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Sustainability in local public health nutrition programmes: beyond nutrition education, towards community collaboration

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The present paper presents the approach, results and outcome of an innovative piece of action research amongst professionals (health and non-health) and the public (women and young people from low-income families in one of the deprived areas of Birmingham, UK). A cooperative inquiry approach was used and data were collected on concerns about health of professionals (n 15) and the public (n 19), as well as dietary practices, smoking pattern and access to healthy foods amongst the public (n 49). The methods of data collection were: desk research; observation; semi-structured individual and focus-group interviews; structured individual interviews. The findings highlight diverse views and expectations about health amongst the public and the professionals, and suggest the existence of tensions between the partnership and the ownership of inter-agency collaboration. It argues the importance of having a shared vision amongst health and non-health professionals regarding health strategy and the way forward for working together to promote the public's health. It recommends that by using the tenet of action research, and adapting a cooperative inquiry approach, members of a partnership project could learn through reflection on action and achieve personal development and social action.

Public health nutrition: Nutrition health education: Action research: Community development

Many of the health and nutrition promotion initiatives are professionally led, and some of them have been criticised for giving little attention to lay people's concerns and priorities (Davison *et al.* 1991). The World Health Organization (1990) Healthy Cities initiatives and the UK health strategies (Department of Health, 1992, 1998, 2001*a,b,c*, 2004, 2005) strongly recommend community participation and inter-agency collaboration for promoting health.

In addition, within the field of health and social care it is generally accepted that there is a need to find new techniques and ways of working to improve service and professional development. Garbett & McCormack (2002) argue that using systematic and rigorous approaches supported by facilitation could increase the effectiveness of patient care through transformation of care and culture and improving practice development.

Partnership working has been advocated as having the potential to make the delivery of services more effective

by generating 'new insights or solutions' and providing a 'synergy' that offers more than the sum of its parts (Mackintosh, 1993). Evidence from the literature (Department of Health, 1998, 2001*a,b,c*, 2004; Fisher & Gilbert, 2001), together with author's own professional experiences over 20 years in the field of public health nutrition and its promotion, suggest that any change in service development within one organisation needs to consider how it would relate to service users and other service providers. Also, for increasing effectiveness, strategies need to involve users as partners, through improving consultation with them, and from the outset the improvement of service delivery outcomes should be considered, so that services are appropriate to need, accessible and client centred.

The present project was set up in part to respond to the request from a group of health professionals to provide a health and nutrition promotion programme for low-income women living in an outer-city deprived area of Birmingham,

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UK. The health professionals believed that because of a lack of nutritional knowledge and cooking skills, women were heavily dependent on fast food and consumed very little fresh fruit and vegetables. They were also concerned about the high prevalence of smoking in the area.

It is well established that nutritional knowledge and cooking skills alone are not sufficient for nutritional behavioural change; wider issues affecting food intake and dietary behaviour, including access to healthy and affordable food, are equally important factors (Department of Health, 1996). In response to the initial request the author therefore raised the following questions:

what is the evidence behind the health professionals' concerns;

to what extent does the community share the health professionals' concerns;

are nutritional knowledge and cooking skills sufficient for nutritional behavioural change;

would nutrition education initiatives on their own be appropriate and cost-effective in the area.

In addition, in the absence of any evidence-based information (Katz & Peberdy, 1997) and in line with *Listening* to Local Voices (Sykes et al. 1992), it was proposed and agreed to undertake a needs assessment exercise before starting any intervention programme. A small steering group was therefore set up to plan and carry out the work. The steering group represented health and non-health professionals as well as the community (residents, shopkeepers and members of community groups active in the area). The author was chosen as the coordinator or facilitator of the group. The aim of the project was to develop a whole-community approach to the promotion of a healthy-eating programme in the selected community (which comprised 175 households, occupying 106 flats and houses owned by Birmingham City Council and sixtynine privately-owned or -rented houses), with the needs assessment being used to try to bring closer the normative needs, i.e. those defined by the health and other professionals and the felt needs expressed by the community itself. The objectives were to:

assess nutritional knowledge, attitudes and behaviour of women living in the community, i.e. conduct a needs assessment;

provide nutrition and health information and support for this community, based on the outcome of the needs assessment;

develop cooking skills amongst women living in the community, through provision of an educational programme;

increase access to healthy and affordable food by working with the local food stores;

encourage participation of local food stores by adapting the concept of the 'Look After Your Heart Award' scheme previously utilised for similar project working with restaurants in the city.

During the process of establishing the steering group, and following a preliminary discussion with a small group of professionals (three health professionals and four nonhealth professionals) who provided public services to the community, a lack of shared vision towards issues affecting health and activities to promote health became apparent. It was proposed, therefore, that the study should also allow time and space for reflection, as well as collecting data relating to the views and concerns of the professionals about health in this locality. The notion of action research (Reason & Bradbury, 2001) was proposed with a view to creating new forms of understanding about social and health issues in the locality before undertaking any practical solution to improving health and well-being. This proposal was agreed by the group following a lengthy discussion and the expression of genuine concerns that it might waste professionals' time and public money. In addition, the concept of 'cooperative inquiry' (Reason, 1998), which treats the researcher and researched as equal partners in an open, honest and non-exploitative relationship, was presented to the steering group. It was decided to adapt this approach for 'researching with people rather than on people', learning together through personal development and social action in the locality. This project therefore started with a notion of a partnership between the Health and Education Authorities and the community within the locality.

