

ANNOTATED BIBLIOGRAPHY: People, Places & Processes to Tackle Health Inequalities

Overview

The following research notes were compiled during the VicHealth *People, Places and Processes* Project. This internal policy development process sought to further our understanding of the potential impact that place-based approaches can have on tackling health inequalities, a key objective of VicHealth's *Strategic Priorities 2006 – 09*. This assists in improving project management; in efficiently allocating resources; and in monitoring the balance between various health promotion approaches that include focusing on place, settings, life course, determinants and/or sub-populations.

Methodology

Articles were sourced from a previous literature search conducted by VicHealth to assist in development of the Position Paper on health inequalities, with articles on area-based approaches drawn from this database.

All issues from 2000 to the current edition of the *Health Promotion Journal of Australia*, the *Public Health Association of Australia and New Zealand Journal*, *Journal of Epidemiology and Community Health*, *Critical Public Health* and VCOSS' *Just Policy* were scanned for relevant articles.

Grey literature with currency in the Victorian policy context were reviewed, including *Growing Victoria Together*, *A Fairer Victoria*, *Melbourne 2030* and various reports from the Department of Victorian Communities.

Current and recent research from VicHealth's Public Health Research Fellows was also consulted including extensive use of research contributions from Tony LaMontagne, Deb Warr and Anne Kavanagh.

Articles in a variety of peer-reviewed journals including *Social Science and Medicine* were also surveyed as they were released from November 2006 to March 2007.

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Annotated Bibliography

Atkinson R, Thomson H, Kearns A, Petticrew M. *Giving urban policy its 'medical': The place of health in area-based regeneration initiatives.*

Presentation notes.

The notes from this presentation recognise the significant investment in urban renewal programs by the UK Government, and the lack of evidence-based practice that can contribute to this discussion, particularly in regards to health. The authors argue that the belief that current evidence can be turned into policy should be challenged.

Ball K, Crawford D, Salmon J, Timperio A, Giles-Corti B, Mishra G (September 2005). *The 'SESAW' study: Socioeconomic and neighbourhood inequalities in women's physical activity, diet and obesity: Summary report, C-PAN, Deakin University & National Heart Foundation.*

The findings from this study are remarkably similar to the findings from VicLANES. For example - people living in lower income areas ate less healthy food and exercised less than residents in middle or high income areas. While there was access to parkland across the areas (high, middle and low), there were less walking tracks in low income areas, and less street connectivity, which may influence walking desirability. Similarly, while there were more large supermarkets in low income areas, there was half the number of fruit/vegetable/green grocer stores in low income areas, and double the amount of fast food outlets. Women respondents indicated that common barriers to physical activity included lack of self-discipline, lack of exercise partners, lack of motivation, expense, lack of child care and perceptions of unsafe neighbourhoods. Barriers to healthy eating were not divided into low, middle and high income areas, despite the study authors noting that there were differences in reported barriers between respondents living in low and high income areas. It is noted that lack of affordability and lack of cooking skills were reported as barriers by women of low education.

Bartley M, Blane D, Montgomery S. Socioeconomic determinants of health: health and the life course: why safety nets matter, *British Medical Journal* 1997;314:1194

This article argues that a life course approach is necessary to understand social variations in health and that such an approach reveals biological and social 'critical periods' during which social policies that will defend individuals against an accumulation of risk are particularly important: "During such periods as the entry into parenthood and the transitions from the parental home to the outside world, from school to work, from one job to another, and into retirement, levels of income support and availability of publicly funded services influence the degree of insecurity and uncertainty experienced by individuals and families".

Cass A, Cunningham J, Wang Z, Hoy W. Social disadvantage and variation in the incidence of end-stage renal disease in Australian capital cities.

Australian and New Zealand Journal of Public Health 2001, 25(4): 322 – 326

This article demonstrates a consistent correlation between SEIFA areas of high disadvantage and end stage renal disease. The authors argue that “to explain the significant association between relative disadvantage and the standardised incidence of ESRD observed in this study, we need to develop a framework for understanding the aetiology of renal disease that encompasses social and environmental determinants of health.”

