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Table 1 Hypothesized relationship between QLQ-C30 and SCNS domains and resulting areas under the curve (AUC): original and validation analysis

QLQ-C30 domain	SCNS domain/item(s)	AUC		
		Original analysis	Validation analysis	
Hypothesized	AUC ≥.70			
Physical function	Physical & daily living needs (overall score and individual items)	.69–.81	.69–.74	
Role function	Work around the home Not being able to do the things you used to	.71–.73	.70–.70	
Emotional function	Psychological needs (overall score and individual items)	.56–.74	.61–.75	
Pain	Pain	.78	.74	
Fatigue	Lack of energy/tiredness	.74	.75	
Global health/ QOL	Feeling unwell a lot of the time	.73	.76	
Hypothesized	AUC <.70			
Social function	Not being able to do the things you used to	.64	.68	
Sleep	Lack of energy/tiredness	.4151	.3955	
	Feeling unwell a lot of the time			
	Being given informationabout aspects of managing your illness and side-effects at home			
Cognitive function	Feeling unwell a lot of the time	.54–.60	.5363	
Nausea/ vomiting	Being given informationabout aspects of managing your illness and side-effects at home	.19–.36	.22–.27	
Dyspnea		.3748	.3248	
Appetite loss		.47–.49	.32–.49	
Constipation		.3137	.3240	
Diarrhea		.3434	.1821	

sensitivity and specificity of our original cut-off scores would be supported.; RESULTS All hypotheses were confirmed: 6/6 QLQ-C30 domains with AUC > .70 from the original analyses had AUC > .70in the validation sample (Table 1), with the same SCNS item from the original analysis having the highest AUC in the validation sample. The sensitivity and specificity were generally comparable to the original analysis (Table 2). Examples of cut-off scores (sensitivity, specificity) are: physical function <90 (.85, .65); role function <90 (.85, .62); emotional function <90 (.84, .60); global health/QOL <70 (.86, .56); pain >10 (.93, .54); fatigue >30 (.86, .62).; CONCLUSIONS These results confirm QLQ-C30 cut-off scores associated with patients' unmet needs. The cut-off scores for these 6 domains could be implemented in clinical practice and their effectiveness evaluated in terms of whether they help clinicians identify patients whose PROs may need attention. Further research is needed to identify appropriate cutoff scores for the remaining QLQ-C30 domains.

Table 2 Sensitivity and specificity of various cut-off scores: original and validation analysis

QLQ-C30 Domain	SCNS Item	Cut- Off	Cohort	Sensitivity	Specificity
Physical Function	Work around the home	80	Original	.65	.83
			Validation	.40	.92
		90	Original	.85	.58
			Validation	.85	.65
Role Function	Work around the home	80	Original	.69	.79
			Validation	.69	.79
		90	Original	.85	.69
			Validation	.85	.62
Emotional Function	Feelings of sadness	90	Original	.89	.53
Tulction			Validation	.84	.60
		100	Original	.94	.35
			Validation	.92	.42
Global Health/ QOL	Feeling unwell a lot of the time	70	Original	.71	.69
			Validation	.86	.56
		80	Original	.89	.58
			Validation	.89	.45
Pain	Pain	20	Original	.66	.84
			Validation	.70	.81
		10	Original	.91	.66
			Validation	.93	.54
Fatigue	Lack of energy/tiredness	30	Original	.77	.71
			Validation	.86	.62
		20	Original	.91	.55
			Validation	.97	.42

## (2083) Oral health-related quality of life and self-rated health in middle and older aged Thai adults

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AIMS Oral health is an important public health issue as it could directly impact overall health and quality of life in the population. However, there has been limited evidence on such association in low and middle-income countries and this study aims to address this knowledge gap for Thailand.; METHODS Data were derived from a cohort of 87,134 distance learning adult students aged 15-87 years enrolled at Sukhothai Thammathirat Open University who completed a baseline study in 2005. This study analyses for respondents aged 35 years and older (n = 24,720): number of remaining teeth, experiencing 'discomfort chewing' and 'pain' and associations between these factors and overall self-rated health. Analysis was carried out using multivariate logistic regression reporting adjusted Odds Ratios (OR) and 95 % Confidence Intervals (CI).; RESULTS Among the Thai cohort members aged 35 and older, 5.8 % reported having teeth less than 20 teeth and 4.2 % reported 'poor' overall self-rated health. Experiences with discomfort were most commonly reported in chewing (23.2 %) and pain (10.1 %). Poor overall self-rated health was associated with discomfort chewing (OR = 1.81, 95 % CI 1.56-2.09) and pain (OR = 2.17, 95 % CI 1.82-2.59), after adjusting for socio-geo-demographic attributes and number of remaining teeth.; CONCLUSIONS This study provides strong evidence of the



association between oral health-related quality of life indicators and overall health outcomes. Promoting oral heath in middle age and especially in the later life will thus be vital for improving population health. There is a need for continued integration of oral health as part of holistic public health policy and programs.

