Implementation and Evaluation of a Community-Based Social Marketing Campaign to Create Awareness of Hypertension as a Risk Factor for Dementia

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Abstract

As the Australian population ages, the incidence of dementia is rising in epidemic proportions, with serious implications for sufferers, carers and health services. There is a compelling need for effective early intervention and prevention strategies as well as models to guide knowledge translation to improve dementia prevention and care. The most modifiable risk factor for dementia is hypertension and treating hypertension in midlife is the most effective means of reducing dementia risk, yet public awareness of this is extremely low. The purpose of this pilot project was to plan, implement and evaluate a social marketing campaign to raise community awareness of the link between hypertension and dementia, and how to prevent, monitor and manage hypertension.

Introduction

Dementia is a syndrome which describes a number of different diseases which manifest in progressive decline of brain functions such as language, memory and cognitive ability (Australian Institute of Health and Welfare, 2004). The most common form of dementia is Alzheimer's disease which accounts for up to 70% of all dementia types (Australian Institute of Health and Welfare, 2004; Low, Gomes and Brodaty, 2008).

The four-fold increase in the prevalence of dementia in New South Wales (NSW) from 245,000 in 2009 to a predicted 1,300,000 by 2050 is set to place unprecedented and considerable impact on the community with health spending on dementia set to outstrip any other health condition (Access Economics, 2009). The wellbeing of patients is a critical issue; so too is the impact of their diagnosis on families and carers who have been found to suffer poorer physical and psychological health, as well as issues such as social isolation and stigma (Brodaty and Green, 2002).

There is currently no cure for dementia and it is a progressive illness. The role of prevention and risk reduction strategies are therefore paramount in public health programs to redress the rapid increase of dementia. Yet Australians have a poor awareness of dementia risk reduction strategies and there has been little uptake of preventative behaviours (Farrow, 2008). Of those who are aware of risk reduction strategies, most cite mental stimulation, healthy diet and physical activity, and very few are aware of the role of well controlled blood pressure (Farrow, 2008).

This paper describes the development, implementation and evaluation of 'Healthy Heart Healthy Mind' (HHHM), a community-based dementia risk reduction campaign which utilises a social marketing approach and focuses on the issue of hypertension (high blood pressure). Social marketing is commonly defined as a program-planning process that applies concepts and techniques of commercial marketing to promote voluntary behaviour change

(Kotler and Lee, 2008). HHHM was piloted in a regional centre of NSW in 2011 under a partnership arrangement between a NSW Health Local Health District and a university research centre. The pilot project was initiated and funded by the NSW Department of Health.

Method

A comprehensive planning phase which included detailed timelines, budgets and performance indicators for each component was carried out. Project logic models provided an overarching framework for linking methodology with objectives for the project and ensured a logical structure for evaluation (Kaplan and Garret, 2005). The campaign objectives were to raise awareness of the link between hypertension and dementia, to encourage the target group to undergo regular blood pressure checks, and to increase appreciation of the need to modify diet and lifestyle habits to reduce the risk of dementia in later life for the target group. Approval was granted by the joint Human Research Ethics Committee for the partnership organisations.

Target Audience

Treating mid-life hypertension is the most effective means of reducing dementia risk (Peila et al. 2006). For this reason, the target audience for the campaign was men and women living within the pilot region aged 45 years and over. An additional component of the pilot project, not detailed in this paper, targeted health care professionals to support and enable adoption of community campaign activities.

Kotler and Lee (2008) describe four ‘P’s of social marketing, product, price, place and promotion, as important considerations that should combine to provide maximum value to the target audience in order to convince them to engage in the desired behaviour. Formative research conducted with the target audience identified the barriers (or the price) of having blood pressure checked as being: lack of awareness of the need for blood pressure checks in relation to dementia; difficulty understanding blood pressure guidelines; and lack of time and urgency to visit their general practitioner (GP) for blood pressure checks. In order to reduce the ‘price’ it was deemed necessary to provide community education regarding the link between hypertension and dementia, as well as clear guidelines regarding what is hypertension and how it can be managed. It was also a priority to provide free and easily accessible blood pressure checks.