Cunnigham J. Comparing Indigenous health status across regions: a numerical example of uncertainty. *Australia and New Zealand Journal of Public Health 2002; 26:497-9*

Regional variations on Indigenous health outcomes could be underestimated by incomplete data collection. Victoria is not considered to have achieved best practice in adequate data collection based on Indigenous status, which could lead to under-reporting of the health inequality gap for Indigenous citizens.

Giskes, et al (2006) Smokers living in deprived areas are less likely to quit: a longitudinal follow-up. *Tobacco Control 2006 (15) pp. 485 – 488.*

Using longitudinal data from the Netherlands, the researchers found that, after adjusting for socio-economic determinants - including occupation, income, education, employment status and housing tenure – there was still an area-level effect on smoking rates. The authors conclude that tobacco control needs to focus on area-level interventions as well as on individual-based approaches. However, there is a need to better understand how area deprivation impacts on smoking. The authors suggest some of the causes (that could be tested in subsequent research) behind area causes could include: greater availability of cigarettes, worse local provision of preventative services, social contagion, strong community norms and social reinforcement for smoking, social isolation, and limited opportunity for other forms of respite.

Hayes LJ, Quine S, Taylor R, Berry G. Socioeconomic mortality differentials in Sydney over a quarter of a century. 1970-94, *Australian and New Zealand Journal of Public Health 2002, 26(4):311-317*

This article uses an ecological approach, and found that in Sydney there was a widening health inequality gap during the study period. For males, this finding was consistent whether using an aggregate index of disadvantage (IRSED) or individual indicators such as income, occupation or education level. For females, the widening inequality gap was observable when using indicators of unemployment and income. The authors note that the findings are useful as general indicators, but do not assist with understanding causal pathways, and the authors make a similar point to McCracken in cautioning against comparing areas with similar SEIFA scores, and point out that “the characteristics of socio-economic disadvantage of a local

government area represent a different phenomenon than the socioeconomic disadvantage of the individual.”

Karpati AM, Bassett MT, McCord C. Neighbourhood mortality inequalities in New York City, 1989 – 91 and 1999 – 2001, *Journal of Epidemiology and Community Health* 2006; 60; 1060-1064

The findings of this study note the need for ‘differing, complementary strategies’ for dealing with ‘shared determinants of persistent disparities’, and that addressing absolute levels of health may not necessarily deal with the root causes of inequalities.

Kavanagh, A, Thornton L, Tattam A, Thomas L, Jolley D, Turrell, G. Unpublished: Lifestyle, environment and disadvantage: A report of the Victorian Lifestyle and Neighbourhood Environment Study 2006.

This draft publication (not for citation at this stage) summarises findings from a major Victorian study assessing the importance of individual and area characteristics in shaping three health behaviours: food purchasing, physical activity and alcohol consumption. The study undertook surveys across 50 census collector districts across Melbourne, with equal proportion of high, mid and low income neighbourhoods. Low income was defined as households earning less than \$400 per week. The findings from the surveys included:

- Respondents in low income areas were less likely to purchase fruit and vegetables and grocery items consistent with current dietary guidelines and were more likely to purchase fast food for consumption at home.
- Respondents in low income areas were less likely to be influenced by health considerations and more likely to be influenced by the price of food.
- There was very little difference between accessibility and availability of food items across low, middle and high income areas, however, respondents in low and mid income areas generally had greater access to fast food outlets.
- Men and women in low income areas were less likely to be sufficiently active for health benefit.
- Beliefs and knowledge on physical activity varied between areas with those in high income areas having more positive attitudes towards exercise. Apart from time constraints, all other barriers to physical activity were highest in low income areas. Women in low income areas were more likely to agree that not having enough time, not having someone to exercise with, not being the sporty type and having young children were barriers to physical activity.
- Respondents from low income areas were far less likely to perceive of their environment in positive terms than respondents from high income areas. Women were less likely to think their neighbourhood was safe for walking than men.
- Alcohol consumption is generally higher in men compared to women. An area trend is apparent for men with those in low income areas consuming alcohol at least once per week at levels that place them at risk of short term harm.

Kavanagh A, Goller JL, King T, Jolley D, Crawford D, Turrell G. Urban area disadvantage and physical activity: a multilevel study in Melbourne, Australia. *Journal of Epidemiology and Community Health* 2005; 59: pp. 934 – 940.

