Embedding an oral health capacity building component within a clinical model of oral healthcare: an evaluation of the implementation process.

Despite all the best efforts and commitment of the oral health profession, there is no evidence of a reduction in oral diseases and corresponding increasing effective disease management in the Australian community. In fact, evidence indicates the oral health of the Australian community could be getting worse, particularly among children, with the proportion of children with dental caries in the Australia increasing by 26% among 6-year-olds and 14% among 12-year-olds. It is now well-understood that the traditional surgical model of dental care will never successfully prevent or reduce oral diseases and it sequalae. Yet this traditional approach still defines much of dentistry performed globally. It is proposed that a health-promoting, minimally/invasive model of oral healthcare may lead to improved outcomes for patients, the community and the health service.

The North Richmond model of oral healthcare (NRCH-OH MoC) is an innovative and structured approach to oral health service delivery that aims to improve patient oral health outcomes and improve the efficiency of care delivery. The principles guiding the NRCH-OH MoC are: a person-centred approach, collaborative team-based care with innovative use of staff and resources, health promotion using prevention, oral health capacity building, risk-based access and ongoing program evaluation.

The oral health capacity building component, a unique and pioneering feature of the NRCH-OH MoC, aims to develop personal oral health skills and support patients to effectively self-manage their oral health. The rationale for including this component within a clinical model of care, was to increase the options available to patients to exercise more control over their own health and to make appropriate choices conducive to health. A new clinician (nonregistered), the oral health coach (OHC), who is a dental assistant with formal training in health promotion, conducts the coaching sessions with patients. The qualification and extended scope for this new member of the oral health team allows for access to funding through the public dental system.

The primary aim of the study was to evaluate the implementation process of the oral health capacity building component of the NRCH-OH MoC. The study objectives were:

- To determine the fidelity and dose of the oral health education component of the NRCH-OH MoC.
- To identify facilitators and barriers to implementation.
- To document any change in client oral hygiene habits and self-reported oral health behaviours.

Preliminary results

For this process evaluation 37 patients were followed, of which 26 completed the oral health capacity building component of the model of care.

The research team's observation of the implementation process showed that most steps of the oral health capacity building component were implemented as per protocol. However, two steps stood out clearly as requiring attention. Only 11% full-compliance was observed for the item 'Did the receptionist explain the oral health capacity building component during patient registration/when they come off the waitlist?'. At the follow-up visit, there was only partial compliance in re-assessing the clinical indicators of improved oral hygiene; i.e., Of the three clinical indicators (Plaque Index, Modified Gingival Index and the Oral Health Assessment), only the Plaque Index was recorded at both the initial and follow-up visits.

Patients, through the interviews conducted, reported that the oral health sessions had increased their awareness and knowledge of their oral health. They were very satisfied with the sessions they had received and had no further recommendations on how the program could be further improved. Although there was general consensus among staff, that they had observed improvements in the oral health of the patients following the capacity building sessions, they identified several barriers to program implementation:

- More work was required to promote and reinforce the specific scope and benefits of the capacity building component, to the patients, via clinicians and front desk staff at NRCH, social media, and flyers.
- The capacity building sessions were not well integrated with follow-up clinical visits.
- The capacity building sessions were too long.
- Capacity building sessions should be tailored to needs of the patients rather than a blanket approach.