Methods

Study design

With the concept of action research, a cooperative-inquiry approach (Reason, 1998) was used as the basis for the study design. Thus, a steering group consisting of an academic in public health promotion, a health visitor, a community dietitian, a health-promotion liaison officer, a school play worker (also a resident), a school home-liaison teacher, two residents, a community worker and an adult education coordinator was established. The role of the steering group was to provide a sounding board for establishing the project, identifying the type of data required, interpreting the information gathered, networking and liaising with the community and enabling the implementation of the project.

The process to agree on the study design, the research approach to the project and consensus about the type of data required took approximately 2 months, by which time some members $(n\ 3)$ of the steering group had left, as they felt they lacked either the time or professional competency to contribute at that stage. Interestingly, none of the three residents left the steering group.

The changes in the composition of the steering group as a result of the departure of the three professional members had no impact on the value of the research or the research process, as there had already been agreement about the type of data required and which member who would be mainly responsible for the collection of the data. However, the impact on professional and practice development based on the concepts of reflection on action and participatory learning advocated by Garbett & McCormack (2002) and Heron (1996) was clearly pronounced. For example, the adult education coordinator was invited to support the development, implementation and accreditation of some of the educational courses. However, because the steering

group decided to undertake a needs assessment exercise before any intervention was undertaken, she felt unable to justify her time on reflection and working with the Group and learning with them without delivering any benefit. The same concerns were expressed by the community dietitian and the health visitor; they talked about the pressure of work and being unable to contribute anything in the research phase.

Process of recruiting participants

The criterion for recruitment was young women with children aged <7 years. It was planned to recruit a representative sample. Data from school registration and health visitors' caseload was used for the sampling frame. As a lack of community participation was expressed by both health and non-health professional members of the steering group, it was therefore decided to invite every woman $(n \ 85)$ on the list with a view to recruiting $\ge 30\%$.

Members of the community. The process of involving members of the community, especially in the most deprived area is cumbersome, and this project was no exception. The author had extensive experience of working with communities, involving families and users of the services both in the UK (Rabiee, 1989, 1991; Rabiee & Thomson, 1999) and in developing countries (Rabiee, 1982, 1984; Rabiee & Geissler, 1990). Nevertheless, the experience of recruiting participants for this project was challenging and the process took approximately 3 months.

Several approaches were used before forty-nine members of the community were recruited:

- (a) an information and invitation letter that used the logos of both the Education Authority's and the Health Authority's was prepared and printed. Information was given about the aims of the project, and participants were invited to join either on their own or with their family members in a group discussion about issues affecting their health and the potential solutions. In the first round eighty-five letters were sent through the local school but no response was received;
- after 2 weeks eighty-five letters were handed out to each parent or carer who collected their child from school and eighty letters were delivered by the community worker to other residents of the community. Sixteen responded, but only five women expressed an interest and volunteered to participate. The researcher approached them and arranged a convenient time and place for a focus-group interview. After the first focus-group interview six other women came forward and formed two further focus groups. When asked why they had not responded to the initial invitation, four women mentioned that they usually did not reply to any letter from the Health Authority or the Education Authority or get involved in their programmes, as 'we know they are going to tell us what we have done wrong or what we did not do in relation to our children's health or welfare'. The other women said 'no-one ever asked our opinion before, so we did not think we could offer anything to professional people';
- (c) following the preliminary analysis of data generated from the three focus groups, the importance of

- capturing the views of young people of the community became apparent. An invitation letter was therefore sent to the youth club. Eight young people aged 15–18 years expressed an interest and they comprised two further focus-group discussions:
- (d) in addition, the steering group considered data collected on dietary pattern and lifestyle behaviour from nineteen women and young people to be inadequate; hence, a new strategy was used to recruit more participants. A health fair was organised at the primary school. Thirty-eight individuals aged 17–51 years were approached, thirty of whom (four men and twenty-six women) agreed to participate in individual structured interviews.

The professionals. Using a purposive sampling framework (Robson, 1993), initially thirteen professionals working in the locality (five health professionals and eight non-health professionals), were recruited for this study. Following the preliminary data analysis it was considered necessary to capture the views of housing officers, so two housing officers were recruited, making a total sample of fifteen.

Data collection

The broad aim and objectives of the project required collecting primary and secondary data from different sources, capturing the different perspectives of the community and of professionals. Using a multi-method approach (Brewer & Hunter, 1989), information was therefore gathered through observation, desk research, semi-structured individual and focus-group interviews and structured individual interviews (Table 1).

Facilitator's roles. In order to maximise the consistency of the tool and approach, it was agreed that the facilitator should collect the primary data. In the absence of any volunteers, the facilitator also took the responsibility for writing and rewriting the proposal and submitting it for ethical approval. Ethical approval was granted by the local Ethics Committee.

Secondary data and information were also collected by the facilitator, with support from a member of the steering group, about the health profile of the community, health promotion activities in the locality and local facilities affecting health and nutritional behaviour, including: the prices and range of food available in local food stores; park, sports and other leisure facilities; community and social forums.

