NATIONAL QUALITY FORUM

Stage 1 Concept Submission and Evaluation Worksheet 1.0

This form contains the information submitted by measure developers/stewards, organized according to NQF's concept evaluation criteria and process. The evaluation criteria, evaluation guidance documents, and a blank online submission form are available on the submitting standards web page.

NQF #: C 2037 NQF Project: GI and GU Project
Date Submitted: Jul 16, 2012
CONCEPT SPECIFICATIONS
De.1 Concept Title: Objective characterization of pelvic organ prolapse prior to surgery
Co.1.1 Concept Steward: American Urogynecologic Society
De.2 Brief Description of Concept: Percentage of female patients with a characterization of the degree of prolapse in each vaginal compartment, using a validated, objective measurement system(e.g.POP-Q or Baden/Walker) within 12 months of surgery for pelvic organ prolapse.
2a1.1 Numerator Statement: The number of female patients whose pelvic organ prolapse was documented using a validated, objective measurement tool (i.e.POP-Q or Baden/Walker Halfway System) performed within the 12 months prior to surgery for pelvic organ prolapse.
2a1.4 Denominator Statement: All patients undergoing pelvic organ prolapse (POP) surgery.
2a1.8 Denominator Exclusions: There are no exclusions.
1.1 Concept Type: Process 2a1. 25-26 Data Source: Administrative claims, Paper Medical Records 2a1.33 Level of Analysis: Clinician : Group/Practice, Clinician : Individual 1.2-1.4 Is this concept paired with another measure? No
2a1.1 Numerator Statement *(Brief, narrative description of the concept focus or what is being measured about the target population, e.g., cases from the target population with the target process, condition, event, or outcome)*: The number of female patients whose pelvic organ prolapse was documented using a validated, objective measurement tool (i.e.POP-Q or Baden/Walker Halfway System) performed within the 12 months prior to surgery for pelvic organ prolapse. 2a1.3 Numerator Details *(All information required to identify and calculate the cases from the target population with the target process, condition, event, or outcome such as definitions, timeframe, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors should be provided in an Excel file in required format with stage 2 measure submission)* For new concepts, describe how you plan to identify and calculate the numerator. Documentation in the patient´s record that characterizes support of the anterior vagina (urethra and bladder), apical vagina (cervix or hysterectomy scar and posterior cul de sac), and posterior vagina (rectum) using the Pelvic Organ Prolapse Quantification (POP-Q) or Baden-Walker Halfway System.
2a1.4 Denominator Statement *(Brief, narrative description of the target population being measured)*: All patients undergoing pelvic organ prolapse (POP) surgery. 2a1.5 Target Population Category *(Check all the populations for which the concept is specified and tested if any)*: Adult/Elderly Care

2a1.7 Denominator Details *(All information required to identify and calculate the target population/denominator such as definitions, timeframe, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors should be provided in an Excel file in required format with stage 2 measure submission)*
For new concepts, describe how you plan to identify and calculate the denominator.
All female patients with pelvic prolapse, identified with ICD-9-CM codes 618: (.01-.05). 618.09, 618: (.2, .3, .5, .6, .84, .89), 622.6 and who also have a surgical procedure within 12 months to address the condition identified by surgical CPT codes.

2a1.8 Denominator Exclusions *(Brief narrative description of exclusions from the target population)*:
There are no exclusions.

2a1.9 Denominator Exclusion Details *(All information required to identify and calculate exclusions from the denominator such as definitions, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors should be provided in an Excel file in required format with stage 2 measure submission)*
For new concepts, describe how you plan to identify and calculate the exclusions.
There are no exclusions.

2a1.10 Stratification Details/Variables *(All information required to stratify the measure results including the stratification variables, definitions, specific data collection items/responses, code/value sets – Note: lists of individual codes with descriptors should be provided in an Excel file in required format with stage 2 measure submission)*
For new concepts, if you plan to stratify the measure results, describe the plans for stratification.
We do not plan to stratify the measure results.

2a1.13 Statistical Risk Model and Variables *(Name the statistical method - e.g., logistic regression and list all the risk factor variables. Note - risk model development should be addressed in measure testing in the stage 2 measure submission)*
For new concepts, if an outcome, describe how you plan to adjust for differences in case mix/risk across measured entities.
We do not plan to risk adjust the measure.

