

Ask what they want, listen to what they say and deliver what they need—it's not rocket science

Kathy Broad¹

¹Queensland Health

Abstract

Cardiovascular disease is the number one killer of Indigenous peoples and is 2.4 times more prevalent than for non-Indigenous Australians.

Lead health organisations and State health bodies recommend that all people with heart disease participate in Cardiac Rehabilitation programs as it has been demonstrated that eligible people who participate in these programs have 26% reduced cardiac related mortality compared to those who don't.

The uptake of Indigenous Australians into programs of CR is in the vicinity of just 2-5%. There are many reasons for this low uptake including barriers to access and programs not being culturally appropriate.

The Cardiac Rehabilitation for Indigenous Communities (CRIC) project piloted a Cardiac Rehabilitation Training Program for health care providers working in Indigenous communities in the Cairns, Cape York Peninsula and Torres Strait regions. The aim of the project was to increase the uptake of Indigenous peoples into CR through the support, education and training of multidisciplinary clinicians working in the four pilot site communities.

Sites were asked to identify participants from each health discipline including a doctor, nurse, health worker and allied health to ensure that training and program development utilised a team approach. Training was delivered in two phases, the first being a foundation workshop delivered at the nearest cardiac referral hospital and the second being delivered on-site. Each workshop was tailored according to the needs of the participants.

The training was well received and for three of the four sites it was well attended. Not all sites were able to identify a core group of participants and not all participants were able to attend or complete the two phases of training.

More than a year following the training, two of the four sites have regular, ongoing Cardiac Rehabilitation programs established—both of these utilise a partnership between the Community Controlled Health Service and the non-Indigenous health service.

One of the sites utilises a chronic disease approach to cardiac rehabilitation and has a strong partnership to service delivery with the Royal Flying Doctor Service.

The other site has employed an Indigenous Health Worker to assist in the development and delivery of their Cardiac Rehabilitation service.

Program development in Indigenous communities requires:

- effective consultation and engagement with key stakeholders, including senior Indigenous leaders in the health service
- delivery of resources including information, training and tools

- facilitation of service delivery through ongoing support, encouragement and resourcing

Background—the history

It doesn't really matter that I am talking about a cardiac rehabilitation program. What matters is that I am talking about a program **involving** Aboriginal and Torres Strait Islander (Indigenous Australian) peoples.

I could go on about the statistics for ill health in the Indigenous Australian population, and then I could break this down into the prevalence of cardiovascular disease or heart disease or risk factors for these. I can assure you that the incidence, rate, prevalence and burden of chronic disease, cardiovascular disease and heart disease is greater in the Aboriginal and Torres Strait Islander population than in the non-Indigenous population, as are the risk factors associated with disease [1]; but if you would like to see the data please refer to Appendix 1. In short, cardiovascular disease is the leading cause of death for Indigenous Australians, accounting for 27% of all deaths in 2002–2005 [1]

The World Health Organisation, National Heart Foundation, Cardiac Society of Australia and New Zealand and the Australian Cardiac Rehabilitation Association are influential peak bodies that recommend all people with cardiac disease participate in programs of cardiac rehabilitation [2-4]. Cardiac Rehabilitation (CR) describes all measures used to help people with heart disease return to an active and satisfying life and to prevent recurrence of cardiac events [3]. The benefits to participation in cardiac rehabilitation have been well-known for more than twenty years and include a reduction in cardiac-related mortality of about 25% compared to those who don't participate in a program of cardiac rehabilitation [5].

Considering that Indigenous Australians have a higher prevalence of cardiac disease than non-Indigenous Australians, it is a stark contrast that their uptake into programs of cardiac rehabilitation in Queensland is only around 2-5% [6] compared to an uptake of approx 26% of the general Queensland population [7].

The aim of the project was to increase the uptake of Aboriginal and Torres Strait Islander peoples into programs of cardiac rehabilitation.

A review of the literature demonstrates that issues such as “not enough black faces” involved in the planning, delivering and evaluation of health care is a barrier to attendance at CR as well as many other factors that are needed to build a ‘culturally competent service’ [8, 9].

The need for a culturally appropriate cardiac rehabilitation service was identified by the customers themselves and was the catalyst for the project. The distance from the cardiac unit and the existing outpatient CR program was only a matter of metres. This meant that all eligible cardiac inpatients could be shown the venue and the program in action. It was common for the Indigenous inpatients to indicate they would participate in the program but then not attend their scheduled appointment.

