# Exploring Communities of Practice through Public Health Walks for Nurse Education

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Abstract—Introduction: Student nurses must develop skills in observation, communication and reflection as well as public health knowledge from their first year of training. This paper will explain a method developed for students to collect their own findings about public health in urban areas. These areas are both rich in the history of old public health that informs the content of many traditional public health walks, but are also locations where new public health concerns about chronic disease are concentrated. The learning method explained in this paper enables students to collect their own data and write original work as first year students. Examples of their findings will be given. Methodology: In small groups, health care students are instructed to walk in neighbourhoods near to the hospitals they will soon attend as apprentice nurses. On their walks, they wander slowly, engage in conversations, and enter places open to the public. As they drift, they observe with all five senses in the real three dimensional world to collect data for their reflective accounts of old and new public health. They are encouraged to stop for refreshments and taste, as well as look, hear, smell, and touch while on their walk. They reflect as a group and later develop an individual reflective account in which they write up their deep reflections about what they observed on their walk. In preparation for their walk, they are encouraged to look at studies of quality of Life and other neighbourhood statistics as well as undertaking a risk assessment for their walk. Findings: Reflecting on their walks, students apply theoretical concepts around social determinants of health and health inequalities to develop their understanding of communities in the neighbourhoods visited. They write about the treasured historical architecture made of stone, bronze and marble which have outlived those who built them; but also how the streets are used now. The students develop their observations into thematic analyses such as: what we drink as illustrated by the empty coke can tossed into a now disused drinking fountain; the shift in home-life balance illustrated by streets where families once lived over the shop which are now walked by commuters weaving around each other as they talk on their mobile phones; and security on the street, with CCTV cameras placed at regular intervals, signs warning trespasses and barbed wire; but little evidence of local people watching the street. Conclusion: In evaluations of their first year, students have reported the health walk as one of their best experiences. The innovative approach was commended by the UK governing body of nurse education and it received a quality award from the nurse education funding body. This approach to education allows students to develop skills in the real world and write original work.

Keywords—Education, innovation. nursing, urban.

### I. INTRODUCTION

REFLECTION on a public health walk is a methodology to develop the skills and knowledge of nursing students. Walking in small groups (two-five) undergraduates are instructed to observe the real 3D world using all five senses

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while they reflect on the community's healthiness. The aim of the walk is not to cover the territory, but to notice and reflect individually on feelings about what is noticed; and over time, develop a deeper reflective account about how these feelings help them understand their observations. Student evaluations, focus group evidence from student assignments and teaching experiences will be drawn on to explore the benefits of the innovation. Evaluations from three seminar groups of about twenty adult nursing students and an end of year evaluation hare available for analysis. After gaining approval from the School of Health Science Research Ethics Committee student assignments were used anonymously as data as well as a focus group. Twenty-one adult nursing students who had gained good scores in their assignments from the first cohort to take the course (N=75) were invited to a focus group to discuss the module. Seven students attended the focus group with a consultant employed to further develop the teaching innovation.

This paper will first present curriculum requirements for nursing students and how reflecting on a public health walk fits with the curriculum; secondly explore the health challenges the current students are likely to manage in their careers which make the study of social science and illness vital for their development; thirdly present the concept of healthy communities and discuss the cultural challenges to walking in the real world with reference to theory and what the students brought to the discussion. The development of the module and assignment will be described after a discussion of how the module addresses the ill-defined questions around social determinants of health and health inequalities some concluding thoughts about how to further develop and disseminate the innovation will be presented.

### II. NURSING CURRICULUM: MAKING SENSE OF THE SENSES

The nursing curriculum is revised every five to ten years to align teaching with Nursing and Midwifery Standards [1], as well as local needs and technological advances in teaching methods within the University. Exploring localities of practice has long been a feature of nurse education. Students in the late  $20^{th}$  Century visited places like public libraries and bus stations to collect information leaflets and while they were there observed the real world. At the beginning of the  $21^{st}$  century, nurses were able to collect most of their information for locality projects online. The consequences of this change will be discussed below.

Good nursing requires observation skills [2] with all five senses of sight, hearing, smell, touch, and taste. While some students arrive at university as perceptual learners (e.g. haptic,

kinesthetic, and olfactory) during their training they need to develop perceptual learning skills. Collecting information online can give a wealth of knowledge, but the method provides two dimensional images selected and framed by someone else, with limited context and, if any, often distorted sounds.