This study used a multilevel approach to estimate the small area variation on physical activity. The authors note it is the first known study to assess area variation and the effect of area level socioeconomic disadvantage on a range of different physical activities (overall physical activity, cycling, walking, swimming and jogging). The study found that living in more socioeconomically disadvantaged areas is associated with lower physical activity levels overall and with jogging in particular. These effects persisted even after adjustment for individual socioeconomic position and area level socioeconomic disadvantage. The authors suggest further work should identify what environmental characteristics might explain these differences.

Kawachi I. Neighbourhoods and Health Powerpoint slides. *Harvard University*

Outlines compositional (the difference that people make to places) vs contextual (the difference that places make to people) effects on neighbourhoods, and the types of ecological variables available for multi-level study design:

Aggregate: Aggregation of variables measured at individual level. Often expressed as measure of central tendency (mean, median). Examples include percentage of poverty, exposure to crime.

Integral: Attributes of groups/places that are not reducible to the individual level (eg. income inequality).

Environmental: Physical characteristics of a place, with individual level analogy that varies between individuals (eg. natural disaster, air pollution, hours of sunlight)

Contagion: Aggregate individual-level outcome that in turn affect the probability of the same outcomes in individuals who are not yet affected (eg. suicide rate, HIV risk, smoking rate).

Kawachi I & Subramanian S V. Neighbourhood influences on health: Outstanding issues in the neighbourhood research agenda, *Journal of Epidemiology and Community Health* 2007, 61(1): pp.3 – 4.

This editorial identifies three research questions that need to be answered to assist in making causal inferences around the impact of neighbourhoods on health. The first issue recognises that while multilevel studies have assisted with teasing out contextual from compositional influences, the impact of other confounders remains unclear. Endogeneity (the reverse causation evident, for example, in moving to a healthier environment for a pre-existing health condition) is an example of potential confounders, and the authors suggest using methods from other social sciences to resolve. The second issue is the “need to ‘unpack’ the specific exposures and pathways through which neighbourhood disadvantage leads to poor health outcomes”. The third issue the authors raise relates to making the most use of multilevel analyses. Clever research design and analysis would be able to measure individual mobility between neighbourhoods and would be able to draw out neighbourhood effects from other contextual effects such as schools and workplaces. The authors conclude that “By incorporating the methods and approaches from economics, geography, sociology (among other disciplines) into public health, research on

neighbourhood effects is poised to make a quantum leap in causal inference as well as usefulness for policy.”

King T, Kavanagah A, Jolley D, Turrell G, Crawford D. Weight and place: a multilevel cross-sectional survey of area-level social disadvantage and overweight/obesity in Australia. *International Journal of Obesity*, 2005

(This study used a \$400/week threshold for households to measure disadvantage.)

This study conducted in 50 small areas across Melbourne, found consistent and strong effects of area level socioeconomic disadvantage on adult body mass index (BMI), as well as between area differences in BMI for women. The authors argue that area level disadvantage ‘may be at least as important as individual socioeconomic position in explaining individual differences in BMI’. The authors speculate that contextual factors such as access to recreational facilities, footpaths, urban sprawl effects, and density of fast food outlets may influence BMI, but conclude that further studies to investigate the environmental characteristics that explain area differences in BMI are needed. “The study highlights the need for public health policy makers and practitioners to focus on local areas when developing interventions to reduce overweight and obesity in disadvantaged groups.”

Lupton R. CASE Paper 73: Neighbourhood Effects: Can we measure them and does it matter? September 2003, *Centre for Analysis of Social Exclusion, London School of Economics*.

The author argues that ‘neighbourhood effects research is not nearly as important to policy as is usually suggested’. Three particular difficulties with place-based approaches include that poor people are selected into poor neighbourhoods by residential sorting and that intrinsic characteristics such as housing stock and local economic base are well established and hard to change; that the size and boundaries of local areas differ in relation to their purpose in people’s lives and therefore area size differs for different aspects; and that neighbourhoods are determined in relation to other neighbourhoods, for example, perceived reputation seemed to matter to local residents regardless of the extent of actual discrimination (ala Warr’s findings in discredited neighbourhoods). To address these in area-based research requires reflecting on the impacts of both physical and social aspects; to identify boundaries of relevance to the theory being tested; to recognise life course impacts that mean that the neighbourhood has different meanings to individuals at different points in the life course. The author notes that UK approaches to neighbourhood renewal are now advancing sufficiently to consider policy aimed at altering the socioeconomic composition of areas to minimise peer effects of concentrated poverty. However, despite these limitations to area-based research, the author acknowledges previous work that has recognised the benefits of area-based approaches such as efficiency in targeting of resources, opportunities to focus activity, allowing a bottom-up approach, and increasing local confidence and capacity. Thus, even if the health impacts are minimal, area-based approaches still have a rationale. The author concludes: “For the field to develop, researchers from both of the traditions within area studies need to move on from a pre-occupation

with identifying neighbourhood effects and consider the specific policy areas where knowledge of the causal mechanisms at work could really have an impact”.

