research Involving Humans establishes the procedures and standards for the ethics review of research involving human subjects. To be eligible for Council funds, WLU must certify compliance with the policy statement. All researchers collecting data with human subjects should become familiar with this policy.

Research Requiring Review

The guidelines outline the conditions of research projects that require review in Article 1.1 of the Tri-Council Policy Statement, which is summarized below.

All research that involves living human subjects requires review and approval by a Research Ethics Board (REB) in accordance with the Tri-Council Policy Statement, before the research is started. This includes research funded by grants, contracts and contributions, unfunded faculty research, graduate and undergraduate research and staff research. Research involving human remains, cadavers, tissues, biological fluids embryos or foetuses shall also be reviewed by the REB.

The only exceptions to this review process by the REB include:

- *Research about a living individual in the public arena, or about an artist, based exclusively on publicly available information, documents, records, works, performances, archival materials or third-party interviews. Such research only requires ethics review if the subject is approached directly for interviews or for access to private papers, and then only to ensure that such approaches are conducted according to professional protocols and to Article 2.3 (Naturalistic Observation) of this Policy.*
- *Quality assurance studies, performance reviews or testing within normal educational requirements. Projects of this nature will be reviewed by the administrative ethics review board in accordance with Policy 8.2 - Ethics Approval for Administrative Research Projects Using Human Subjects.*
- *Research undertaken by students on co-op work terms outside the auspices of Wilfrid Laurier University and/or its academic programs that does not require Wilfrid Laurier University resources and is not directly supervised by Wilfrid Laurier University faculty or staff.*

If a student is conducting research on a practicum that involves human participants (questionnaires, surveys, needs studies, focus groups, interviews, naturalistic observation, participant observation, etc.) and is part of an ongoing project at the practicum placement, this is the work of the agency or other employer and does not need to be ethically reviewed by the Research Ethics Board for graduate students or by the departmental ethics review committee for undergraduate students. If the student is the primary person involved in the development and implementation of some research that involves human participants at the practicum setting, then it is mandatory to complete the WLU ethics review process.

It is also mandatory to complete the WLU ethics review process if the student's research in the practicum is part of a faculty member's own research program or if the student plans to use the information collected in the practicum setting in another academic project at a later time (for example, another course, a thesis, or a paper).

The WLU Research Ethics Board

The Research Ethics Board (REB) considers matters of policy related to research with human subjects. In addition, it reviews research applications on referral from its Chair. According to the Tri-Council Policy Statement on Research with Human Subjects, the REB must review and approve all relevant research conducted by faculty, staff and graduate students. The REB is mandated to approve, reject, propose modification to, or terminate any proposed or ongoing research involving human participants which is conducted within, or by members of, the WLU community, using the considerations set forth in that Policy Statement. Research that is carried out by undergraduate students as part of their course work must be reviewed and approved by Departmental or Faculty Ethics Review Committees.

The REB is composed of at least seven faculty members from different departments/Faculties that are directly involved in research involving human subjects, a staff member in Psychology responsible for coordinating human ethics reviews, and at least one community representative.

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Vice-President: Academic, on the recommendation of the Dean of Graduate Studies and Research. The Board is chaired by a faculty member. The Associate Dean of Graduate Studies and Research is an ex-officio (non-voting) member, and serves as a resource person for the REB. The Coordinator of Research Services is an ex-officio (non-voting) member, and co-ordinates the ethics review process for the REB, ensures the REB is informed about any ethics policy changes on a national level, provides ethics advice to faculty and students, and serves as secretary to the REB. For all funded projects (internal or external), ethics approval must be obtained before funds are awarded. Members of the REB are subject to the university policy that relates to conflict of interest; see University Policies: Article 8.1: Conflicts of Interest, which is in keeping with Article 1.12 of the Tri-Council Policy Statement.

Current Membership

The REB will also serve as a liaison committee to review projects undertaken by members of the WLU community that are conducted within the domains of other institutions (e.g. a school, hospital, social agency). For these research settings, the REB reviews the ethical soundness of faculty and student applications to be submitted to external agencies (e.g. The Waterloo County Board of Education) whose Research Boards vet research proposals dealing with human subjects. Proposals should be submitted to the Research Office at least two and one half weeks prior to the external agency's deadline for the submission of proposals.

Proportionate Review Process

All research involving human subjects falls into one of two review categories:

1) Full Review: All research is presumptively in this category unless it meets certain exceptions, as described below. The term "full review" refers to a face-to-face review before the full Board. In such cases, the REB will allow researchers to participate in discussions about their proposals, but the researcher may not be present when the REB is making its decision. When the REB is considering a negative decision, all reasons for this decision will be made available to the researcher and a reply from the researcher will be requested. Researchers have the right to request, and the REB has the obligation to provide, reconsideration of decisions affecting a research project.

Signed informed consent is required from all subjects or their legal guardians. A sample Informed Consent Checklist and Statement is available on the web.

2) Expedited Review: Research proposals will be reviewed by the chair of the REB and at least one additional member, if the research falls into certain categories defined as "minimal risk".

The Tri-Council Policy Statement definition of "minimal risk" is as follows: "if potential subjects can reasonably be expected to regard the probability and magnitude of possible harms implied by participation in the research to be no greater than those encountered by the subject in those aspects of his or her everyday life that relate to the research then the research can be regarded as within the range of minimal risk". This definition requires a judgement by the chair and the member of the committee designated to review the proposal. In light of the proposed research, the judgement is based on such factors as:

- *the nature of the population studied (ie, children, institutionalized individuals, vulnerable populations, incompetent populations, aboriginal peoples) in light of the proposed research,*
- *collection of information regarding sensitive aspects of the subject's behaviour, such as drug use, sexual practices, illegal conduct, memories of a traumatic nature, etc.,*
- *collection of information or recording of behaviour which, if known outside of the research, could reasonably place the subject at risk of civil or criminal liability or damage the subject's social standing, financial standing, or employability,*
- *invasive manipulations.*

According to the policy statement, "Research governed by this Policy may begin only if prospective subjects, or authorized third parties, have been given the opportunity to give free and informed consent about participation..." This consent should ordinarily be obtained in writing. Where there are "good reasons" for not recording consent in writing, the procedures used to seek free and informed consent shall be documented.

Scholarly Review as Part of Ethics Review

In all cases of research that poses more than "minimal risk", the REB shall satisfy itself that the design of a research project is capable of addressing the questions being asked in the research. In cases of funded peer-reviewed research, the review by the agency will constitute review of scholarly merit. In cases of research that has not been peer-reviewed (including contract or contribution research), the researcher(s) will be requested to provide two names (one internal to the University and one external to the University) of arms-length expert in the field who could provide an assessment of the scholarly merit of the proposed research.

In consideration of harms/benefits analysis of the proposal it is important for reviewers to note Article 1.5 (d) of the Tri-Council Statement: "Certain types of research, particularly in the social sciences and the humanities may legitimately have a negative effect on public figures in politics,

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business, labour, the arts or other walks of life, or on organizations. Such research should not be blocked through the use of harms/benefits analysis or because of the potentially negative nature of the findings. The safeguard for those in the public arena is through public debate and discourse and, in extremis, through action in the courts for libel."

Review Procedures for Ongoing Research

The Tri-Council Policy Statement stipulates that: "Ongoing research shall be subject to continuing ethics review. The rigour of the review should be in accordance with a proportionate approach to ethics assessment". In compliance with this policy, continuing review will consist of the submission of a succinct annual status report to the REB by July 1 of each year in cases of "minimal risk" research. This policy pertains to all faculty research and doctoral student research. The REB shall be promptly notified when data collection for a project concludes. In the case of a master's student's research, the annual report form may be completed and signed at the time of the thesis defence.

In cases of greater than "minimal risk", as part of the research proposal submitted for REB review, the researcher shall propose to the REB the continuing review process deemed appropriate for the project that is consistent with Article 1.13 (c) of the Tri-Council Policy statement.

Multi-Centred Research and Research Approved at Another Institution

As collaborative research between faculty members, staff, or students at different institutions, and perhaps with community partners, become more common, there is a desire that researchers are not unnecessarily hindered in their research by several ethics reviews by several research ethics boards. However, the Research Ethics Board (REB) at Wilfrid Laurier University has an obligation to ensure that research undertaken by faculty members, staff, and students of the University is appropriately reviewed and approved, and adheres to accepted ethical norms for research that involves human participants as set out in "Laurier Policy and Procedures for Research Involving Human Subjects".

If a research project has been reviewed and approved by a research ethics board, or equivalent body, at another institution, the chair of WLU's REB will review the project. If all ethics concerns have been addressed or if only minor changes are required, then the chair may approve the research project. However, at the chair's discretion, a review (full or expedited) by WLU's REB may be required.

If a research project has not been reviewed by a research ethics board, or equivalent body, at another institution, or if the institution's ethics policy does not comply with the guidelines set out in Laurier's policy, then WLU's REB must undertake a review (full or expedited) of the project.

In situations where WLU faculty members, staff, or students are part of a multi-centred research project, WLU's REB, through its chair, may cooperate with the research ethics boards, or equivalent bodies, at the other centres or institutions in the ethics review process in order to reduce the number of separate reviews that are necessary. In such situations, WLU's REB must ensure that the research has been appropriately reviewed and approved, and adheres to accepted ethical norms for research that involves human participants as set out in "Laurier Policy and Procedures for Research Involving Human Subjects".

Meetings and Attendance

The REB will meet as necessary, and at least quarterly, to review expedited review decisions and to review proposals that are deemed greater than "minimal risk". For "full" reviews, a quorum will consist of 60% of the committee, and a majority vote will determine the decision, with the Chair of the committee only voting in the case of a tie. Minutes of these meetings will be available in the Office of Graduate Studies and Research.

The REB will submit an annual report to SCRAP by September 1, concerning the number of proposals reviewed in each category (expedited review, full review, continuing review), a generic description of ethics issues/concerns that have been addressed in the past year, and, if necessary, recommendations concerning changes to this policy or the procedures for conducting an ethics review.

Appeals

In cases when a researcher and the REB can not reach agreement through discussion and reconsideration, the decision will be reviewed by an appeal board, which will operate in a similar manner as the REB. The Vice-President: Academic will appoint the 5-member standing appeal board, at least one of whom must be from outside the WLU community, upon recommendation of the Dean, Graduate Studies and Research. Members will be chosen for their experience in research ethics, and should be former REB members, but they must not be current members of the REB. Decisions of the appeal board are final.

Departmental or Faculty Ethical Reviews

Departmental or Faculty Ethics Review Committees must review and approve undergraduate students' course-related activities that involve human participants that are deemed "minimal risk",

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including undergraduate thesis research. If the departmental or Faculty committee deems a project to be of greater than "minimal risk", it must be reviewed by the University REB. Departmental Ethics Review Committees must not review and approve undergradute student research that is part of a faculty member's own research program; such research must be approved by the University REB.

Departmental Ethics Review Committees will operate according to the Tri-Council Statement on "Ethical Conduct for Research Involving Humans". The Departmental Ethics Review Committee shall consist of least two persons who will be replaced with alternates when they are associated with the project under review. The chairpersons of the Departmental Ethic Review Committees will provide information to the chairperson of the University REB by forwarding an Annual Report by July 1, summarizing the membership on the committee, the committees' activities, and any problems encountered when reviewing projects. Members of the University's REB will be available as resource and support persons for the Departmental Ethics Review Committees.

Decisions by a Departmental Ethics Review Committee may be appealed to the University Research Ethics Board. In order to avoid a conflict of interest, any member of the Research Ethics Board who participated in the decision by the Departmental Ethics Review Committee can not hear the appeal.

contact WLU site index disclaimer privacy policy

Ontario, Canada

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Laurier Brantford

Wilfrid Laurier University 75 University Avenue West, Waterloo, Ontario, Canada N2L 3C5

phone: (519) 884-1970

Researcher's Pledge of Confidentiality and Professionalism

As a research team member of the quality of life study conducted by Annette Penney, I am aware that I will be collecting personal information, opinions and/or values of residents while going door to door in various neighborhoods within the Lang's catchment area. The information revealed by research participants will be revealed in good faith that the answers to survey questions would remain strictly confidential. I understand that I have a responsibility to honour this confidentiality agreement. I hereby agree not to share any information, including conversations that may arise as a result of the survey content, with anyone except the primary researcher of this project Annette Penney, her thesis supervisor Dr. Terry Mitchell, or other members of the research team. I understand that breach of any aspect of this agreement including confidentiality or engaging in disrespectful behaviour will result in loss of pay and termination of employment.

Any issue of concern that may arise while going door to door with surveys that is not deemed serious enough to call police, I will discuss in private with Annette. It will then be Annette's responsibility to address and resolve these issues.

I have read and understand the above information. I have received a copy of this form from Annette Penney. I agree to abide by the terms outlined in this pledge as they are stated above.

_____ _____

Research Team Member Date

As the primary researcher on this project, I commit to treating you, the coresearcher, with respect and dignity. You will be treated with honesty, integrity, openness, and straightforwardness during the entire process of this study including your training period. I will take steps to manage any anticipated risk including assurance that your personal welfare and safety will be protected while going door to door in the neighborhoods in the Langs catchment area. I will do everything in my power to ensure that no harm will come to you as a result of your affiliation with this research project. When your participation in this research project has been completed, you will receive a letter of recommendation outlining what your responsibilities have been and an evaluation of your performance on this project.

_____ _____

Annette A. Penney Date
Primary Researcher

158(s)

LANGS FARM VILLAGE ASSOCIATION
TIME SHEET

EMPLOYEE NAME: _____

PAY PERIOD: _____

DATE	DAY	START	FINISH	LIEU TIME WORKED	LIEU TIME TAKEN	REASON FOR LIEU	HOURS WORKED
	Mon						
	Tue						
	Wed						
	Thur						
	Fri						
	Sat/Sun						

DATE	DAY	START	FINISH	LIEU TIME WORKED	LIEU TIME TAKEN	REASON FOR LIEU	HOURS WORKED
	Mon						
	Tues						
	Wed						
	Thur						
	Fri						
	Sat/Sun						

HRS TO BE PAID _____

Permanent Employees only:

	Vacation Time	Sick Days	Personal Days	Professional Development	Floating Day
Balance as of last pay					
Used this pay period					
Balance to Date					

Lieu Time Report (all staff):

Balance as of the last pay	
Add: Lieu Time Worked	
Less: Lieu Time Taken	
Balance to Date	

FOR ADMIN ONLY:

SUPERVISOR APPROVAL: _____

ACCOUNT: _____

NOTES:

Appendix Q

Letter of Employment

159(a)

LAURIER
Canadian Excellence

03 October, 2005

Katherine Keogh
585D Langs Drive
Cambridge, ON
N3H 2N4

Dear Katherine:

It is my pleasure to be able to extend an offer of employment to you as a member of a team of coresearchers. This employment position is a part-time, short-term contract term which is work associated with my master's thesis research at Wilfrid Laurier University in Waterloo. As a member of the research team, I would need you to be available somewhere between five and ten hours per week beginning 10 October, 2005 ending no later than the end of November, 2005. The total number of hours I can offer you will depend on funding, however, at this point I can guarantee at least 25 hours paid at $10 per hour.

As part of the research team you would be required to attending several training sessions on both 14 October, 2005 and 18 October, 2005. For the remainder of the contract period you would accompany another research team member in door-to-door surveying as part of my quality of life study in the Langs catchment area.

Expenses: You will be reimbursed for any cell phone expenses you incur as a result of door-to-door surveying.

Please note that this offer is contingent upon the receipt of a copy of a recent police check.

Kindest regards,

Annette A. Penney, B.A. (Hons)
Masters Student, Community Psychology
Wilfrid Laurier University
Science Building
75 University Avenue West
Waterloo, ON N2L 3C5
Tel. 519-505-6725

Appendix S

Resume for Sanjeev Rajput

161(a)

2 Williams Road
Southall, Middlesex
UB2 5QD
+44 208 571 7978 (Home)
+44 7939 277790 (Mobile)
+44 207 840 6985 (Work)

Sanjeev Rajput

Profile

A bilingual IT specialist with a strong base of experience gained in hardware and software support environments, predominantly within the professional services sector. Possesses a strong client focus with excellent training and customer service record gained in variety of business sectors.

Cap Gemini Ernst & Young **2000 – To Date**

Senior Programmer (grade) - Customer Trainer (April 2001 – To Date)

Programmer (grade) – 1st Line Analyst (October 2000 – April 2001)

Joined organisation as an analyst providing telephone based first and second line support to client's customer base of 23,000 staff. This included, but was not limited to application and technical support, networking issues, and remote dial-up facilities. Transferred to Customer Trainer role after four months as a direct result of successes and reputation gained within the analyst role. This resulted in subsequent promotion to senior programmer grade. Current projects include access database administration, and client presentation design.

Successes during this period include:

Handling 50-70 calls per day, while maintaining an 83% first time fix rate. Was frequently called upon by management for special projects and provide cover for Team Leaders and Second Line support.

Designed and implemented a new modular training system allowing customers to select customised training sessions based on their individual needs.

Responsible for authoring complete set of training manuals. Updated documentation for the Customer Trainer policies and procedures. Created documentation for the Customer Trainer database including a user guide and technical document.

Developed and administered an Access 2000 database for tracking training data. The database supports multiple users and contains training data for over 5000 customers.

Provided training for all levels of client's customers from support staff to senior global partners.

Mesh Computers Plc **1999 – 2000**

Hardware/Software Support Engineer (November 1999 – October 2000)

Mesh computers is a medium sized London based computer manufacturer with a wide client base varying from individual personal computers to government offices. Provided first and second line telephone based technical support. Worked closely with Research & Development, providing testing and feedback on new products and acting as a liaison with customers. Acted as a primary point of contact for Customer Services technical issues, often dealing face-to-face with clients in the sales showroom. Resolved 50-90 calls per day with a 90% first time fix rate. Provided cover for the premium rate software support line and helped to maintain response targets for email based technical support. Was called upon to fill in as acting Supervisor during management weekly meetings. Worked weekend shifts, troubleshooting and configuring hardware and pre-installed software in the repair centre.

161(b)

Easy PC **1998-1999**

Owner/Operator (August 1998 – Sept 1999)

Started and successfully managed my own business from the initial planning stages through to implementation of business plan which included budgetary & inventory control and marketing/promotional activities.
Provided services handling installations of computer hardware and software. Provided desktop support, computer assembly, upgrades and in home set-up and troubleshooting for software, hardware and peripherals.

TDL Corporation **1995 – 1999**

Supervisor (July 1995 – January 1999)
Counter Staff (May 1995 – July 1995)

Duties included; monitoring staff duties, overseeing high traffic areas, balancing daily cash sheets and deposits, calculating production and waste levels, maintaining health standards.
Handled customer complaints, promotions and contests as well as customer satisfaction programs.
From Feb-Aug 1998 handled all training and staff appraisals for the branch. Several of my trainees received promotions and service awards.

Other Information

Software/Applications Experience (Practical):

Windows XP Workstation	Windows 3.x	Office XP (2002)	Lotus Notes 4.5
Windows 2000 Workstation	DOS	Office 2000	Lotus Notes 5.05
Windows Millennium		Office 97	Adobe Photoshop 7
Visual Basic for Applications		Virtual Private Networking	Adobe Premiere 6

Training/Education (Theoretical):

Windows 2000 Server/Workstation	Macromedia Flash 5.0
TCP/IP	In-House Software
Visual Basic 6.0	

Other

Interests: General Socialising, reading, painting, and modding.
Full Clean British Driving Licence.

Date of Birth: 3rd July 1974 Nationality: Canadian\British

Appendix T

Random Selection Macro (example)

16 2(a)

809	Barbara Court	0.619162
815 - #1	Barbara Court	0.005675
815 - #2	Barbara Court	0.941263
815 - #3	Barbara Court	0.355246
815 - #4	Barbara Court	0.080463
815 - #5	Barbara Court	0.439856
815 - #6	Barbara Court	0.034101
815 - #7	Barbara Court	0.117188
815 - #8	Barbara Court	0.113611
815 - #9	Barbara Court	0.987868
815 - #10	Barbara Court	0.058529
815 - #11	Barbara Court	0.026224
815 - #12	Barbara Court	0.758887
815 - #13	Barbara Court	0.244708
815 - #14	Barbara Court	0.493503
815 - #15	Barbara Court	0.908902
815 - #16	Barbara Court	0.537323
815 - #17	Barbara Court	0.256279
815 - #18	Barbara Court	0.129363
815 - #19	Barbara Court	0.683047
815 - #20	Barbara Court	0.417936
815 - #21	Barbara Court	0.75841
815 - #22	Barbara Court	0.55786
815 - #23	Barbara Court	0.952213
815 - #24	Barbara Court	0.894333
815 - #25	Barbara Court	0.45361
815 - #26	Barbara Court	0.11779
815 - #27	Barbara Court	0.029337
819A	Barbara Court	0.327872
819B	Barbara Court	0.242442
819C	Barbara Court	0.237238
819D	Barbara Court	0.12621
819E	Barbara Court	0.720302
821A	Barbara Court	0.301265
821B	Barbara Court	0.931975
821C	Barbara Court	0.137789
821D	Barbara Court	0.437621
821E	Barbara Court	0.084166
823A	Barbara Court	0.802591
823B	Barbara Court	0.458974
823C	Barbara Court	0.793184
823D	Barbara Court	0.072964
823E	Barbara Court	0.791226
4	Chateau Crescent	0.83996
6	Chateau Crescent	0.454549
10	Chateau Crescent	0.336044
14	Chateau Crescent	0.499892
22	Chateau Crescent	0.650016
26	Chateau Crescent	0.022722
30	Chateau Crescent	0.366847
34	Chateau Crescent	0.012891
38	Chateau Crescent	0.817695

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42	Chateau Crescent	0.793777
46	Chateau Crescent	0.897896
50	Chateau Crescent	0.443342
54	Chateau Crescent	0.276402
58	Chateau Crescent	0.751161
62	Chateau Crescent	0.368108
70	Chateau Crescent	0.402464
74	Chateau Crescent	0.81077
78	Chateau Crescent	0.7861
82	Chateau Crescent	0.494618
86	Chateau Crescent	0.858774
90	Chateau Crescent	0.228754
98	Chateau Crescent	0.802887
102	Chateau Crescent	0.362362
110	Chateau Crescent	0.96916
114	Chateau Crescent	0.327255
118	Chateau Crescent	0.187328
122	Chateau Crescent	0.956683
124	Chateau Crescent	0.799761
5	Chateau Crescent	0.661289
7	Chateau Crescent	0.72983
11	Chateau Crescent	0.874775
15	Chateau Crescent	0.377243
23	Chateau Crescent	0.112102
57	Chateau Crescent	0.161812
61	Chateau Crescent	0.369998
65	Chateau Crescent	0.958907
69	Chateau Crescent	0.638909
115	Chateau Crescent	0.931831
119	Chateau Crescent	0.721468
123	Chateau Crescent	0.752919
125	Chateau Crescent	0.62747
4	Chrysler Crescent	0.593379
8	Chrysler Crescent	0.788935
12	Chrysler Crescent	0.342683
16	Chrysler Crescent	0.699876
20	Chrysler Crescent	0.694053
24	Chrysler Crescent	0.506334
28	Chrysler Crescent	0.919124
32	Chrysler Crescent	0.930811
36	Chrysler Crescent	0.711041
44	Chrysler Crescent	0.344939
48	Chrysler Crescent	0.855719
52	Chrysler Crescent	0.227471
60	Chrysler Crescent	0.205456
64	Chrysler Crescent	0.990412
68	Chrysler Crescent	0.051973
76	Chrysler Crescent	0.637006
80	Chrysler Crescent	0.248398
84	Chrysler Crescent	0.731836
88	Chrysler Crescent	0.575649
96	Chrysler Crescent	0.657009