Research tools. The facilitator devised topic guides to steer the individual interviews and the focus-group discussions, with prompts to encourage expansion on topics or answers. These guides were refined following discussion with the steering group. A semi-structured interview schedule was devised for gathering qualitative data about the health concerns of the community (felt needs; n 19) and professionals (normative needs; n 15).

In addition, a structured interview schedule was designed to collect information about smoking habits, access to affordable food, food purchasing and cooking behaviour from forty-nine members of the community

Table 1. Summary of types of information by method of investigation and sources

Types of information	Methods	Sources of information
The health and social profile of the community	Desk research	Secondary data from Birmingham Health Authority, Healthy Birmingham 2000, general practitioners' data set, health visitors' case load, primary school data set, 1991 Census data and Birmingham City Council predicted mid 1990s Census for the community
The health promotion activities, leisure facilities and range of food stores in the locality	Observation and telephone inquiry	School, health centre, Health Promotion Department, community and leisure centre, library, adult education centre, youth club, mother and toddler group
The professionals' concerns about the community's health	Semi-structured individual interview	Fifteen professionals: two health visitors, two general practitioners, one school head teacher, one infant teacher and one junior teacher, one preschool worker, one community worker, one youth worker (also resident), one social worker, two housing officers, two nursery school helpers (also residents)
The community's concerns about health	Focus-group interview	Nineteen in total: eleven women aged 21–35 years (three focus groups) and eight young people aged 15–18 years (two focus groups)
Eating pattern, access to affordable and healthy food, cooking practice and smoking behaviour	Food-frequency questionnaire, and structured interview	Forty-nine in total: nineteen members of focus group plus thirty men and women aged 16–51 years recruited at a health day event

(nineteen from the initial group of volunteers and thirty who were recruited at the health fair). Information about whether they would like to join in any health-promotion programme was also explored.

Furthermore, using a validated food-frequency questionnaire (Cade *et al.* 2002), information was collected on the dietary pattern of all forty-nine participants.

All tools were piloted and questions modified accordingly before the main data collection. Having three residents as members of the steering group helped not only to clarify and rephrase questions during piloting, but also helped in allocating a realistic timeframe for focus-group interview. Each focus group and individual interview took approximately 55 and 40 min respectively to complete. Permission was sought to record individual and group interviews, and audiotapes were later transcribed in full for analysis. The audio recording was also tested each time for quality. Assurance was given that interview tapes and transcripts would only be used for the purpose of the research and would be destroyed after the report was completed. Confidentiality and anonymity were assured both at the beginning and at the end of the interview. The focus-group interview with the community members took place at a community flat. The individual interview with the professionals took place at their workplace.

Field notes to support the data collection and aid analysis were recorded immediately after the interviews.

Data analysis. Qualitative data was analysed using the Miles & Huberman (1994) framework of content analysis and by identifying major and minor themes. After carefully reading the transcripts several times, it was possible to identify themes using the research questions as a guide. It was not possible to include all the data generated from the interviews, therefore extracts were selected when they illustrated strongly-held views shared by many

informants or gave a summary of the points made. To ensure anonymity, all respondents were given an individual letter from the alphabet with another letter to identify their gender as male (M) or female (F). In addition, a number (1–4) was allocated to each participant to identify whether they were members of the community (1), a pupil or student (2) or health (3) and non-health (4) professionals. Following the initial analysis the coded transcripts were presented to the steering group and interpreted collectively to ensure a fair representation of the data generated and to minimise facilitator bias. This process was in line with implementing the concept of cooperative inquiry.

Quantitative data from food-frequency questionnaires were coded and analysed using SPSS for descriptive data analysis (SPSS, Chicago, IL, USA). The present paper concentrates mainly on the findings of the qualitative data. Information from the quantitative data will be used to provide context.

Ethical issues

The main key ethical agreements, as suggested by Babbie (1992), were adhered to, including: voluntary participation; no harm to participants; honesty about the research agenda; anonymity; confidentiality. Consent was sought before the interview through the use of a participant information sheet and consent form. Informants who were <16 years of age were asked to obtain consent from a parent or guardian. Confidentiality was ensured by the setting of ground rules at the beginning of each interview. Members of the group agreed to keep all discussion confidential. Anonymity was ensured by the coding of the transcripts. Furthermore, as requested, respect for the individual rights was achieved by acknowledging the contribution of the members of the steering group without mentioning their individual names.

Table 2. Summary of major themes and other findings

Housing was an issue of concern for both the professionals and the public

Drugs were an important issue for the residents but were mentioned only by one of the professionals

Definition of 'parenting skills' varied between professionals and the public

Contrary to health professional views, consumption of fast food was not perceived or reported to be high; more than two-thirds of women reported cooking every day

Low reported consumption of fruit and vegetables and the high prevalence of, or reported, smoking confirmed the health professionals' concerns. However, these health behaviours were not the main issues for the community. Only two women expressed an interest in a cooking skills and nutrition education programme and one woman wanted support to stop smoking.

Environment, housing, leisure facilities, drugs, parenting and coping skills, and a lack of social connectedness were the main issues raised by the community

Lack of purpose and motivation were highlighted by all young people

Different world views between the professionals and the public and unease in their working relationship, in part the result of a lack of understanding and communication

Findings and interpretation

The findings are presented with a summary of the participants' socio-demographic information, followed by some general information about the community found through desk research and information from the qualitative data derived from the professionals and the community under the major theme of concerns about health and the minor themes of housing, parenting and environment. Finally, the dietary habits and health behaviours of the informants are summarised.