McCracken K. Into a SEIFA SES cul-de-sac? *Australian and New Zealand Journal of Public Health* 2001 25(4): 305 – 306

SEIFA is the Australian Bureau of Statistics socioeconomic indices of advantage, the main one used being the Index of Relative Socio-economic Disadvantage (IRSD). This paper is a methodological note to warn against the broad-brush use of SEIFA scores when trying to understand how social and economic processes produce health inequality. A key shortcoming of SEIFA is that while income, education and occupation are all represented within SEIFA indices, there is great variation on each of these variables in their influence on mortality. The influence of these variables on mortality for each gender also differs markedly. Data from the Hunter Valley is provided which provides startling proof of the limited usefulness of SEIFA in understanding causal pathways to health inequality. Also, areas with similar SEIFA scores can mask socio-economic differences between areas. The author acknowledges the use of SEIFA in providing a broad summary association between health and socioeconomic status, but cautions that “the emerging, almost automatic recourse to the indexes, however, is unfortunate and holding back understanding of health inequalities.”

McIntyre S & Ellaway A. Ecological Approaches: Rediscovering the Role of the Physical and Social Environment. *Social Epidemiology*.

A seminal text in the literature on area-based health promotion. “The role of the local physical and social environment in generating inequalities in health has largely been neglected in favour of the role of individual attributes such as education, income, employment, and psychosocial resources.” Argues for greater theorising on causal pathways, particularly the associations between individual status (composition) and local conditions (context) on health and mortality, and that such theorising should then lead to the development of measures, rather than relying on what population health data is available. Also, there has traditionally been a lack of attempt to measure features of the environment directly. Despite these limitations, the paper argues for an ecological perspective as it may help understand causal relationships better, as well as help identify intervention points for reducing health inequality.

McIntyre S, Ellaway A, Cummins S. Place effects on health: how can we conceptualise, operationalise and measure them? *Social Science and Medicine* 55 (2002): 125 – 139.

This article reviews the often contradictory research findings on place effects on health, noting that a new picture has emerged “in which rather than there being one single, universal ‘area effect on health’ there appear to be some area effects on some health outcomes, in some population groups, and in some types of areas.” The authors argue for a new methodology in research that addresses compositional and contextual influences on health by suggesting that researchers begin with a hypothesis and test specific pathways by which area might influence

health. A range of examples are given proving the inadequacies and fallacies within divisions between compositional and contextual explanations, for example, composition attributes may be shaped by the contextual environment. The following quote sums up the key themes of this paper: “We have suggested that it might be helpful, firstly, to distinguish between compositional and contextual explanations for spatial variations in health; secondly, to include collective social functioning and social practices as candidate contextual mechanisms; thirdly to expand our conceptualisation of collective social functioning beyond the confines of social capital/social cohesion, to include other features of non-material culture; fourthly to develop robust, testable, hypotheses about the potential impact of features of the local social and physical environment on human health, and to test these empirically.”

McIntyre S, Ellaway A (1999). Local Opportunity Structures, Social Capital and Social Inequalities in Health: What can central and local government do? *Health Promotion Journal of Australia* 1999: 9(3)

The authors note that places allow us to consider structural influences while focusing on people focuses on agency and culture. The article concludes with three policy recommendations: 1. that policies to reduce health inequalities should focus on people as well as places; 2. that policies should focus on both the physical and social environment; 3. health and health inequality impact assessments should be undertaken by state and local government, and by local services.

Ministry of Health (2005). Monitoring Health Inequality through neighbourhood life expectancy. *Public Health Intelligence Occasional Bulletin, no. 28*. Wellington: Ministry of Health.