Appendix U

Surveying Lists

LAURIER
Canadian Excellence

Research Team Member: _____
Date: _____

ADDRESS	ACTION TAKEN

Mortimer Drive – 545, 561,579, 601, 609, 614, 634, 673, 686, 697, 702, 709, 710, 717, 722

Trico Drive – 509, 521, 525, 530, 533, 542, 546, 549, 557, 577, 578, 582, 585, 586, 602, 605, 614, 645, 649, 661, 665, 676, 680, 681, 688

Newport Drive – 15, 40, 50, 56, 64, 67, 68, 71, 76, 79, 83, 91, 127, 167, 182, 185, 188, 206, 212, 215, 227, 230, 245, 254, 263, 272, 275, 278, 299, 311, 347, 359, 375, 376, 396, 404, 412, 415, 435, 447, 456, 459

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
581B Langs Drive	
583D Langs Drive	
587D Langs Drive	
587G Langs Drive	
587H Langs Drive	
589A Langs Drive	
589C Langs Drive	
591D Langs Drive	
595A Langs Drive	
599B Langs Drive	
599D Langs Drive	
627 Langs Drive	
631 Langs Drive	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
995 Langs Circle	
1027 Langs Circle	
1087 Langs Circle	
1114 Langs Circle	
1150 Langs Circle	
1052 Valentine Drive	
1229 Longfield Court	
1213 Michael Crescent	
1294 Michael Crescent	
1300 Michael Crescent	
1312 Michael Crescent	
1335 Michael Crescent	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
72 Masterson Crescent	
508 Mortimer Drive	
545 Mortimer Drive	
557 Mortimer Drive	
561 Mortimer Drive	
567 Mortimer Drive	
597 Mortimer Drive	
661 Mortimer Drive	
669 Mortimer Drive	
673 Mortimer Drive	
701 Mortimer Drive	
705 Mortimer Drive	
709 Mortimer Drive	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
7 Newport Drive	
15 Newport Drive	
19 Newport Drive	
35 Newport Drive	
39 Newport Drive	
43 Newport Drive	
79 Newport Drive	
83 Newport Drive	
107 Newport Drive	
137 Newport Drive	
143 Newport Drive	
161 Newport Drive	
173 Newport Drive	
30 Watch Hill Lane	
46 Watch Hill Lane	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
179 Newport Drive	
191 Newport Drive	
215 Newport Drive	
221 Newport Drive	
233 Newport Drive	
239 Newport Drive	
269 Newport Drive	
299 Newport Drive	
327 Newport Drive	
331 Newport Drive	
355 Newport Drive	
375 Newport Drive	
415 Newport Drive	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
12 Chrysler Crescent	
32 Chrysler Crescent	
68 Chrysler Crescent	
36 Livingstone Crescent	
47 Livingstone Crescent	
14 Chateau Crescent	
38 Chateau Crescent	
861 Shannon Drive	
717 Kummer Crescent	
733 Kummer Crescent	
737 Kummer Crescent	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
978 Mary Avenue	
1075 Mary Avenue	
1083 Mary Avenue	
1095 Mary Avenue	
1107 Mary Avenue	
1119 Mary Avenue	
1123 Mary Avenue	
1127 Mary Avenue	
1131 Mary Avenue	
1181 Mary Avenue	
1323 Mary Avenue	
1377 Mary Avenue	
1431 Mary Avenue	

LAURIER
Canadian Excellence

Research Team Member: _____

Date: _____

ADDRESS	ACTION TAKEN
405 Old Newbury Lane	
423 Old Newbury Lane	
427 Old Newbury Lane	
435 Old Newbury Lane	
445 Old Newbury Lane	
505 Old Newbury Lane	
529 Old Newbury Lane	
513 Trico Drive	
521 Trico Drive	
541 Trico Drive	
545 Trico Drive	
569 Trico Drive	
609 Trico Drive	
613 Trico Drive	
6 Providence Drive	

Appendix W

Certificate of Appreciation

Certificate of Appreciation

Annette Penney's
Quality of Life Study at LFVA

This certificate is awarded to

Sherry McNeil

In recognition of her valuable contributions as a
Research Team Leader

LAURIER
Canadian Excellence

Signature

Date

EXCELLENCE AWARD

Appendix X

Rotated Component and Correlation Matrices for Factor Analysis

166(a)

Rotated Component Matrix[a]

	Component					
	1	2	3	4	5	6
Q4 Culture	-.063	-.026	.817	.063	.202	.023
Q5 Culture	-.036	-.031	.817	.071	.004	.002
Q6 Culture	.042	-.075	.880	.105	.072	.007
Q7 Culture	.024	.061	.788	.077	-.102	-.056
Q8 Culture	.014	-.168	.572	.023	.023	-.110
Q9 Work	.785	.082	-.008	-.052	.213	.043
Q10 Work	.857	.043	-.036	-.165	.083	.041
Q11 Work	.834	.067	-.037	-.012	.108	.162
Q12 Work	.885	.122	.012	-.002	.036	.048
Q13 Work	.871	.141	.027	.003	.091	-.044
Q14 Community	.129	.171	.036	-.020	.035	.112
Q15 Community	-.045	.101	.319	.321	-.052	-.074
Q16 Community	-.199	-.049	.120	.714	-.016	.027
Q17 Community	.024	-.088	.187	.764	.072	.105
Q18 Community	-.041	.104	-.006	.541	-.018	.239
Q19 Social Programs & Conditions	-.041	.092	.073	.795	.100	-.100
Q20 Social Programs & Conditions	-.065	-.016	.087	.309	.216	-.121
Q21 Social Programs & Conditions	-.083	.086	.127	.213	-.094	.204
Q22 Social Programs & Conditions	.109	.081	.005	.011	.154	-.098
Q23 Social Programs & Conditions	.247	.137	.262	.391	-.025	.010
Q24 Family, Friends, & Connections	.032	.833	-.067	.020	.066	.278
Q25 Family, Friends, & Connections	.213	.660	-.117	.034	.195	.013
Q26 Family, Friends, & Connections	.194	.621	-.104	.148	-.033	-.059
Q27 Family, Friends, & Connections	.289	.429	.046	.149	.191	.100
Q28 Family, Friends, & Connections	.107	.811	.024	-.098	.035	.045
Q29 Health	.088	.153	.001	.201	-.002	.257
Q30 Health	.096	.024	-.123	.036	-.091	.706
Q31 Health	-.136	-.341	.163	-.111	-.095	-.534
Q32 Health	.052	-.029	.079	.123	.057	.076
Q33 Health	.029	.104	.136	-.108	.107	-.130
Q34 Personal Well-being	.099	.299	.084	.108	.078	.121
Q35 Personal Well-being	.041	.490	.138	.004	.100	.240
Q36 Personal Well-being	.110	.394	.133	-.012	.332	.254
Q37 Personal Well-being	.087	.568	.003	.013	.217	.544
Q38 Personal Well-being	.054	.458	.103	-.120	.059	.653
Q39 Environment	.059	.042	.099	-.133	.147	.092
Q40 Environment	.013	.107	.033	-.083	.129	-.041
Q41 Environment	.062	.144	-.054	.048	.003	.024
Q42 Environment	-.092	.017	-.017	.284	.366	.059
Q43 Environment	-.019	.044	.131	.071	.176	-.022
Q44 Economy	.283	.063	-.021	-.037	.111	-.241
Q45 Economy	.054	-.020	.031	-.059	-.024	-.051
Q46 Economy	.122	-.003	.113	-.021	.143	.088

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

166(b)

Rotated Component Matrix[a]

	Component					
	1	2	3	4	5	6
Q47 Economy	.190	.387	.127	.112	.338	.282
Q48 Economy	.258	.280	.201	.191	.301	.316
Q49 Transport & Infrastructure	.156	.271	-.040	.199	.496	-.005
Q50 Transport & Infrastructure	.048	.077	.182	.249	.298	.338
Q51 Transport & Infrastructure	.016	.181	-.026	-.029	.002	.207
Q52 Transport & Infrastructure	.000	.193	.426	.315	-.061	-.063
Q53 Transport & Infrastructure	-.050	.302	.100	.111	.222	.229
Q54 Education	.300	.083	.043	.043	.151	.047
Q55 Education	.184	-.026	.123	.075	.182	-.007
Q56 Education	.273	.121	.125	-.011	.701	.042
Q57 Education	.223	.219	.101	.126	.744	.121
Q58 Education	.125	-.013	-.082	-.058	.671	-.091

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

166(c)

Rotated Component Matrix[a]

	Component					
	7	8	9	10	11	12
Q4 Culture	-.015	.099	.011	-.026	-.088	-.034
Q5 Culture	.115	.014	.006	-.113	.129	.084
Q6 Culture	.073	.020	.037	.035	.036	.028
Q7 Culture	.064	-.056	.023	.227	.124	.038
Q8 Culture	-.131	.070	.145	.142	-.167	.423
Q9 Work	.113	.132	.034	-.020	-.037	-.023
Q10 Work	.043	.075	.108	.012	-.044	.064
Q11 Work	.009	.003	.136	.090	-.007	.033
Q12 Work	-.008	.084	.079	.027	.069	-.041
Q13 Work	.031	-.056	.077	.093	-.044	-.009
Q14 Community	.105	.766	-.097	.105	.098	.025
Q15 Community	-.001	.032	.174	-.053	.081	.206
Q16 Community	.119	-.120	.118	-.033	.155	-.071
Q17 Community	-.009	-.129	-.068	.100	.059	.121
Q18 Community	.377	.226	7.663E-05	.113	.002	.183
Q19 Social Programs & Conditions	.055	.021	.009	-.128	.156	.017
Q20 Social Programs & Conditions	.008	-.142	.060	.063	.694	-.150
Q21 Social Programs & Conditions	.101	-.010	.015	-.091	.777	.027
Q22 Social Programs & Conditions	.172	.224	.132	.180	.633	.167
Q23 Social Programs & Conditions	-.154	.171	.302	-.213	.047	.076
Q24 Family, Friends, & Connections	.035	-.003	.115	.020	.063	-.010
Q25 Family, Friends, & Connections	.095	.153	.270	-.083	-.131	.111
Q26 Family, Friends, & Connections	.265	.022	-.092	-.175	-.006	.030
Q27 Family, Friends, & Connections	.268	.091	-.304	.087	.022	-.051
Q28 Family, Friends, & Connections	-.035	.113	-.116	.024	.136	-.011
Q29 Health	-.034	-.001	-.065	-.021	.225	.169
Q30 Health	.258	.067	-.084	-.058	.117	.038
Q31 Health	.031	-.154	-.041	-.042	.154	.097
Q32 Health	.841	.028	.010	.060	.020	.045
Q33 Health	.250	.168	-.020	.109	.068	-.182
Q34 Personal Well-being	.692	-.019	-.175	-.033	.256	.097
Q35 Personal Well-being	.622	.020	.065	.040	.014	-.041
Q36 Personal Well-being	.287	.295	-.174	.261	.086	.084
Q37 Personal Well-being	.196	.106	.012	.083	.177	.075
Q38 Personal Well-being	.158	.091	.097	.039	-.007	-.107
Q39 Environment	-.068	.738	.016	.105	-.069	.069
Q40 Environment	.064	.289	.134	.042	.025	.021
Q41 Environment	-.037	.515	.180	-.030	-.073	-.303
Q42 Environment	.156	.413	.106	.351	.052	-.072
Q43 Environment	.104	.010	.016	-.014	.026	.791
Q44 Economy	.083	-.251	.132	.409	.103	.342
Q45 Economy	.094	.187	-.034	.766	-.067	.090
Q46 Economy	-.051	.108	.029	.803	.082	-.084

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

Rotated Component Matrix[a]

	Component					
	7	8	9	10	11	12
Q47 Economy	.080	.332	-.133	.146	-.077	.309
Q48 Economy	.173	.148	-.231	.147	-.096	.253
Q49 Transport & Infrastructure	.273	.099	.019	.143	.051	.170
Q50 Transport & Infrastructure	-.106	.094	.253	-.146	.248	.302
Q51 Transport & Infrastructure	.049	.040	.028	.018	-.086	.089
Q52 Transport & Infrastructure	.031	.093	.189	.085	.144	-.011
Q53 Transport & Infrastructure	.144	-.241	-.011	.285	-.017	-.032
Q54 Education	-.119	-.069	.754	.021	.126	.050
Q55 Education	.033	.023	.850	.031	.015	-.012
Q56 Education	-.012	.023	.209	-.033	.033	.103
Q57 Education	.038	.041	.002	-.007	.159	.125
Q58 Education	.115	.186	.257	.242	-.053	.017

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

166(e)

Rotated Component Matrix[a]

	Component			
	13	14	15	16
Q4 Culture	-.057	.165	.042	-.010
Q5 Culture	.019	.010	-.001	-.008
Q6 Culture	.009	-.022	.036	.100
Q7 Culture	.003	-.099	-.009	.026
Q8 Culture	-.159	.143	-.051	-.298
Q9 Work	-.062	-.041	-.131	.166
Q10 Work	.073	.036	.048	.082
Q11 Work	-.051	.135	.091	-.085
Q12 Work	.056	-.030	-.017	-.049
Q13 Work	.033	-.005	.034	-.148
Q14 Community	-.006	.008	.065	.034
Q15 Community	-.293	.184	.014	.487
Q16 Community	-.070	-.001	-.047	.014
Q17 Community	.169	.079	.041	.217
Q18 Community	-.069	.110	.239	-.133
Q19 Social Programs & Conditions	-.042	-.008	-.092	-.056
Q20 Social Programs & Conditions	.134	.153	.163	.060
Q21 Social Programs & Conditions	-.046	.089	-.017	-.073
Q22 Social Programs & Conditions	-.245	.050	-.200	.094
Q23 Social Programs & Conditions	-.017	-.145	-.334	-.307
Q24 Family, Friends, & Connections	.049	.071	-.003	.071
Q25 Family, Friends, & Connections	-.115	-.010	-.088	.094
Q26 Family, Friends, & Connections	.116	.153	.179	-.265
Q27 Family, Friends, & Connections	.042	.197	.144	.173
Q28 Family, Friends, & Connections	.198	.106	.081	-.028
Q29 Health	-.009	.713	.100	-.062
Q30 Health	.227	.179	-.109	.072
Q31 Health	.037	.030	.035	.111
Q32 Health	.135	.123	.031	.121
Q33 Health	.072	.662	-.132	.107
Q34 Personal Well-being	-.068	-.061	.016	-.117
Q35 Personal Well-being	-.025	.124	.029	-.053
Q36 Personal Well-being	.054	-.161	.036	.100
Q37 Personal Well-being	.105	-.038	.059	.079
Q38 Personal Well-being	.081	.020	.110	-.041
Q39 Environment	.075	.086	.168	-.001
Q40 Environment	-.002	-.024	.754	-.001
Q41 Environment	-.047	.047	.490	-.019
Q42 Environment	.078	-.066	.080	-.091
Q43 Environment	.120	-.020	-.025	.059
Q44 Economy	-.201	-.080	-.005	-.329
Q45 Economy	.149	.080	.111	.241
Q46 Economy	-.060	.049	-.047	-.191

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

Rotated Component Matrix[a]

	Component			
	13	14	15	16
Q47 Economy	.112	-.031	.291	.150
Q48 Economy	.031	-.076	.340	.239
Q49 Transport & Infrastructure	.462	.104	-.056	-.081
Q50 Transport & Infrastructure	.186	.084	.023	.007
Q51 Transport & Infrastructure	.800	-.012	.012	-.023
Q52 Transport & Infrastructure	.293	.142	-.123	.214
Q53 Transport & Infrastructure	-.238	.415	.075	.193
Q54 Education	-.045	-.078	.119	.076
Q55 Education	.071	.005	.066	-.032
Q56 Education	.038	.002	.143	.076
Q57 Education	.035	.031	.103	-.148
Q58 Education	-.169	.139	-.084	.058

Extraction Method: Principal Component Analysis.
Rotation Method: Varimax with Kaiser Normalization.

a. Rotation converged in 15 iterations.

Correlations

166(g)

Correlations

		Q4 Culture	Q5 Culture	Q6 Culture	Q7 Culture
Q4 Culture	Pearson Correlation	1	.675**	.708**	.518**
	Sig. (2-tailed)		.000	.000	.000
	N	130	130	130	130
Q5 Culture	Pearson Correlation	.675**	1	.697**	.543**
	Sig. (2-tailed)	.000		.000	.000
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.708**	.697**	1	.694**
	Sig. (2-tailed)	.000	.000		.000
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.518**	.543**	.694**	1
	Sig. (2-tailed)	.000	.000	.000	
	N	130	130	130	130
Q8 Culture	Pearson Correlation	.411**	.393**	.464**	.458**
	Sig. (2-tailed)	.000	.000	.000	.000
	N	130	130	130	130
Q9 Work	Pearson Correlation	-.046	-.011	.058	.008
	Sig. (2-tailed)	.604	.904	.509	.930
	N	130	130	130	130
Q10 Work	Pearson Correlation	-.091	.006	.000	-.054
	Sig. (2-tailed)	.301	.942	.996	.539
	N	130	130	130	130
Q11 Work	Pearson Correlation	.039	-.080	-.012	-.032
	Sig. (2-tailed)	.662	.364	.888	.718
	N	130	130	130	130
Q12 Work	Pearson Correlation	-.020	-.049	.041	.055
	Sig. (2-tailed)	.819	.576	.645	.534
	N	130	130	130	130
Q13 Work	Pearson Correlation	-.019	-.032	.024	.049
	Sig. (2-tailed)	.832	.722	.782	.581
	N	130	130	130	130
Q14 Community	Pearson Correlation	.100	.056	.053	.052
	Sig. (2-tailed)	.256	.523	.550	.557
	N	130	130	130	130
Q15 Community	Pearson Correlation	.294**	.302**	.308**	.304**
	Sig. (2-tailed)	.001	.000	.000	.000
	N	130	130	130	130
Q16 Community	Pearson Correlation	.134	.192*	.205*	.167
	Sig. (2-tailed)	.129	.029	.020	.058
	N	130	130	130	130
Q17 Community	Pearson Correlation	.191*	.201*	.322**	.211*
	Sig. (2-tailed)	.029	.022	.000	.016
	N	130	130	130	130
Q18 Community	Pearson Correlation	.072	.071	.080	.062
	Sig. (2-tailed)	.415	.419	.366	.482
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.143	.188*	.172	.113
	Sig. (2-tailed)	.104	.032	.051	.199
	N	130	130	130	130

Correlations

		Q4 Culture	Q5 Culture	Q6 Culture	Q7 Culture
Q20 Social Programs & Conditions	Pearson Correlation	.082	.182*	.156	.127
	Sig. (2-tailed)	.353	.038	.077	.151
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.058	.228**	.158	.204*
	Sig. (2-tailed)	.513	.009	.072	.020
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.054	.076	.068	.141
	Sig. (2-tailed)	.543	.388	.443	.109
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.196*	.188*	.179*	.183*
	Sig. (2-tailed)	.025	.032	.042	.038
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	-.019	-.051	-.061	-.029
	Sig. (2-tailed)	.833	.568	.492	.744
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	-.035	-.074	-.079	-.050
	Sig. (2-tailed)	.692	.406	.372	.575
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	-.076	-.010	-.128	-.044
	Sig. (2-tailed)	.388	.907	.148	.621
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.089	.033	.073	.049
	Sig. (2-tailed)	.316	.707	.411	.578
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	-.009	-.012	-.006	.024
	Sig. (2-tailed)	.915	.893	.949	.791
	N	130	130	130	130
Q29 Health	Pearson Correlation	.111	.087	.027	.030
	Sig. (2-tailed)	.209	.323	.763	.736
	N	130	130	130	130
Q30 Health	Pearson Correlation	-.108	-.075	-.059	-.087
	Sig. (2-tailed)	.223	.397	.507	.322
	N	130	130	130	130
Q31 Health	Pearson Correlation	.085	.116	.110	.149
	Sig. (2-tailed)	.337	.190	.213	.090
	N	130	130	130	130
Q32 Health	Pearson Correlation	.111	.150	.175*	.118
	Sig. (2-tailed)	.208	.088	.047	.182
	N	130	130	130	130
Q33 Health	Pearson Correlation	.184*	.096	.147	.038
	Sig. (2-tailed)	.037	.275	.096	.669
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	-.028	.188*	.116	.170
	Sig. (2-tailed)	.753	.032	.187	.054
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.145	.147	.124	.087
	Sig. (2-tailed)	.099	.096	.161	.326
	N	130	130	130	130

Correlations

		Q4 Culture	Q5 Culture	Q6 Culture	Q7 Culture
Q36 Personal Well-being	Pearson Correlation	.149	.089	.156	.160
	Sig. (2-tailed)	.090	.314	.077	.069
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.026	.018	-.012	.026
	Sig. (2-tailed)	.771	.837	.896	.767
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.064	.073	.056	.056
	Sig. (2-tailed)	.468	.408	.526	.528
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.164	.002	.138	.018
	Sig. (2-tailed)	.062	.980	.118	.836
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.110	-.003	.025	.030
	Sig. (2-tailed)	.215	.971	.781	.735
	N	130	130	130	130
Q41 Environment	Pearson Correlation	.044	-.053	-.016	-.081
	Sig. (2-tailed)	.622	.553	.858	.357
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.096	.056	.022	.043
	Sig. (2-tailed)	.277	.526	.807	.627
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.163	.237**	.169	.093
	Sig. (2-tailed)	.063	.007	.055	.292
	N	130	130	130	130
Q44 Economy	Pearson Correlation	-.073	-.026	.048	.111
	Sig. (2-tailed)	.411	.771	.591	.207
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.031	-.006	.121	.148
	Sig. (2-tailed)	.728	.942	.171	.093
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.140	.044	.089	.186*
	Sig. (2-tailed)	.112	.618	.314	.034
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.169	.106	.204*	.083
	Sig. (2-tailed)	.055	.229	.020	.350
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.215*	.149	.240**	.186*
	Sig. (2-tailed)	.014	.092	.006	.034
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.071	.023	.024	.043
	Sig. (2-tailed)	.422	.792	.790	.626
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.198*	.268**	.209*	.094
	Sig. (2-tailed)	.024	.002	.017	.289
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	-.031	-.014	-.037	.034
	Sig. (2-tailed)	.730	.871	.673	.704
	N	130	130	130	130