For those few (two in total, over a 12 month period who attended under their own volition and one who was transported to and from an Residential Aged Care Facility within his community) Indigenous clients who returned to attend the program as an outpatient, they invariably had challenges to get to and from the twice-weekly, six week program let alone reap the benefits of the program. One Aboriginal fellow commented during a CR session “the heart ward is full of Murries so where are they all now?” This opened up discussions between the Cardiac Rehabilitation Coordinator and those Indigenous individuals and it became clear that the existing program format was unsuitable due to a myriad of reasons.

Project—the journey

Initially the vision was to replicate a ‘traditional-style’ of outpatient CR program within the Indigenous community through the up-skilling of health care staff working in the communities. This set the context for the CRIC project.

There were six stages identified for the project implementation:

- consultation with stakeholders
- identification of training pilot sites
- development of a Cardiac Rehabilitation Training Program (CRTP)
- delivery of the CRTP
- evaluation of the CRTP
- evaluation of the CRIC project.

Extensive consultation found that it was neither feasible nor appropriate to replicate the “usual” style of CR in each identified community. Consequently the CRTP was designed to be delivered in a workshop-style but separated into a two parts. The first phase of the CRTP comprised was the baseline foundation training component that was designed to provide the participants with knowledge of the integral **processes** for a cardiac rehabilitation program to be implemented and also the core components to cardiac rehabilitation; this took place within a facility that already had a functional CR program embedded within the business. The second phase of the training required a visit to each site and focused upon working with the participants to support and guide the application of their phase one knowledge into practice within their setting.

Consultation and literature review also found that health services in Indigenous communities and in rural and remote areas should utilise a **team approach** to service delivery. Therefore the aim was for the participants from each site to be a group comprising at least one of each of the following disciplines: doctor, Indigenous health worker, nurse, allied health and the centre manager—the managers were asked to identify the participants who would be attending both phases of the training. This required extensive negotiation regarding dates, venues and participant availability. Training schedules were drafted and rewritten until eventually eight workshops were delivered in order to get the greatest breadth and depth of representation from participants and workshop presenters as possible.

Findings—the discovery

There was evidence of stakeholder engagement through the early demonstration of the willingness of service planners, clinicians and Aboriginal and Torres Strait Islander individuals (both health care professionals and consumers) to be involved in the planning for a cardiac rehabilitation training program for staff in Indigenous communities.

The two-phased multidisciplinary training program allowed the participants to acquire knowledge not only about cardiac rehabilitation but about each other and how they each practiced and operated. Bringing the “team” together for the training provided them with an environment whereby they could learn what a CR program could look like in their community and collectively identify their individual roles and responsibilities as a valued and integral member of the service delivery team.

The overall findings from the evaluation of the CRTP were very positive.

Shortly after the delivery of the CRTP, participants demonstrated a high level of enthusiasm and motivation to develop and implement a CR service in their area. Follow-up visits and discussions with participants were conducted.

One site had a regular weekly service that was receiving a high number of referrals and routinely held team meetings to review and refine their service. It must be noted however, that prior to the CRTP for participants at this site, the service had already implemented a CR program in partnership with the local hospital-based CR program. The site had a variety of tools resources for use in the CR program, some acquired from the local hospital CR program staff, others acquired from the CRTP. The most significant assets were the recruitment of an Indigenous health worker into a position of Cardiac Rehabilitation Coordinator; dedicated space for the CR program, dedicated equipment for the CR program and an embedded schedule for the CR program. It was found that despite the inclusion of a medical officer in both phases of the CRTP, this did not correlate to an increase in the initiation of CR referrals from either this doctor or the other doctors at the centre. The vast majority of the referrals were generated from the local hospital's CR Coordinator (a Registered Nurse position) who diligently and routinely referred all [eligible] Aboriginal and Torres Strait Islander cardiac inpatients and outpatient to the local Indigenous CR program that was held at the Community Controlled facility in the town.

The second site had begun to build a working relationship between the identified team members but did not have a doctor. Despite this, the team had begun a process of local community engagement, holding various consultation meetings with community leaders and the also the community residents. There was an evolving but sensitive relationship between the host organisation (the Community Controlled Health Service) and the nearby Queensland Health facility. The most notable issues were around staff concerns over the sharing of health information between the different health service organisations which had a significant negative impact upon referrals to the program.