This report acknowledges the central goal of reducing health inequalities within New Zealand’s public health agenda and proposes a methodology to measure health inequality both between groups and within groups, arguing that “without adequate monitoring, the causes of inequality cannot be understood and progress towards reduction in inequality cannot be assessed.” The report uses life expectancy as a measure of health inequality and notes that while the report does not analyse causes of inequality, such studies are intended to be undertaken in the future. The inequalities data presented suggests “there is more to explaining variation in life expectancy across neighbourhoods than variation in neighbourhood deprivation or ethnic composition”. The report argues for the need for multi-level regression modelling to explore causal analyses for health inequalities.

Ministry of Health & University of Otago (2006). *Decades of Disparity III: Ethnic and socioeconomic inequalities in mortality, New Zealand 1981 – 1999*. Wellington. Ministry of Health.

This study seeks to understand: the distribution of socioeconomic factors amongst Maori and non-Maori in New Zealand, mortality rates, the association of socioeconomic position with mortality and the contribution of socioeconomic factors to disparities between Maori and non-Maori mortality rates. This document progresses the understanding of causal pathways, using Williams’ health inequalities

framework as its base. The study findings imply that ethnic inequalities cannot be reduced simply to socioeconomic inequalities, as after multilevel analysis, the authors found that socioeconomic position and ethnicity exert both joint and independent effects on mortality, acting through multiple pathways. The authors found that “there are intergenerational effects of socioeconomic position on mortality risk, so the impacts of colonisation and the cumulative effects of historical socioeconomic disadvantage by earlier generations may affect the health and mortality of current and future generations.” The authors conclude that socioeconomic and ethnic determinants of health need to be addressed if health inequalities are to be reduced and eliminated. In particular, policies aimed at achieving full employment have particular potential for reducing health inequalities.

Newman L, Baum F & Harris E (2006). Summary for Victoria. *Australian Governments and Health Inequities Project, AHIP*, http://som.flinders.edu.au/FUSA/PublicHealth/AHIP/projects_list.htm

This summary is part of a larger project that maps health inequality action amongst Federal, State and Territory government departments in Australia. The Victorian summary reviews key policies such as *Growing Victoria Together* and *A Fairer Victoria*. The policy review identifies that “reducing disadvantage and improving equality of opportunity” are whole-of-government responsibilities, while the Department of Human Services takes a significant role in implementing *A Fairer Victoria*. Children and refugees are highlighted in all of the Victorian documents. The summary notes that some strategies have clear performance measures, while other strategies to reduce health inequalities have ambiguous targets.

Parkes A & Kearns A (2004). *CNR Paper 19: The multi-dimensional neighbourhood and health: A cross-sectional analysis of the Scottish Household Survey, 2001*, cited at www.neighbourhoodcentre.org.uk on 1 February 2007.

This report acknowledges that the neighbourhood has a multidimensional impact on health, with the relationship between neighbourhood factors and health varying according to the population subgroup. In particular, the role of neighbourhood in providing social support is questioned given the fluidity of community and the reduced ties of community to physical space (quoting Wellman’s work as did Ziller). The paper suggests life course approaches may assist in understanding the influence of neighbourhoods on health, noting “It seems likely that women with children, older people or the unemployed [referred to as the economically inactive] who spend more time in their neighbourhoods will be more vulnerable to neighbourhood conditions such as poor social support and inadequate services.” Findings included that the appearance of the neighbourhood was consistently associated with better health, for all health outcomes and behaviours measured (matching the findings of VicLanes). The links between social factors and health were the least conclusive.

Oreopoulos P, *Neighbourhood Effects in Canada: A Critique*, cited at <http://www.economics.utoronto.ca/oreo/research/neighbourhood%20effects%20in%20canada/neighbourhood%20effects%20in%20canada3.pdf> on 1 February 2007

This paper highlights the current literature on neighbourhood effects, with a specific look at Canadian neighbourhoods, noting that they are much less racially segregated than in America. Along similar lines to McIntyre, the author laments that “few papers link specific theories on how residential environment influences behaviour and outcomes.” The author quotes research that found neighbourhood effects accounted for 7% of the variation in child problem behaviour – a similar statistic to Tobias’ findings in New Zealand and Wagstaff’s findings in the UK on the contribution of geography to health inequalities. Interestingly, the paper also questions the validity and reliability of regression analysis and favours research using natural experiments, instrumental variables and detailed ethnographic studies.