Correlations

		Q4 Culture	Q5 Culture	Q6 Culture	Q7 Culture
Q52 Transport & Infrastructure	Pearson Correlation	.264**	.335**	.346**	.376**
	Sig. (2-tailed)	.002	.000	.000	.000
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.174*	.033	.059	.152
	Sig. (2-tailed)	.048	.707	.503	.083
	N	130	130	130	130
Q54 Education	Pearson Correlation	.046	.055	.110	.060
	Sig. (2-tailed)	.606	.534	.211	.500
	N	130	130	130	130
Q55 Education	Pearson Correlation	.136	.083	.201*	.114
	Sig. (2-tailed)	.122	.347	.022	.198
	N	130	130	130	130
Q56 Education	Pearson Correlation	.186*	.082	.187*	.066
	Sig. (2-tailed)	.034	.356	.034	.457
	N	130	130	130	130
Q57 Education	Pearson Correlation	.161	.059	.148	.051
	Sig. (2-tailed)	.067	.508	.093	.563
	N	130	130	130	130
Q58 Education	Pearson Correlation	.094	-.063	.022	-.025
	Sig. (2-tailed)	.288	.478	.808	.779
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	.048	.128	.078	.085
	Sig. (2-tailed)	.586	.145	.376	.337
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	.108	.018	.074	-.049
	Sig. (2-tailed)	.222	.842	.401	.579
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	.099	.177*	.113	.111
	Sig. (2-tailed)	.263	.044	.199	.208
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	-.091	-.126	.005	.050
	Sig. (2-tailed)	.303	.152	.954	.575
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.008	-.050	.043	-.013
	Sig. (2-tailed)	.929	.571	.631	.880
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	-.226**	-.172	-.128	-.147
	Sig. (2-tailed)	.010	.050	.146	.095
	N	130	130	130	130

Correlations

		Q8 Culture	Q9 Work	Q10 Work	Q11 Work	Q12 Work
Q4 Culture	Pearson Correlation	.411**	-.046	-.091	.039	-.020
	Sig. (2-tailed)	.000	.604	.301	.662	.819
	N	130	130	130	130	130
Q5 Culture	Pearson Correlation	.393**	-.011	.006	-.080	-.049
	Sig. (2-tailed)	.000	.904	.942	.364	.576
	N	130	130	130	130	130
Q6 Culture	Pearson Correlation	.464**	.058	.000	-.012	.041
	Sig. (2-tailed)	.000	.509	.996	.888	.645
	N	130	130	130	130	130
Q7 Culture	Pearson Correlation	.458**	.008	-.054	-.032	.055
	Sig. (2-tailed)	.000	.930	.539	.718	.534
	N	130	130	130	130	130
Q8 Culture	Pearson Correlation	1	-.013	.007	.036	-.035
	Sig. (2-tailed)		.881	.941	.685	.692
	N	130	130	130	130	130
Q9 Work	Pearson Correlation	-.013	1	.728**	.609**	.642**
	Sig. (2-tailed)	.881		.000	.000	.000
	N	130	130	130	130	130
Q10 Work	Pearson Correlation	.007	.728**	1	.694**	.731**
	Sig. (2-tailed)	.941	.000		.000	.000
	N	130	130	130	130	130
Q11 Work	Pearson Correlation	.036	.609**	.694**	1	.755**
	Sig. (2-tailed)	.685	.000	.000		.000
	N	130	130	130	130	130
Q12 Work	Pearson Correlation	-.035	.642**	.731**	.755**	1
	Sig. (2-tailed)	.692	.000	.000	.000	
	N	130	130	130	130	130
Q13 Work	Pearson Correlation	.062	.606**	.765**	.735**	.815**
	Sig. (2-tailed)	.482	.000	.000	.000	.000
	N	130	130	130	130	130
Q14 Community	Pearson Correlation	-.025	.197*	.172	.137	.202*
	Sig. (2-tailed)	.777	.025	.050	.120	.021
	N	130	130	130	130	130
Q15 Community	Pearson Correlation	.181*	-.036	-.026	-.030	-.051
	Sig. (2-tailed)	.039	.686	.765	.736	.565
	N	130	130	130	130	130
Q16 Community	Pearson Correlation	.053	-.186*	-.280**	-.174*	-.153
	Sig. (2-tailed)	.550	.034	.001	.047	.082
	N	130	130	130	130	130
Q17 Community	Pearson Correlation	.111	.006	-.063	.021	-.022
	Sig. (2-tailed)	.207	.945	.479	.809	.806
	N	130	130	130	130	130
Q18 Community	Pearson Correlation	.046	-.036	-.071	.077	.013
	Sig. (2-tailed)	.604	.681	.425	.385	.885
	N	130	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.004	-.044	-.188*	-.055	-.022
	Sig. (2-tailed)	.968	.621	.032	.533	.806
	N	130	130	130	130	130

Correlations

		Q8 Culture	Q9 Work	Q10 Work	Q11 Work	Q12 Work
Q20 Social Programs & Conditions	Pearson Correlation	-.083	-.076	-.091	-.072	-.015
	Sig. (2-tailed)	.349	.393	.305	.415	.869
	N	130	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.055	-.069	-.111	-.043	-.041
	Sig. (2-tailed)	.532	.435	.208	.629	.644
	N	130	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.060	.173*	.069	.198*	.168
	Sig. (2-tailed)	.498	.049	.436	.024	.056
	N	130	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.302**	.199*	.094	.203*	.258**
	Sig. (2-tailed)	.000	.023	.287	.021	.003
	N	130	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	-.218*	.115	.123	.175*	.160
	Sig. (2-tailed)	.013	.194	.164	.046	.068
	N	130	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	-.076	.354**	.263**	.298**	.267**
	Sig. (2-tailed)	.392	.000	.002	.001	.002
	N	130	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	-.154	.192*	.190*	.190*	.232**
	Sig. (2-tailed)	.079	.029	.030	.030	.008
	N	130	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	-.135	.309**	.206*	.321**	.239**
	Sig. (2-tailed)	.125	.000	.019	.000	.006
	N	130	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	-.184*	.148	.182*	.128	.218*
	Sig. (2-tailed)	.036	.094	.038	.147	.013
	N	130	130	130	130	130
Q29 Health	Pearson Correlation	.042	.028	.054	.198*	.110
	Sig. (2-tailed)	.638	.753	.544	.024	.213
	N	130	130	130	130	130
Q30 Health	Pearson Correlation	-.195*	.129	.108	.126	.101
	Sig. (2-tailed)	.026	.143	.223	.152	.252
	N	130	130	130	130	130
Q31 Health	Pearson Correlation	.158	-.175*	-.176*	-.227**	-.197*
	Sig. (2-tailed)	.072	.046	.045	.009	.025
	N	130	130	130	130	130
Q32 Health	Pearson Correlation	-.086	.092	.057	.118	.054
	Sig. (2-tailed)	.332	.296	.520	.181	.538
	N	130	130	130	130	130
Q33 Health	Pearson Correlation	.048	.089	.068	.068	.033
	Sig. (2-tailed)	.587	.315	.445	.439	.709
	N	130	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	-.079	.169	.099	.089	.113
	Sig. (2-tailed)	.373	.054	.261	.315	.201
	N	130	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	-.055	.208*	.133	.138	.128
	Sig. (2-tailed)	.537	.018	.131	.118	.148
	N	130	130	130	130	130

Correlations

		Q8 Culture	Q9 Work	Q10 Work	Q11 Work	Q12 Work
Q36 Personal Well-being	Pearson Correlation	-.106	.215*	.149	.166	.224*
	Sig. (2-tailed)	.230	.014	.090	.059	.010
	N	130	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	-.149	.206*	.141	.258**	.222*
	Sig. (2-tailed)	.091	.019	.109	.003	.011
	N	130	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	-.126	.122	.155	.215*	.170
	Sig. (2-tailed)	.154	.168	.077	.014	.053
	N	130	130	130	130	130
Q39 Environment	Pearson Correlation	.161	.147	.186*	.104	.128
	Sig. (2-tailed)	.068	.094	.034	.237	.146
	N	130	130	130	130	130
Q40 Environment	Pearson Correlation	.047	.021	.088	.140	.049
	Sig. (2-tailed)	.594	.810	.317	.112	.582
	N	130	130	130	130	130
Q41 Environment	Pearson Correlation	-.128	.081	.106	.141	.121
	Sig. (2-tailed)	.148	.359	.231	.109	.171
	N	130	130	130	130	130
Q42 Environment	Pearson Correlation	.045	.060	.026	.013	.017
	Sig. (2-tailed)	.608	.496	.771	.885	.848
	N	130	130	130	130	130
Q43 Environment	Pearson Correlation	.275**	.020	.051	.010	.027
	Sig. (2-tailed)	.002	.822	.564	.913	.761
	N	130	130	130	130	130
Q44 Economy	Pearson Correlation	.257**	.150	.214*	.300**	.212*
	Sig. (2-tailed)	.003	.089	.014	.001	.016
	N	130	130	130	130	130
Q45 Economy	Pearson Correlation	.101	.115	.138	.082	.041
	Sig. (2-tailed)	.253	.194	.118	.353	.642
	N	130	130	130	130	130
Q46 Economy	Pearson Correlation	.158	.108	.095	.222*	.158
	Sig. (2-tailed)	.072	.222	.281	.011	.073
	N	130	130	130	130	130
Q47 Economy	Pearson Correlation	.078	.304**	.287**	.257**	.206*
	Sig. (2-tailed)	.380	.000	.001	.003	.018
	N	130	130	130	130	130
Q48 Economy	Pearson Correlation	.059	.299**	.249**	.260**	.250**
	Sig. (2-tailed)	.502	.001	.004	.003	.004
	N	130	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	-.025	.225**	.225**	.210*	.217*
	Sig. (2-tailed)	.777	.010	.010	.016	.013
	N	130	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.123	.107	.111	.158	.108
	Sig. (2-tailed)	.165	.225	.210	.072	.222
	N	130	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	-.154	.000	.088	.085	.078
	Sig. (2-tailed)	.080	.999	.320	.335	.375
	N	130	130	130	130	130

Correlations

		Q8 Culture	Q9 Work	Q10 Work	Q11 Work	Q12 Work
Q52 Transport & Infrastructure	Pearson Correlation	.230**	-.005	-.028	.002	.082
	Sig. (2-tailed)	.009	.951	.750	.978	.355
	N	130	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.009	.059	.013	.110	-.025
	Sig. (2-tailed)	.915	.503	.887	.215	.779
	N	130	130	130	130	130
Q54 Education	Pearson Correlation	.086	.267**	.308**	.345**	.325**
	Sig. (2-tailed)	.332	.002	.000	.000	.000
	N	130	130	130	130	130
Q55 Education	Pearson Correlation	.180*	.197*	.252**	.257**	.236**
	Sig. (2-tailed)	.040	.025	.004	.003	.007
	N	130	130	130	130	130
Q56 Education	Pearson Correlation	.119	.384**	.302**	.342**	.284**
	Sig. (2-tailed)	.177	.000	.000	.000	.001
	N	130	130	130	130	130
Q57 Education	Pearson Correlation	.142	.262**	.245**	.340**	.289**
	Sig. (2-tailed)	.108	.003	.005	.000	.001
	N	130	130	130	130	130
Q58 Education	Pearson Correlation	.072	.311**	.241**	.223*	.171
	Sig. (2-tailed)	.413	.000	.006	.011	.051
	N	130	130	130	130	130
Q59 Age Group	Pearson Correlation	.011	-.390**	-.392**	-.429**	-.447**
	Sig. (2-tailed)	.898	.000	.000	.000	.000
	N	130	130	130	130	130
Q60 Country Born	Pearson Correlation	.108	-.203*	-.169	-.128	-.164
	Sig. (2-tailed)	.222	.021	.055	.145	.062
	N	130	130	130	130	130
Q61 Relationship Status	Pearson Correlation	-.064	-.168	-.236**	-.297**	-.302**
	Sig. (2-tailed)	.468	.056	.007	.001	.000
	N	130	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	-.020	.238**	.234**	.239**	.335**
	Sig. (2-tailed)	.823	.006	.007	.006	.000
	N	130	130	130	130	130
Q63 Income Level	Pearson Correlation	.061	.444**	.482**	.469**	.452**
	Sig. (2-tailed)	.489	.000	.000	.000	.000
	N	130	130	130	130	130
Q64 Attend Langs	Pearson Correlation	-.120	.285**	.298**	.120	.106
	Sig. (2-tailed)	.174	.001	.001	.174	.231
	N	130	130	130	130	130

Correlations

		Q13 Work	Q14 Community	Q15 Community	Q16 Community
Q4 Culture	Pearson Correlation	-.019	.100	.294**	.134
	Sig. (2-tailed)	.832	.256	.001	.129
	N	130	130	130	130
Q5 Culture	Pearson Correlation	-.032	.056	.302**	.192*
	Sig. (2-tailed)	.722	.523	.000	.029
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.024	.053	.308**	.205*
	Sig. (2-tailed)	.782	.550	.000	.020
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.049	.052	.304**	.167
	Sig. (2-tailed)	.581	.557	.000	.058
	N	130	130	130	130
Q8 Culture	Pearson Correlation	.062	-.025	.181*	.053
	Sig. (2-tailed)	.482	.777	.039	.550
	N	130	130	130	130
Q9 Work	Pearson Correlation	.606**	.197*	-.036	-.186*
	Sig. (2-tailed)	.000	.025	.686	.034
	N	130	130	130	130
Q10 Work	Pearson Correlation	.765**	.172	-.026	-.280**
	Sig. (2-tailed)	.000	.050	.765	.001
	N	130	130	130	130
Q11 Work	Pearson Correlation	.735**	.137	-.030	-.174*
	Sig. (2-tailed)	.000	.120	.736	.047
	N	130	130	130	130
Q12 Work	Pearson Correlation	.815**	.202*	-.051	-.153
	Sig. (2-tailed)	.000	.021	.565	.082
	N	130	130	130	130
Q13 Work	Pearson Correlation	1	.097	-.082	-.154
	Sig. (2-tailed)		.273	.352	.081
	N	130	130	130	130
Q14 Community	Pearson Correlation	.097	1	.060	-.055
	Sig. (2-tailed)	.273		.498	.532
	N	130	130	130	130
Q15 Community	Pearson Correlation	-.082	.060	1	.239**
	Sig. (2-tailed)	.352	.498		.006
	N	130	130	130	130
Q16 Community	Pearson Correlation	-.154	-.055	.239**	1
	Sig. (2-tailed)	.081	.532	.006	
	N	130	130	130	130
Q17 Community	Pearson Correlation	-.024	-.112	.315**	.524**
	Sig. (2-tailed)	.784	.204	.000	.000
	N	130	130	130	130
Q18 Community	Pearson Correlation	.006	.206*	.202*	.275**
	Sig. (2-tailed)	.950	.018	.021	.002
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	-.029	.020	.302**	.545**
	Sig. (2-tailed)	.746	.821	.000	.000
	N	130	130	130	130

Correlations

		Q13 Work	Q14 Community	Q15 Community	Q16 Community
Q20 Social Programs & Conditions	Pearson Correlation	-.013	-.010	.188*	.320**
	Sig. (2-tailed)	.882	.908	.032	.000
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.121	.037	.129	.335**
	Sig. (2-tailed)	.172	.676	.143	.000
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.079	.170	.225**	.059
	Sig. (2-tailed)	.370	.053	.010	.508
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.244**	.051	.122	.249**
	Sig. (2-tailed)	.005	.568	.168	.004
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.158	.196*	.056	.003
	Sig. (2-tailed)	.073	.026	.528	.973
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.263**	.217*	.063	-.045
	Sig. (2-tailed)	.002	.013	.479	.613
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.238**	.129	.000	.008
	Sig. (2-tailed)	.006	.143	.996	.929
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.257**	.256**	.075	-.020
	Sig. (2-tailed)	.003	.003	.399	.825
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.224*	.270**	-.040	-.097
	Sig. (2-tailed)	.010	.002	.650	.271
	N	130	130	130	130
Q29 Health	Pearson Correlation	.058	.187*	.178*	.201*
	Sig. (2-tailed)	.510	.033	.042	.022
	N	130	130	130	130
Q30 Health	Pearson Correlation	-.015	.179*	-.104	.065
	Sig. (2-tailed)	.867	.042	.240	.463
	N	130	130	130	130
Q31 Health	Pearson Correlation	-.151	-.189*	.032	.043
	Sig. (2-tailed)	.086	.031	.719	.625
	N	130	130	130	130
Q32 Health	Pearson Correlation	.100	.167	.104	.165
	Sig. (2-tailed)	.257	.057	.237	.061
	N	130	130	130	130
Q33 Health	Pearson Correlation	.042	.081	.143	-.088
	Sig. (2-tailed)	.633	.358	.106	.317
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.115	.201*	.066	.177*
	Sig. (2-tailed)	.194	.022	.454	.044
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.160	.200*	.095	.086
	Sig. (2-tailed)	.070	.022	.280	.330
	N	130	130	130	130

Correlations

		Q13 Work	Q14 Community	Q15 Community	Q16 Community
Q36 Personal Well-being	Pearson Correlation	.197*	.430**	-.001	-.050
	Sig. (2-tailed)	.024	.000	.989	.570
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.146	.285**	.103	.019
	Sig. (2-tailed)	.098	.001	.244	.831
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.122	.248**	-.036	-.109
	Sig. (2-tailed)	.167	.004	.681	.217
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.079	.560**	.004	-.186*
	Sig. (2-tailed)	.374	.000	.968	.034
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.055	.237**	.032	-.077
	Sig. (2-tailed)	.536	.007	.719	.384
	N	130	130	130	130
Q41 Environment	Pearson Correlation	.058	.398**	-.042	-.067
	Sig. (2-tailed)	.515	.000	.638	.449
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.030	.310**	.010	.139
	Sig. (2-tailed)	.736	.000	.914	.114
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.041	.015	.133	.063
	Sig. (2-tailed)	.643	.867	.131	.477
	N	130	130	130	130
Q44 Economy	Pearson Correlation	.326**	-.030	-.026	-.086
	Sig. (2-tailed)	.000	.735	.767	.331
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.032	.238**	.002	-.046
	Sig. (2-tailed)	.715	.006	.981	.606
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.205*	.167	-.022	-.082
	Sig. (2-tailed)	.019	.057	.802	.352
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.209*	.415**	.127	-.036
	Sig. (2-tailed)	.017	.000	.148	.687
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.265**	.324**	.170	-.036
	Sig. (2-tailed)	.002	.000	.053	.686
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.241**	.223*	-.032	.052
	Sig. (2-tailed)	.006	.011	.719	.556
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.104	.119	.207*	.127
	Sig. (2-tailed)	.239	.176	.018	.151
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.053	.115	-.154	-.097
	Sig. (2-tailed)	.547	.193	.081	.270
	N	130	130	130	130

Correlations

		Q13 Work	Q14 Community	Q15 Community	Q16 Community
Q52 Transport & Infrastructure	Pearson Correlation	.022	.095	.308**	.245**
	Sig. (2-tailed)	.806	.281	.000	.005
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.070	.016	.206*	.143
	Sig. (2-tailed)	.429	.859	.019	.105
	N	130	130	130	130
Q54 Education	Pearson Correlation	.317**	-.014	.147	.095
	Sig. (2-tailed)	.000	.874	.095	.282
	N	130	130	130	130
Q55 Education	Pearson Correlation	.248**	-.014	.147	.101
	Sig. (2-tailed)	.004	.875	.096	.251
	N	130	130	130	130
Q56 Education	Pearson Correlation	.263**	.144	.118	-.034
	Sig. (2-tailed)	.002	.102	.182	.704
	N	130	130	130	130
Q57 Education	Pearson Correlation	.310**	.165	.074	.073
	Sig. (2-tailed)	.000	.061	.403	.411
	N	130	130	130	130
Q58 Education	Pearson Correlation	.193*	.189*	.030	-.018
	Sig. (2-tailed)	.028	.032	.733	.836
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	-.381**	-.006	.267**	.210*
	Sig. (2-tailed)	.000	.943	.002	.016
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	-.057	-.042	.089	.126
	Sig. (2-tailed)	.522	.637	.316	.153
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	-.256**	-.115	.121	.058
	Sig. (2-tailed)	.003	.192	.169	.516
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	.309**	.134	-.084	.085
	Sig. (2-tailed)	.000	.128	.344	.334
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.430**	.281**	-.148	-.144
	Sig. (2-tailed)	.000	.001	.094	.102
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	.172	.149	-.156	-.483**
	Sig. (2-tailed)	.050	.092	.076	.000
	N	130	130	130	130

Correlations

		Q17 Community	Q18 Community	Q19 Social Programs & Conditions	Q20 Social Programs & Conditions
Q4 Culture	Pearson Correlation	.191*	.072	.143	.082
	Sig. (2-tailed)	.029	.415	.104	.353
	N	130	130	130	130
Q5 Culture	Pearson Correlation	.201*	.071	.188*	.182*
	Sig. (2-tailed)	.022	.419	.032	.038
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.322**	.080	.172	.156
	Sig. (2-tailed)	.000	.366	.051	.077
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.211*	.062	.113	.127
	Sig. (2-tailed)	.016	.482	.199	.151
	N	130	130	130	130
Q8 Culture	Pearson Correlation	.111	.046	.004	-.083
	Sig. (2-tailed)	.207	.604	.968	.349
	N	130	130	130	130
Q9 Work	Pearson Correlation	.006	-.036	-.044	-.076
	Sig. (2-tailed)	.945	.681	.621	.393
	N	130	130	130	130
Q10 Work	Pearson Correlation	-.063	-.071	-.188*	-.091
	Sig. (2-tailed)	.479	.425	.032	.305
	N	130	130	130	130
Q11 Work	Pearson Correlation	.021	.077	-.055	-.072
	Sig. (2-tailed)	.809	.385	.533	.415
	N	130	130	130	130
Q12 Work	Pearson Correlation	-.022	.013	-.022	-.015
	Sig. (2-tailed)	.806	.885	.806	.869
	N	130	130	130	130
Q13 Work	Pearson Correlation	-.024	.006	-.029	-.013
	Sig. (2-tailed)	.784	.950	.746	.882
	N	130	130	130	130
Q14 Community	Pearson Correlation	-.112	.206*	.020	-.010
	Sig. (2-tailed)	.204	.018	.821	.908
	N	130	130	130	130
Q15 Community	Pearson Correlation	.315**	.202*	.302**	.188*
	Sig. (2-tailed)	.000	.021	.000	.032
	N	130	130	130	130
Q16 Community	Pearson Correlation	.524**	.275**	.545**	.320**
	Sig. (2-tailed)	.000	.002	.000	.000
	N	130	130	130	130
Q17 Community	Pearson Correlation	1	.360**	.510**	.327**
	Sig. (2-tailed)		.000	.000	.000
	N	130	130	130	130
Q18 Community	Pearson Correlation	.360**	1	.390**	.151
	Sig. (2-tailed)	.000		.000	.086
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.510**	.390**	1	.386**
	Sig. (2-tailed)	.000	.000		.000
	N	130	130	130	130