At the university where the teaching initiative is developed, the current nursing curriculum is based on Nolan's Six Senses Framework; a framework that presents the senses of security, belonging, continuity, purpose, achievement and significance as fundamental to developing meaningful relationships [3]. These emotional senses are applied to all those involved in the care setting: patient, staff, student, family member. The traditional meaning of the sixth sense as an additional skill beyond the five physical senses (above) is not foregrounded by Nolan. How far Nolan intends his audience to enjoy a play on words with this implicit link between his social senses and the five physical senses (plus the different cultural understandings of a sixth sense) is unclear in reports of the model. Exploring the culture of health and illness and the psychology of what is said consciously and unconsciously has been on the nursing curriculum for some decades and social sciences underpin health education. One of the aims of this module is to explore and influence the cultural understandings held by students and others in health care services. However, to return to all physical senses as important for observation: the skill of observing and reporting what is observed has been developed by social scientists, for example in the methods of sociological imagination [4].

## III. HEALTH CHALLENGES IN THE $21^{\rm st}$ CENTURY: LIFESTYLE DISEASES AND HEALTH INEQUALITIES

The population of England is getting healthier. We are living longer and for most of us the onset of disease and disability will be later than for previous generations [5]. Life expectancy across the 20th Century increased from less than 50 to nearly 80 years [6]. As the Department of Health [5] summarises; infectious diseases which blighted the English up to the middle of the 20th Century are no longer the main causes of premature death. While the foundation of the NHS in 1948 may account for some of this reduction; the white paper emphasises the contribution a wide range of public health interventions such as clean water and sewage systems, the clean air acts, better food and immunisation, arguably the main contribution of nurses to the big change in the health of the nation, is constructed as a political decision of mass immunisation programmes. However, the improvement in health is not uniform. Prior to the then new conservative government's white paper in 2010 [5], the Marmot Review [7] published at the end of the thirteen years of labour rule emphasised in Fair Society, Healthy Lives that the health of those in the most advantaged neighbourhoods is significantly better than the health of those in deprived neighbourhoods. The introduction of the NHS in the 1940s by a Labour government had not eradicated health inequalities. The social gradient of health stood at a shockingly sharp tilt after Labour government's 1997 to 2010. While old public health challenges were successfully managed, as outlined in 'Healthy

Lives, Healthy People', new public health challenges had succeeded them [8] which required transformations in how health is approached. With longevity new diseases had emerged as the 'big killers' by the beginning of this century: heart disease, respiratory diseases, stroke, cancers and liver diseases [9], [10], diseases which are linked to lifestyle and may be plotted on a social gradient from advantaged to deprived. In London the mapping of these chronic diseases across boroughs [12] indicates some success in new public health initiatives, but also highlights health inequalities [11].

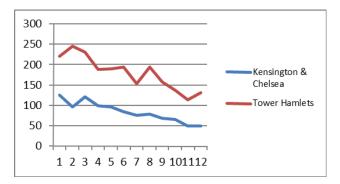


Fig. 1 Age Standardised Rates for ischaemic heart disease as cause of death for men 2001-2012 [12]

Fig. 1 shows the reduction in ischaemic heart disease for men in an East London borough is comparable to the reduction in a West London borough but the poorer borough continues to have a much higher death rate than the wealthier borough for this disease. Although the gap narrows at times, the trend in the poorer is more erratic. The x axis shows years 2001 to 2012, and the Y axis shows the number of deaths.

England has a poorer record than other European countries for improving the nation's health [9]. International data equal societies have better health for all and that only government intervention to reduce wealth inequalities will produce healthier communities [13]. Identifying the mechanism to improve health is contentious. Some students may want to be told an answer they can learn and put into practice to reduce health inequalities; however, the solution is to learn to work with ill-defined questions and becoming aware of recurring themes. One recurring theme is encouraging people to walk.

## IV. HEALTHY COMMUNITIES AND WALKING AS A PUBLIC HEALTH POLICY INITIATIVE

The latest government public health white paper Healthy Lives, Healthy People: Our strategy for public health in England [5] drew on the healthy communities agenda to consider how to redress health inequalities in England. This followed on from the 2010 Marmot Review Fair Society healthy lives [7] which recommended an increase in active travel, green spaces, and carbon reduction as key to a sustainable strategy for reducing health inequalities. Marmot acknowledges that some places are more walkable than others. In his work good walkability is related to good pavements, traffic calming measures, and places to walk to such as green

spaces, shops and work; poor walkability is connected with dense vegetation, ill maintained paths, dog fouling, graffiti and vandalism. The Marmot review recommended interventions to increase investment to encourage more walking. Two case studies in the report look at projects in Tower Hamlets which encourage walking; one is a universally targeted project to reduce healthy inequalities and another for community regeneration.