Socio-demographic data

The ages of the community members who participated in the study ranged from 15 to 51 years. All participants were from white British ethnic backgrounds, which reflected 92% of the population of the community, based on the data from the primary school and the databases and health visitor's case load of two general practitioners. Twenty of thirty-six participant women were single parents (sixteen had school-aged children who were eligible for free school meals). None of the participants had a car. Only three were owner occupiers, six lived in private rented accommodation and the rest lived in council-owned flats or houses. Thirty-one of the forty-nine heads of household (either female or male) were unemployed. These data clearly indicate the poor social-class background of the informants. Based on the 1991 Census data, the community was considered as a deprived outer-city area. There is a high turnover in the population of the community, and therefore, as discussed later, the census data seems to be out of date. Nevertheless, the socio-economic information indicated that the participants were representative of their community as a whole.

Facilities available in the community. The facilities included: a primary school; a community flat with two rooms and a kitchen used for different communal activities (a mother and toddler group in the morning, a youth club in the evening and occasionally other group activities); two relatively large food stores with a wide range of fruit and vegetables and a reasonable price range. There was no park or any other leisure facilities, but the community was served by a number of bus services to the city centre, and a 'park and ride' mini-bus service. There were two general

practitioner surgeries and a health centre at the boundary of the community. A number of health promotion activities were held at the health centre, but according to health professionals they were not widely used by members of the community.

Concerns about health

Professionals' concerns about health. Table 2 summarises and compares the major themes that emerged from interviews with professionals with those that arose from interviews with members of the public.

Housing was the main issue of concern for all, although a different interpretation was given by health and non-health professionals. Health professionals saw poor housing in relation to problems of physical ill health, associated with asthma and respiratory infections, whereas non-health professionals saw it in relation to well-being. They were concerned about the high turnover of the population of the community and its impact on social relationships and networking. The following comments from non-health professionals illustrate this point:

- MF4: 'Housing is a big issue, very high turn over in this community, almost two third of kids leave our school by the time they reach top infant.'
- BF4: 'Very few of our kids remained at same school through their primary education.'
- JF4: 'Difficult to forge any relationship, by the time you know the family they have moved somewhere else.'
- JM4: 'There is no community sprit, or any sense of community. Let's face it there is no community at all and then we are expected to do community development here. Housing policy has to change.'

Interviews with the housing officers confirmed this concern because they mentioned that they are aware of the poor physical condition of the housing in the community, as well as the adverse effect of short-term housing policy in preventing social cohesion, as highlighted in this quote:

PM4: 'I know, just providing housing for nine to twelve months is not good, it does not help integration. Hence we don't have 'community' as such in this estate.'

They mentioned various steps they were taking to change the policy and bring some degree of stability to this community. They welcomed the overall aims of the project and thought that the project could be used to create a pressure group to advocate improving the health and wellbeing of population in the area.

Professionals expressed concern about lack of parenting skills. Once again, different meanings were attached to the concept of parenting. Health professionals expressed deep concerns about parental lack of knowledge relating to nutrition and feeding, and cooking skills, which were seen as aspects of a more general negative attitude towards better healthy living, as illustrated in the following examples of their concerns:

CM3: 'They don't provide fruit and vegetable to their kids.'

RF3: 'I know poverty takes away one's self esteem and motivation, but it's not only that, I think they don't have any cooking skills, or perhaps can't be bothered and they spend all their money either on smoking or fast food.'

Parental negative attitudes were seen to be complex in origin, incidental to the parents' own youth and lack of knowledge, and lack of motivation to learn or to change, which compounded the negative role model portrayed by smoking.

MM3: 'They just can't be bothered about anything, I know they are young and it's difficult to cope on your own with small kids. But (they) don't want even to hear any advice.'

CF3: 'What a role model to have, poor kids!?'

Non-health professionals' concerns about health. Non-health professionals talked about children's lack of bedtimes and not being given breakfasts before school, which adversely affected their attention and readiness to learn at school:

SF4: 'Children arrive at school late, tired and without having breakfast.'

HF4: 'We had to start breakfast club, as they come to school late and tired. Mums can't be bothered to put them to bed early enough.'

DM4: 'Well, what do you expect, F, G and D keep telling me they were up till 12.30, well how do you expect them get up early enough, be washed and fed before coming to school ... They are only 7, my kids are in bed by 8.30.'

Public's concerns about health: women. The physical and social environment, linked with housing, were the main areas of concern for women, and these two points were mentioned respectively by respondents DF1 and JF1:

DF1: 'You should come and see the condition in our flat; water leaking, smells and poor J is ill all the time.'

JF1: 'The amount of noise they make at night, does not allow my children to sleep.'

They felt that because of the lack of recreational facilities and a play area, they could not send their children outside to play. This point is illustrated by CF1, a mother of three children of <7 years of age:

'My kids are stuck in the house, not able to go out and play.'

In addition, they expressed being 'fearful of abusive teenagers', who were said to be out of control and to contribute a malign influence by making noise at night that caused distress and anxiety for the mothers and disrupted their own and their children's sleep.

MF1: 'I put S and J to bed around eight, but they can't fall sleep, they (young people) are so loud, I don't know is it the drugs or the alcohol which make them so loud?'

