## Design and promotion of an outdoor gym for older adults: a collaborative project

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Physical activity promotes health and well being across the life course and is pertinent to Australia's ageing population. However, more than half of Australian adults are insufficiently active for good health, and this proportion increases with age.<sup>1</sup>

Outdoor gyms have become increasingly available in Australia<sup>2</sup> and internationally.<sup>3</sup> Featuring equipment and designs similar to indoor gym equipment, modern outdoor gyms can provide equitable access to aerobic, strength, balance and flexibility exercises, for people of all ages and fitness levels.

In November 2011, Randwick City Council (RCC) sought advice from the Health Promotion Service (HPS), South Eastern Sydney Local Health District (SESLHD), regarding suitable equipment for a seniors' outdoor gym. The HPS reviewed the literature on outdoor gyms, older adults' physical activity participation and park use, and sought advice from a leading exercise physiologist. The review considered current physical activity recommendations for older adults, and identified barriers and facilitators common to older adults' physical activity participation, park use and outdoor gym use, including safety (risk of injury, perceived safety of area), information, social factors, variety, cost, accessibility, aesthetics and maintenance.<sup>2</sup> The findings informed recommendations for the outdoor gym to include equipment promoting aerobic fitness, upper and lower limb strength, balance and flexibility, and be placed in an aesthetic, accessible location, close to amenities and other physical activity facilities.<sup>2</sup> They also informed engagement strategies including targeted marketing, instructional exercise sessions and an instructional guide.

The \$60 000 outdoor gym was funded and installed in a reserve at Maroubra beach by RCC (February 2013) and launched with a Come and Try Day (CATD) co-hosted by the Council and HPS in National Seniors Week (March 2013). Eight exercise sessions were hosted by the HPS over a four-week period during November–December 2013. The sessions were hosted biweekly on weekday mornings. The CATD and biweekly sessions were facilitated by an accredited exercise professional and included demonstrations of warm-up and cool-down methods, safe and effective use of the equipment

and how to modify the intensity of exercises. Sessions aimed to engage older adults in using the outdoor gym and increase their knowledge and confidence in using the equipment. Although the sessions were targeted towards people aged over 50 years, all adults were included.

Sessions were promoted in the local newspaper, the SESLHD and RCC websites and via flyers and posters distributed to local businesses, libraries and community centres. The CATD promotion also included flyer distribution to local homes and advertising on prominent seniors' websites. Council engagement, promotion and local media coverage were significantly higher for the CATD.

A *How to Use an Outdoor Gym Guide* was developed by the HPS in consultation with an exercise physiologist and released at the CATD in March 2013.<sup>4</sup> The *Guide* provides instructions on how to use the outdoor gym equipment safely and effectively, and is tailored to a range of fitness levels. It was distributed to session participants and is downloadable via the SESI HD and RCC websites.

At each session a survey was conducted to determine participants' previous use of the outdoor gym, if confidence in outdoor gym use increased after the session, barriers and facilitators to use, and intended use of the outdoor gym and the *Guide*. Approximately 120 people attended the sessions and 66 (55%) completed the survey. Key results from the feedback questionnaire are summarised in Table 1.

The survey findings indicate that providing professionally-instructed exercise sessions at an outdoor gym designed for older adults was successful in engaging older adults in outdoor gym use. All sessions were successful in attracting new outdoor gym users and increased both new and experienced users' confidence in correct equipment use. All respondents reported they would use the outdoor gym again and recommend it to a friend. Most commonly cited facilitators to further outdoor gym use were programming/instruction sessions, and shade or shelter. Most respondents reported they would use the *Guide* which has the potential to support sustained outdoor gym use.

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**Table 1. Outdoor gym session feedback survey – key results**Percentages may not add up to 100% due to rounding or options for multiple selection

Variable	Survey respondents (n = 66)	
	N	%
Age		
< 50 years	5	8
≥ 50 years	56	85
Unknown	5	8
Gender		
Male	20	30
Female	44	67
Unknown	2	3
Type of session		
CATD event	29	44
Biweekly sessions	37	56
How heard about outdoor gym		
Local newspaper	34	52
Walked past	23	35
Flyer	10	15
Word of mouth	7	11
Council website	3	4
Poster	2	3
Other	4	6
New outdoor gym user		-
CATD (Mar 2013) $(n = 29)$	19	65
Biweekly session (Nov-Dec 2013) $(n = 37)$	12	32
Previously attended outdoor gym session <sup>A</sup>	7	19
Session increased confidence using outdoor gym	65	98
Will use outdoor gym again <sup>B</sup>	65	98
Would recommend outdoor gym to a friend <sup>8</sup>	65	98
Would use 'How to Use an Outdoor Gym' guide again <sup>B</sup>	63	95
Facilitator of outdoor gym use	03	,,,
No answer	19	29
Programming/instruction sessions	18	27
Shade/shelter	8	12
Personal facilitators	5	7
More detailed instructions	3	4
Fewer children on equipment	3	4
More convenient location	2	3
No facilitators needed	2	3
Other	8	3 12
	0	0
Barrier to outdoor gym use	U	U

<sup>&</sup>lt;sup>A</sup>Collected in biweekly sessions (Nov-Dec 2013) only.

The majority of session participants were women, which is encouraging given more Australian women are insufficiently active than men<sup>1</sup> and women have been observed as less active park users.<sup>5,6</sup> Our finding is consistent with two recent studies that reported higher proportions of female outdoor gym users than general park users,<sup>7</sup> and greater use and activity levels of women and older adults in parks providing structured environments offering exercise classes;<sup>8</sup> suggesting this may be an acceptable form of exercise for older women.

The co-location of the outdoor gym with a playground, amenities and walkway was important in raising awareness of the gym, attracting new users to exercise sessions and ensuring natural surveillance of the gym. Co-locating free facilities, such as the outdoor

gym and walkway, provides equitable access to physical activity opportunities that can meet current quidelines.<sup>9</sup>

The March CATD had more new users than the November–December sessions, most likely due to the novelty of the new outdoor gym and a significant promotion of the former event by RCC. Session attendance and reported facilitators to outdoor gym use demonstrate a desire for exercise sessions regardless of previous use of the equipment. Programming, such as exercise sessions, is important to increasing older adults' physical activity as it provides instruction on correct use, social opportunities and reduces barriers such as cost and safety concerns.<sup>10,11</sup>

The survey is limited to self-report data from a small sample of older adults in one park setting and findings may not be

 $<sup>^{\</sup>rm B}n = 65$ , answer missing for one respondent.

generalisable to the Australian older adult population. Further research in different settings should focus on the acceptability of outdoor gyms by older Australians and the impact of the installation and promotion of outdoor gyms on physical activity levels. Research was conducted on the impact of this intervention on park use and physical activity levels and results will be released in 2014-2015.

The collaboration between the HPS and RCC enabled the selection of appropriate outdoor gym equipment and promotional strategies targeting older adults. To maximise outdoor gym use by older adults we recommend a variety of equipment targeting aerobic fitness, strength, balance and flexibility is installed in accessible, aesthetic locations close to other physical activity facilities and amenities. Targeted marketing including instructional exercise sessions and guides may promote safe and sustained outdoor gym use.

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