Correlations

		Q17 Community	Q18 Community	Q19 Social Programs & Conditions	Q20 Social Programs & Conditions
Q20 Social Programs & Conditions	Pearson Correlation	.327**	.151	.386**	1
	Sig. (2-tailed)	.000	.086	.000	
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.219*	.251**	.282**	.484**
	Sig. (2-tailed)	.012	.004	.001	.000
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.073	.130	.140	.324**
	Sig. (2-tailed)	.409	.142	.113	.000
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.194*	.119	.345**	.027
	Sig. (2-tailed)	.027	.178	.000	.764
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.006	.203*	.052	.057
	Sig. (2-tailed)	.943	.021	.555	.520
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	-.030	.070	.104	-.121
	Sig. (2-tailed)	.735	.428	.240	.169
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.008	.300**	.169	.035
	Sig. (2-tailed)	.925	.001	.054	.691
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.124	.305**	.179*	.096
	Sig. (2-tailed)	.161	.000	.041	.279
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	-.032	.109	-.007	.071
	Sig. (2-tailed)	.715	.216	.933	.422
	N	130	130	130	130
Q29 Health	Pearson Correlation	.212*	.241**	.183*	.217*
	Sig. (2-tailed)	.015	.006	.037	.013
	N	130	130	130	130
Q30 Health	Pearson Correlation	.174*	.227**	-.027	-.007
	Sig. (2-tailed)	.048	.009	.757	.934
	N	130	130	130	130
Q31 Health	Pearson Correlation	-.038	-.192*	-.057	.111
	Sig. (2-tailed)	.671	.029	.523	.209
	N	130	130	130	130
Q32 Health	Pearson Correlation	.185*	.371**	.162	.128
	Sig. (2-tailed)	.035	.000	.065	.147
	N	130	130	130	130
Q33 Health	Pearson Correlation	.013	.062	-.023	.199*
	Sig. (2-tailed)	.887	.482	.792	.023
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.121	.342**	.174*	.139
	Sig. (2-tailed)	.172	.000	.048	.114
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	-.011	.388**	.035	.070
	Sig. (2-tailed)	.905	.000	.692	.427
	N	130	130	130	130

Correlations

		Q17 Community	Q18 Community	Q19 Social Programs & Conditions	Q20 Social Programs & Conditions
Q36 Personal Well-being	Pearson Correlation	.062	.288**	.019	.029
	Sig. (2-tailed)	.481	.001	.834	.739
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.069	.290**	.074	.115
	Sig. (2-tailed)	.436	.001	.402	.195
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	-.046	.210*	-.033	-.041
	Sig. (2-tailed)	.600	.017	.712	.644
	N	130	130	130	130
Q39 Environment	Pearson Correlation	-.097	.168	-.070	-.071
	Sig. (2-tailed)	.271	.055	.431	.423
	N	130	130	130	130
Q40 Environment	Pearson Correlation	-.015	.130	-.105	.070
	Sig. (2-tailed)	.863	.141	.236	.431
	N	130	130	130	130
Q41 Environment	Pearson Correlation	-.061	.183*	-.024	-.039
	Sig. (2-tailed)	.493	.037	.787	.657
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.226**	.300**	.145	.170
	Sig. (2-tailed)	.010	.001	.100	.053
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.214*	.194*	.145	.032
	Sig. (2-tailed)	.014	.027	.099	.719
	N	130	130	130	130
Q44 Economy	Pearson Correlation	-.026	-.035	.039	.059
	Sig. (2-tailed)	.765	.695	.660	.506
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.084	.096	-.160	-.004
	Sig. (2-tailed)	.341	.276	.068	.962
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.012	.152	-.046	.107
	Sig. (2-tailed)	.890	.085	.607	.224
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.181*	.393**	.060	.010
	Sig. (2-tailed)	.040	.000	.498	.909
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.275**	.387**	.110	.029
	Sig. (2-tailed)	.002	.000	.214	.742
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.226**	.246**	.193*	.204*
	Sig. (2-tailed)	.010	.005	.028	.020
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.298**	.224*	.233**	.255**
	Sig. (2-tailed)	.001	.010	.008	.003
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.079	.045	-.018	-.051
	Sig. (2-tailed)	.372	.612	.841	.564
	N	130	130	130	130

Correlations

		Q17 Community	Q18 Community	Q19 Social Programs & Conditions	Q20 Social Programs & Conditions
Q52 Transport & Infrastructure	Pearson Correlation	.371**	.175*	.210*	.241**
	Sig. (2-tailed)	.000	.047	.016	.006
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.209*	.191*	.044	.161
	Sig. (2-tailed)	.017	.029	.616	.067
	N	130	130	130	130
Q54 Education	Pearson Correlation	-.018	-.027	.090	.160
	Sig. (2-tailed)	.840	.763	.309	.068
	N	130	130	130	130
Q55 Education	Pearson Correlation	.065	.112	.100	.163
	Sig. (2-tailed)	.460	.204	.260	.064
	N	130	130	130	130
Q56 Education	Pearson Correlation	.067	.106	.037	.151
	Sig. (2-tailed)	.447	.228	.673	.086
	N	130	130	130	130
Q57 Education	Pearson Correlation	.187*	.190*	.180*	.248**
	Sig. (2-tailed)	.033	.030	.041	.004
	N	130	130	130	130
Q58 Education	Pearson Correlation	-.040	.056	.032	.040
	Sig. (2-tailed)	.650	.530	.715	.653
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	.124	.136	.097	.122
	Sig. (2-tailed)	.160	.123	.272	.168
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	.054	-.026	-.047	-.087
	Sig. (2-tailed)	.540	.769	.595	.327
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	.118	-.105	.062	.081
	Sig. (2-tailed)	.182	.236	.485	.357
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	.057	-.058	.181*	-.122
	Sig. (2-tailed)	.520	.513	.039	.166
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.085	.075	-.014	-.133
	Sig. (2-tailed)	.334	.399	.876	.132
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	-.348**	-.096	-.235**	-.104
	Sig. (2-tailed)	.000	.277	.007	.237
	N	130	130	130	130

Correlations

		Q21 Social Programs & Conditions	Q22 Social Programs & Conditions	Q23 Social Programs & Conditions	Q24 Family, Friends, & Connections
Q4 Culture	Pearson Correlation	.058	.054	.196*	-.019
	Sig. (2-tailed)	.513	.543	.025	.833
	N	130	130	130	130
Q5 Culture	Pearson Correlation	.228**	.076	.188*	-.051
	Sig. (2-tailed)	.009	.388	.032	.568
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.158	.068	.179*	-.061
	Sig. (2-tailed)	.072	.443	.042	.492
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.204*	.141	.183*	-.029
	Sig. (2-tailed)	.020	.109	.038	.744
	N	130	130	130	130
Q8 Culture	Pearson Correlation	-.055	.060	.302**	-.218*
	Sig. (2-tailed)	.532	.498	.000	.013
	N	130	130	130	130
Q9 Work	Pearson Correlation	-.069	.173*	.199*	.115
	Sig. (2-tailed)	.435	.049	.023	.194
	N	130	130	130	130
Q10 Work	Pearson Correlation	-.111	.069	.094	.123
	Sig. (2-tailed)	.208	.436	.287	.164
	N	130	130	130	130
Q11 Work	Pearson Correlation	-.043	.198*	.203*	.175*
	Sig. (2-tailed)	.629	.024	.021	.046
	N	130	130	130	130
Q12 Work	Pearson Correlation	-.041	.168	.258**	.160
	Sig. (2-tailed)	.644	.056	.003	.068
	N	130	130	130	130
Q13 Work	Pearson Correlation	-.121	.079	.244**	.158
	Sig. (2-tailed)	.172	.370	.005	.073
	N	130	130	130	130
Q14 Community	Pearson Correlation	.037	.170	.051	.196*
	Sig. (2-tailed)	.676	.053	.568	.026
	N	130	130	130	130
Q15 Community	Pearson Correlation	.129	.225**	.122	.056
	Sig. (2-tailed)	.143	.010	.168	.528
	N	130	130	130	130
Q16 Community	Pearson Correlation	.335**	.059	.249**	.003
	Sig. (2-tailed)	.000	.508	.004	.973
	N	130	130	130	130
Q17 Community	Pearson Correlation	.219*	.073	.194*	.006
	Sig. (2-tailed)	.012	.409	.027	.943
	N	130	130	130	130
Q18 Community	Pearson Correlation	.251**	.130	.119	.203*
	Sig. (2-tailed)	.004	.142	.178	.021
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.282**	.140	.345**	.052
	Sig. (2-tailed)	.001	.113	.000	.555
	N	130	130	130	130

Correlations

		Q21 Social Programs & Conditions	Q22 Social Programs & Conditions	Q23 Social Programs & Conditions	Q24 Family, Friends, & Connections
Q20 Social Programs & Conditions	Pearson Correlation	.484**	.324**	.027	.057
	Sig. (2-tailed)	.000	.000	.764	.520
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	1	.412**	.175*	.179*
	Sig. (2-tailed)		.000	.046	.042
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.412**	1	.127	.141
	Sig. (2-tailed)	.000		.151	.111
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.175*	.127	1	.095
	Sig. (2-tailed)	.046	.151		.280
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.179*	.141	.095	1
	Sig. (2-tailed)	.042	.111	.280	
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	-.006	.165	.176*	.617**
	Sig. (2-tailed)	.946	.061	.045	.000
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.119	.029	.105	.474**
	Sig. (2-tailed)	.177	.743	.236	.000
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.114	.126	-.035	.345**
	Sig. (2-tailed)	.196	.154	.696	.000
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.129	.082	.057	.683**
	Sig. (2-tailed)	.144	.351	.522	.000
	N	130	130	130	130
Q29 Health	Pearson Correlation	.311**	.102	-.020	.253**
	Sig. (2-tailed)	.000	.250	.824	.004
	N	130	130	130	130
Q30 Health	Pearson Correlation	.233**	.042	.037	.270**
	Sig. (2-tailed)	.008	.637	.678	.002
	N	130	130	130	130
Q31 Health	Pearson Correlation	.007	-.013	-.063	-.415**
	Sig. (2-tailed)	.933	.884	.475	.000
	N	130	130	130	130
Q32 Health	Pearson Correlation	.127	.177*	-.113	.104
	Sig. (2-tailed)	.150	.044	.202	.238
	N	130	130	130	130
Q33 Health	Pearson Correlation	.082	.213*	-.073	.104
	Sig. (2-tailed)	.355	.015	.407	.239
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.311**	.250**	.037	.252**
	Sig. (2-tailed)	.000	.004	.679	.004
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.177*	.166	.035	.504**
	Sig. (2-tailed)	.044	.059	.692	.000
	N	130	130	130	130

Correlations

		Q21 Social Programs & Conditions	Q22 Social Programs & Conditions	Q23 Social Programs & Conditions	Q24 Family, Friends, & Connections
Q36 Personal Well-being	Pearson Correlation	.057	.199*	.047	.375**
	Sig. (2-tailed)	.517	.023	.594	.000
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.240**	.192*	.051	.621**
	Sig. (2-tailed)	.006	.029	.564	.000
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.126	-.030	.010	.537**
	Sig. (2-tailed)	.154	.738	.910	.000
	N	130	130	130	130
Q39 Environment	Pearson Correlation	-.050	.065	.006	.056
	Sig. (2-tailed)	.574	.462	.943	.525
	N	130	130	130	130
Q40 Environment	Pearson Correlation	-.040	.079	-.094	.086
	Sig. (2-tailed)	.653	.373	.288	.333
	N	130	130	130	130
Q41 Environment	Pearson Correlation	-.050	-.006	.033	.143
	Sig. (2-tailed)	.576	.947	.708	.104
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.072	.222*	.049	.095
	Sig. (2-tailed)	.415	.011	.578	.281
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.060	.152	.112	.020
	Sig. (2-tailed)	.500	.085	.205	.819
	N	130	130	130	130
Q44 Economy	Pearson Correlation	-.023	.211*	.085	-.016
	Sig. (2-tailed)	.797	.016	.339	.854
	N	130	130	130	130
Q45 Economy	Pearson Correlation	-.103	.119	-.263**	.036
	Sig. (2-tailed)	.244	.177	.003	.681
	N	130	130	130	130
Q46 Economy	Pearson Correlation	-.009	.233**	-.005	.009
	Sig. (2-tailed)	.917	.008	.953	.916
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.007	.113	.029	.434**
	Sig. (2-tailed)	.934	.199	.741	.000
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.037	.053	.013	.341**
	Sig. (2-tailed)	.674	.552	.884	.000
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.074	.202*	.108	.310**
	Sig. (2-tailed)	.404	.021	.223	.000
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.282**	.207*	.279**	.213*
	Sig. (2-tailed)	.001	.018	.001	.015
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	-.040	-.162	.007	.238**
	Sig. (2-tailed)	.654	.065	.940	.006
	N	130	130	130	130

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Correlations

		Q21 Social Programs & Conditions	Q22 Social Programs & Conditions	Q23 Social Programs & Conditions	Q24 Family, Friends, & Connections
Q52 Transport & Infrastructure	Pearson Correlation	.208*	.140	.285**	.133
	Sig. (2-tailed)	.018	.112	.001	.130
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.118	.121	-.101	.342**
	Sig. (2-tailed)	.182	.169	.253	.000
	N	130	130	130	130
Q54 Education	Pearson Correlation	.085	.132	.305**	.145
	Sig. (2-tailed)	.339	.135	.000	.099
	N	130	130	130	130
Q55 Education	Pearson Correlation	.013	.143	.298**	.083
	Sig. (2-tailed)	.883	.106	.001	.350
	N	130	130	130	130
Q56 Education	Pearson Correlation	-.018	.190*	.175*	.201*
	Sig. (2-tailed)	.838	.030	.047	.022
	N	130	130	130	130
Q57 Education	Pearson Correlation	.136	.243**	.146	.277**
	Sig. (2-tailed)	.123	.005	.098	.001
	N	130	130	130	130
Q58 Education	Pearson Correlation	-.111	.244**	-.027	.060
	Sig. (2-tailed)	.211	.005	.762	.495
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	.189*	-.003	-.114	.096
	Sig. (2-tailed)	.032	.974	.197	.279
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	-.119	-.268**	.057	-.101
	Sig. (2-tailed)	.179	.002	.519	.253
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	.029	-.117	-.158	-.063
	Sig. (2-tailed)	.744	.186	.073	.475
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	-.022	.108	.101	.046
	Sig. (2-tailed)	.807	.219	.255	.606
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	-.162	.063	.086	.115
	Sig. (2-tailed)	.065	.474	.332	.194
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	-.073	.021	-.174*	.060
	Sig. (2-tailed)	.407	.817	.047	.498
	N	130	130	130	130

Correlations

		Q25 Family, Friends, & Connections	Q26 Family, Friends, & Connections	Q27 Family, Friends, & Connections
Q4 Culture	Pearson Correlation	-.035	-.076	.089
	Sig. (2-tailed)	.692	.388	.316
	N	130	130	130
Q5 Culture	Pearson Correlation	-.074	-.010	.033
	Sig. (2-tailed)	.406	.907	.707
	N	130	130	130
Q6 Culture	Pearson Correlation	-.079	-.128	.073
	Sig. (2-tailed)	.372	.148	.411
	N	130	130	130
Q7 Culture	Pearson Correlation	-.050	-.044	.049
	Sig. (2-tailed)	.575	.621	.578
	N	130	130	130
Q8 Culture	Pearson Correlation	-.076	-.154	-.135
	Sig. (2-tailed)	.392	.079	.125
	N	130	130	130
Q9 Work	Pearson Correlation	.354**	.192*	.309**
	Sig. (2-tailed)	.000	.029	.000
	N	130	130	130
Q10 Work	Pearson Correlation	.263**	.190*	.206*
	Sig. (2-tailed)	.002	.030	.019
	N	130	130	130
Q11 Work	Pearson Correlation	.298**	.190*	.321**
	Sig. (2-tailed)	.001	.030	.000
	N	130	130	130
Q12 Work	Pearson Correlation	.267**	.232**	.239**
	Sig. (2-tailed)	.002	.008	.006
	N	130	130	130
Q13 Work	Pearson Correlation	.263**	.238**	.257**
	Sig. (2-tailed)	.002	.006	.003
	N	130	130	130
Q14 Community	Pearson Correlation	.217*	.129	.256**
	Sig. (2-tailed)	.013	.143	.003
	N	130	130	130
Q15 Community	Pearson Correlation	.063	.000	.075
	Sig. (2-tailed)	.479	.996	.399
	N	130	130	130
Q16 Community	Pearson Correlation	-.045	.008	-.020
	Sig. (2-tailed)	.613	.929	.825
	N	130	130	130
Q17 Community	Pearson Correlation	-.030	.008	.124
	Sig. (2-tailed)	.735	.925	.161
	N	130	130	130
Q18 Community	Pearson Correlation	.070	.300**	.305**
	Sig. (2-tailed)	.428	.001	.000
	N	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.104	.169	.179*
	Sig. (2-tailed)	.240	.054	.041
	N	130	130	130

Correlations

		Q25 Family, Friends, & Connections	Q26 Family, Friends, & Connections	Q27 Family, Friends, & Connections
Q20 Social Programs & Conditions	Pearson Correlation	-.121	.035	.096
	Sig. (2-tailed)	.169	.691	.279
	N	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.006	.119	.114
	Sig. (2-tailed)	.946	.177	.196
	N	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.165	.029	.126
	Sig. (2-tailed)	.061	.743	.154
	N	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.176*	.105	-.035
	Sig. (2-tailed)	.045	.236	.696
	N	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.617**	.474**	.345**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	1	.372**	.303**
	Sig. (2-tailed)		.000	.000
	N	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.372**	1	.400**
	Sig. (2-tailed)	.000		.000
	N	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.303**	.400**	1
	Sig. (2-tailed)	.000	.000	
	N	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.416**	.512**	.428**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q29 Health	Pearson Correlation	.126	.236**	.250**
	Sig. (2-tailed)	.154	.007	.004
	N	130	130	130
Q30 Health	Pearson Correlation	.099	.138	.258**
	Sig. (2-tailed)	.260	.118	.003
	N	130	130	130
Q31 Health	Pearson Correlation	-.346**	-.251**	-.194*
	Sig. (2-tailed)	.000	.004	.027
	N	130	130	130
Q32 Health	Pearson Correlation	.121	.186*	.306**
	Sig. (2-tailed)	.172	.034	.000
	N	130	130	130
Q33 Health	Pearson Correlation	.059	.117	.301**
	Sig. (2-tailed)	.503	.186	.000
	N	130	130	130
Q34 Personal Well-being	Pearson Correlation	.218*	.406**	.336**
	Sig. (2-tailed)	.013	.000	.000
	N	130	130	130
Q35 Personal Well-being	Pearson Correlation	.344**	.433**	.433**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130

Correlations

		Q25 Family, Friends, & Connections	Q26 Family, Friends, & Connections	Q27 Family, Friends, & Connections
Q36 Personal Well-being	Pearson Correlation	.273**	.227**	.433**
	Sig. (2-tailed)	.002	.009	.000
	N	130	130	130
Q37 Personal Well-being	Pearson Correlation	.403**	.341**	.498**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q38 Personal Well-being	Pearson Correlation	.331**	.323**	.347**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q39 Environment	Pearson Correlation	.154	.051	.153
	Sig. (2-tailed)	.080	.564	.083
	N	130	130	130
Q40 Environment	Pearson Correlation	.178*	.147	.158
	Sig. (2-tailed)	.042	.094	.072
	N	130	130	130
Q41 Environment	Pearson Correlation	.192*	.117	.137
	Sig. (2-tailed)	.029	.186	.121
	N	130	130	130
Q42 Environment	Pearson Correlation	.127	.064	.166
	Sig. (2-tailed)	.149	.469	.058
	N	130	130	130
Q43 Environment	Pearson Correlation	.114	.037	.077
	Sig. (2-tailed)	.198	.677	.385
	N	130	130	130
Q44 Economy	Pearson Correlation	.149	.012	.039
	Sig. (2-tailed)	.090	.888	.660
	N	130	130	130
Q45 Economy	Pearson Correlation	-.037	-.052	.151
	Sig. (2-tailed)	.679	.560	.087
	N	130	130	130
Q46 Economy	Pearson Correlation	-.021	-.075	.121
	Sig. (2-tailed)	.815	.396	.171
	N	130	130	130
Q47 Economy	Pearson Correlation	.361**	.337**	.443**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q48 Economy	Pearson Correlation	.301**	.204*	.554**
	Sig. (2-tailed)	.001	.020	.000
	N	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.327**	.356**	.358**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.155	.108	.103
	Sig. (2-tailed)	.079	.220	.246
	N	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.087	.178*	.135
	Sig. (2-tailed)	.323	.042	.126
	N	130	130	130

Correlations

		Q25 Family, Friends, & Connections	Q26 Family, Friends, & Connections	Q27 Family, Friends, & Connections
Q52 Transport & Infrastructure	Pearson Correlation	.129	.018	.187*
	Sig. (2-tailed)	.142	.835	.033
	N	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.183*	.142	.300**
	Sig. (2-tailed)	.037	.108	.001
	N	130	130	130
Q54 Education	Pearson Correlation	.294**	.016	.009
	Sig. (2-tailed)	.001	.857	.919
	N	130	130	130
Q55 Education	Pearson Correlation	.190*	-.020	-.119
	Sig. (2-tailed)	.030	.819	.176
	N	130	130	130
Q56 Education	Pearson Correlation	.285**	.123	.250**
	Sig. (2-tailed)	.001	.164	.004
	N	130	130	130
Q57 Education	Pearson Correlation	.317**	.210*	.279**
	Sig. (2-tailed)	.000	.017	.001
	N	130	130	130
Q58 Education	Pearson Correlation	.288**	-.040	.153
	Sig. (2-tailed)	.001	.651	.082
	N	130	130	130
Q59 Age Group	Pearson Correlation	-.135	-.022	.035
	Sig. (2-tailed)	.125	.800	.689
	N	130	130	130
Q60 Country Born	Pearson Correlation	-.095	-.212*	-.216*
	Sig. (2-tailed)	.280	.016	.014
	N	130	130	130
Q61 Relationship Status	Pearson Correlation	-.084	-.155	.007
	Sig. (2-tailed)	.341	.079	.939
	N	130	130	130
Q62 Living Arrangements	Pearson Correlation	.200*	.040	.049
	Sig. (2-tailed)	.022	.654	.583
	N	130	130	130
Q63 Income Level	Pearson Correlation	.256**	.194*	.237**
	Sig. (2-tailed)	.003	.027	.007
	N	130	130	130
Q64 Attend Langs	Pearson Correlation	.137	.083	.155
	Sig. (2-tailed)	.119	.348	.079
	N	130	130	130