NF1: 'We don't have double glazing, well none of the flats have, if I open the window and ask them (young people) to be quiet or go somewhere else, they become very aggressive and abusive. I don't want my children to hear the argument, so try to ignore and get frustrated and smoke more.'

The link made between the stress and maternal smoking, as mentioned by NF1, a mother in this deprived community, echoes Graham's (1987) findings about smoking amongst single-parent low-income women elsewhere.

Drugs and worry about the possibility of their young children being offered drugs was raised by almost all community members interviewed. MF1 summarised this point well:

'What if, if they offered drugs, I can't watch them all the time.'

Women talked at great length about the issue of parenting. They felt their difficulty in coping with children was linked partly to the housing condition and partly to their own childhood experiences. The following quotes illustrate this point:

CT: 'It is not as if I had good relationship with my parents, but at least we could go out and play safely in the road.'

NT: 'Have a lot of baggage from my own childhood. Often wonder how firm I am being with them, then again the area I was brought up was friendly and safe and we used to stay out a lot.'

The issue of short-term housing policy and its impact on social relationship is summed up succintly by MF1:

'This is my 3rd flat in fifteen months, how am I supposed to make friends? The health visitor thinks I am not interested in my baby, she thinks that is why I don't come out to join mother and toddler group.'

A number of women expressed concerns about their poor relationship with health professionals in general, and health visitors in particular. NF1 provides a good example:

....health visitor (HV) thinks I am stupid \dots I don't have central heating in my flat, she arrived (HV) while I was

breast feeding D, so had to stop feeding and leave baby on the settee before going and opening the door for her (HV). Of course, my baby started crying, and then without asking any question she (HV) assumed I don't know why my baby's crying Started (HV) telling me off and putting me down D must be hungry, have you changed him Just fed up with all of them ... so decided not to open the door next time.'

The issue of the poor relationships with professionals is a cause for concern, given that the inverse health care law is well documented among those who are most in need. The facilitator felt that had a better relationship been forged, these young women could have benefitted greatly from the support provided by professionals, which could, in turn, increase participation in, and uptake of, services.

Public's concerns about health: young people. Recreation facilities, lack of ambition and communication with parents and reasons for the use of drugs were the main themes that emerged from two focus-group interviews with young people. Almost every one mentioned the lack of facilities for recreation, saying that '..there is no park or play area. What are we supposed to do?'

They all talked at great length about not having any incentive to work hard at school or college because of the high unemployment rate in their area. They gave examples of their parents', siblings' and neighbours' experiences. They were generally concerned about the uncertainty of their future, because they expected their lives to replicate those of their parents and friends. The following comments illustrate this point:

BF2: 'Well my parents are unemployed, what hope is there for me?'

FM2: 'Most of my friends were not able to find any job, even though they got good GCSE and A level results'

RM2: 'My parents think I should go to college, what for, wasting another few years and not getting any work and miss all the fun?'

Against this background of hopelessness, young people spent their time in the words of one of them:

Not doing anything ... except making noise outside the flats at night – a big fun and challenge for us, isn't it?'

When they were asked about the use of drugs, all eight participants in both focus groups mentioned using a range of drugs for recreation, because of the ease of access and low cost compared with other entertainment:

SM2: 'Drugs? ... of course we use it, much cheaper than going to the town and spend a couple hours there.'

JF2: 'Much cheaper than going to cinema or having a couple of drinks in a bar.'

When asked whether their parents are aware of their use of drugs, CM2 mentioned that:

'I go to my girl friend's house to smoke, her mother does the same. She doesn't mind as long as we don't make a mess in the house.' The same comments were made by the female members of the group as illustrated by CF2:

'Mine too, they are more concerned about the cleanliness of the house than using the drug.'

Finally in response to a question about why they used drugs, BM2 summarised the point:

'It is nice, enjoyable and you forget about your misery for a couple of hours.'

The last point also raised the degree of unhappiness experienced by these young people. Whether the misery felt is real or induced by the aftermath of the use of drug is an issue that requires further exploration.

Asked about the cost of drugs and how they pay for them, five of eight participants talked about different ways of financing their drug use, from crimes that were characterised by one young person as 'petty theft, breaking [into] the cars'. Another mentioned 'shop-lifting', and also 'breaking [into] the houses of the neighbourhood area if needs be'.

Another young person admitted to behaving badly to manipulate parents:

'Making noise at home, I know they (parents) are scared when I get angry. They give me money and know how to get rid of me'

Once the issue of drugs and its financing was explored in detail, the facilitator faced an ethical dilemma. Despite assurance given about the confidentiality and anonymity, the facilitator faced, on the one hand, a professional's concerns for public safety and, on the other hand, a researcher's need to keep a promise of confidentiality and anonymity. This tension created the dilemma of the dual role of researcher practitioner, as pointed out by Robson (1993), which will be addressed further in the discussion.

Finally, young people's openness about issues affecting their behaviour and possibly their health in the long term was pleasantly surprising. They were grateful that somebody took the time to listen to their issues, some of which they said they were unable to communicate with their parents. Their openness showed that the researcher had been able to reassure those who voiced concerns about confidentiality and anonymity. Their suggestions about how to improve the well-being of their community were refreshing. For example, they mentioned that school and youth club should work together, that the school playground could be utilised by young people in the evening, in order to reduce unnecessary noise outside the flats, and also create better community relationships and prevent or reduce drug usage in the area.