Consultation and Partnership

A fifth ‘p’ that is considered critical to the success of developing and implementing social marketing campaigns is partnerships (French, 2010). In order to ensure broad community reach and support, a consultation process was carried out with other health and community based organisations. Partnerships were established with other health events (e.g., Heart Week activities run by or for the National Heart Foundation). Alliances were also made, where opportunities existed, to collaborate in disseminating project messages, (e.g., The Stroke Foundation’s *Know Your Numbers Program* also uses blood pressure checking as a means to raise awareness about stroke). The HHHM messages and activities complimented many employee wellness programs implemented by large workplaces such as local councils. The campaign messages were of particular relevance and interest to service clubs such as Rotary and Lions whose members were not only in the target group, but were often influential members of their community. In these ways, the project quickly established message

credibility, and support for the project's own scheduled activities were enhanced by referrals and third party promotion.

Implementation

Promotion of the product was conducted over a six month period from April-September 2011. The key message, which had been pre tested with the target group, was "High blood pressure is a risk factor for dementia" followed by the campaign's tagline, "Keep your blood pressure in check" and the campaign's website address which provided supportive 'how-to' information. A media and marketing campaign comprising paid radio and print advertising, and regular unpaid editorial in local and community-based newspapers was carried out. Campaign messages were delivered in high volume traffic areas via large roadside banners which were rotated on a fortnightly basis. Small advertising billboards were utilised in three major shopping centres and over 400 posters were distributed throughout the region's GP surgeries, pharmacies, community health centres, schools and workplaces. Give-away promotional items, including 7000 bookmarks, 1000 pens, 1000 fridge magnets and 5000 postcards, were made available at project events and at frequented community buildings such as public libraries.

There was an interactive website which provided easy to understand explanations about dementia and hypertension, the links between them, and an overview of campaign events and activities. Brochures and fact sheets were made available for free download as well as specific information for local health professionals and journalists. Public relations activities included promotion of the launch of the project and an active presence at relevant community events including Seniors' Week, International Women's Day, Men's Health Week, NAIDOC Week and various lifestyle expos.

Community blood pressure checks

To make blood pressure checking more easily accessible to the target markets (consideration of 'place'), 21 free blood pressure checking services were made available in shopping centres, libraries and a large hardware chain. These services were promoted on the campaign's website, the venues' websites, and in local newspapers as part of publicity for other community activities. High pedestrian traffic areas with good visual impact were selected for the blood pressure checking stations which comprised tables displaying campaign materials, chairs for participants and large banners promoting the free service. Stations were available for three to four hours in each location and were staffed by health and medical students who had passed standard competencies in measuring blood pressures.

Participants were actively invited to have their blood pressure checked by staff and were informed of two levels of voluntary involvement: (1) simply having their blood pressure checked and recorded or (2) providing signed consent to complete a two page paper questionnaire, have their blood pressure checked and agreeing to a brief follow-up telephone interview in four weeks' time (see Results section).

Automatic blood pressure machines were used and two measurements were taken for participants who had agreed to have their blood pressure checked. The second (most accurate) measurement was recorded on a GP referral card and issued to the participant. Staff used the Hypertension Guidelines (National Heart Foundation of Australia, 2008) to explain what the measurement meant and to advise participants of when to have their blood pressure re-

checked. This advice, as well as the measurement, was recorded on the card (and on the questionnaire). Participants were also provided with written information such as fact sheets on how to reduce/control blood pressure, and how to reduce their risk of dementia.

Community education presentations

The availability of guest speakers for community and workplace meetings was promoted on the campaign's website as well as via online newsletters and email distribution lists disseminated by key community and business networks (e.g., business chambers). In addition to this, the campaign manager proactively targeted service clubs and large employers to offer educational presentations to their members and employees. Educational presentations were delivered using MS PowerPoint in approximately 25 community centres, educational institutions, community group meeting places and workplaces with over 400 attendees in total. Attendees were requested to provide signed consent to complete evaluation questionnaires and participate in follow up phone interviews.