Pappas G. *Geographic Data on Health Inequities: Understanding Policy Implications. PLoS Medicine. 3(9): September 2006*

This paper notes that health inequities ‘are perpetuated by systemic processes that operate outside of the targeted places’. The author suggests that it is necessary to understand the reasons behind the widening gap in inequalities in order to identify appropriate actions. Along the lines of McIntyre and others, the author concludes that ‘efforts to isolate small groups and then demonstrate health inequalities among them can produce interesting data, but these are difficult to interpret without a theoretical framework to support them’.

Spencer N. *The life course, childhood housing conditions and adult health. Journal of Epidemiology and Community Health 2001; 55:6*

This article calls for greater use of path analysis in understanding the differential exposures to socioeconomic conditions over the life course and their impact on adult mortality and morbidity. Such exposures over the life course are likely to (partly) account for the social gradient. The article also notes that in the UK, housing tenure is a fairly reliable proxy for income, however, “clear evidence of an effect of housing conditions on health independent of other socioeconomic variables remains elusive”.

Tobias M & Searle P. *Does geography explain ethnic inequalities in health in New Zealand? Australian and New Zealand Journal of Public Health 2006 30(5): 457 – 460.*

This article notes that geographic variations in health exist across the 21 health districts in New Zealand but that geography may confound the relationship between ethnicity and life expectancy because Maori and non-Maori are not uniformly distributed across the districts. The study found the geographic contribution to ethnic disparity would not account for more than 10.5% of the inequalities difference. Some limitations in the study design included that all-cause mortality was used, whereas geography may play a stronger influence on preventable

causes and non-fatal health outcomes, but such study limitations were not expected to make a significant difference to the study results. Also, it is possible that ethnic and economic residential segregation contribute to ethnic inequalities at a neighbourhood rather than district level. The results indicate that inequalities are best targeted through national policy goals such as “socio-economic deprivation and other manifestations of discrimination rather than on geographic variations in health and health care that have an impact on all ethnic groups more-or-less alike.”

Turrell G, Kavanagh A, Draper G, Subramanian S V. Do places affect the probability of death in Australia? A multilevel study of area-level disadvantage, individual-level socioeconomic position and all-cause mortality, 1998 – 2000. *Journal of Epidemiology and Community Health* 2007, 61(1): pp 13 – 19.

This study recognises that most related research has concluded that area-level disadvantage increases mortality risk over and above an individual's socioeconomic position. The authors warn against the use of ecological studies which are unable to separate compositional from contextual effects. Due to privacy legislation and the lack of area-based population surveys in Australia, multilevel studies may assist with deepening our understanding of the issues but it is important to use a number of spatial scales, as previous studies using just two scales may have mis-estimated the magnitude of variation in mortality. The study found a strong association between occupation and mortality, with blue-collar workers having significantly higher mortality than professionals, and white collar workers having significantly lower rates of mortality than professionals. Mortality inequality between professionals, white-collar employees and blue-collar workers was similar irrespective of the socioeconomic environment. In conclusion, the authors found that both area-level disadvantage and occupation independently influenced the probability of death, with limited influence of the socioeconomic environment on the mortality differences between occupation groups. The authors suggest further research into the reasons for socioeconomic differences in mortality at the area level.

Van Hooijdonk C, Droomers M, van Loon JAM, van der Lucht F, Junst AE. Exceptions to the rule: healthy deprived areas and unhealthy wealthy areas. *Social Science & Medicine* (2007), doi:10.1016/j.socscimed.2006.10.041

This study looked at why some areas of high socioeconomic advantage have unhealthy outcomes while some low socioeconomic areas had healthy outcomes for local residents, thus implying that other factors besides the socioeconomic level of an area contributes to the health of local residents. Beyond this, findings may be difficult to extrapolate to an Australian context, but the authors found that for the Netherlands, urbanisation and residential segregation based on age, ethnicity and marital status might be important contributors to geographical health inequalities. The authors also found that endogeneity (selective migration) may impact on health outcomes, especially among younger adults where positive health was correlated with greater residential mobility.