## (2084) Improving the linguistic validation process of patient reported outcomes instruments into South African languages

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AIMS The objective of this research project is to obtain greater knowledge of South Africa Bantu languages. Recently, linguistic validation of Patient Reported Outcomes (PRO) instruments in these languages are required more often. However, this language group presents translation challenges, as their linguistic development and grammatical structure is unique compared to languages of Europe, Asia and the Americas.; METHODS A literature review of South African language history and development was conducted, to gauge whether Bantu languages will continue to be spoken in South Africa, and to determine the necessity of future linguistic validation into such languages. Additionally, linguistic validation data was analyzed, providing insight into the translation process of PRO Instruments in South African Bantu languages and to pinpoint anomalies unique to these languages.; RESULTS Today's South African Bantu languages evolved from pre-colonial languages that were initially unwritten and had the Roman alphabet imposed upon them by colonists. Consequently, this caused distinctions between the verbal and spoken dialects of these languages. This is evident in analysis of cognitive debriefing data, as subjects recognized certain items that originated from a spoken dialect, and suggested appropriate corrections for the written dialect. Compared to other languages, many more South African Bantu spelling corrections were observed during cognitive debriefing. It was discovered that although some spelling corrections may seem to be a stylistic preference, these should be implemented with caution, as a single letter change can have an effect on words and entire sentences.; CONCLUSIONS Upon completion of the literature review, it appears that South African Bantu languages will continue to gain prominence in South Africa. Therefore, linguistic validation of PROs into these languages is essential in achieving a valid sample of South African respondents. Several linguistic validation anomalies unique to South African Bantu languages were identified. Cognitive debriefing in these languages is imperative to ensure cultural appropriateness, conceptual equivalency, and accuracy of dialect. Additionally, because spelling corrections could affect meaning, further linguistic input is required prior to implementation.

## (2085) Limitations of the social relationships domain of WHOQOL-Bref

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AIMS The aim of this study is to assess the suitability of the social relationships (SR) domain of the WHOQOL-Bref by comparing it with the WHOQOL-100 SR domain. SR are an essential

consideration in clinical rehabilitation after stroke, and especially for those who have aphasia (language impairment).; METHODS Two hundred and fifty-five (n = 255) participants from the general Portuguese population have taken part in this research (mean age 43 years, range 25–84 years; 148 female, 107 male). Participants completed the European Portuguese version of the World Health Organization Quality of Life short-form instrument (WHOQOL-Bref, Serra et al., 2004) and the SR domain of WHOQOL-100 (Canavarro et al., 2009). WHOQOL-Bref SR domain has three items and the WHOQOL-100 SR domain has twelve items. Correlation and regression analysis of quality of life (QOL), and the SR domains of WHOQOL-Bref and of WHOQOL-100 (WHOQOL-100-SR) was undertaken.; RESULTS

All WHOQOL-Bref domains were significantly correlated with overall QOL. Correlation strength of WHOQOL-Bref domains in a descending order were: physical domain (0.56), psychological domain (0.50), environment (0.45) and SR domain (0.34). The weakest predictor of overall OOL in WHOOOL-Bref was the SR domain. WHOOOL-100-SR better predicts overall OOL than WHOOOL-Bref SR domain. The item of WHOQOL-Bref most correlated with the overall SR results was F15.3—sexual life (0.82). The WHOQOL-100-SR item that most explained the domain results was F13 (SR satisfaction) which explained 89 %, followed by F15 (sexual life), which, together, explained 96 % of the variance of QOL results. Item F13.2 (family relationships) of WHOQOL-100-RS strongly predicted WHOQOL-100-SR results, and was followed by F15.3 (sexual life) and F14.2 (friends support). Together, explained 89 % of the WHOQOL-100-RS results.; CONCLUSIONS The SR domain of WHOQOL-100 better explained overall QOL scores than the WHOQOL-Bref SR domain. Data collection in the clinical subgroup of participants with aphasia is being undertaken now. If these findings are reproducible for people with aphasia (PWA), the WHOQOL-100 SR domain is preferable to the WHOQOL-Bref SR domain when assessing SR among PWA as it will reveal more impact on social relationships and be better understood by clinicians.

## (2086) Older adults' quality of life and adjustment to aging: findings from SF-6D and ATAS-33

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AIMS To examine the associations of older adults' quality of life (QoL) with adjustment to aging (AtA).; METHODS For the purposes of this study, the Health Survey Questionnaire (SF-6D), one measure of cognitive functioning—the Mini-Mental State Examination (MMSE) and demographics, were included. Measures were completed using a variety of culturally appropriate methods, including self-administration and interviews. All variables had fewer than 1 % missing values and complete data were available for 709 older adults (M = 84.9; SD = 6.65; range 74–102) from four different nationalities. Exploratory and confirmatory factor analysis were run for data reduction and for exploring theoretical structure. Controlling for age, gender and country of origin, we assessed the level of QoL of elderly people, and its association with AtA.; RESULTS SF-6D score was positively associated with AtA score (r = .295, p < .001). QoL showed a moderate association with AtA and its impact was also mediated through attitudes towards personal accomplishment and health status. CONCLUSIONS This cross-national study enlightens links among QoL, and AtA in older age. Using developmental frameworks in future research could help us better understand how older adults adapt to aging transitions and add quality to their remaining life years. Keywords: Adjustment to Aging; Old Age; Older Adults; Quality of Life.