Results

Evaluation is essential to determine the extent to which the program objectives have been achieved and to provide feedback about progress so that the program can be modified and continually improved (Kotler and Lee, 2008). Process evaluation is considered essential during campaign implementation to determine effectiveness of the program implementation and provide feedback to motivate and re-energize staff involved (Kotler & Lee, 2008). Key process measures include media coverage, reach and frequency, and the number of materials distributed. For the HHHM campaign, media coverage has been steady across the region's newspapers (three articles and over twenty ads or advertorial) as well as coverage in *The Age* and *The Sydney Morning Herald*. Importantly, support from the education sector (public and Catholic schools) facilitated a bulletin to primary school staff in the region, endorsed a newsletter insert in school newsletters, and ensured placement of posters in school offices and staff rooms.

In terms of engaging with the target group, and distributing materials, it is anticipated that by the project's conclusion:

- Approximately 2,000 individuals will have had their blood pressure checked
- Over 30 free blood pressure checking services will have been provided (scheduled public services as well as invited services to private workplaces and other venues)
- Over 500 individuals will have attended an educational presentation
- Over 20,000 educational or promotional resources will have been distributed
- 15 casual staff will have been employed; and
- A campaign presence will have been achieved at over 20 other community events.

To measure whether awareness of the link between hypertension and dementia has increased in the target audience, and whether there is increased awareness of hypertension risk reduction strategies, an Omnibus survey has been commissioned. A pre-intervention random telephone survey with 489 adults in the target group was conducted in March 2011 to ascertain a baseline level of knowledge of risk factors for dementia, respondents' current methods of reducing high blood pressure and their recall of dementia messages in local media. A post intervention random telephone survey is planned for September 2011. Pre and post survey questionnaires are also being undertaken with participants attending the community based blood pressure checking stations and the community/work-place

educational presentations to determine the effectiveness of these measures in raising awareness of hypertension and dementia and whether they have acted as 'cues to action' (Janz, Champion and Strecher, 2002) for behaviour change.

Discussion

While the HHHM campaign is still being implemented, process evaluation results demonstrate considerable media coverage, a wide distribution of resources, and a high degree of community engagement via educational presentations, blood pressure checking and presence at community events. Further, the program has helped to overcome several of the key barriers to blood pressure checks identified in formative research with the target audience.

This intervention demonstrates the capability of social marketing principles to the prevention of a chronic disease that is predicted to increase four-fold by 2050. It is clear that social marketing has a role to play in reducing the incidence of dementia. It is also clear that a social marketing framework can address a critical need in the dementia literature for guiding strategies which can be used to translate new knowledge regarding dementia into practice (Draper, Low et al, 2010). This project involved careful consideration of the four Ps, recognising the need to go beyond the promotion/educational approach that is often taken to disease prevention initiatives. Further, consistent with Weinrich (2011) this intervention incorporated several other Ps that are essential for social marketing. That is, consideration of the needs and priorities of the various publics; the need to address policy and environmental issues; the use of partnerships; and the need to achieve sustainable change on a limited budget due to the purse strings that commonly restrict social marketing interventions.

Implementation success to date can be largely attributed to the strength of collaborative partnerships. Firstly, the complimentary skill sets of the project partners (a NSW Health Local Health District and a university) helped to overcome implementation barriers, maintain positive public perceptions, and provide feedback and ongoing support. The reach of the project has benefitted enormously from the support and cooperation of high profile authorities such as local Divisions of General Practice, schools and local councils. Their capacity to promote HHHM messages and materials in their existing programs made a significant contribution to community engagement and message credibility. This demonstrates that partnerships can enhance promotion and distribution, as well as planning and implementation. For social marketing practitioners undertaking community-based interventions, it is recommended to identify and engage key partners in the scoping stage to help maximise intervention success.

Conclusion

The 'Healthy Heart Healthy Mind' pilot campaign provides a useful example of how social marketing can be used to create awareness, and promote and enable behaviour change in individuals in order to reduce their risk of developing a health condition. It is also an important example of a population based prevention strategy for dementia, given that there is no cure for dementia and yet it is the leading cause of disability in older Australians. It is hoped that the results from the evaluation will demonstrate the effectiveness of the program, and that widespread adoption will have a longer-term impact on hypertension management and dementia prevention throughout NSW. While the usual considerations of social marketing

practice are evident in this pilot campaign, including the use of formative research and consideration of the four ‘Ps’, the project also demonstrates the importance of considering other ‘Ps’, in particular developing and maintaining partnerships, in social marketing practice.

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