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Correlations

		Q28 Family, Friends, & Connections	Q29 Health	Q30 Health	Q31 Health
Q4 Culture	Pearson Correlation	-.009	.111	-.108	.085
	Sig. (2-tailed)	.915	.209	.223	.337
	N	130	130	130	130
Q5 Culture	Pearson Correlation	-.012	.087	-.075	.116
	Sig. (2-tailed)	.893	.323	.397	.190
	N	130	130	130	130
Q6 Culture	Pearson Correlation	-.006	.027	-.059	.110
	Sig. (2-tailed)	.949	.763	.507	.213
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.024	.030	-.087	.149
	Sig. (2-tailed)	.791	.736	.322	.090
	N	130	130	130	130
Q8 Culture	Pearson Correlation	-.184*	.042	-.195*	.158
	Sig. (2-tailed)	.036	.638	.026	.072
	N	130	130	130	130
Q9 Work	Pearson Correlation	.148	.028	.129	-.175*
	Sig. (2-tailed)	.094	.753	.143	.046
	N	130	130	130	130
Q10 Work	Pearson Correlation	.182*	.054	.108	-.176*
	Sig. (2-tailed)	.038	.544	.223	.045
	N	130	130	130	130
Q11 Work	Pearson Correlation	.128	.198*	.126	-.227**
	Sig. (2-tailed)	.147	.024	.152	.009
	N	130	130	130	130
Q12 Work	Pearson Correlation	.218*	.110	.101	-.197*
	Sig. (2-tailed)	.013	.213	.252	.025
	N	130	130	130	130
Q13 Work	Pearson Correlation	.224*	.058	-.015	-.151
	Sig. (2-tailed)	.010	.510	.867	.086
	N	130	130	130	130
Q14 Community	Pearson Correlation	.270**	.187*	.179*	-.189*
	Sig. (2-tailed)	.002	.033	.042	.031
	N	130	130	130	130
Q15 Community	Pearson Correlation	-.040	.178*	-.104	.032
	Sig. (2-tailed)	.650	.042	.240	.719
	N	130	130	130	130
Q16 Community	Pearson Correlation	-.097	.201*	.065	.043
	Sig. (2-tailed)	.271	.022	.463	.625
	N	130	130	130	130
Q17 Community	Pearson Correlation	-.032	.212*	.174*	-.038
	Sig. (2-tailed)	.715	.015	.048	.671
	N	130	130	130	130
Q18 Community	Pearson Correlation	.109	.241**	.227**	-.192*
	Sig. (2-tailed)	.216	.006	.009	.029
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	-.007	.183*	-.027	-.057
	Sig. (2-tailed)	.933	.037	.757	.523
	N	130	130	130	130

Correlations

		Q28 Family, Friends, & Connections	Q29 Health	Q30 Health	Q31 Health
Q20 Social Programs & Conditions	Pearson Correlation	.071	.217*	-.007	.111
	Sig. (2-tailed)	.422	.013	.934	.209
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.129	.311**	.233**	.007
	Sig. (2-tailed)	.144	.000	.008	.933
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.082	.102	.042	-.013
	Sig. (2-tailed)	.351	.250	.637	.884
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.057	-.020	.037	-.063
	Sig. (2-tailed)	.522	.824	.678	.475
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.683**	.253**	.270**	-.415**
	Sig. (2-tailed)	.000	.004	.002	.000
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.416**	.126	.099	-.346**
	Sig. (2-tailed)	.000	.154	.260	.000
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.512**	.236**	.138	-.251**
	Sig. (2-tailed)	.000	.007	.118	.004
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.428**	.250**	.258**	-.194*
	Sig. (2-tailed)	.000	.004	.003	.027
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	1	.235**	.155	-.277**
	Sig. (2-tailed)		.007	.079	.001
	N	130	130	130	130
Q29 Health	Pearson Correlation	.235**	1	.328**	-.109
	Sig. (2-tailed)	.007		.000	.217
	N	130	130	130	130
Q30 Health	Pearson Correlation	.155	.328**	1	-.313**
	Sig. (2-tailed)	.079	.000		.000
	N	130	130	130	130
Q31 Health	Pearson Correlation	-.277**	-.109	-.313**	1
	Sig. (2-tailed)	.001	.217	.000	
	N	130	130	130	130
Q32 Health	Pearson Correlation	.025	.089	.317**	-.017
	Sig. (2-tailed)	.781	.316	.000	.844
	N	130	130	130	130
Q33 Health	Pearson Correlation	.213*	.272**	.105	-.048
	Sig. (2-tailed)	.015	.002	.234	.589
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.272**	.228**	.272**	-.154
	Sig. (2-tailed)	.002	.009	.002	.080
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.387**	.200*	.244**	-.253**
	Sig. (2-tailed)	.000	.022	.005	.004
	N	130	130	130	130

Correlations

		Q28 Family, Friends, & Connections	Q29 Health	Q30 Health	Q31 Health
Q36 Personal Well-being	Pearson Correlation	.454**	.125	.235**	-.235**
	Sig. (2-tailed)	.000	.157	.007	.007
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.528**	.248**	.439**	-.454**
	Sig. (2-tailed)	.000	.004	.000	.000
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.450**	.150	.488**	-.429**
	Sig. (2-tailed)	.000	.089	.000	.000
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.193*	.038	.044	-.166
	Sig. (2-tailed)	.027	.669	.616	.059
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.173*	.016	-.003	-.091
	Sig. (2-tailed)	.049	.856	.973	.305
	N	130	130	130	130
Q41 Environment	Pearson Correlation	.179*	.063	.002	-.172*
	Sig. (2-tailed)	.041	.478	.979	.050
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.047	.026	-.022	-.143
	Sig. (2-tailed)	.599	.771	.806	.104
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.133	.076	.036	.056
	Sig. (2-tailed)	.132	.391	.681	.530
	N	130	130	130	130
Q44 Economy	Pearson Correlation	-.015	.006	-.170	.053
	Sig. (2-tailed)	.870	.948	.053	.548
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.033	.045	-.005	-.020
	Sig. (2-tailed)	.710	.609	.957	.823
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.087	.029	.009	-.106
	Sig. (2-tailed)	.324	.743	.922	.232
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.418**	.186*	.231**	-.303**
	Sig. (2-tailed)	.000	.034	.008	.000
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.256**	.176*	.237**	-.282**
	Sig. (2-tailed)	.003	.045	.007	.001
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.258**	.205*	.206*	-.212*
	Sig. (2-tailed)	.003	.019	.019	.015
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.086	.280**	.135	-.156
	Sig. (2-tailed)	.328	.001	.125	.075
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.272**	.097	.284**	-.179*
	Sig. (2-tailed)	.002	.271	.001	.042
	N	130	130	130	130

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Correlations

		Q28 Family, Friends, & Connections	Q29 Health	Q30 Health	Q31 Health
Q52 Transport & Infrastructure	Pearson Correlation	.153	.142	.101	.081
	Sig. (2-tailed)	.081	.108	.251	.359
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.220*	.357**	.127	-.099
	Sig. (2-tailed)	.012	.000	.151	.260
	N	130	130	130	130
Q54 Education	Pearson Correlation	.012	.073	-.072	-.074
	Sig. (2-tailed)	.890	.412	.413	.401
	N	130	130	130	130
Q55 Education	Pearson Correlation	-.010	-.023	-.089	-.071
	Sig. (2-tailed)	.912	.799	.315	.420
	N	130	130	130	130
Q56 Education	Pearson Correlation	.186*	.082	.067	-.128
	Sig. (2-tailed)	.034	.355	.446	.146
	N	130	130	130	130
Q57 Education	Pearson Correlation	.267**	.184*	.056	-.237**
	Sig. (2-tailed)	.002	.036	.527	.007
	N	130	130	130	130
Q58 Education	Pearson Correlation	.018	.086	-.062	-.018
	Sig. (2-tailed)	.843	.331	.482	.840
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	.110	.149	.048	.012
	Sig. (2-tailed)	.214	.091	.591	.893
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	-.142	-.027	-.168	.042
	Sig. (2-tailed)	.107	.763	.056	.634
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	-.048	.030	-.044	.062
	Sig. (2-tailed)	.591	.734	.617	.487
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	.026	-.008	-.057	-.069
	Sig. (2-tailed)	.772	.925	.517	.432
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.224*	.019	.071	-.201*
	Sig. (2-tailed)	.011	.831	.422	.022
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	.109	-.096	.045	-.028
	Sig. (2-tailed)	.219	.277	.614	.755
	N	130	130	130	130

Correlations

		Q32 Health	Q33 Health	Q34 Personal Well-being	Q35 Personal Well-being
Q4 Culture	Pearson Correlation	.111	.184*	-.028	.145
	Sig. (2-tailed)	.208	.037	.753	.099
	N	130	130	130	130
Q5 Culture	Pearson Correlation	.150	.096	.188*	.147
	Sig. (2-tailed)	.088	.275	.032	.096
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.175*	.147	.116	.124
	Sig. (2-tailed)	.047	.096	.187	.161
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.118	.038	.170	.087
	Sig. (2-tailed)	.182	.669	.054	.326
	N	130	130	130	130
Q8 Culture	Pearson Correlation	-.086	.048	-.079	-.055
	Sig. (2-tailed)	.332	.587	.373	.537
	N	130	130	130	130
Q9 Work	Pearson Correlation	.092	.089	.169	.208*
	Sig. (2-tailed)	.296	.315	.054	.018
	N	130	130	130	130
Q10 Work	Pearson Correlation	.057	.068	.099	.133
	Sig. (2-tailed)	.520	.445	.261	.131
	N	130	130	130	130
Q11 Work	Pearson Correlation	.118	.068	.089	.138
	Sig. (2-tailed)	.181	.439	.315	.118
	N	130	130	130	130
Q12 Work	Pearson Correlation	.054	.033	.113	.128
	Sig. (2-tailed)	.538	.709	.201	.148
	N	130	130	130	130
Q13 Work	Pearson Correlation	.100	.042	.115	.160
	Sig. (2-tailed)	.257	.633	.194	.070
	N	130	130	130	130
Q14 Community	Pearson Correlation	.167	.081	.201*	.200*
	Sig. (2-tailed)	.057	.358	.022	.022
	N	130	130	130	130
Q15 Community	Pearson Correlation	.104	.143	.066	.095
	Sig. (2-tailed)	.237	.106	.454	.280
	N	130	130	130	130
Q16 Community	Pearson Correlation	.165	-.088	.177*	.086
	Sig. (2-tailed)	.061	.317	.044	.330
	N	130	130	130	130
Q17 Community	Pearson Correlation	.185*	.013	.121	-.011
	Sig. (2-tailed)	.035	.887	.172	.905
	N	130	130	130	130
Q18 Community	Pearson Correlation	.371**	.062	.342**	.388**
	Sig. (2-tailed)	.000	.482	.000	.000
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.162	-.023	.174*	.035
	Sig. (2-tailed)	.065	.792	.048	.692
	N	130	130	130	130

Correlations

		Q32 Health	Q33 Health	Q34 Personal Well-being	Q35 Personal Well-being
Q20 Social Programs & Conditions	Pearson Correlation	.128	.199*	.139	.070
	Sig. (2-tailed)	.147	.023	.114	.427
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.127	.082	.311**	.177*
	Sig. (2-tailed)	.150	.355	.000	.044
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.177*	.213*	.250**	.166
	Sig. (2-tailed)	.044	.015	.004	.059
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	-.113	-.073	.037	.035
	Sig. (2-tailed)	.202	.407	.679	.692
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.104	.104	.252**	.504**
	Sig. (2-tailed)	.238	.239	.004	.000
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.121	.059	.218*	.344**
	Sig. (2-tailed)	.172	.503	.013	.000
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.186*	.117	.406**	.433**
	Sig. (2-tailed)	.034	.186	.000	.000
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.306**	.301**	.336**	.433**
	Sig. (2-tailed)	.000	.000	.000	.000
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.025	.213*	.272**	.387**
	Sig. (2-tailed)	.781	.015	.002	.000
	N	130	130	130	130
Q29 Health	Pearson Correlation	.089	.272**	.228**	.200*
	Sig. (2-tailed)	.316	.002	.009	.022
	N	130	130	130	130
Q30 Health	Pearson Correlation	.317**	.105	.272**	.244**
	Sig. (2-tailed)	.000	.234	.002	.005
	N	130	130	130	130
Q31 Health	Pearson Correlation	-.017	-.048	-.154	-.253**
	Sig. (2-tailed)	.844	.589	.080	.004
	N	130	130	130	130
Q32 Health	Pearson Correlation	1	.290**	.498**	.469**
	Sig. (2-tailed)		.001	.000	.000
	N	130	130	130	130
Q33 Health	Pearson Correlation	.290**	1	.109	.248**
	Sig. (2-tailed)	.001		.216	.004
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.498**	.109	1	.587**
	Sig. (2-tailed)	.000	.216		.000
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.469**	.248**	.587**	1
	Sig. (2-tailed)	.000	.004	.000	
	N	130	130	130	130

Correlations

		Q32 Health	Q33 Health	Q34 Personal Well-being	Q35 Personal Well-being
Q36 Personal Well-being	Pearson Correlation	.310**	.157	.439**	.428**
	Sig. (2-tailed)	.000	.074	.000	.000
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.242**	.074	.417**	.575**
	Sig. (2-tailed)	.006	.403	.000	.000
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.182*	.114	.267**	.470**
	Sig. (2-tailed)	.038	.197	.002	.000
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.035	.129	-.028	.060
	Sig. (2-tailed)	.694	.145	.756	.497
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.105	-.002	.073	.123
	Sig. (2-tailed)	.236	.983	.407	.162
	N	130	130	130	130
Q41 Environment	Pearson Correlation	-.027	.089	-.043	.096
	Sig. (2-tailed)	.758	.315	.624	.277
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.184*	.137	.126	.216*
	Sig. (2-tailed)	.036	.120	.154	.013
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.189*	-.029	.105	.091
	Sig. (2-tailed)	.031	.744	.236	.304
	N	130	130	130	130
Q44 Economy	Pearson Correlation	.040	-.030	.161	.002
	Sig. (2-tailed)	.651	.738	.067	.981
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.138	.187*	.032	.092
	Sig. (2-tailed)	.117	.033	.716	.299
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.051	.141	-.022	.092
	Sig. (2-tailed)	.566	.109	.803	.297
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.180*	.119	.283**	.354**
	Sig. (2-tailed)	.040	.178	.001	.000
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.274**	.107	.320**	.356**
	Sig. (2-tailed)	.002	.224	.000	.000
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.317**	.201*	.309**	.361**
	Sig. (2-tailed)	.000	.022	.000	.000
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.045	-.010	.084	.188*
	Sig. (2-tailed)	.609	.909	.340	.032
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.169	-.026	.082	.155
	Sig. (2-tailed)	.055	.768	.354	.079
	N	130	130	130	130

Correlations

		Q32 Health	Q33 Health	Q34 Personal Well-being	Q35 Personal Well-being
Q52 Transport & Infrastructure	Pearson Correlation	.155	.162	.138	.180*
	Sig. (2-tailed)	.078	.065	.117	.041
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.240**	.210*	.220*	.394**
	Sig. (2-tailed)	.006	.016	.012	.000
	N	130	130	130	130
Q54 Education	Pearson Correlation	-.074	-.057	-.074	.033
	Sig. (2-tailed)	.404	.516	.402	.710
	N	130	130	130	130
Q55 Education	Pearson Correlation	.059	.079	-.079	.081
	Sig. (2-tailed)	.507	.374	.374	.359
	N	130	130	130	130
Q56 Education	Pearson Correlation	.069	.052	.120	.143
	Sig. (2-tailed)	.436	.559	.175	.105
	N	130	130	130	130
Q57 Education	Pearson Correlation	.161	.097	.313**	.274**
	Sig. (2-tailed)	.067	.270	.000	.002
	N	130	130	130	130
Q58 Education	Pearson Correlation	.109	.128	.086	.113
	Sig. (2-tailed)	.218	.146	.333	.202
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	.093	.079	.106	.179*
	Sig. (2-tailed)	.290	.371	.231	.041
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	-.192*	.025	-.233**	-.172*
	Sig. (2-tailed)	.029	.773	.008	.050
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	.002	.081	-.077	-.059
	Sig. (2-tailed)	.984	.357	.382	.505
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	-.127	-.171	-.034	-.172*
	Sig. (2-tailed)	.151	.052	.697	.050
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.166	.074	.101	.005
	Sig. (2-tailed)	.059	.401	.253	.952
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	.077	.046	.063	.146
	Sig. (2-tailed)	.384	.603	.480	.097
	N	130	130	130	130

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Correlations

		Q36 Personal Well-being	Q37 Personal Well-being	Q38 Personal Well-being
Q4 Culture	Pearson Correlation	.149	.026	.064
	Sig. (2-tailed)	.090	.771	.468
	N	130	130	130
Q5 Culture	Pearson Correlation	.089	.018	.073
	Sig. (2-tailed)	.314	.837	.408
	N	130	130	130
Q6 Culture	Pearson Correlation	.156	-.012	.056
	Sig. (2-tailed)	.077	.896	.526
	N	130	130	130
Q7 Culture	Pearson Correlation	.160	.026	.056
	Sig. (2-tailed)	.069	.767	.528
	N	130	130	130
Q8 Culture	Pearson Correlation	-.106	-.149	-.126
	Sig. (2-tailed)	.230	.091	.154
	N	130	130	130
Q9 Work	Pearson Correlation	.215*	.206*	.122
	Sig. (2-tailed)	.014	.019	.168
	N	130	130	130
Q10 Work	Pearson Correlation	.149	.141	.155
	Sig. (2-tailed)	.090	.109	.077
	N	130	130	130
Q11 Work	Pearson Correlation	.166	.258**	.215*
	Sig. (2-tailed)	.059	.003	.014
	N	130	130	130
Q12 Work	Pearson Correlation	.224*	.222*	.170
	Sig. (2-tailed)	.010	.011	.053
	N	130	130	130
Q13 Work	Pearson Correlation	.197*	.146	.122
	Sig. (2-tailed)	.024	.098	.167
	N	130	130	130
Q14 Community	Pearson Correlation	.430**	.285**	.248**
	Sig. (2-tailed)	.000	.001	.004
	N	130	130	130
Q15 Community	Pearson Correlation	-.001	.103	-.036
	Sig. (2-tailed)	.989	.244	.681
	N	130	130	130
Q16 Community	Pearson Correlation	-.050	.019	-.109
	Sig. (2-tailed)	.570	.831	.217
	N	130	130	130
Q17 Community	Pearson Correlation	.062	.069	-.046
	Sig. (2-tailed)	.481	.436	.600
	N	130	130	130
Q18 Community	Pearson Correlation	.288**	.290**	.210*
	Sig. (2-tailed)	.001	.001	.017
	N	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.019	.074	-.033
	Sig. (2-tailed)	.834	.402	.712
	N	130	130	130

Correlations

		Q36 Personal Well-being	Q37 Personal Well-being	Q38 Personal Well-being
Q20 Social Programs & Conditions	Pearson Correlation	.029	.115	-.041
	Sig. (2-tailed)	.739	.195	.644
	N	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.057	.240**	.126
	Sig. (2-tailed)	.517	.006	.154
	N	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.199*	.192*	-.030
	Sig. (2-tailed)	.023	.029	.738
	N	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.047	.051	.010
	Sig. (2-tailed)	.594	.564	.910
	N	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.375**	.621**	.537**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.273**	.403**	.331**
	Sig. (2-tailed)	.002	.000	.000
	N	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.227**	.341**	.323**
	Sig. (2-tailed)	.009	.000	.000
	N	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.433**	.498**	.347**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.454**	.528**	.450**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q29 Health	Pearson Correlation	.125	.248**	.150
	Sig. (2-tailed)	.157	.004	.089
	N	130	130	130
Q30 Health	Pearson Correlation	.235**	.439**	.488**
	Sig. (2-tailed)	.007	.000	.000
	N	130	130	130
Q31 Health	Pearson Correlation	-.235**	-.454**	-.429**
	Sig. (2-tailed)	.007	.000	.000
	N	130	130	130
Q32 Health	Pearson Correlation	.310**	.242**	.182*
	Sig. (2-tailed)	.000	.006	.038
	N	130	130	130
Q33 Health	Pearson Correlation	.157	.074	.114
	Sig. (2-tailed)	.074	.403	.197
	N	130	130	130
Q34 Personal Well-being	Pearson Correlation	.439**	.417**	.267**
	Sig. (2-tailed)	.000	.000	.002
	N	130	130	130
Q35 Personal Well-being	Pearson Correlation	.428**	.575**	.470**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130

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Correlations

		Q36 Personal Well-being	Q37 Personal Well-being	Q38 Personal Well-being
Q36 Personal Well-being	Pearson Correlation	1	.590**	.402**
	Sig. (2-tailed)		.000	.000
	N	130	130	130
Q37 Personal Well-being	Pearson Correlation	.590**	1	.670**
	Sig. (2-tailed)	.000		.000
	N	130	130	130
Q38 Personal Well-being	Pearson Correlation	.402**	.670**	1
	Sig. (2-tailed)	.000	.000	
	N	130	130	130
Q39 Environment	Pearson Correlation	.302**	.235**	.202*
	Sig. (2-tailed)	.000	.007	.021
	N	130	130	130
Q40 Environment	Pearson Correlation	.171	.166	.174*
	Sig. (2-tailed)	.052	.059	.048
	N	130	130	130
Q41 Environment	Pearson Correlation	.181*	.144	.198*
	Sig. (2-tailed)	.039	.101	.024
	N	130	130	130
Q42 Environment	Pearson Correlation	.365**	.206*	.159
	Sig. (2-tailed)	.000	.019	.072
	N	130	130	130
Q43 Environment	Pearson Correlation	.241**	.158	-.017
	Sig. (2-tailed)	.006	.072	.843
	N	130	130	130
Q44 Economy	Pearson Correlation	.066	-.016	-.078
	Sig. (2-tailed)	.457	.858	.377
	N	130	130	130
Q45 Economy	Pearson Correlation	.262**	.066	.035
	Sig. (2-tailed)	.003	.453	.695
	N	130	130	130
Q46 Economy	Pearson Correlation	.254**	.140	.113
	Sig. (2-tailed)	.003	.113	.200
	N	130	130	130
Q47 Economy	Pearson Correlation	.579**	.557**	.425**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q48 Economy	Pearson Correlation	.568**	.493**	.382**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.403**	.406**	.225**
	Sig. (2-tailed)	.000	.000	.010
	N	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.221*	.297**	.315**
	Sig. (2-tailed)	.011	.001	.000
	N	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.149	.347**	.210*
	Sig. (2-tailed)	.091	.000	.017
	N	130	130	130

Correlations

		Q36 Personal Well-being	Q37 Personal Well-being	Q38 Personal Well-being
Q52 Transport & Infrastructure	Pearson Correlation	.138	.155	.122
	Sig. (2-tailed)	.117	.077	.166
	N	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.279**	.307**	.262**
	Sig. (2-tailed)	.001	.000	.003
	N	130	130	130
Q54 Education	Pearson Correlation	.061	.162	.087
	Sig. (2-tailed)	.490	.066	.326
	N	130	130	130
Q55 Education	Pearson Correlation	.007	.064	.116
	Sig. (2-tailed)	.940	.472	.188
	N	130	130	130
Q56 Education	Pearson Correlation	.299**	.253**	.149
	Sig. (2-tailed)	.001	.004	.092
	N	130	130	130
Q57 Education	Pearson Correlation	.399**	.447**	.222*
	Sig. (2-tailed)	.000	.000	.011
	N	130	130	130
Q58 Education	Pearson Correlation	.255**	.146	.059
	Sig. (2-tailed)	.003	.096	.502
	N	130	130	130
Q59 Age Group	Pearson Correlation	-.002	.136	.041
	Sig. (2-tailed)	.984	.122	.640
	N	130	130	130
Q60 Country Born	Pearson Correlation	-.180*	-.176*	-.051
	Sig. (2-tailed)	.040	.045	.563
	N	130	130	130
Q61 Relationship Status	Pearson Correlation	-.151	-.100	-.123
	Sig. (2-tailed)	.086	.255	.162
	N	130	130	130
Q62 Living Arrangements	Pearson Correlation	.169	-.010	-.013
	Sig. (2-tailed)	.054	.914	.888
	N	130	130	130
Q63 Income Level	Pearson Correlation	.310**	.165	.104
	Sig. (2-tailed)	.000	.061	.241
	N	130	130	130
Q64 Attend Langs	Pearson Correlation	.125	.116	.148
	Sig. (2-tailed)	.157	.188	.093
	N	130	130	130