Dietary habits and health behaviours of the community

Thirty-three of forty-nine individuals interviewed reported smoking (69%), in keeping with the picture that emerged from the qualitative interviews. The average number of cigarettes smoked daily was eighteen, with a range of seven to thirty. Interestingly, none of the adult males $(n\ 4)$ said that they smoked.

Access to healthy and affordable food was perceived to be generally good, and it appeared that women were managing their household budgets competently by shopping at local markets. Observation from three local food stores, as mentioned earlier, also indicated a wide range of food choices, including good availability of fresh fruit and vegetables, and a reasonable price range.

In addition, a high proportion of women, more than twothirds, mentioned cooking every day, and only two of those interviewed were interested in a nutrition and health education programme and in developing specific cooking skills, in making curries.

Food and nutrition did not appear to be a salient issue for the community. When this subject was probed, two women expressed their anger and frustration at incessant information and exhortation around food and eating by the following statement:

JF1: 'We are bombarded with nutrition information on TV and women's weekly magazines.'

To which another woman, CF1, added:

'[We] have been dieting all our life and know everything about healthy eating.'

Thus, all women interviewed mentioned that 'fast food' is too expensive to buy', and a few of them also stated that 'we don't like greasy food'. Another frequently-expressed comment was 'we treat ourselves and our children to fish and chips, or Chinese take-away once or maximum twice a week', indicating that women were aware of messages about avoiding high-fat fast foods as well as the likely adverse impact on their household budget of relying on fast food.

When questioned about their pattern of food shopping, most indicated that they either used the corner shop or went to the city centre (Bull Ring) market to purchase food. Almost everyone praised the community's good transport service, especially the 'park and ride' services that facilitated access to city amenities.

Participants were asked whether they were concerned about their dietary habit and smoking. Only two women said that they were concerned about smoking, because of their children's comments, such as 'smelly mum'. The rest of the participants said that they enjoyed smoking, because ... it helps me socialise with others, something we all do, or because it brought some feelings of relief, e.g. 'it helps me not to think about my boring life' and 'it gives me a break from my stressful daily life'. The use of smoking in managing stress or overcoming boredom has been identified previously (Rabiee, 1996; Graham, 1987).

Fruit and vegetable consumption was reported to be low, one portion of fruit or 1.5 portions of vegetable daily, on average, which is far below the current recommendation of five portions of fruit and vegetables daily. Only one person mentioned consuming five portions daily and the rest had fewer than three portions per week. A number of them (eight) said they do not eat fruit and fresh vegetables at all, but occasionally consumed tinned vegetables. The reasons given were that 'they don't taste nice', or were 'expensive', or 'children don't like it, I can't cook separately for myself, can I.'

Data from the interviews and food-frequency questionnaires suggested that contrary to the views of the professionals, the consumption of fast food was not high amongst adult participants (n 40). By contrast, young people (n 9) said that they were consuming chips every evening and occasionally had chips and a pie during lunch times. Although the low consumption of fruit and vegetables and the high prevalence of smoking (69%) confirmed the health professionals' concerns about health, only one of thirty-three smokers requested help with quitting smoking.

Discussion

Findings from the present study, as summarised in Table 2, clearly indicated that there was a gap between the professionals' and the public's concerns about health, suggesting divergent views and expectations amongst the professionals (health and non-health) about issues affecting the public's health. This divergence is clear justification for undertaking the study, as it would have been a waste of public money to invest in a public health nutrition promotion or education programme.

The findings also highlighted how the professionals and the community attached different interpretations and meaning to the same issue, such as parenting skills and children's tiredness. The professionals ascribed the children's tiredness and their lack of concentration to a lack of parenting skill in imposing discipline and setting bedtime schedules. By contrast, women talked about disturbance in their children's sleep because of noise at night that was perceived to be outside their control. Interestingly, the young people confirmed that they caused the women's dilemma, which provides the internal consistency of data collected. This diverse interpretation highlights the importance of collecting information from different perspectives, as well as using different approaches to provide a big picture of the issues that need addressing; the value of a multi-method approach.

The findings also indicated a number of challenges for practice and professional development, which will be discussed under the following four broad headings: concept of health; lessons learned; challenges faced that lead to action; partnership and inter-agency working.

Concept of health

The public's concerns about health were broad and beyond physical health. The issue raised by them was in line with the field of well-being described by Labonte (1998), who argues that well-being could be defined as having the ability to do things one enjoys, feeling control over life–living condition and enjoying good social relationships. He suggests that this outcome would be achieved through three interconnecting cycles of vitality or energy, having a purpose or meaning in life and enjoying social connectedness. He asserts that the outer layer of these cycles could be interpreted as physical, mental and social health. Labonte's (1998) concept of well-being could be used successfully as a community development tool

for improving health. It enables links to be established between felt and normative needs in authentic ways.

The importance of social connectedness and social cohesion was raised equally by the community members and the professionals, and its impact on well-being and community participation is in line with the notion of social capital advocated by Putnam (1995) in recent years.