Conclusion

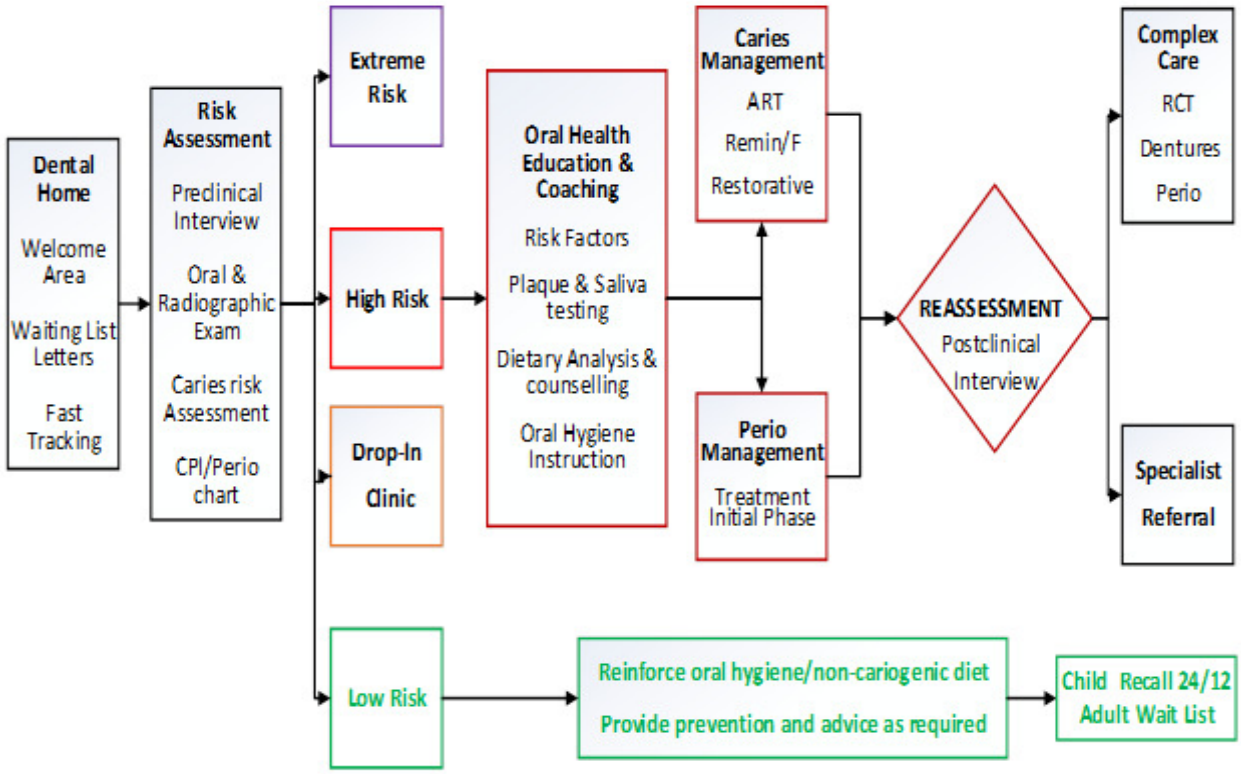
This evaluation provides the much needed evidence to demonstrate the integration of oral health capacity building within a clinical service delivery model.

Table. Process evaluation: Fidelity and dose of the implementation process for both the initial clinical assessment and the follow-on oral health capacity building components of the North Richmond Model of Oral Health Care.

Does implementation comply with protocol?	**Full-Compliance**	**Partial-Compliance**	**Non-Compliance**
Clinical Assessment Component			
Did patient coming off the waitlist receive information about the oral health capacity building component? (n=37)	41%	-	59%
Type of information provided to patient coming of the wait list (n=37)	67%	33%	-
Did the receptionist explain the oral health capacity building component during client registration/when they come off the waitlist? (n=37)	11%	8%	81%
Was a pre-clinical interview conducted? (n=37)	76%	-	24%
Are the pre-clinical interviews administered in a consistent manner? (n=37)	84%	3%	13%
Does the dental practitioner provide a prescription for the oral health coach on where to focus their capacity building efforts? (n=37)	86%	11%	3%
Does the dental practitioner communicate clearly with the patient what the capacity building component and process entails? (n=37)	73%	24%	3%
Capacity Building Component Initial Visit			
Does the oral health coach plan and deliver the patient's oral health capacity sessions according to prescribed areas? (n=37)	100%	-	-
Does the oral health coach and patient work together to set goals for the client to achieve? (n=37)	78%	19%	3%
Are the oral health messages consistent with the session plan within the protocol? (n=37)	86%	-	-
Capacity Building Component Follow-up Visit			
How are these goals followed up? (n=26)	73%	23%	4%

Were the clinical indicators re-assessed at follow-up visit?	-	100%	-
How often are goals assessed and revised? (n=26)	96%	-	4%
Has the patient been exited from the capacity building component at the appropriate time? (n=26)	92%	4%	4%
Does the OHC provide appropriate handover notes for the dental practitioner at the final OHE session? (n=26)	96%	-	4%
Has the patient been sent to the appropriate dental practitioner as instructed from the clinical handover notes, care plan or treatment plan? (n=26)	96%	-	4%

Figure. Oral health education embedded within the NRCH OH MoC



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