Correlations

		Q39 Environment	Q40 Environment	Q41 Environment
Q4 Culture	Pearson Correlation	.164	.110	.044
	Sig. (2-tailed)	.062	.215	.622
	N	130	130	130
Q5 Culture	Pearson Correlation	.002	-.003	-.053
	Sig. (2-tailed)	.980	.971	.553
	N	130	130	130
Q6 Culture	Pearson Correlation	.138	.025	-.016
	Sig. (2-tailed)	.118	.781	.858
	N	130	130	130
Q7 Culture	Pearson Correlation	.018	.030	-.081
	Sig. (2-tailed)	.836	.735	.357
	N	130	130	130
Q8 Culture	Pearson Correlation	.161	.047	-.128
	Sig. (2-tailed)	.068	.594	.148
	N	130	130	130
Q9 Work	Pearson Correlation	.147	.021	.081
	Sig. (2-tailed)	.094	.810	.359
	N	130	130	130
Q10 Work	Pearson Correlation	.186*	.088	.106
	Sig. (2-tailed)	.034	.317	.231
	N	130	130	130
Q11 Work	Pearson Correlation	.104	.140	.141
	Sig. (2-tailed)	.237	.112	.109
	N	130	130	130
Q12 Work	Pearson Correlation	.128	.049	.121
	Sig. (2-tailed)	.146	.582	.171
	N	130	130	130
Q13 Work	Pearson Correlation	.079	.055	.058
	Sig. (2-tailed)	.374	.536	.515
	N	130	130	130
Q14 Community	Pearson Correlation	.560**	.237**	.398**
	Sig. (2-tailed)	.000	.007	.000
	N	130	130	130
Q15 Community	Pearson Correlation	.004	.032	-.042
	Sig. (2-tailed)	.968	.719	.638
	N	130	130	130
Q16 Community	Pearson Correlation	-.186*	-.077	-.067
	Sig. (2-tailed)	.034	.384	.449
	N	130	130	130
Q17 Community	Pearson Correlation	-.097	-.015	-.061
	Sig. (2-tailed)	.271	.863	.493
	N	130	130	130
Q18 Community	Pearson Correlation	.168	.130	.183*
	Sig. (2-tailed)	.055	.141	.037
	N	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	-.070	-.105	-.024
	Sig. (2-tailed)	.431	.236	.787
	N	130	130	130

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Correlations

		Q39 Environment	Q40 Environment	Q41 Environment
Q20 Social Programs & Conditions	Pearson Correlation	-.071	.070	-.039
	Sig. (2-tailed)	.423	.431	.657
	N	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.050	-.040	-.050
	Sig. (2-tailed)	.574	.653	.576
	N	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.065	.079	-.006
	Sig. (2-tailed)	.462	.373	.947
	N	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.006	-.094	.033
	Sig. (2-tailed)	.943	.288	.708
	N	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.056	.086	.143
	Sig. (2-tailed)	.525	.333	.104
	N	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.154	.178*	.192*
	Sig. (2-tailed)	.080	.042	.029
	N	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.051	.147	.117
	Sig. (2-tailed)	.564	.094	.186
	N	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.153	.158	.137
	Sig. (2-tailed)	.083	.072	.121
	N	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.193*	.173*	.179*
	Sig. (2-tailed)	.027	.049	.041
	N	130	130	130
Q29 Health	Pearson Correlation	.038	.016	.063
	Sig. (2-tailed)	.669	.856	.478
	N	130	130	130
Q30 Health	Pearson Correlation	.044	-.003	.002
	Sig. (2-tailed)	.616	.973	.979
	N	130	130	130
Q31 Health	Pearson Correlation	-.166	-.091	-.172*
	Sig. (2-tailed)	.059	.305	.050
	N	130	130	130
Q32 Health	Pearson Correlation	.035	.105	-.027
	Sig. (2-tailed)	.694	.236	.758
	N	130	130	130
Q33 Health	Pearson Correlation	.129	-.002	.089
	Sig. (2-tailed)	.145	.983	.315
	N	130	130	130
Q34 Personal Well-being	Pearson Correlation	-.028	.073	-.043
	Sig. (2-tailed)	.756	.407	.624
	N	130	130	130
Q35 Personal Well-being	Pearson Correlation	.060	.123	.096
	Sig. (2-tailed)	.497	.162	.277
	N	130	130	130

Correlations

		Q39 Environment	Q40 Environment	Q41 Environment
Q36 Personal Well-being	Pearson Correlation	.302**	.171	.181*
	Sig. (2-tailed)	.000	.052	.039
	N	130	130	130
Q37 Personal Well-being	Pearson Correlation	.235**	.166	.144
	Sig. (2-tailed)	.007	.059	.101
	N	130	130	130
Q38 Personal Well-being	Pearson Correlation	.202*	.174*	.198*
	Sig. (2-tailed)	.021	.048	.024
	N	130	130	130
Q39 Environment	Pearson Correlation	1	.371**	.290**
	Sig. (2-tailed)		.000	.001
	N	130	130	130
Q40 Environment	Pearson Correlation	.371**	1	.463**
	Sig. (2-tailed)	.000		.000
	N	130	130	130
Q41 Environment	Pearson Correlation	.290**	.463**	1
	Sig. (2-tailed)	.001	.000	
	N	130	130	130
Q42 Environment	Pearson Correlation	.272**	.223*	.253**
	Sig. (2-tailed)	.002	.011	.004
	N	130	130	130
Q43 Environment	Pearson Correlation	.069	.035	-.188*
	Sig. (2-tailed)	.437	.691	.033
	N	130	130	130
Q44 Economy	Pearson Correlation	-.160	-.002	-.111
	Sig. (2-tailed)	.068	.980	.208
	N	130	130	130
Q45 Economy	Pearson Correlation	.250**	.148	.091
	Sig. (2-tailed)	.004	.092	.305
	N	130	130	130
Q46 Economy	Pearson Correlation	.194*	.084	.013
	Sig. (2-tailed)	.027	.340	.882
	N	130	130	130
Q47 Economy	Pearson Correlation	.411**	.313**	.248**
	Sig. (2-tailed)	.000	.000	.005
	N	130	130	130
Q48 Economy	Pearson Correlation	.235**	.316**	.159
	Sig. (2-tailed)	.007	.000	.070
	N	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.129	.116	.030
	Sig. (2-tailed)	.143	.190	.732
	N	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.071	.048	.075
	Sig. (2-tailed)	.420	.588	.397
	N	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.154	.044	.019
	Sig. (2-tailed)	.081	.617	.831
	N	130	130	130

Correlations

		Q39 Environment	Q40 Environment	Q41 Environment
Q52 Transport & Infrastructure	Pearson Correlation	.051	.057	.049
	Sig. (2-tailed)	.563	.519	.581
	N	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.011	.052	.012
	Sig. (2-tailed)	.902	.558	.894
	N	130	130	130
Q54 Education	Pearson Correlation	.049	.135	.102
	Sig. (2-tailed)	.579	.126	.250
	N	130	130	130
Q55 Education	Pearson Correlation	.127	.112	.156
	Sig. (2-tailed)	.148	.205	.076
	N	130	130	130
Q56 Education	Pearson Correlation	.147	.250**	.126
	Sig. (2-tailed)	.095	.004	.154
	N	130	130	130
Q57 Education	Pearson Correlation	.250**	.220*	.050
	Sig. (2-tailed)	.004	.012	.569
	N	130	130	130
Q58 Education	Pearson Correlation	.249**	.152	.146
	Sig. (2-tailed)	.004	.085	.098
	N	130	130	130
Q59 Age Group	Pearson Correlation	.055	.014	-.157
	Sig. (2-tailed)	.534	.878	.075
	N	130	130	130
Q60 Country Born	Pearson Correlation	-.019	.045	.184*
	Sig. (2-tailed)	.827	.613	.036
	N	130	130	130
Q61 Relationship Status	Pearson Correlation	-.071	-.094	-.122
	Sig. (2-tailed)	.420	.290	.166
	N	130	130	130
Q62 Living Arrangements	Pearson Correlation	.159	.030	.060
	Sig. (2-tailed)	.071	.738	.499
	N	130	130	130
Q63 Income Level	Pearson Correlation	.309**	.148	.192*
	Sig. (2-tailed)	.000	.094	.028
	N	130	130	130
Q64 Attend Langs	Pearson Correlation	.199*	.088	.075
	Sig. (2-tailed)	.023	.318	.399
	N	130	130	130

Correlations

		Q42 Environment	Q43 Environment	Q44 Economy
Q4 Culture	Pearson Correlation	.096	.163	-.073
	Sig. (2-tailed)	.277	.063	.411
	N	130	130	130
Q5 Culture	Pearson Correlation	.056	.237**	-.026
	Sig. (2-tailed)	.526	.007	.771
	N	130	130	130
Q6 Culture	Pearson Correlation	.022	.169	.048
	Sig. (2-tailed)	.807	.055	.591
	N	130	130	130
Q7 Culture	Pearson Correlation	.043	.093	.111
	Sig. (2-tailed)	.627	.292	.207
	N	130	130	130
Q8 Culture	Pearson Correlation	.045	.275**	.257**
	Sig. (2-tailed)	.608	.002	.003
	N	130	130	130
Q9 Work	Pearson Correlation	.060	.020	.150
	Sig. (2-tailed)	.496	.822	.089
	N	130	130	130
Q10 Work	Pearson Correlation	.026	.051	.214*
	Sig. (2-tailed)	.771	.564	.014
	N	130	130	130
Q11 Work	Pearson Correlation	.013	.010	.300**
	Sig. (2-tailed)	.885	.913	.001
	N	130	130	130
Q12 Work	Pearson Correlation	.017	.027	.212*
	Sig. (2-tailed)	.848	.761	.016
	N	130	130	130
Q13 Work	Pearson Correlation	.030	.041	.326**
	Sig. (2-tailed)	.736	.643	.000
	N	130	130	130
Q14 Community	Pearson Correlation	.310**	.015	-.030
	Sig. (2-tailed)	.000	.867	.735
	N	130	130	130
Q15 Community	Pearson Correlation	.010	.133	-.026
	Sig. (2-tailed)	.914	.131	.767
	N	130	130	130
Q16 Community	Pearson Correlation	.139	.063	-.086
	Sig. (2-tailed)	.114	.477	.331
	N	130	130	130
Q17 Community	Pearson Correlation	.226**	.214*	-.026
	Sig. (2-tailed)	.010	.014	.765
	N	130	130	130
Q18 Community	Pearson Correlation	.300**	.194*	-.035
	Sig. (2-tailed)	.001	.027	.695
	N	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.145	.145	.039
	Sig. (2-tailed)	.100	.099	.660
	N	130	130	130

Correlations

		Q42 Environment	Q43 Environment	Q44 Economy
Q20 Social Programs & Conditions	Pearson Correlation	.170	.032	.059
	Sig. (2-tailed)	.053	.719	.506
	N	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.072	.060	-.023
	Sig. (2-tailed)	.415	.500	.797
	N	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.222*	.152	.211*
	Sig. (2-tailed)	.011	.085	.016
	N	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.049	.112	.085
	Sig. (2-tailed)	.578	.205	.339
	N	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.095	.020	-.016
	Sig. (2-tailed)	.281	.819	.854
	N	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.127	.114	.149
	Sig. (2-tailed)	.149	.198	.090
	N	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.064	.037	.012
	Sig. (2-tailed)	.469	.677	.888
	N	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.166	.077	.039
	Sig. (2-tailed)	.058	.385	.660
	N	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.047	.133	-.015
	Sig. (2-tailed)	.599	.132	.870
	N	130	130	130
Q29 Health	Pearson Correlation	.026	.076	.006
	Sig. (2-tailed)	.771	.391	.948
	N	130	130	130
Q30 Health	Pearson Correlation	-.022	.036	-.170
	Sig. (2-tailed)	.806	.681	.053
	N	130	130	130
Q31 Health	Pearson Correlation	-.143	.056	.053
	Sig. (2-tailed)	.104	.530	.548
	N	130	130	130
Q32 Health	Pearson Correlation	.184*	.189*	.040
	Sig. (2-tailed)	.036	.031	.651
	N	130	130	130
Q33 Health	Pearson Correlation	.137	-.029	-.030
	Sig. (2-tailed)	.120	.744	.738
	N	130	130	130
Q34 Personal Well-being	Pearson Correlation	.126	.105	.161
	Sig. (2-tailed)	.154	.236	.067
	N	130	130	130
Q35 Personal Well-being	Pearson Correlation	.216*	.091	.002
	Sig. (2-tailed)	.013	.304	.981
	N	130	130	130

Correlations

		Q42 Environment	Q43 Environment	Q44 Economy
Q36 Personal Well-being	Pearson Correlation	.365**	.241**	.066
	Sig. (2-tailed)	.000	.006	.457
	N	130	130	130
Q37 Personal Well-being	Pearson Correlation	.206*	.158	-.016
	Sig. (2-tailed)	.019	.072	.858
	N	130	130	130
Q38 Personal Well-being	Pearson Correlation	.159	-.017	-.078
	Sig. (2-tailed)	.072	.843	.377
	N	130	130	130
Q39 Environment	Pearson Correlation	.272**	.069	-.160
	Sig. (2-tailed)	.002	.437	.068
	N	130	130	130
Q40 Environment	Pearson Correlation	.223*	.035	-.002
	Sig. (2-tailed)	.011	.691	.980
	N	130	130	130
Q41 Environment	Pearson Correlation	.253**	-.188*	-.111
	Sig. (2-tailed)	.004	.033	.208
	N	130	130	130
Q42 Environment	Pearson Correlation	1	.070	.036
	Sig. (2-tailed)		.427	.681
	N	130	130	130
Q43 Environment	Pearson Correlation	.070	1	.178*
	Sig. (2-tailed)	.427		.043
	N	130	130	130
Q44 Economy	Pearson Correlation	.036	.178*	1
	Sig. (2-tailed)	.681	.043	
	N	130	130	130
Q45 Economy	Pearson Correlation	.227**	.064	.153
	Sig. (2-tailed)	.009	.466	.083
	N	130	130	130
Q46 Economy	Pearson Correlation	.318**	-.001	.300**
	Sig. (2-tailed)	.000	.989	.001
	N	130	130	130
Q47 Economy	Pearson Correlation	.347**	.300**	.025
	Sig. (2-tailed)	.000	.001	.774
	N	130	130	130
Q48 Economy	Pearson Correlation	.302**	.264**	.068
	Sig. (2-tailed)	.000	.002	.444
	N	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.358**	.240**	.200*
	Sig. (2-tailed)	.000	.006	.022
	N	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.314**	.308**	.006
	Sig. (2-tailed)	.000	.000	.944
	N	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.071	.118	-.147
	Sig. (2-tailed)	.424	.180	.095
	N	130	130	130

Correlations

		Q42 Environment	Q43 Environment	Q44 Economy
Q52 Transport & Infrastructure	Pearson Correlation	.119	.079	-.054
	Sig. (2-tailed)	.176	.371	.540
	N	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.139	.068	.055
	Sig. (2-tailed)	.114	.440	.537
	N	130	130	130
Q54 Education	Pearson Correlation	.090	.077	.198*
	Sig. (2-tailed)	.310	.385	.024
	N	130	130	130
Q55 Education	Pearson Correlation	.170	.075	.181*
	Sig. (2-tailed)	.053	.399	.040
	N	130	130	130
Q56 Education	Pearson Correlation	.156	.203*	.150
	Sig. (2-tailed)	.076	.021	.089
	N	130	130	130
Q57 Education	Pearson Correlation	.268**	.201*	.185*
	Sig. (2-tailed)	.002	.022	.035
	N	130	130	130
Q58 Education	Pearson Correlation	.308**	.131	.226**
	Sig. (2-tailed)	.000	.136	.010
	N	130	130	130
Q59 Age Group	Pearson Correlation	.045	.007	-.300**
	Sig. (2-tailed)	.613	.936	.001
	N	130	130	130
Q60 Country Born	Pearson Correlation	-.014	-.186*	-.092
	Sig. (2-tailed)	.876	.034	.297
	N	130	130	130
Q61 Relationship Status	Pearson Correlation	-.004	-.174*	-.235**
	Sig. (2-tailed)	.967	.047	.007
	N	130	130	130
Q62 Living Arrangements	Pearson Correlation	.091	-.072	.172
	Sig. (2-tailed)	.304	.417	.051
	N	130	130	130
Q63 Income Level	Pearson Correlation	.122	.188*	.108
	Sig. (2-tailed)	.168	.033	.220
	N	130	130	130
Q64 Attend Langs	Pearson Correlation	-.045	.120	.091
	Sig. (2-tailed)	.611	.173	.306
	N	130	130	130

Correlations

		Q45 Economy	Q46 Economy	Q47 Economy
Q4 Culture	Pearson Correlation	.031	.140	.169
	Sig. (2-tailed)	.728	.112	.055
	N	130	130	130
Q5 Culture	Pearson Correlation	-.006	.044	.106
	Sig. (2-tailed)	.942	.618	.229
	N	130	130	130
Q6 Culture	Pearson Correlation	.121	.089	.204*
	Sig. (2-tailed)	.171	.314	.020
	N	130	130	130
Q7 Culture	Pearson Correlation	.148	.186*	.083
	Sig. (2-tailed)	.093	.034	.350
	N	130	130	130
Q8 Culture	Pearson Correlation	.101	.158	.078
	Sig. (2-tailed)	.253	.072	.380
	N	130	130	130
Q9 Work	Pearson Correlation	.115	.108	.304**
	Sig. (2-tailed)	.194	.222	.000
	N	130	130	130
Q10 Work	Pearson Correlation	.138	.095	.287**
	Sig. (2-tailed)	.118	.281	.001
	N	130	130	130
Q11 Work	Pearson Correlation	.082	.222*	.257**
	Sig. (2-tailed)	.353	.011	.003
	N	130	130	130
Q12 Work	Pearson Correlation	.041	.158	.206*
	Sig. (2-tailed)	.642	.073	.018
	N	130	130	130
Q13 Work	Pearson Correlation	.032	.205*	.209*
	Sig. (2-tailed)	.715	.019	.017
	N	130	130	130
Q14 Community	Pearson Correlation	.238**	.167	.415**
	Sig. (2-tailed)	.006	.057	.000
	N	130	130	130
Q15 Community	Pearson Correlation	.002	-.022	.127
	Sig. (2-tailed)	.981	.802	.148
	N	130	130	130
Q16 Community	Pearson Correlation	-.046	-.082	-.036
	Sig. (2-tailed)	.606	.352	.687
	N	130	130	130
Q17 Community	Pearson Correlation	.084	.012	.181*
	Sig. (2-tailed)	.341	.890	.040
	N	130	130	130
Q18 Community	Pearson Correlation	.096	.152	.393**
	Sig. (2-tailed)	.276	.085	.000
	N	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	-.160	-.046	.060
	Sig. (2-tailed)	.068	.607	.498
	N	130	130	130

Correlations

		Q45 Economy	Q46 Economy	Q47 Economy
Q20 Social Programs & Conditions	Pearson Correlation	-.004	.107	.010
	Sig. (2-tailed)	.962	.224	.909
	N	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.103	-.009	.007
	Sig. (2-tailed)	.244	.917	.934
	N	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.119	.233**	.113
	Sig. (2-tailed)	.177	.008	.199
	N	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	-.263**	-.005	.029
	Sig. (2-tailed)	.003	.953	.741
	N	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.036	.009	.434**
	Sig. (2-tailed)	.681	.916	.000
	N	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	-.037	-.021	.361**
	Sig. (2-tailed)	.679	.815	.000
	N	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	-.052	-.075	.337**
	Sig. (2-tailed)	.560	.396	.000
	N	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.151	.121	.443**
	Sig. (2-tailed)	.087	.171	.000
	N	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.033	.087	.418**
	Sig. (2-tailed)	.710	.324	.000
	N	130	130	130
Q29 Health	Pearson Correlation	.045	.029	.186*
	Sig. (2-tailed)	.609	.743	.034
	N	130	130	130
Q30 Health	Pearson Correlation	-.005	.009	.231**
	Sig. (2-tailed)	.957	.922	.008
	N	130	130	130
Q31 Health	Pearson Correlation	-.020	-.106	-.303**
	Sig. (2-tailed)	.823	.232	.000
	N	130	130	130
Q32 Health	Pearson Correlation	.138	.051	.180*
	Sig. (2-tailed)	.117	.566	.040
	N	130	130	130
Q33 Health	Pearson Correlation	.187*	.141	.119
	Sig. (2-tailed)	.033	.109	.178
	N	130	130	130
Q34 Personal Well-being	Pearson Correlation	.032	-.022	.283**
	Sig. (2-tailed)	.716	.803	.001
	N	130	130	130
Q35 Personal Well-being	Pearson Correlation	.092	.092	.354**
	Sig. (2-tailed)	.299	.297	.000
	N	130	130	130

Correlations

		Q45 Economy	Q46 Economy	Q47 Economy
Q36 Personal Well-being	Pearson Correlation	.262**	.254**	.579**
	Sig. (2-tailed)	.003	.003	.000
	N	130	130	130
Q37 Personal Well-being	Pearson Correlation	.066	.140	.557**
	Sig. (2-tailed)	.453	.113	.000
	N	130	130	130
Q38 Personal Well-being	Pearson Correlation	.035	.113	.425**
	Sig. (2-tailed)	.695	.200	.000
	N	130	130	130
Q39 Environment	Pearson Correlation	.250**	.194*	.411**
	Sig. (2-tailed)	.004	.027	.000
	N	130	130	130
Q40 Environment	Pearson Correlation	.148	.084	.313**
	Sig. (2-tailed)	.092	.340	.000
	N	130	130	130
Q41 Environment	Pearson Correlation	.091	.013	.248**
	Sig. (2-tailed)	.305	.882	.005
	N	130	130	130
Q42 Environment	Pearson Correlation	.227**	.318**	.347**
	Sig. (2-tailed)	.009	.000	.000
	N	130	130	130
Q43 Environment	Pearson Correlation	.064	-.001	.300**
	Sig. (2-tailed)	.466	.989	.001
	N	130	130	130
Q44 Economy	Pearson Correlation	.153	.300**	.025
	Sig. (2-tailed)	.083	.001	.774
	N	130	130	130
Q45 Economy	Pearson Correlation	1	.500**	.294**
	Sig. (2-tailed)		.000	.001
	N	130	130	130
Q46 Economy	Pearson Correlation	.500**	1	.172
	Sig. (2-tailed)	.000		.050
	N	130	130	130
Q47 Economy	Pearson Correlation	.294**	.172	1
	Sig. (2-tailed)	.001	.050	
	N	130	130	130
Q48 Economy	Pearson Correlation	.252**	.117	.745**
	Sig. (2-tailed)	.004	.184	.000
	N	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.221*	.125	.449**
	Sig. (2-tailed)	.011	.157	.000
	N	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	-.080	-.037	.344**
	Sig. (2-tailed)	.368	.675	.000
	N	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.103	.004	.244**
	Sig. (2-tailed)	.242	.962	.005
	N	130	130	130

