International Consultation on Incontinence Questionnaire Anal Incontinence Symptoms and Quality of Life Module (ICIQ-B)

Summary

The ICIQ-B is a comprehensive and psychometrically robust patient-completed questionnaire for evaluating symptoms of anal incontinence (including flatus incontinence) and impact on quality of life (QoL) in research and clinical practice across the world. The ICIQ-B provides a robust measure organised into three domains providing scores from 1-21 for bowel pattern, 0-28 for bowel control and 0-26 for impact on quality of life associated with anal incontinence symptoms. Four further items are included that do not form part of a score as they were considered essential extra items for assessment, clinically and by patients. This questionnaire will be of use to general practitioners and clinicians in both primary and secondary care institutions to screen for incontinence, to obtain a brief yet comprehensive summary of the level, impact and perceived cause of symptoms of incontinence and to facilitate patient-clinician discussions. It is also an ideal research tool. The Third International Consultation on Incontinence recommended that all randomised trials evaluating treatments for incontinence use high quality questionnaires, in particular the ICIQ, to assess impact on patient outcome and facilitate comparisons. The ICIQ-B provides a comprehensive and robust measure for this purpose.

Patient population

The ICIQ-B is relevant for use in the widest range of individuals, including men and women, young and old, from all patient groups, with varied causes for incontinence symptoms.

Time to complete

A few minutes

Development

Studies were undertaken to evaluate the psychometric properties of the ICIQ-B following standard methods of psychometric testing, including content validity, construct, convergent and criterion validity (including comparison with other existing measures), stability (test-retest reliability), internal consistency and responsiveness to change following treatment (including conservative management and surgical intervention). The ICIQ-B has been shown to be robust and psychometrically sound in these validation studies.

Reliability

Test-retest reliability was 'moderate' to 'very good' for all question items using the weighted kappa statistic, (10 items 'moderate', 41 items 'good', 4 items 'very good'). Crude agreement ranged from 80 to 96% for all items and between 77 and 99% of retest responses were identical or within one response category of the test response. Cronbach's alpha coefficient was high for the total set of question items at 0.94 indicating redundancy of some items. The Cronbach's alpha statistics for the final domains to assess symptoms (0.73) and quality of life (0.82) seperately, indicated acceptable internal consistency with minimal redundancy if any.

Validity

Items were generated for inclusion in the ICIQ-B through qualitative studies. Subsequent interviews with patients and review by clinical experts indicated that ICIQ-B items were well interpreted and covered all important domains. Missing data was low for most items (mean 3.7%). The ICIQ-B was also able to detect differences between prevalence of different types of incontinence.

Responsiveness

Reduction in the occurrence of symptoms was detected in 12 of 21 question items that was found to be statistically significantly sensitive to change following treatment. The magnitude of

reduction ranged from 1 to 18% in the subgroup managed conservatively and 1 to 43% in the subgroup managed surgically. All domain scores exhibited sensitivity to change following conservative and surgical management.

Distribution

Correspondence to: Mrs Nikki Cotterill, Bristol Urological Institute, Southmead Hospital, Westbury-on-Trym, Bristol BS10 5NB, UK (nikki_cotterill@bui.ac.uk). The ICIQ-B is copyright protected and should not be altered in any way. It may be used if it is quoted clearly, and it must be used in its entirety, as presented in the copy enclosed. It is not possible to use parts of the questionnaire in isolation in any studies without the written permission of the ICIQ study group. The scoring system is clearly stated on the questionnaire. If any researchers or clinicians wish to use the ICIQ-B, the authors ask to be informed of the details of the study and any results that are presented or published. The ICIQ-B will be translated into a number of languages other than UK-English using standard methods for international adaptation. If any researchers wish to be involved in the translation or psychometric testing of alternative language versions of the ICIQ-B, or would like to enquire about available translations, please contact Nikki Cotterill (details above). The authors ask that no data from studies to validate alternative language versions of the ICIQ-B be published without prior consent.

Reference

Validation publication in preparation.

Cotterill N, Norton C, Avery KNL, Abrams P, Donovan JL. A patient-centered approach to developing a comprehensive symptom and quality of life assessment of anal incontinence. *Dis Colon Rectum.* 2008; 51(1): 82-87

Donovan J., Bosch JLHR., Gotoh M., et al. 2005. Symptom and quality of life assessment. In: Abrams P, Cardozo L, Khoury S, Wein A, eds. Incontinence, Third ed. Plymouth: Health Publication Ltd, 2005. 519-584.

Miscellaneous

In addition to the ICIQ-B, the development and psychometric testing of the modular ICIQ questionnaire is being undertaken, in an effort to produce an internationally accepted series of questionnaires for research and clinical use. The ICIQ is intended to be fully comprehensive for incontinence and related lower urinary tract symptoms (LUTS), lower bowel symptoms and vaginal symptoms. Condition-specific short form questionnaires (for screening and epidemiological studies) and long form questionnaires (for further investigation) are being developed for seven core conditions: urinary incontinence, other urinary symptoms, bowel incontinence including other bowel symptoms (ICIQ-B), vaginal symptoms, overactive bladder and nocturia. Long form modules will also include items to assess condition-specific quality of life (QoL), general QoL and condition-specific sexual matters. Finally, there will be post-treatment modules to assess outcome, including patient satisfaction with treatment. Please refer to copies of the individual modules for further details and also www.iciq.net which is being developed as the project progresses.

The ICIQ-B is primarily intended for bowel symptoms' research, to form part of the standard investigative protocol at baseline and follow-up in prevalence studies, clinical trials and investigative studies of symptoms or QoL. The ICIQ-B will also provide a robust measure for use in randomised trials evaluating treatments for bowel symptoms in order to assess their impact on patient outcome. Investigators will be able to select particular modules or domains for use independently or together as the objectives of each study requires. Its simple and robust nature will also make the ICIQ-B an ideal tool for use in community and clinic populations in routine clinical use, where further investigation of the level of symptoms and their impact on QoL is required.

Descriptors

Questionnaire, bowel symptoms, anal/faecal incontinence, quality of life, patient, outcome measure.