Van Lenthe, FJ. Chapter 8: Aggregate Deprivation and effects on health

This book chapter aims to improve our understanding of the association between the neighbourhood socioeconomic environment and health by reviewing international comparisons. The article discusses the complex conceptual and methodological issues that must be considered in designing studies and drawing conclusions, mainly:

- *What is the size of the neighbourhood at which inequalities occur?*
- *What is the evidence for a social causation and selection mechanism in the development of neighbourhood inequalities in health?*
- *What are the most relevant characteristics of the social and physical environment related to health?*
- *Do neighbourhood inequalities occur in the same direction and magnitude for all health outcomes?*

The chapter describes some of the complexities behind each of these questions, but broadly hints that the influence of the neighbourhood may be fairly small after accounting for individual socio-economic circumstances such as employment. More research is suggested; as is improved evaluation of community-based approaches to better measure their impact on health inequalities, neighbourhoods are proposed as an appropriate setting for health promotion interventions, and neighbourhood characteristics are urged to be taken into account when designing interventions and health equality policies.

Wagstaff, A, Paci, P, Joshi, H (2001) Inequalities in Health: Who You Are? Where You Live? Or What Your Parents Were? Evidence from a cohort of British 33-year olds presented at International Health Economics Association Conference July 2001

This study used the UK longitudinal National Child Development Study (NCDS) to track the self-reported health status at age 33 of approximately 6,000 individuals. It sought to unpack the role of geography and of childhood/parental factors as determinants of health inequality. The article starts by noting that there is strong interest in the UK and internationally in reducing health inequalities between and within nations, but that there is a weak knowledge base that allows for priorities to be meaningfully set, and instead laments the 'laundry list' approach of many policy documents, where costs are not estimated and impacts largely unknown. The researchers noted that the effects of living in an affluent area compound the effects of favourable circumstances and reduce the effects of unfavourable individual socioeconomic circumstances; and that, conversely, living in a deprived area can exacerbate unfavourable individual socioeconomic circumstances. "This raises the issue of how far socioeconomic inequalities in health are due to inequalities in the socioeconomic circumstances of *areas* rather than inequalities in the socioeconomic circumstances of *individuals*. To put it another way, how far should policy be focused on *places* rather than on the *people* living in them?"

Sophisticated modelling was used on the cohort sample, measuring self-reported health at age 33. The researchers found that:

- “A full three quarters of inequalities in ill health at age 33 is explained by inequalities...in income, housing status and spouse’s education...Income inequality is by far the most contributory factor, accounting for 60 percentage points of inequality in ill health.”
- “Of the remaining one quarter...the biggest contributory factors are inequalities in the individual’s own education and inequalities in the maths score at age 7, which each account for 6 percentage points.”
- “Inequalities in early childhood, birth, and the pre-natal period account for a mere 4 percentage points of the total inequality in ill health at age 33.”
- “Inequalities in the influences on ill health at the area level – captured by area-level fixed effects – account for only...6 percentage points.”

This study set out to understand how much health inequalities are due to poor people living in unhealthy areas, and how much health inequalities in adulthood are influenced by childhood. The researchers found that “The bulk of health inequality amongst NCDS cohort members at age 33 stem not from where they live, or who their parents were, but rather who they are.” The study may result in different findings if the cohort members were at different ages, and also utilises self-assessed health as the measure to assess health equality differences. Further, the findings may reflect the UK policy environment and may not be transferable to an Australian setting.

Warr, D.J. (2005) Social networks in a ‘discredited’ neighbourhood. *Journal of Sociology*, 41(3)

This article summarises community characteristics in Norlane/Corio, two ‘impoverished suburbs’ in Victoria, with a particular look at how stigma impacts on the local community and on social capital. The study found that while residents were involved with bonding networks within the community, there were few bridging networks from the community to wider access to economic and social resources. Stigma was an important influence on community members, and the author suggests stigma is crucial to understanding the processes through which social and economic disadvantage become entrenched. There were strong experiences that people were stigmatised when attempting to engage in bridging networks, and this occurred through both people self-limiting their engagement with others, and through their reactions from others when attempting to develop their networks. There is a recognition that area-based strategies may not address the macroeconomic conditions that entrench impoverished neighbourhoods, but are crucial for building self-confidence, self-efficacy and a sense of well-being that may lay foundations for bridging networks in the future.