Correlations

		Q45 Economy	Q46 Economy	Q47 Economy
Q52 Transport & Infrastructure	Pearson Correlation	.089	.067	.124
	Sig. (2-tailed)	.316	.446	.158
	N	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.149	.196*	.208*
	Sig. (2-tailed)	.090	.025	.018
	N	130	130	130
Q54 Education	Pearson Correlation	.011	.097	.117
	Sig. (2-tailed)	.904	.272	.184
	N	130	130	130
Q55 Education	Pearson Correlation	.000	.103	.049
	Sig. (2-tailed)	.996	.242	.579
	N	130	130	130
Q56 Education	Pearson Correlation	.072	.154	.415**
	Sig. (2-tailed)	.416	.080	.000
	N	130	130	130
Q57 Education	Pearson Correlation	-.026	.191*	.488**
	Sig. (2-tailed)	.768	.030	.000
	N	130	130	130
Q58 Education	Pearson Correlation	.244**	.301**	.216*
	Sig. (2-tailed)	.005	.001	.013
	N	130	130	130
Q59 Age Group	Pearson Correlation	-.062	-.125	-.035
	Sig. (2-tailed)	.483	.155	.689
	N	130	130	130
Q60 Country Born	Pearson Correlation	-.063	.000	-.111
	Sig. (2-tailed)	.479	.996	.210
	N	130	130	130
Q61 Relationship Status	Pearson Correlation	.022	-.157	-.245**
	Sig. (2-tailed)	.805	.074	.005
	N	130	130	130
Q62 Living Arrangements	Pearson Correlation	.104	.085	.117
	Sig. (2-tailed)	.240	.334	.185
	N	130	130	130
Q63 Income Level	Pearson Correlation	.270**	.190*	.410**
	Sig. (2-tailed)	.002	.031	.000
	N	130	130	130
Q64 Attend Langs	Pearson Correlation	.127	.015	.172
	Sig. (2-tailed)	.150	.870	.051
	N	130	130	130

Correlations

		Q48 Economy	Q49 Transport & Infrastructure	Q50 Transport & Infrastructure
Q4 Culture	Pearson Correlation	.215*	.071	.198*
	Sig. (2-tailed)	.014	.422	.024
	N	130	130	130
Q5 Culture	Pearson Correlation	.149	.023	.268**
	Sig. (2-tailed)	.092	.792	.002
	N	130	130	130
Q6 Culture	Pearson Correlation	.240**	.024	.209*
	Sig. (2-tailed)	.006	.790	.017
	N	130	130	130
Q7 Culture	Pearson Correlation	.186*	.043	.094
	Sig. (2-tailed)	.034	.626	.289
	N	130	130	130
Q8 Culture	Pearson Correlation	.059	-.025	.123
	Sig. (2-tailed)	.502	.777	.165
	N	130	130	130
Q9 Work	Pearson Correlation	.299**	.225**	.107
	Sig. (2-tailed)	.001	.010	.225
	N	130	130	130
Q10 Work	Pearson Correlation	.249**	.225**	.111
	Sig. (2-tailed)	.004	.010	.210
	N	130	130	130
Q11 Work	Pearson Correlation	.260**	.210*	.158
	Sig. (2-tailed)	.003	.016	.072
	N	130	130	130
Q12 Work	Pearson Correlation	.250**	.217*	.108
	Sig. (2-tailed)	.004	.013	.222
	N	130	130	130
Q13 Work	Pearson Correlation	.265**	.241**	.104
	Sig. (2-tailed)	.002	.006	.239
	N	130	130	130
Q14 Community	Pearson Correlation	.324**	.223*	.119
	Sig. (2-tailed)	.000	.011	.176
	N	130	130	130
Q15 Community	Pearson Correlation	.170	-.032	.207*
	Sig. (2-tailed)	.053	.719	.018
	N	130	130	130
Q16 Community	Pearson Correlation	-.036	.052	.127
	Sig. (2-tailed)	.686	.556	.151
	N	130	130	130
Q17 Community	Pearson Correlation	.275**	.226**	.298**
	Sig. (2-tailed)	.002	.010	.001
	N	130	130	130
Q18 Community	Pearson Correlation	.387**	.246**	.224*
	Sig. (2-tailed)	.000	.005	.010
	N	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.110	.193*	.233**
	Sig. (2-tailed)	.214	.028	.008
	N	130	130	130

Correlations

		Q48 Economy	Q49 Transport & Infrastructure	Q50 Transport & Infrastructure
Q20 Social Programs & Conditions	Pearson Correlation	.029	.204*	.255**
	Sig. (2-tailed)	.742	.020	.003
	N	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.037	.074	.282**
	Sig. (2-tailed)	.674	.404	.001
	N	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.053	.202*	.207*
	Sig. (2-tailed)	.552	.021	.018
	N	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.013	.108	.279**
	Sig. (2-tailed)	.884	.223	.001
	N	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.341**	.310**	.213*
	Sig. (2-tailed)	.000	.000	.015
	N	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.301**	.327**	.155
	Sig. (2-tailed)	.001	.000	.079
	N	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.204*	.356**	.108
	Sig. (2-tailed)	.020	.000	.220
	N	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.554**	.358**	.103
	Sig. (2-tailed)	.000	.000	.246
	N	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.256**	.258**	.086
	Sig. (2-tailed)	.003	.003	.328
	N	130	130	130
Q29 Health	Pearson Correlation	.176*	.205*	.280**
	Sig. (2-tailed)	.045	.019	.001
	N	130	130	130
Q30 Health	Pearson Correlation	.237**	.206*	.135
	Sig. (2-tailed)	.007	.019	.125
	N	130	130	130
Q31 Health	Pearson Correlation	-.282**	-.212*	-.156
	Sig. (2-tailed)	.001	.015	.075
	N	130	130	130
Q32 Health	Pearson Correlation	.274**	.317**	.045
	Sig. (2-tailed)	.002	.000	.609
	N	130	130	130
Q33 Health	Pearson Correlation	.107	.201*	-.010
	Sig. (2-tailed)	.224	.022	.909
	N	130	130	130
Q34 Personal Well-being	Pearson Correlation	.320**	.309**	.084
	Sig. (2-tailed)	.000	.000	.340
	N	130	130	130
Q35 Personal Well-being	Pearson Correlation	.356**	.361**	.188*
	Sig. (2-tailed)	.000	.000	.032
	N	130	130	130

Correlations

		Q48 Economy	Q49 Transport & Infrastructure	Q50 Transport & Infrastructure
Q36 Personal Well-being	Pearson Correlation	.568**	.403**	.221*
	Sig. (2-tailed)	.000	.000	.011
	N	130	130	130
Q37 Personal Well-being	Pearson Correlation	.493**	.406**	.297**
	Sig. (2-tailed)	.000	.000	.001
	N	130	130	130
Q38 Personal Well-being	Pearson Correlation	.382**	.225**	.315**
	Sig. (2-tailed)	.000	.010	.000
	N	130	130	130
Q39 Environment	Pearson Correlation	.235**	.129	.071
	Sig. (2-tailed)	.007	.143	.420
	N	130	130	130
Q40 Environment	Pearson Correlation	.316**	.116	.048
	Sig. (2-tailed)	.000	.190	.588
	N	130	130	130
Q41 Environment	Pearson Correlation	.159	.030	.075
	Sig. (2-tailed)	.070	.732	.397
	N	130	130	130
Q42 Environment	Pearson Correlation	.302**	.358**	.314**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q43 Environment	Pearson Correlation	.264**	.240**	.308**
	Sig. (2-tailed)	.002	.006	.000
	N	130	130	130
Q44 Economy	Pearson Correlation	.068	.200*	.006
	Sig. (2-tailed)	.444	.022	.944
	N	130	130	130
Q45 Economy	Pearson Correlation	.252**	.221*	-.080
	Sig. (2-tailed)	.004	.011	.368
	N	130	130	130
Q46 Economy	Pearson Correlation	.117	.125	-.037
	Sig. (2-tailed)	.184	.157	.675
	N	130	130	130
Q47 Economy	Pearson Correlation	.745**	.449**	.344**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q48 Economy	Pearson Correlation	1	.425**	.303**
	Sig. (2-tailed)		.000	.000
	N	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.425**	1	.347**
	Sig. (2-tailed)	.000		.000
	N	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.303**	.347**	1
	Sig. (2-tailed)	.000	.000	
	N	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.145	.377**	.180*
	Sig. (2-tailed)	.100	.000	.040
	N	130	130	130

Correlations

		Q48 Economy	Q49 Transport & Infrastructure	Q50 Transport & Infrastructure
Q52 Transport & Infrastructure	Pearson Correlation	.135	.254**	.302**
	Sig. (2-tailed)	.127	.004	.000
	N	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.281**	.149	.153
	Sig. (2-tailed)	.001	.091	.082
	N	130	130	130
Q54 Education	Pearson Correlation	.074	.078	.274**
	Sig. (2-tailed)	.404	.379	.002
	N	130	130	130
Q55 Education	Pearson Correlation	.003	.174*	.275**
	Sig. (2-tailed)	.969	.048	.002
	N	130	130	130
Q56 Education	Pearson Correlation	.360**	.408**	.261**
	Sig. (2-tailed)	.000	.000	.003
	N	130	130	130
Q57 Education	Pearson Correlation	.433**	.514**	.363**
	Sig. (2-tailed)	.000	.000	.000
	N	130	130	130
Q58 Education	Pearson Correlation	.102	.347**	.139
	Sig. (2-tailed)	.249	.000	.116
	N	130	130	130
Q59 Age Group	Pearson Correlation	-.031	-.127	.069
	Sig. (2-tailed)	.723	.150	.436
	N	130	130	130
Q60 Country Born	Pearson Correlation	-.009	-.274**	.006
	Sig. (2-tailed)	.923	.002	.950
	N	130	130	130
Q61 Relationship Status	Pearson Correlation	-.171	-.257**	-.116
	Sig. (2-tailed)	.051	.003	.190
	N	130	130	130
Q62 Living Arrangements	Pearson Correlation	.116	.022	-.093
	Sig. (2-tailed)	.187	.804	.293
	N	130	130	130
Q63 Income Level	Pearson Correlation	.308**	.324**	.015
	Sig. (2-tailed)	.000	.000	.864
	N	130	130	130
Q64 Attend Langs	Pearson Correlation	.095	.173*	-.021
	Sig. (2-tailed)	.284	.049	.815
	N	130	130	130

Correlations

		Q51 Transport & Infrastructure	Q52 Transport & Infrastructure	Q53 Transport & Infrastructure	Q54 Education
Q4 Culture	Pearson Correlation	-.031	.264**	.174*	.046
	Sig. (2-tailed)	.730	.002	.048	.606
	N	130	130	130	130
Q5 Culture	Pearson Correlation	-.014	.335**	.033	.055
	Sig. (2-tailed)	.871	.000	.707	.534
	N	130	130	130	130
Q6 Culture	Pearson Correlation	-.037	.346**	.059	.110
	Sig. (2-tailed)	.673	.000	.503	.211
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.034	.376**	.152	.060
	Sig. (2-tailed)	.704	.000	.083	.500
	N	130	130	130	130
Q8 Culture	Pearson Correlation	-.154	.230**	.009	.086
	Sig. (2-tailed)	.080	.009	.915	.332
	N	130	130	130	130
Q9 Work	Pearson Correlation	.000	-.005	.059	.267**
	Sig. (2-tailed)	.999	.951	.503	.002
	N	130	130	130	130
Q10 Work	Pearson Correlation	.088	-.028	.013	.308**
	Sig. (2-tailed)	.320	.750	.887	.000
	N	130	130	130	130
Q11 Work	Pearson Correlation	.085	.002	.110	.345**
	Sig. (2-tailed)	.335	.978	.215	.000
	N	130	130	130	130
Q12 Work	Pearson Correlation	.078	.082	-.025	.325**
	Sig. (2-tailed)	.375	.355	.779	.000
	N	130	130	130	130
Q13 Work	Pearson Correlation	.053	.022	.070	.317**
	Sig. (2-tailed)	.547	.806	.429	.000
	N	130	130	130	130
Q14 Community	Pearson Correlation	.115	.095	.016	-.014
	Sig. (2-tailed)	.193	.281	.859	.874
	N	130	130	130	130
Q15 Community	Pearson Correlation	-.154	.308**	.206*	.147
	Sig. (2-tailed)	.081	.000	.019	.095
	N	130	130	130	130
Q16 Community	Pearson Correlation	-.097	.245**	.143	.095
	Sig. (2-tailed)	.270	.005	.105	.282
	N	130	130	130	130
Q17 Community	Pearson Correlation	.079	.371**	.209*	-.018
	Sig. (2-tailed)	.372	.000	.017	.840
	N	130	130	130	130
Q18 Community	Pearson Correlation	.045	.175*	.191*	-.027
	Sig. (2-tailed)	.612	.047	.029	.763
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	-.018	.210*	.044	.090
	Sig. (2-tailed)	.841	.016	.616	.309
	N	130	130	130	130

Correlations

		Q51 Transport & Infrastructure	Q52 Transport & Infrastructure	Q53 Transport & Infrastructure	Q54 Education
Q20 Social Programs & Conditions	Pearson Correlation	-.051	.241**	.161	.160
	Sig. (2-tailed)	.564	.006	.067	.068
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.040	.208*	.118	.085
	Sig. (2-tailed)	.654	.018	.182	.339
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	-.162	.140	.121	.132
	Sig. (2-tailed)	.065	.112	.169	.135
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.007	.285**	-.101	.305**
	Sig. (2-tailed)	.940	.001	.253	.000
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.238**	.133	.342**	.145
	Sig. (2-tailed)	.006	.130	.000	.099
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.087	.129	.183*	.294**
	Sig. (2-tailed)	.323	.142	.037	.001
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.178*	.018	.142	.016
	Sig. (2-tailed)	.042	.835	.108	.857
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.135	.187*	.300**	.009
	Sig. (2-tailed)	.126	.033	.001	.919
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.272**	.153	.220*	.012
	Sig. (2-tailed)	.002	.081	.012	.890
	N	130	130	130	130
Q29 Health	Pearson Correlation	.097	.142	.357**	.073
	Sig. (2-tailed)	.271	.108	.000	.412
	N	130	130	130	130
Q30 Health	Pearson Correlation	.284**	.101	.127	-.072
	Sig. (2-tailed)	.001	.251	.151	.413
	N	130	130	130	130
Q31 Health	Pearson Correlation	-.179*	.081	-.099	-.074
	Sig. (2-tailed)	.042	.359	.260	.401
	N	130	130	130	130
Q32 Health	Pearson Correlation	.169	.155	.240**	-.074
	Sig. (2-tailed)	.055	.078	.006	.404
	N	130	130	130	130
Q33 Health	Pearson Correlation	-.026	.162	.210*	-.057
	Sig. (2-tailed)	.768	.065	.016	.516
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.082	.138	.220*	-.074
	Sig. (2-tailed)	.354	.117	.012	.402
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.155	.180*	.394**	.033
	Sig. (2-tailed)	.079	.041	.000	.710
	N	130	130	130	130

Correlations

		Q51 Transport & Infrastructure	Q52 Transport & Infrastructure	Q53 Transport & Infrastructure	Q54 Education
Q36 Personal Well-being	Pearson Correlation	.149	.138	.279**	.061
	Sig. (2-tailed)	.091	.117	.001	.490
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.347**	.155	.307**	.162
	Sig. (2-tailed)	.000	.077	.000	.066
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.210*	.122	.262**	.087
	Sig. (2-tailed)	.017	.166	.003	.326
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.154	.051	.011	.049
	Sig. (2-tailed)	.081	.563	.902	.579
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.044	.057	.052	.135
	Sig. (2-tailed)	.617	.519	.558	.126
	N	130	130	130	130
Q41 Environment	Pearson Correlation	.019	.049	.012	.102
	Sig. (2-tailed)	.831	.581	.894	.250
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.071	.119	.139	.090
	Sig. (2-tailed)	.424	.176	.114	.310
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.118	.079	.068	.077
	Sig. (2-tailed)	.180	.371	.440	.385
	N	130	130	130	130
Q44 Economy	Pearson Correlation	-.147	-.054	.055	.198*
	Sig. (2-tailed)	.095	.540	.537	.024
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.103	.089	.149	.011
	Sig. (2-tailed)	.242	.316	.090	.904
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.004	.067	.196*	.097
	Sig. (2-tailed)	.962	.446	.025	.272
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.244**	.124	.208*	.117
	Sig. (2-tailed)	.005	.158	.018	.184
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.145	.135	.281**	.074
	Sig. (2-tailed)	.100	.127	.001	.404
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.377**	.254**	.149	.078
	Sig. (2-tailed)	.000	.004	.091	.379
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.180*	.302**	.153	.274**
	Sig. (2-tailed)	.040	.000	.082	.002
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	1	.128	-.041	.001
	Sig. (2-tailed)		.148	.647	.994
	N	130	130	130	130

Correlations

		Q51 Transport & Infrastructure	Q52 Transport & Infrastructure	Q53 Transport & Infrastructure	Q54 Education
Q52 Transport & Infrastructure	Pearson Correlation	.128	1	.179*	.090
	Sig. (2-tailed)	.148		.042	.308
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	-.041	.179*	1	.030
	Sig. (2-tailed)	.647	.042		.731
	N	130	130	130	130
Q54 Education	Pearson Correlation	.001	.090	.030	1
	Sig. (2-tailed)	.994	.308	.731	
	N	130	130	130	130
Q55 Education	Pearson Correlation	.036	.167	.000	.715**
	Sig. (2-tailed)	.687	.057	.998	.000
	N	130	130	130	130
Q56 Education	Pearson Correlation	.099	.108	.162	.358**
	Sig. (2-tailed)	.261	.222	.066	.000
	N	130	130	130	130
Q57 Education	Pearson Correlation	.122	.146	.221*	.218*
	Sig. (2-tailed)	.165	.097	.012	.013
	N	130	130	130	130
Q58 Education	Pearson Correlation	-.083	.005	.235**	.274**
	Sig. (2-tailed)	.347	.957	.007	.002
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	.060	.189*	.249**	-.242**
	Sig. (2-tailed)	.497	.031	.004	.006
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	-.237**	-.098	.070	.004
	Sig. (2-tailed)	.007	.267	.430	.965
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	-.028	.119	.068	-.140
	Sig. (2-tailed)	.749	.177	.443	.112
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	-.059	-.060	-.213*	.244**
	Sig. (2-tailed)	.502	.495	.015	.005
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.154	.048	.014	.154
	Sig. (2-tailed)	.081	.590	.872	.080
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	.012	-.212*	-.008	-.005
	Sig. (2-tailed)	.897	.016	.925	.956
	N	130	130	130	130

Correlations

		Q55 Education	Q56 Education	Q57 Education	Q58 Education
Q4 Culture	Pearson Correlation	.136	.186*	.161	.094
	Sig. (2-tailed)	.122	.034	.067	.288
	N	130	130	130	130
Q5 Culture	Pearson Correlation	.083	.082	.059	-.063
	Sig. (2-tailed)	.347	.356	.508	.478
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.201*	.187*	.148	.022
	Sig. (2-tailed)	.022	.034	.093	.808
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.114	.066	.051	-.025
	Sig. (2-tailed)	.198	.457	.563	.779
	N	130	130	130	130
Q8 Culture	Pearson Correlation	.180*	.119	.142	.072
	Sig. (2-tailed)	.040	.177	.108	.413
	N	130	130	130	130
Q9 Work	Pearson Correlation	.197*	.384**	.262**	.311**
	Sig. (2-tailed)	.025	.000	.003	.000
	N	130	130	130	130
Q10 Work	Pearson Correlation	.252**	.302**	.245**	.241**
	Sig. (2-tailed)	.004	.000	.005	.006
	N	130	130	130	130
Q11 Work	Pearson Correlation	.257**	.342**	.340**	.223*
	Sig. (2-tailed)	.003	.000	.000	.011
	N	130	130	130	130
Q12 Work	Pearson Correlation	.236**	.284**	.289**	.171
	Sig. (2-tailed)	.007	.001	.001	.051
	N	130	130	130	130
Q13 Work	Pearson Correlation	.248**	.263**	.310**	.193*
	Sig. (2-tailed)	.004	.002	.000	.028
	N	130	130	130	130
Q14 Community	Pearson Correlation	-.014	.144	.165	.189*
	Sig. (2-tailed)	.875	.102	.061	.032
	N	130	130	130	130
Q15 Community	Pearson Correlation	.147	.118	.074	.030
	Sig. (2-tailed)	.096	.182	.403	.733
	N	130	130	130	130
Q16 Community	Pearson Correlation	.101	-.034	.073	-.018
	Sig. (2-tailed)	.251	.704	.411	.836
	N	130	130	130	130
Q17 Community	Pearson Correlation	.065	.067	.187*	-.040
	Sig. (2-tailed)	.460	.447	.033	.650
	N	130	130	130	130
Q18 Community	Pearson Correlation	.112	.106	.190*	.056
	Sig. (2-tailed)	.204	.228	.030	.530
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.100	.037	.180*	.032
	Sig. (2-tailed)	.260	.673	.041	.715
	N	130	130	130	130

Correlations

		Q55 Education	Q56 Education	Q57 Education	Q58 Education
Q20 Social Programs & Conditions	Pearson Correlation	.163	.151	.248**	.040
	Sig. (2-tailed)	.064	.086	.004	.653
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.013	-.018	.136	-.111
	Sig. (2-tailed)	.883	.838	.123	.211
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.143	.190*	.243**	.244**
	Sig. (2-tailed)	.106	.030	.005	.005
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.298**	.175*	.146	-.027
	Sig. (2-tailed)	.001	.047	.098	.762
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.083	.201*	.277**	.060
	Sig. (2-tailed)	.350	.022	.001	.495
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.190*	.285**	.317**	.288**
	Sig. (2-tailed)	.030	.001	.000	.001
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	-.020	.123	.210*	-.040
	Sig. (2-tailed)	.819	.164	.017	.651
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	-.119	.250**	.279**	.153
	Sig. (2-tailed)	.176	.004	.001	.082
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	-.010	.186*	.267**	.018
	Sig. (2-tailed)	.912	.034	.002	.843
	N	130	130	130	130
Q29 Health	Pearson Correlation	-.023	.082	.184*	.086
	Sig. (2-tailed)	.799	.355	.036	.331
	N	130	130	130	130
Q30 Health	Pearson Correlation	-.089	.067	.056	-.062
	Sig. (2-tailed)	.315	.446	.527	.482
	N	130	130	130	130
Q31 Health	Pearson Correlation	-.071	-.128	-.237**	-.018
	Sig. (2-tailed)	.420	.146	.007	.840
	N	130	130	130	130
Q32 Health	Pearson Correlation	.059	.069	.161	.109
	Sig. (2-tailed)	.507	.436	.067	.218
	N	130	130	130	130
Q33 Health	Pearson Correlation	.079	.052	.097	.128
	Sig. (2-tailed)	.374	.559	.270	.146
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	-.079	.120	.313**	.086
	Sig. (2-tailed)	.374	.175	.000	.333
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.081	.143	.274**	.113
	Sig. (2-tailed)	.359	.105	.002	.202
	N	130	130	130	130