The third site—who had all the centre staff, including the visiting doctor and allied health—participate in the CRTP, had begun to encourage community members to participate in weekly walking groups. The staff were working with Health Promotion staff to engage the community in physical activities. The visiting GP was reviewing the charts of all clients with 'chronic disease' and was encouraging those people with cardiac disease to practice healthy lifestyle behaviours through the informal delivery of brief intervention-styled counselling during the patient:doctor consultation. A significant strength was the ongoing staff support of the one of the centre's Indigenous Health Workers whom had been identified during the CRTP as most suitable to be their facility's Cardiac Rehabilitation Coordinator. It was noted that apart from the usual GP consultation, cardiac clients did not appear to receive specific cardiac-related advice nor rehabilitation but rather there was more of an ad hoc approach to secondary prevention of all cardiac and chronic diseases. Discussions with the visiting allied health staff found that they did not perceive that the site was doing anything different following the CRTP apart from having an Indigenous Health Worker with a CR 'portfolio'. The permanent clinic staff (nurses and health workers) found that they perceived they were "getting right into the whole thing" by leading regular community walking activities in the evenings but that they would like some exercise equipment because they had identified some space to have some basic gym equipment. The allied health staff said that they would prefer physical activity to be integrated into the individuals' daily life by way of increased walking rather than going to "a gym". There appeared to be conflicting feelings and an undercurrent of sensitivity between the permanent staff and the visiting service staff.

The forth site did not demonstrate any form of team approach to CR service delivery predominantly because there was no identifiable multidisciplinary CR team and also because there were palpable tensions between staff at the local hospital and staff the primary health care centre. There was no identifiable lead agent to host the CR service despite the efforts to encourage collaboration between the

two facilities. Despite this, there was considerable will by senior health clinicians and Executive Management to provide a CR service. The staff of both facilities indicated they would need extra resourcing by way of funding for a dedicated CR Coordinator. There were opposing opinions as to whether the position should be a health worker or a registered nurse and also conflicting opinions about where they person should 'sit' (hospital vs primary health care centre).

Over a year since the delivery of the CRTP, there is considerable variation to the level of CR service provision at each site. It was not possible to have discussions with all the CRTP participants as the majority were either no longer working at the site, had changed roles or we not able to be contacted. CR service implementation was evaluated against the degree of uptake of the stages of the CR process that were identified by CR expert advisory group and subsequently taught to participants as part of the CRTP.

The findings are summarised in Appendix 2.

On the whole, there continues to be in principal support for CR service and/or program delivery by the Executive Management and senior clinicians at each site. However, a more systematic exploration of the service reveals that this does not necessarily translate to robust program implementation. The sites with multiple service providers are clearly the most complicated with regard to identifying clear roles of responsibilities of the various services, the positions and the individuals within each service. The sites with the fewest variations to service providers (for instance, they were either wholly serviced by Queensland Health employees or they were wholly serviced by their own employees), had a more clearly defined model of care for service delivery compared those sites that had multiple health service providers.

The sites that held regular internal and external stakeholder meetings for the purpose of program and procedure review and enhancement, had more clearly defined pathways, roles and responsibilities.

Conclusions—the revelations

Given that Aboriginal and Torres Strait Islander peoples have such extreme health needs—and by implication a high capacity to gain from public health interventions—why have Public Health Strategies had limited success in this area? The reasons are complex, but almost certainly include a gap in knowledge and understanding amongst those developing and implementing public health Strategies about how to make the Strategies work effectively for Aboriginal and Torres Strait Islander peoples. [10]

Program development and implementation in Indigenous communities firstly requires the development of relationships with the service providers who in turn must have (or build) a trusting relationship with the Indigenous occupants of that community.

There are three sets of stakeholders to be engaged for effective program development in Indigenous communities:

- those at the strategic service planning level
- those at the clinical service delivery level
- those at the staff development level.

A critical element is identifying and engaging the 'right' people to represent each of the stakeholder groups.

At the strategic planning level there needs to be senior representatives with a large circle of influence. Engagement at the strategic level requires the provision of timely, accurate, succinct, relevant advice regarding the issues, their impact, the suggested strategies, the resources required and the cost. While

not all this information may initially be available, it is important to present a strong, sound case and ensure there is opportunity for ongoing stakeholder involvement.