The concept of healthy communities predates 2010 documents. A programme of regeneration was proposed to make *Healthy Cities* by the Ottowa charter [14]. The concept involved locally based healthcare providers collaborating with other agencies and local people to develop sustainable reduction in the inequalities of health. Healthy communities were a recurring theme in The NHS Plan [15] alongside the programme of building new hospitals [16] as part of a collaboration with urban planners and communities. The Plan aimed at collaboration that would also lead to walkable spaces, for example the Green Bridge which joins two small parks in an area of East London [17].

### V.CULTURE AND WALKING

Observing in the Street is a well-established sociological practice, starting with the Poverty Maps produced by Charles Booth which identify where the rich and poor lived in London in decades around 1900. How far Booth and his researchers walked all these streets is not foregrounded in accounts of the maps. Lacking training in current theories of compassion and empathy, Booth labels to the poorest in East London as vicious and semi-criminal. This description however makes me wonder who went to the areas to find out about living conditions and how they felt about going. The Chicago Sociologists looked at zones in their cities in the 1930s and Anderson [18] considered The Code of the Street as he walked Philadelphia and observed how neighbourhoods change from the very rich to the very poor in an inner city landscape. This long established practice of observing social divisions in the street does not promote walking as an activity for leisure of physical health, but does indicate a willingness to walk by those interested in society. The healthy communities programme suggests walking for health is be an activity available to the whole population. However, who chooses to walk as a healthy option can be distinguished by the social divisions observed in the classic sociological studies of the street. Sociological studies of risk and road traffic accidents [19] highlight that those without cars walk more than those with cars, but perceive walking as a risky activity where danger features higher than health benefits. While policy approaches aim to improve areas to make them more walkable, cultural perspectives on walking may be harder to change. This paper will look at student anxieties about walking.

### VI. PUBLIC HEALTH WALKS AND SOCIAL HISTORY

A tradition of walks exists that has developed to look at the history of public health. Guided tours led by individuals or leaflets provide a structure for looking at how our ancestors improved their health. Guided public health tours are sometimes prefaced by an individual's statement that this is his or her own perspective and avoid an invitation to discuss what is contestable. There are excellent walks in London for example around the brewery founded by Buxton as part of the Quaker reforming movement to improve the lives of the poor, a contribution celebrated on the five pound note; and in Soho where the origins of epidemiology can be presented on a walk in squares where cholera was mapped by John Snow before he removed the handle from the pump to prevent people drinking the poisonous water [20]. A leaflet bearing the NHS logo offers a walk in East Central London describes Northampton Square as the site of a manor house which then became a private asylum and is currently an administrative building for The University. The leaflet offers no suggestion that this is the main site where students study and where The University is permanently based. Guided walks have several shortcomings as a learning opportunity. First guided walks may provide contestable accounts as facts. Secondly the guide for the walk is the person with the knowledge and no other perspective is welcomed; an environment that encourages transmissive learning. Thirdly, a guided walk can plan for permanent historic features such as the Bell Foundry in East London (famous as the longest continuously working business in England); however, it cannot prepare the learner to manage what is new or unexpected. Fourthly, because the focus of the guided walk is on the historic, these walks can be seen in the virtual world online and the incentive to undertake the walk in the real world is reduced. Features of historic interest add to the walkability of an area. While a historic guide may be a useful tool for encouraging some people to walk for health, undertaking a virtual tour offers little to the healthy communities' agenda. While historically focused public health walks have a tradition in the health visitors training, but as they walk their patch, it is more important that they observe the here and now. The historic tour can be useful [21]. Observing the history may help develop an understanding of the community and what engenders wellbeing [16] allowing the NHS to refocus on health rather than sickness. An awareness of East London's long history as a site of poverty, immigration which receives constant intervention influences an understanding of how it is now. Whether there is a sense of pride and belonging in the neighbourhoods [16] requires a more complex response. Those who live and work in the area do not have a homogeneous relationship with the artifacts identified on public health walks.