Correlations

		Q55 Education	Q56 Education	Q57 Education	Q58 Education
Q36 Personal Well-being	Pearson Correlation	.007	.299**	.399**	.255**
	Sig. (2-tailed)	.940	.001	.000	.003
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.064	.253**	.447**	.146
	Sig. (2-tailed)	.472	.004	.000	.096
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.116	.149	.222*	.059
	Sig. (2-tailed)	.188	.092	.011	.502
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.127	.147	.250**	.249**
	Sig. (2-tailed)	.148	.095	.004	.004
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.112	.250**	.220*	.152
	Sig. (2-tailed)	.205	.004	.012	.085
	N	130	130	130	130
Q41 Environment	Pearson Correlation	.156	.126	.050	.146
	Sig. (2-tailed)	.076	.154	.569	.098
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.170	.156	.268**	.308**
	Sig. (2-tailed)	.053	.076	.002	.000
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.075	.203*	.201*	.131
	Sig. (2-tailed)	.399	.021	.022	.136
	N	130	130	130	130
Q44 Economy	Pearson Correlation	.181*	.150	.185*	.226**
	Sig. (2-tailed)	.040	.089	.035	.010
	N	130	130	130	130
Q45 Economy	Pearson Correlation	.000	.072	-.026	.244**
	Sig. (2-tailed)	.996	.416	.768	.005
	N	130	130	130	130
Q46 Economy	Pearson Correlation	.103	.154	.191*	.301**
	Sig. (2-tailed)	.242	.080	.030	.001
	N	130	130	130	130
Q47 Economy	Pearson Correlation	.049	.415**	.488**	.216*
	Sig. (2-tailed)	.579	.000	.000	.013
	N	130	130	130	130
Q48 Economy	Pearson Correlation	.003	.360**	.433**	.102
	Sig. (2-tailed)	.969	.000	.000	.249
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.174*	.408**	.514**	.347**
	Sig. (2-tailed)	.048	.000	.000	.000
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.275**	.261**	.363**	.139
	Sig. (2-tailed)	.002	.003	.000	.116
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.036	.099	.122	-.083
	Sig. (2-tailed)	.687	.261	.165	.347
	N	130	130	130	130

Correlations

		Q55 Education	Q56 Education	Q57 Education	Q58 Education
Q52 Transport & Infrastructure	Pearson Correlation	.167	.108	.146	.005
	Sig. (2-tailed)	.057	.222	.097	.957
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.000	.162	.221*	.235**
	Sig. (2-tailed)	.998	.066	.012	.007
	N	130	130	130	130
Q54 Education	Pearson Correlation	.715**	.358**	.218*	.274**
	Sig. (2-tailed)	.000	.000	.013	.002
	N	130	130	130	130
Q55 Education	Pearson Correlation	1	.385**	.207*	.294**
	Sig. (2-tailed)		.000	.018	.001
	N	130	130	130	130
Q56 Education	Pearson Correlation	.385**	1	.625**	.493**
	Sig. (2-tailed)	.000		.000	.000
	N	130	130	130	130
Q57 Education	Pearson Correlation	.207*	.625**	1	.433**
	Sig. (2-tailed)	.018	.000		.000
	N	130	130	130	130
Q58 Education	Pearson Correlation	.294**	.493**	.433**	1
	Sig. (2-tailed)	.001	.000	.000	
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	-.167	-.315**	-.146	-.265**
	Sig. (2-tailed)	.057	.000	.097	.002
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	-.028	-.120	-.108	-.102
	Sig. (2-tailed)	.755	.174	.219	.249
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	-.136	-.265**	-.276**	-.222*
	Sig. (2-tailed)	.123	.002	.001	.011
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	.123	.043	.109	.179*
	Sig. (2-tailed)	.165	.630	.219	.041
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	.252**	.424**	.273**	.275**
	Sig. (2-tailed)	.004	.000	.002	.002
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	-.017	.093	.034	.077
	Sig. (2-tailed)	.851	.292	.699	.383
	N	130	130	130	130

Correlations

		Q59 Age Group	Q60 Country Born	Q61 Relationship Status	Q62 Living Arrangements
Q4 Culture	Pearson Correlation	.048	.108	.099	-.091
	Sig. (2-tailed)	.586	.222	.263	.303
	N	130	130	130	130
Q5 Culture	Pearson Correlation	.128	.018	.177*	-.126
	Sig. (2-tailed)	.145	.842	.044	.152
	N	130	130	130	130
Q6 Culture	Pearson Correlation	.078	.074	.113	.005
	Sig. (2-tailed)	.376	.401	.199	.954
	N	130	130	130	130
Q7 Culture	Pearson Correlation	.085	-.049	.111	.050
	Sig. (2-tailed)	.337	.579	.208	.575
	N	130	130	130	130
Q8 Culture	Pearson Correlation	.011	.108	-.064	-.020
	Sig. (2-tailed)	.898	.222	.468	.823
	N	130	130	130	130
Q9 Work	Pearson Correlation	-.390**	-.203*	-.168	.238**
	Sig. (2-tailed)	.000	.021	.056	.006
	N	130	130	130	130
Q10 Work	Pearson Correlation	-.392**	-.169	-.236**	.234**
	Sig. (2-tailed)	.000	.055	.007	.007
	N	130	130	130	130
Q11 Work	Pearson Correlation	-.429**	-.128	-.297**	.239**
	Sig. (2-tailed)	.000	.145	.001	.006
	N	130	130	130	130
Q12 Work	Pearson Correlation	-.447**	-.164	-.302**	.335**
	Sig. (2-tailed)	.000	.062	.000	.000
	N	130	130	130	130
Q13 Work	Pearson Correlation	-.381**	-.057	-.256**	.309**
	Sig. (2-tailed)	.000	.522	.003	.000
	N	130	130	130	130
Q14 Community	Pearson Correlation	-.006	-.042	-.115	.134
	Sig. (2-tailed)	.943	.637	.192	.128
	N	130	130	130	130
Q15 Community	Pearson Correlation	.267**	.089	.121	-.084
	Sig. (2-tailed)	.002	.316	.169	.344
	N	130	130	130	130
Q16 Community	Pearson Correlation	.210*	.126	.058	.085
	Sig. (2-tailed)	.016	.153	.516	.334
	N	130	130	130	130
Q17 Community	Pearson Correlation	.124	.054	.118	.057
	Sig. (2-tailed)	.160	.540	.182	.520
	N	130	130	130	130
Q18 Community	Pearson Correlation	.136	-.026	-.105	-.058
	Sig. (2-tailed)	.123	.769	.236	.513
	N	130	130	130	130
Q19 Social Programs & Conditions	Pearson Correlation	.097	-.047	.062	.181*
	Sig. (2-tailed)	.272	.595	.485	.039
	N	130	130	130	130

Correlations

		Q59 Age Group	Q60 Country Born	Q61 Relationship Status	Q62 Living Arrangements
Q20 Social Programs & Conditions	Pearson Correlation	.122	-.087	.081	-.122
	Sig. (2-tailed)	.168	.327	.357	.166
	N	130	130	130	130
Q21 Social Programs & Conditions	Pearson Correlation	.189*	-.119	.029	-.022
	Sig. (2-tailed)	.032	.179	.744	.807
	N	130	130	130	130
Q22 Social Programs & Conditions	Pearson Correlation	-.003	-.268**	-.117	.108
	Sig. (2-tailed)	.974	.002	.186	.219
	N	130	130	130	130
Q23 Social Programs & Conditions	Pearson Correlation	-.114	.057	-.158	.101
	Sig. (2-tailed)	.197	.519	.073	.255
	N	130	130	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.096	-.101	-.063	.046
	Sig. (2-tailed)	.279	.253	.475	.606
	N	130	130	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	-.135	-.095	-.084	.200*
	Sig. (2-tailed)	.125	.280	.341	.022
	N	130	130	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	-.022	-.212*	-.155	.040
	Sig. (2-tailed)	.800	.016	.079	.654
	N	130	130	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.035	-.216*	.007	.049
	Sig. (2-tailed)	.689	.014	.939	.583
	N	130	130	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.110	-.142	-.048	.026
	Sig. (2-tailed)	.214	.107	.591	.772
	N	130	130	130	130
Q29 Health	Pearson Correlation	.149	-.027	.030	-.008
	Sig. (2-tailed)	.091	.763	.734	.925
	N	130	130	130	130
Q30 Health	Pearson Correlation	.048	-.168	-.044	-.057
	Sig. (2-tailed)	.591	.056	.617	.517
	N	130	130	130	130
Q31 Health	Pearson Correlation	.012	.042	.062	-.069
	Sig. (2-tailed)	.893	.634	.487	.432
	N	130	130	130	130
Q32 Health	Pearson Correlation	.093	-.192*	.002	-.127
	Sig. (2-tailed)	.290	.029	.984	.151
	N	130	130	130	130
Q33 Health	Pearson Correlation	.079	.025	.081	-.171
	Sig. (2-tailed)	.371	.773	.357	.052
	N	130	130	130	130
Q34 Personal Well-being	Pearson Correlation	.106	-.233**	-.077	-.034
	Sig. (2-tailed)	.231	.008	.382	.697
	N	130	130	130	130
Q35 Personal Well-being	Pearson Correlation	.179*	-.172*	-.059	-.172*
	Sig. (2-tailed)	.041	.050	.505	.050
	N	130	130	130	130

Correlations

		Q59 Age Group	Q60 Country Born	Q61 Relationship Status	Q62 Living Arrangements
Q36 Personal Well-being	Pearson Correlation	-.002	-.180*	-.151	.169
	Sig. (2-tailed)	.984	.040	.086	.054
	N	130	130	130	130
Q37 Personal Well-being	Pearson Correlation	.136	-.176*	-.100	-.010
	Sig. (2-tailed)	.122	.045	.255	.914
	N	130	130	130	130
Q38 Personal Well-being	Pearson Correlation	.041	-.051	-.123	-.013
	Sig. (2-tailed)	.640	.563	.162	.888
	N	130	130	130	130
Q39 Environment	Pearson Correlation	.055	-.019	-.071	.159
	Sig. (2-tailed)	.534	.827	.420	.071
	N	130	130	130	130
Q40 Environment	Pearson Correlation	.014	.045	-.094	.030
	Sig. (2-tailed)	.878	.613	.290	.738
	N	130	130	130	130
Q41 Environment	Pearson Correlation	-.157	.184*	-.122	.060
	Sig. (2-tailed)	.075	.036	.166	.499
	N	130	130	130	130
Q42 Environment	Pearson Correlation	.045	-.014	-.004	.091
	Sig. (2-tailed)	.613	.876	.967	.304
	N	130	130	130	130
Q43 Environment	Pearson Correlation	.007	-.186*	-.174*	-.072
	Sig. (2-tailed)	.936	.034	.047	.417
	N	130	130	130	130
Q44 Economy	Pearson Correlation	-.300**	-.092	-.235**	.172
	Sig. (2-tailed)	.001	.297	.007	.051
	N	130	130	130	130
Q45 Economy	Pearson Correlation	-.062	-.063	.022	.104
	Sig. (2-tailed)	.483	.479	.805	.240
	N	130	130	130	130
Q46 Economy	Pearson Correlation	-.125	.000	-.157	.085
	Sig. (2-tailed)	.155	.996	.074	.334
	N	130	130	130	130
Q47 Economy	Pearson Correlation	-.035	-.111	-.245**	.117
	Sig. (2-tailed)	.689	.210	.005	.185
	N	130	130	130	130
Q48 Economy	Pearson Correlation	-.031	-.009	-.171	.116
	Sig. (2-tailed)	.723	.923	.051	.187
	N	130	130	130	130
Q49 Transport & Infrastructure	Pearson Correlation	-.127	-.274**	-.257**	.022
	Sig. (2-tailed)	.150	.002	.003	.804
	N	130	130	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.069	.006	-.116	-.093
	Sig. (2-tailed)	.436	.950	.190	.293
	N	130	130	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.060	-.237**	-.028	-.059
	Sig. (2-tailed)	.497	.007	.749	.502
	N	130	130	130	130

Correlations

		Q59 Age Group	Q60 Country Born	Q61 Relationship Status	Q62 Living Arrangements
Q52 Transport & Infrastructure	Pearson Correlation	.189*	-.098	.119	-.060
	Sig. (2-tailed)	.031	.267	.177	.495
	N	130	130	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.249**	.070	.068	-.213*
	Sig. (2-tailed)	.004	.430	.443	.015
	N	130	130	130	130
Q54 Education	Pearson Correlation	-.242**	.004	-.140	.244**
	Sig. (2-tailed)	.006	.965	.112	.005
	N	130	130	130	130
Q55 Education	Pearson Correlation	-.167	-.028	-.136	.123
	Sig. (2-tailed)	.057	.755	.123	.165
	N	130	130	130	130
Q56 Education	Pearson Correlation	-.315**	-.120	-.265**	.043
	Sig. (2-tailed)	.000	.174	.002	.630
	N	130	130	130	130
Q57 Education	Pearson Correlation	-.146	-.108	-.276**	.109
	Sig. (2-tailed)	.097	.219	.001	.219
	N	130	130	130	130
Q58 Education	Pearson Correlation	-.265**	-.102	-.222*	.179*
	Sig. (2-tailed)	.002	.249	.011	.041
	N	130	130	130	130
Q59 Age Group	Pearson Correlation	1	.217*	.360**	-.407**
	Sig. (2-tailed)		.013	.000	.000
	N	130	130	130	130
Q60 Country Born	Pearson Correlation	.217*	1	-.040	-.108
	Sig. (2-tailed)	.013		.651	.220
	N	130	130	130	130
Q61 Relationship Status	Pearson Correlation	.360**	-.040	1	-.200*
	Sig. (2-tailed)	.000	.651		.022
	N	130	130	130	130
Q62 Living Arrangements	Pearson Correlation	-.407**	-.108	-.200*	1
	Sig. (2-tailed)	.000	.220	.022	
	N	130	130	130	130
Q63 Income Level	Pearson Correlation	-.403**	-.176*	-.227**	.258**
	Sig. (2-tailed)	.000	.045	.010	.003
	N	130	130	130	130
Q64 Attend Langs	Pearson Correlation	.003	-.029	-.228**	-.116
	Sig. (2-tailed)	.974	.741	.009	.187
	N	130	130	130	130

Correlations

		Q63 Income Level	Q64 Attend Langs
Q4 Culture	Pearson Correlation	.008	-.226**
	Sig. (2-tailed)	.929	.010
	N	130	130
Q5 Culture	Pearson Correlation	-.050	-.172
	Sig. (2-tailed)	.571	.050
	N	130	130
Q6 Culture	Pearson Correlation	.043	-.128
	Sig. (2-tailed)	.631	.146
	N	130	130
Q7 Culture	Pearson Correlation	-.013	-.147
	Sig. (2-tailed)	.880	.095
	N	130	130
Q8 Culture	Pearson Correlation	.061	-.120
	Sig. (2-tailed)	.489	.174
	N	130	130
Q9 Work	Pearson Correlation	.444**	.285**
	Sig. (2-tailed)	.000	.001
	N	130	130
Q10 Work	Pearson Correlation	.482**	.298**
	Sig. (2-tailed)	.000	.001
	N	130	130
Q11 Work	Pearson Correlation	.469**	.120
	Sig. (2-tailed)	.000	.174
	N	130	130
Q12 Work	Pearson Correlation	.452**	.106
	Sig. (2-tailed)	.000	.231
	N	130	130
Q13 Work	Pearson Correlation	.430**	.172
	Sig. (2-tailed)	.000	.050
	N	130	130
Q14 Community	Pearson Correlation	.281**	.149
	Sig. (2-tailed)	.001	.092
	N	130	130
Q15 Community	Pearson Correlation	-.148	-.156
	Sig. (2-tailed)	.094	.076
	N	130	130
Q16 Community	Pearson Correlation	-.144	-.483**
	Sig. (2-tailed)	.102	.000
	N	130	130
Q17 Community	Pearson Correlation	.085	-.348**
	Sig. (2-tailed)	.334	.000
	N	130	130
Q18 Community	Pearson Correlation	.075	-.096
	Sig. (2-tailed)	.399	.277
	N	130	130
Q19 Social Programs & Conditions	Pearson Correlation	-.014	-.235**
	Sig. (2-tailed)	.876	.007
	N	130	130

Correlations

		Q63 Income Level	Q64 Attend Langs
Q20 Social Programs & Conditions	Pearson Correlation	-.133	-.104
	Sig. (2-tailed)	.132	.237
	N	130	130
Q21 Social Programs & Conditions	Pearson Correlation	-.162	-.073
	Sig. (2-tailed)	.065	.407
	N	130	130
Q22 Social Programs & Conditions	Pearson Correlation	.063	.021
	Sig. (2-tailed)	.474	.817
	N	130	130
Q23 Social Programs & Conditions	Pearson Correlation	.086	-.174*
	Sig. (2-tailed)	.332	.047
	N	130	130
Q24 Family, Friends, & Connections	Pearson Correlation	.115	.060
	Sig. (2-tailed)	.194	.498
	N	130	130
Q25 Family, Friends, & Connections	Pearson Correlation	.256**	.137
	Sig. (2-tailed)	.003	.119
	N	130	130
Q26 Family, Friends, & Connections	Pearson Correlation	.194*	.083
	Sig. (2-tailed)	.027	.348
	N	130	130
Q27 Family, Friends, & Connections	Pearson Correlation	.237**	.155
	Sig. (2-tailed)	.007	.079
	N	130	130
Q28 Family, Friends, & Connections	Pearson Correlation	.224*	.109
	Sig. (2-tailed)	.011	.219
	N	130	130
Q29 Health	Pearson Correlation	.019	-.096
	Sig. (2-tailed)	.831	.277
	N	130	130
Q30 Health	Pearson Correlation	.071	.045
	Sig. (2-tailed)	.422	.614
	N	130	130
Q31 Health	Pearson Correlation	-.201*	-.028
	Sig. (2-tailed)	.022	.755
	N	130	130
Q32 Health	Pearson Correlation	.166	.077
	Sig. (2-tailed)	.059	.384
	N	130	130
Q33 Health	Pearson Correlation	.074	.046
	Sig. (2-tailed)	.401	.603
	N	130	130
Q34 Personal Well-being	Pearson Correlation	.101	.063
	Sig. (2-tailed)	.253	.480
	N	130	130
Q35 Personal Well-being	Pearson Correlation	.005	.146
	Sig. (2-tailed)	.952	.097
	N	130	130

Correlations

		Q63 Income Level	Q64 Attend Langs
Q36 Personal Well-being	Pearson Correlation	.310**	.125
	Sig. (2-tailed)	.000	.157
	N	130	130
Q37 Personal Well-being	Pearson Correlation	.165	.116
	Sig. (2-tailed)	.061	.188
	N	130	130
Q38 Personal Well-being	Pearson Correlation	.104	.148
	Sig. (2-tailed)	.241	.093
	N	130	130
Q39 Environment	Pearson Correlation	.309**	.199*
	Sig. (2-tailed)	.000	.023
	N	130	130
Q40 Environment	Pearson Correlation	.148	.088
	Sig. (2-tailed)	.094	.318
	N	130	130
Q41 Environment	Pearson Correlation	.192*	.075
	Sig. (2-tailed)	.028	.399
	N	130	130
Q42 Environment	Pearson Correlation	.122	-.045
	Sig. (2-tailed)	.168	.611
	N	130	130
Q43 Environment	Pearson Correlation	.188*	.120
	Sig. (2-tailed)	.033	.173
	N	130	130
Q44 Economy	Pearson Correlation	.108	.091
	Sig. (2-tailed)	.220	.306
	N	130	130
Q45 Economy	Pearson Correlation	.270**	.127
	Sig. (2-tailed)	.002	.150
	N	130	130
Q46 Economy	Pearson Correlation	.190*	.015
	Sig. (2-tailed)	.031	.870
	N	130	130
Q47 Economy	Pearson Correlation	.410**	.172
	Sig. (2-tailed)	.000	.051
	N	130	130
Q48 Economy	Pearson Correlation	.308**	.095
	Sig. (2-tailed)	.000	.284
	N	130	130
Q49 Transport & Infrastructure	Pearson Correlation	.324**	.173*
	Sig. (2-tailed)	.000	.049
	N	130	130
Q50 Transport & Infrastructure	Pearson Correlation	.015	-.021
	Sig. (2-tailed)	.864	.815
	N	130	130
Q51 Transport & Infrastructure	Pearson Correlation	.154	.012
	Sig. (2-tailed)	.081	.897
	N	130	130

Correlations

		Q63 Income Level	Q64 Attend Langs
Q52 Transport & Infrastructure	Pearson Correlation	.048	-.212*
	Sig. (2-tailed)	.590	.016
	N	130	130
Q53 Transport & Infrastructure	Pearson Correlation	.014	-.008
	Sig. (2-tailed)	.872	.925
	N	130	130
Q54 Education	Pearson Correlation	.154	-.005
	Sig. (2-tailed)	.080	.956
	N	130	130
Q55 Education	Pearson Correlation	.252**	-.017
	Sig. (2-tailed)	.004	.851
	N	130	130
Q56 Education	Pearson Correlation	.424**	.093
	Sig. (2-tailed)	.000	.292
	N	130	130
Q57 Education	Pearson Correlation	.273**	.034
	Sig. (2-tailed)	.002	.699
	N	130	130
Q58 Education	Pearson Correlation	.275**	.077
	Sig. (2-tailed)	.002	.383
	N	130	130
Q59 Age Group	Pearson Correlation	-.403**	.003
	Sig. (2-tailed)	.000	.974
	N	130	130
Q60 Country Born	Pearson Correlation	-.176*	-.029
	Sig. (2-tailed)	.045	.741
	N	130	130
Q61 Relationship Status	Pearson Correlation	-.227**	-.228**
	Sig. (2-tailed)	.010	.009
	N	130	130
Q62 Living Arrangements	Pearson Correlation	.258**	-.116
	Sig. (2-tailed)	.003	.187
	N	130	130
Q63 Income Level	Pearson Correlation	1	.228**
	Sig. (2-tailed)		.009
	N	130	130
Q64 Attend Langs	Pearson Correlation	.228**	1
	Sig. (2-tailed)	.009	
	N	130	130

**. Correlation is significant at the 0.01 level (2-tailed).

*. Correlation is significant at the 0.05 level (2-tailed).