Lessons learned

The findings also reconfirmed the questions raised from the outset in relation to the viability of setting up a nutrition health education or promotion programme based exclusively on normative needs that have little salience for the community who are the intended beneficiaries. This insight legitimises reflection on practice, and points out how reflection on action should be encouraged and viewed as a means of professional development that can help with service development for redressing health inequalities. In addition, the research process also highlighted the importance of evidence-based intervention in public health nutrition promotion programmes.

Challenges faced that led to action

The cooperative inquiry approach appeared to be a viable means of closing the professional-public gap and working together to improve the public's health. Having presented the data to the steering group, it was agreed that the results should be disseminated to a mixed audience of the local public and professionals. The rationale was that the only way to move forward and improve the health of the community would be to facilitate and foster a better relationship and understanding amongst the professionals and the public. It was decided to involve the young people in the area in the use of performing arts to present the findings of the project, which was another challenging task to negotiate with the school, youth club and adult education department. Preparation took at least 1 month, but generated positive collaboration amongst the parties involved. The researcher tactfully facilitated discussion following the dissemination. She advocated changes in the housing policy and recreation facilities in order to create a sense of belonging and social connectedness in the community.

The following action was then planned and a subgroup was formed to:

- (a) campaign for changes in short-term housing policy;
- (b) negotiate with the school authority about shared use of school leisure facilities.

Partnership and inter-agency working

Experience from this project suggested that successful inter-agency collaboration requires a shared vision, as well as a partnership, creating a sense of shared ownership. Ownership of a project does not necessarily come with the extent of the contribution an individual makes. It is often related to the treatment of the individual within the project, and therefore the extent to which the individual feels part

of the group or project. However, the romantic notion of partnership often portraved in text books and contemporary literature should not be overlooked (for example, see Barnes et al. 2001; Sullivan & Skelcher, 2002; Morris, 2003: Newman et al. 2004). It should be acknowledged that in reality inter-agency collaboration is challenging and time consuming, especially if professionals participate because they are sent by their managers rather than joining a group based on their own inclination. For example, before the dissemination this project constituted inter-agency collaboration work as far as setting the agenda was concerned. In effect, only two members were carrying out the work, but at a very slow pace, as they had to check every step with the rest of the group. This situation raised another tension between the notions of partnership and ownership. By implication it meant that there was an imbalanced contribution from the primary agencies. Interestingly, one of the members of the group, who provided a lot of ideas about its membership and which members should be involved, left the group after the second meeting because she felt she could not make any contribution during the data-collection stage. She said she would be happy to rejoin for delivery, if her contribution was required. It transpired that she did not return to the group, as there was not much she could deliver.

Similarly, at times the facilitator found difficulty in managing ownership v. partnership of the project, as most often she was the only member of the group carrying out the agreed tasks. She was, however, aware of the challenge of her role, i.e. the need for managing anxiety amongst those key informants and professionals who did not have the time to deliver any work outside the meeting but were extremely useful as a sounding board for the steering group. The facilitator was often torn between, on the one hand, convincing those who were desperate to do things and didn't want to waste their time with her desire to have academic debate about the rationale and viability of intervention programme. On the other hand, she had to encourage those silent 'committee lovers' to undertake some aspect of the work and contribute practically to the notion of inter-agency collaborative work. One of her main tasks was to reassure some of the members of the steering group that at times it is acceptable not to be able to contribute at every stage and yet still belong to, and own, the whole project and its outcome.

Where are we now

Having identified the task, the subgroup became very active and committed to working together and acting as change agents to improve the quality of life of their neighbourhood. Within the first 6 months they started to make an impact on achieving their goals, as well as setting up lively cookery sessions and a smoking-cessation programme. It appeared that the facilitator's job had come to an end, the community began trusting the professionals and their level of participation increased. The professionals also seemed to enjoy working in the area. Furthermore, 5 years later, the community is still actively involved in a number of projects. The following quote from one of the

residents summarises the positive feeling that now exists in the community:

'We built something together which was not possible making it on our own ... and enjoy having a responsible youth and community'

This comment has reassured the facilitator that despite the ethical issue faced earlier regarding the protection of the public safety, she was able to manage the tension that existed between her dual role of practitioner—researcher. Maintaining the promise made in relation to confidentiality and anonymity meant that the young people began trusting professionals, participating in social action to improve the well-being of their own community.

Conclusion and recommendations

In conclusion, food and nutrition was not an issue of concern; the environment, housing and parenting and coping skills were the main health-related concerns for the public. The findings demonstrate the importance of evidence-based information, and argue that the aims and goals that provide the framework for any public health nutrition intervention programme should reflect not only the normative needs of the professionals, but also take into account the expressed and felt needs of the target population (Hawe *et al.* 1992). Although it is recognised that the findings of the present study may not be generalisable, nevertheless, they are clearly transferable to other settings.

Further research is required to identify whether socialclass differences in the responses to health information campaigns (Turrell, 1998) are in part a result of the gap between the priorities of professionals and the public about health. Findings from the present study suggest the use of the cooperative inquiry approach as a model for closing the gap and working together to promote the public's health. Action research appears to offer a model that integrates both reflection and action in a way that gives validity to the competencies and experiences of the researcher or fieldworker. Successful collaboration and inter-agency work requires time, shared vision and facilitation.

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References

Babbie E (1992) *The Practice of Social Research*. Belmont, CA: Wadsworth.