## VII. DEVELOPING THE MODULE AND ASSIGNMENT: WHICH WAY TO WALK?

Since 2010, the Marmot Review [7] and subsequent White Paper [5] were used as teaching materials for the first year psychosocial module called the locality project. By then local authorities had a wealth of reports available on line about the health of their populations. While the best locality projects were written by students who visited communities of practice and reflected on how the data matched on to the real world;

the poorest assignments were written by students who expressed an unwillingness to visit the areas where they would undertake their practical training. The ease of finding and copying text and figures from reports written by others became problematic as a high proportion of assignments. There was a need to create an assignment that was not 'an invitation to academic misconduct'. In developing a teaching method for relating social sciences to health communities, a traditional public health walk was considered and several of the walks discussed were attended. However, as transmissive experiences guided walks would predominantly invite students to reproduce the information given. To explore how guided walks might work, a small group of us made videos for the students initially intended to be loaded on phones and used as a guide on the walk [22]. While these can be useful preparation, they are highly directive and would produce assignments that are all the same. There were concerns that taking the students awareness away from the real world as they focused on the app would significantly reduce their ability to observe, and concerns were voiced about the risks of tripping while focusing on a phone, vulnerability to theft of devises used for the activity, and the possibility that a group might listen to a broadcast that may be controversial to someone passing.

Collaborating with CASS business school the possibility of using the dérive as a methodology came to the fore [23]. Dérive is French for 'wander' and is the name given to a methodology for exploring the world devised by Guy Debord in Paris. Using a term by a French situationist was resisted by colleagues at the school of health sciences, but essentially, what the nursing students do is a 'dérive'. The advantage is looking at what is in front of you, not just what was there when a walk was devised, the active learning of conversation with each other. Materials developed by Clive Holtham and Angela Dove have been invaluable in arriving at a successful educational experience for student nurses. In his presentation to a higher education academy workshop, this innovative module was described as:

"Best yet – the adaptation of the dérive ... for first year Nursing "Localities" project in vicinity of hospital with first work experience" Holtham [24].

## VIII. EVALUATING THE SUCCESS OF THE DERIVE STYLE PUBLIC HEALTH WALK

Since the course began in 2012, students responded positively to the learning initiative. In routine evaluations of the module, students rated the teaching from good to very good; the score rising from 4.1 in the first year to 4.4 in the second year (on a scale of 0-5). In their comments, students praised the enthusiasm of the staff and appreciated the structure which looked at both old and new health and provided a number of good exercises throughout the module. A minority were concerned they had not been given enough information; something addressed by adding quizzes to the module, but as the module encourages skills rather transmissive learning, it is possibly a good thing that some report a lack of facts. At an end of year evaluation, the first

cohort of adult nursing students were asked 'what was the best part of year one in the university?' The summary written by the programme director

'meeting people from different cultures, ability to look round London, great placements, new friends, simulated practice, public health walk, smooth running programme, biology module.'

The student response suggests that certainly for their own lives they understand Piet Hein's poem written for the World Health Organisation's 1988 40<sup>th</sup> Anniversary.

Health is not bought with a chemist's pills Nor saved by the surgeon's knife Health is not only the absence of ills But the fight for the fullness of life

### IX. SUMMARY OF THE FOCUS GROUP

The seven students who attended a focus group expressed appreciation for the invitation to talk to staff in a setting outside the taught programme and were keen to voice views to help the module retain what was good and alter what could be improved. Focus group participants valued the opportunity to work in small walking groups and get to know a few people well at the beginning of the course. They thought it was a good idea to have a purposeful visit into their communities of practice before attending placements and enjoyed the action learning aspect of the module. What worked well on the walk was engaging in conversations. How far it was good to read research before the walk or after was debated. In considering the oft quoted phrase of Louis Pasteur 'chance favours the prepared mind' there remained a preference to go into the field with an unbiased mind; however, there was also an acknowledgement that some reading might help guide the walk. Thoughts on how to allocate where to walk were aired and taken on board for future groups. The zones allocated for the walk were questioned.

The focus group began with an explanation of how the module was scaffolded, starting with an adobe presentation summarizing key points for the module. The participants said that the adobe presentation was good, but more scaffolding was welcome, particularly with identifying their themes for writing the final assignment.

### X. ANALYSING THE ASSIGNMENTS

In their assignments, students write coherent narratives based on compelling themes around healthy communities. A lecturer new to the teaching team for the course said after marking assignments that they had been a joy to read.

Following a walk in Whitechapel one student has discussed the drinking fountain funded by the Jewish community as an example of how those who live and work in a neighbourhood wish to belong. As well as historic evidence, observations about what is sold in the stalls and how people dress is included in the theme about a sense of belonging: a belonging which includes buying socially desirable drinks rather than tap water. Further reflection leads to thoughts about a sense of belonging in health care settings as well as the important

healthcare need for hydration. A photograph taken by the walking group shows the fountain with what looks like a working tap, but with stagnant water in the basin which is being used for refuse including a fizzy drink can.