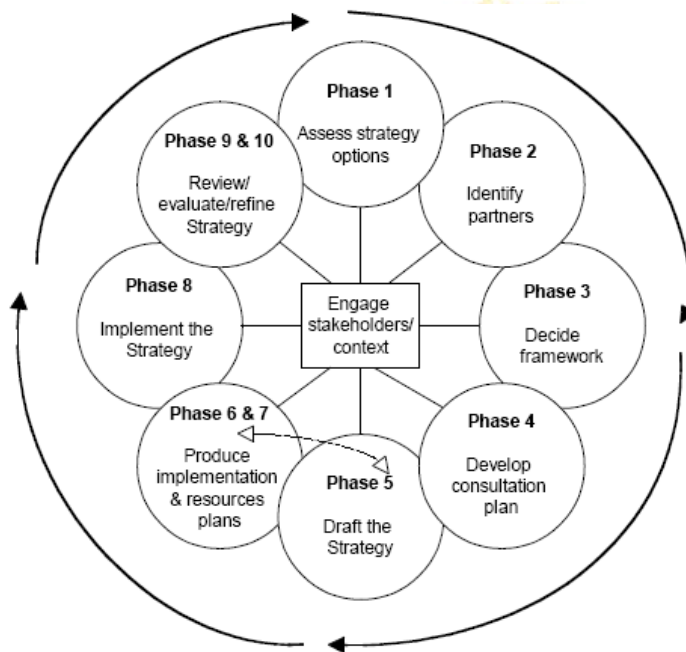
At the clinical service delivery level there needs to be people who are respected by their peers and facility staff and this should include the senior Indigenous health worker, a senior medical officer and the facility manager who can operationalise (“make it happen”) the required activities. Relationship building with the service providers in the Indigenous community must include influential leaders as stakeholders and should aim to include:

- the centre manager and/or senior nurse
- the senior medical officer
- the senior Indigenous health worker.

At the staff development level there needs to be people who have an understanding of the context of Indigenous health care. For example, it is not appropriate to have expert clinicians lead discussions if they have don't empathise with the challenges facing Indigenous communities such as the impact of the social determinants of health [8, 11] and issues around staff recruitment, retention and turnover in these areas. It is important to utilise educators who not only have the relevant clinical knowledge but can apply it to the context of holistic Indigenous health at the population level [12].

Once the stakeholders have been identified, there needs to be ongoing evolution of the program development and implementation.

A stakeholder engagement model for strategy implementation



Source: NPHP Making the Connections 2006

Recommendations—leveraging from the experience

1. Convene an expert working party to identify a standardised map of the processes required in for a sustainable Cardiac Rehabilitation Service in Indigenous communities with corresponding performance measures for the monitoring of the implementation of the process.
2. Develop tools and resources that will assist with the implementation of the cardiac rehabilitation processes (including flowcharts, forms and templates).
3. Medical discharge summaries for patients being transferred or discharged from tertiary health care facilities with cardiac disease should have a mechanism triggering routine referral of the person to Cardiac Rehabilitation
4. All cardiac facilities to employ and support the professional development of Aboriginal and Torres Strait Islander Health Workers and part of the cardiology team
5. In the case of multiple service providers for a community or facility there must be Memorandums of Understanding which are reviewed annually by the Executive Management of both/all parties with reportable indicators for cardiac rehabilitation.
6. Bi-annual cardiac rehabilitation training of multi-disciplinary service providers in Indigenous communities

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Appendix 1

Table 1 Prevalence of major cardiovascular diseases as long-term conditions in Aboriginal and Torres Strait Islander peoples, 2004–05

Disease	Per cent of Indigenous population	Number of people affected	Indigenous to non-Indigenous rate ratio ^(a)
Coronary heart disease	1.2	5,800	2.1
Cerebrovascular disease	0.3	1,300	1.7
Heart failure	1.0	4,500	1.7
Hypertension	7.0	33,600	1.6
Rheumatic fever and rheumatic heart disease	0.7	3,500	..
Total cardiovascular disease	12.0	55,900	1.3

(a) Standardised prevalence ratio; that is, the ratio of the observed number of cases to the number of cases expected if Indigenous Australians had the same age- and sex-specific prevalence rates as non-Indigenous Australians.

Note: Based on self-reported information collected in the ABS 2004–05 National Aboriginal and Torres Strait Islander Health Survey.