- Barnes M, Sullivan H & Matka E (2001) Building Capacity for Collaboration: Context, Strategy and Capacity. Initial Findings from the Strategic Level Analysis of HAZs. Birmingham: University of Birmingham.
- Brewer J & Hunter A (1989) Multimethod Research: A Syntheses of Styles. London: Sage.
- Cade J, Thompson R, Burley V & Warm D (2002) Development, validation and utilisation of food-frequency questionnaires a review. *Public Health Nutrition* **5**, 567–587.
- Davison C, Davey Smith G & Frankel S (1991) Lay epidemiology and the prevention paradox; the implications of coronary candidacy for health education. *Sociology of Health and Illness* **13**, 1–19.
- Department of Health (1992) *The Health of the Nation*. London: The Stationery Office.
- Department of Health (1996) Low Income Food Nutrition and Health Strategies for Improvement. A Report by the Low Income Project Team for the Nutrition Task Force. London: The Stationery Office.
- Department of Health (1998) *Our Healthier Nation*. London: The Stationery Office.
- Department of Health (2001a) Shifting the Balance of Power: Securing Delivery, London: H. M. Stationery Office.
- Department of Health (2001b) The Expert Patient: A New Approach to Chronic Disease Management for the 21st Century. London: The Stationery Office.
- Department of Health (2001c) Involving Patients and the Public in Healthcare: A Discussion Document. London: The Stationery Office.
- Department of Health (2004) *Choosing Health*. London: The Stationery Office.
- Department of Health (2005) About Our Health, Our Care, Our Say. London: The Stationery Office.
- Fisher B & Gilbert D (2001) Patient involvement and clinical effectiveness. In *New Beginnings: Towards Patient and Public Involvement in Primary Care*, pp. 119–131 [S Gillam and F Brooks, editors]. London. King's Fund.
- Garbett R & McCormack B (2002) A concept analysis of practice development. *Nursing Times Research* **7**, 87–100.
- Graham H (1987) Women's smoking and family health. *Social Science and Medicine* **25**, 1.
- Hawe P, Degeling D & Hall J (1992) Evaluating Health Promotion A Health Worker's Guide. London: Maclennan and Petty Pty Ltd.
- Heron J (1996) Co-operative Inquiry: Research into the Human Condition. London: Sage.
- Katz J & Peberdy A (editors) (1997) Promoting Health Knowledge and Practice. Bristol: Open University Press.
- Labonte R (1998) A Community Development Approach to Health Promotion. Edinburgh: Health Education Board for Scotland.
- Mackintosh M (1993) Partnership: Issues of policy and negotiation. *Local Economy* **7**, 210–224.
- Miles MB & Huberman AM (1994). *Qualitative Data Analysis*, 2nd ed. London: Sage.
- Morris AM (2003) Partnership; a collaborative method to develop child centred services: a study using cooperative inquiry. MSc Dissertation, University of Central England, Birmingham.
- Newman J, Barnes M, Sullivan H & Knops A (2004) Public participation and collaborative governance. *Journal of Social Policy* **33**, 203–223.
- Putnam RD (1995) Bowling alone: America's declining social capital. *Journal of Democracy* **6**, 65–78.
- Rabiee F (1982) Preventing Hookworms: Working together and Understanding Community's Perspective. A Report to the Department of Health Gilan Province, Iran. Astaneh Ashrafihe, Iran: Department of Health Gilan Province.

Rabiee F (1984) Evaluation of rural primary health care services in Gilan Iran: 1981–83. *Gilan Health* 3, 11–13.

- Rabiee F (1989) Health Education Needs of Asian Communities: Prevention of Coronary Heart Disease. A Report to the Regional Advisory Group on Health Promotion. Birmingham: Central Birmingham Health Promotion Department.
- Rabiee F (1991) Health Education Needs of Chinese Women. A Report to the Department of Health. London: Department of Health.
- Rabiee F (1996) Nutritional knowledge, dieting and pattern of exercise in adolescents. *British Journal of Community Nursing* 1, 340–346.
- Rabiee F & Geissler C (1990) Causes of malnutrition in young children: Gilan Iran. *Journal of Tropical Paediatrics* **36**, 19–24.
- Rabiee F & Thomson D (1999) Widening Participation Increasing Access to Higher Education for Muslim Women. Birmingham: UCE and Westhill College Birmingham University.

- Reason P (1998) Human inquiry, cooperative inquiry, and action inquiry. In *Introduction to Action Research: Social Research* for Social Change, pp. 203–213 [DJ Greenwood and M Levin, editors]. Thousand Oaks, CA: Sage.
- Reason P & Bradbury H (2001) *Handbook of Action Research*. London: Sage.
- Robson C (1993) *The Real World Research*. Oxford: Blackwell. Sullivan H & Skelcher C (2002) *Working Across Boundaries:* Collaboration in Public Services. Basingstoke, Hants.: Palgrave.
- Sykes W, Collins M, Hunter D, Popay J & Williams G (1992) Listening to Local Voices. Leeds: Nuffield Institute for Health, Salford Public Health Research & Resource Centre.
- Turrell G (1998) Socioeconomic differences in food preferences and their influence on healthy food purchasing choices. *Journal of Human Nutrition and Dietetics* **11**, 135–149.
- World Health Organization (1990) World Health Organization Healthy Cities Project: A Project Becomes a Movement. Copenhagen: WHO.