Each year the walks are slightly different. The students mid autumn term, often in their reading week, which is often the week after school half term, a popular week to walk for those who have other plans for reading week. It is always autumn and the leaf fall and changing weather is a regular feature which students manage on their walks. In 2012, the timing of reading week coincided with celebrations of Hallowe'en and Diwali and led to themes around different cultural celebrations. In 2013, reading week did not map on to festivals and a summary of themes included: the observer and the observed; relief from stress in inner cities; interventions and how far they are fit for purpose; the messages signs convey; smoking regulation and public behaviour that results from the regulation; substance use and addiction and regeneration and decay [23]. In 2014, the build up to remembrance day and the preparation of war memorials began earlier in the year. More students included observations memorials than in previous years.

An assignment by a student who walked in North London developed a theme about memorials over time with pictures showing long term publicly managed memorials to service men who died in world wars, and the private memorials to family and friends. In the images from the assignment, the photograph of the war memorial shares a page with a lamppost bearing a photocopy of a grandmother and flowers held in place with parcel tape and then an even less permanent memorial of a bunch of flowers left by a pond. Helping service users manage attachment and loss is ongoing work for nurses and this reflection on how it is managed in the public space is valuable work.

From the same walk, another theme developed was the difficulty of improving the healthiness of a community in an area where service providers attempt to develop a healthy community by posting on a noticeboard upcoming events which are next to notices of teenagers that have gone missing from the area. The challenge of encouraging a sense of wellbeing in this setting is captured by the student as observations thoughts and reading are placed together. The 1500-word assignment encourages a creative approach to writing simple, sensitive, and meaningful accounts of the neighborhoods the students are introduced to as their communities of practice.

Another student developed a theme about home-life balance based on observations of older buildings designed for inhabitants to live over their small businesses and the active transport initiatives for commuters who travel to inner city areas for work. The student was able to relate her own observations to the Penguin classic 'Family and Kinship in East London'. The difference in lifestyles is reflected upon by the student with observations that private life is taken into the street by the homeless, for example, the woman greeted on the walk, but also by the celebrated street art of East London, the ubiquitous smoking areas outside buildings and the practice of walking and talking on mobile phones. Relating this theme to

her future practice, nurses work in an intimate setting with those who are their patients in the most private space of all: in hed.

### XI. DISCUSSION

The innovative module challenges students who may seek a finite definition of what affects health to consider the how social determinants of health are influenced by context. While Public Health England presents key health indicators, there is no fixed list. What impacts health will vary by area and time. As a result the opportunity to reflect on a walk values student skills in observing and understanding the real world around them. While an appreciative enquiry approach is encouraged for the assignment, students observe the health needs of the areas they visit as well as appreciating what is healthy about the community they will practice in. The assignment succeeds as a learning opportunity for students who each produce a unique account of thoughts developed during the taught period, the walk and the time to write up the assignment. Both the physical five senses and the six sense model come to make sense for the students as they work through the process. They experience the service users' challenge of being asked to go for a walk and find out how walkable the environment is for them. They discuss their anxieties about visiting these areas. While some express anxiety about walking in disadvantaged areas where Booth once defined the people as 'lowest class: vicious, semi-criminal', a second concern voiced is about the risks of the urban environment from toxic fumes and fast moving traffic, and a third anxiety is expressed about more natural risks from walking on paths covered with leaves and overhung with branches which might fall. Student fear of the low frequency high impact occurrences gives material to reflect on the service users' response to the advice to get out there and walk. Getting students out into the community to see and be seen by their communities of practice is valuable both for nursing students to relate social sciences to healthy communities and for making spaces more walkable.

### XII. CONCLUSION

Adapting the dérive to produce a methodology student nurses to observe the social determinants of health has been a success. Students individually write concise purposeful accounts based on their walks and relate them to the theories presented on their course. The success of the module has been celebrated for contributing to the community engagement by students and was the presentation in the first seminar of the University's *Community Engagement Seminar Series* [24]. before presenting in the School of Health Sciences annual talent share. The walk will be presented at conferences in the coming year including the 52<sup>nd</sup> International Making Cities Livable conference in the summer 2015 where the capacity of learning experience can increase the walkability of an area.

Support for a formal research project to analyse the assignments produced by students will be sought in 2015 to enable a more thorough account of the themes produced by the students and the impact of the teaching initiative will be

developed in the future with dissemination of work in local environments to enhance community engagement between the university and the neighbourhoods in which our students practice. At the moment, we are exploring how best to award prizes for students who produce the best observations to widen the senses of celebrating success to the students.

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