Source: Australia's Health 2008

Table 2 Average annual deaths from cardiovascular diseases for Aboriginal and Torres Strait Islander peoples^(a), 2002–2005^(b)

	Indigenous Australian males		Indigenous Australian females	
	Number of deaths ^(c)	SMR ^(d)	Number of deaths ^(c)	SMR ^(d)
Coronary heart disease	140	3.3	83	2.8
Cerebrovascular disease	28	2.1	33	1.8
Heart failure	4	2.1	7	2.4
Rheumatic fever and rheumatic heart disease	5	15.0	13	23.0
Total cardiovascular diseases	217	3.1	170	2.7

(a) Data are for Indigenous deaths for usual residents of Queensland, Western Australia, South Australia and Northern Territory.

(b) Deaths are based on year of occurrence of death for 2002–2004 and year of registration of death for 2005.

(c) The number of deaths has been averaged over the period 2002–2005.

(d) SMR (standardised mortality ratio) is the ratio of the observed number of deaths to the number of expected deaths if Indigenous Australians had experienced the same age- and sex-specific death rates as non-Indigenous Australians.

Note: All ratios are significantly different from those for non-Indigenous Australians.

Source: Australia's Health 2008

Appendix 2

Stage of CR process	Site W	Site X	Site Y	Site Z
I Identification of the cardiac patient	Not using a systematic process. Clients are identified through local [staff] knowledge of the clientele in their community.	Not using a systematic process. Are reliant upon passively receiving referrals in order to identify actual cases.	Not using a systematic process. Have got a good referral system and rely upon this plus marketing to increase referrals.	Not using a systematic process. Reliant upon knowing the medical diagnosis or clinical knowledge to be the trigger for a referral.
II Make the recommendation to participate in CR	Yes. The PHCC records cardiac clients on the chronic disease register and recall database. Senior clinicians speak to individuals clients and recommend 'general behavioural and lifestyle' education and activities as part of chronic disease management.	Yes. There is a designated CR nurse and a Health Worker at the local hospital whom sees cardiac patients as inpatients and/or following their cardiac procedure (angiogram); they specifically talk to them about outpatient cardiac rehabilitation.	Yes. There is a designated CR nurse and a Health Worker at the local hospital whom sees cardiac patients as inpatients and/or following their cardiac procedure (angiogram); they specifically talk to them about outpatient cardiac rehabilitation.	No. The nurses in the hospital provide cardiac-related inpatient education and may refer individuals to the dietician for outpatient follow-up, but they do not discuss outpatient cardiac rehabilitation. There is an inpatient cardiac rehabilitation education and mobility plan and the nurses follow this.
III Refer to CR	No. There is no clearly defined CR program at the PHCC site to which the client is referred.	No. The CR program is not receiving any referrals.	Yes. The CR program receives primarily internal (within the PHCC) referrals and infrequent referrals from the local/referral hospital (note: this is the opposite of the referral sources within the first 12 months of CR program being established, whereby there was a clear referral pathway for Indigenous cardiac patients).	No. There is no clearly defined CR program to which the client is referred. There are referrals made for general chronic disease management.
IV Communicate with the doctor [about CR for the client]	Yes. It is informal and ad hoc.	No. There has never been a doctor in the centre, until recently.	Yes. There is some direct communication but most of the time it is via the referral.	No. Not about specific cardiac clients.
V Participate in the CR program	No. Receive general chronic disease related care. There is no clearly defined CR program.	Yes. There is a specific, dedicated CR program that runs once per week throughout the year; referred clients do participate.	Yes. There is a specific, dedicated CR program that runs once per week throughout the year; referred clients do participate.	No. Receive general chronic disease related care. There is no clearly defined CR program.
VI Follow-up	No. Receive ongoing general chronic disease related care.	No. There is no specific CR—related follow-up.	No. There is no specific CR—related follow-up.	No. Receive ongoing general chronic disease related care.

Presenter

Kathy Broad is the northern Chronic Disease Coordinator for Queensland Health with a role in assisting with the implementation of the Queensland Strategy for Chronic Disease. Kathy has a passion for improving Indigenous health and is an advocate for equitable health care for people living in regional, rural and remote areas. Her background includes nursing in cardiology and cardiac rehabilitation and she was the project officer for the Cardiac Rehabilitation for Indigenous Communities project. Kathy also currently represents primary health care on the Cardiac Clinical Network for Queensland Health.