Warr DJ (2006). Gender, Class, and the Art and Craft of Social Capital. *The Sociological Quarterly* 2006 47:197-520

Warr discusses the limitations of contemporary place-based praxis to create bridging networks for socially isolated women in deprived areas, which could build access to wider social and economic resources. However, the research did find that some women were ‘politically generating social capital’ through collective

action and involvement in neighbourhood groups. It is speculated by building capacity for involvement in decision-making processes at the community level, women could build the linking and bridging networks currently 'hindered by household economic circumstances and other barriers'. Warr suggests that for women, this neighbourhood collectivization is one example of the need for social participation to help in both 'getting by' (bonding social networks for practical support) and for 'getting ahead' (bridging networks that create connections across differences in social, economic and gender power). Since socioeconomic barriers are embedded in society, public health initiatives aimed at generating social capital require creative skills: "being socially transformative, involving reflexive participation in bridging and bonding networks, collectivizing to become empowered, and learning to interact in vertical networks and unfamiliar social settings".

Wiseman J. Local Heroes? Learning from recent community strengthening initiatives in Victoria.

This paper discusses the neighbourhood/community renewal agenda in Victoria, particularly noting the move beyond rhetoric by the current Bracks Labor government into scaled-up actions and investment, alongside emerging exploration of new political ideas and practices to challenge neo-liberal globalisation. In particular, area based approaches have assisted with renewing public debate on cooperation and collaboration; have led to a rediscovery of community development as a platform to reinvest in basic community infrastructure; have fostered debate on social connectedness and encouraged new explorations of civil society relationships; and have created new models for citizen and community engagement which in turn can lead to revitalising democratic processes. Thus, community strengthening initiatives make a valuable contribution to civic engagement processes.

Ziller A. The Community Is Not a Place and why it matters – case study: Green Square. *Urban Policy and Research* 22(4), 465 – 479, December 2004.

This article deeply questions the appropriateness of place-based approaches to improving social wellbeing and argues that it distracts from working on the more important question of fostering relative equality within places. While the audience for the paper is urban planners, the relevance of this piece is equally as important for anyone involved in neighbourhood and community renewal initiatives, and health promotion workers using place-based approaches. The author argues that people's social and economic networks are based on interest or attachment rather than on places. "The plethora of commitments and connections between people now rarely coincide with any geographic boundary much less a local one. Rather, the connections between people, their social, economic, political, religious, cultural, etc affiliations and interests are a diverse and ever shifting kaleidoscope of interrelated layers which cross territorial boundaries with all the ease of electronic communications." The article proposes a clearer direction towards reducing health inequities through social and urban planning. This planning should be focused on ensuring a social mix at the community/place-based level in order to reduce relative inequality across neighbourhoods. The author argues "It is time to

recognise that traditional urban design concepts do not address the key drivers of social health and wellbeing.” A range of emergent research questions are suggested, including: (1) can planning reduce residential segregation by income and if so what planning strategies seem to work best and (2) what planning and design strategies reduce perceptions of relative social inequalities between suburbs and neighbourhoods?”

Ziller A (2006), *Relative equality: practical implications for land use planners. Address to the ACT Branch of the Planning Institute of Australia, 6 Dec 2006.*

This paper cautions against the use of terms such as social sustainability in land use planning, as they are often poorly defined and intangible in resulting actions. The paper acknowledges findings from the health inequalities literature, in particular noting that the size of a local area income inequality gap is a greater impact on local health outcomes than low income per se, and that the social gradient interplay means that the negative effects of living in a highly unequal society impact on everyone in the local area. The paper highlights the ways in which land use planning reinforces health inequalities, including: (1) planning zones that identify high and low density can create income enclaves; (2) such zoning reinforces how new development areas are then marketed with no pressure for diversification of income or tenure mixes; (3) tenure mix and mixed income communities are rarely incorporated into planning instruments; (4) affordable housing requirements are fairly weak in Australia; (5) urban design often reinforces income segregation; and (6) planning and development actions often result in geographic displacement of people on low incomes. The author argues for carefully considered use of terms such as ‘community’ and ‘social sustainability’, arguing that these need to be clearly defined in order to have tangible outcomes in planning. The following yardstick is suggested to assist planners in land use developments: “Will this make relative inequalities worse, in particular will this lead to an entrenchment of relative inequality in geographic separations, enclaves, visual amenity and access arrangements?”