2a1.25 Data Source *(Check all the sources for which the concept is specified and tested)*. If other, please describe:
Administrative claims, Paper Medical Records

2a1.26 Data Source/Data Collection Instrument (*Identify the specific data source/data collection instrument, e.g. name of database, clinical registry, collection instrument, etc.*): Practice Patterns Associated with Surgical Care of Pelvic Organ Prolapse: A Targeted Chart Review

2a1.33 Level of Analysis (*Check the levels of analysis for which the concept is specified and tested)*: Clinician : Group/Practice, Clinician : Individual

2a1.34 Care Setting *(Check all the settings for which the concept is specified and tested)*: Ambulatory Care : Clinician Office/Clinic

IMPACT, OPPORTUITY, EVIDENCE - IMPORTANCE TO MEASURE AND REPORT

Importance to Measure and Report is the criterion that must be met in order to recommend a concept for approval. All three subcriteria must be met to pass this criterion. See guidance on evidence.

1a. High Impact: H☐ M☐ L☐ I ☐
(*The concept directly addresses a specific national health goal/priority identified by DHHS or NPP, or some other high impact aspect of healthcare.*)

De.4 Subject/Topic Areas *(Check all the areas that apply)*: GU/GYN, GU/GYN : Gynecology
De.5 Cross Cutting Areas (*Check all the areas that apply)*: Prevention : Screening

1a.1 Demonstrated High Impact Aspect of Healthcare: Affects large numbers; Frequently performed procedure; Patient/societal consequences of poor quality

1a.2 If "Other," please describe:

1a.3 Summary of Evidence of High Impact *(Provide epidemiologic or resource use data)*:
Pelvic organ prolapse (POP) is common and debilitating. It is defined as any deviation of the pelvic support structures from their normal anatomic position. In the United States it is estimated that ~10% of women undergo at least one reconstructive surgical repair during their lives, with over 200,000 surgeries being performed annually at a cost greater than $1 billion(1,2,3). The prevalence of POP in women increases with age, and as the population ages these numbers will only increase. Indeed, estimates are that the number of women in the U.S. with POP will increase 46% between 2010 and 2050, from 3.3 to 4.9 million (4).
Studies have shown that women with POP often undergo inappropriate, or incomplete, surgery for their prolapse, leading to additional treatments and surgeries with their attendant additional costs. Rhoads and Sokol showed that surgical care for women with a primary admission diagnosis of uterovaginal prolapse was not compliant with standard treatment recommendations over 50% of the time (5). Anger et al have demonstrated that patients undergoing sling procedures to correct stress urinary incontinence are twice as likely to have a prolapse repair in the subsequent 12 months if their sling was performed by an urologist, who was less likely to perform a prolapse repair at the time of sling placement, than if their sling procedures was performed by a gynecologist, who was more likely to correct prolapse at the time of sling placement (6). These data suggest a probable significant impact if proper POP evaluation is performed prior to surgery.

1a.4 Citations for Evidence of High Impact cited in 1a.3:
1) Prolapse. ACOG practice Bulletin number 85 September 2007
2) Subak, Leslie L., et al. Cost of Pelvic Organ Prolapse Surgery in the United States. Obstet Gynecol 2001;98:646-51.
3) Fialkow, MF et al. Lifetime risk of surgical management for pelvic organ prolapse or urinary incontinence. Int Urogynecol J Pelvic Floor Dysfunct. 2008 Mar;19(3):437-40.
4) Wu, Jennifer M., et al. Forecasting the Prevalence of Pelvic Floor Disorders in U.S. Women. Obstet Gynecol 2009;114:1278-83.
5) Rhoads, Kim F. and Sokol, Eric R. Variation in the Quality of Surgical Care for Uterovaginal Prolpase. Medical Care 2011;49:46-51.
6) Anger, JT et al. Variations in stress incontinence and prolapse management by surgeon specialty. J Urol 2007;178(4 Pt 1):1411-7.

1b. Opportunity for Improvement: H☐ M☐ L☐ I ☐
(*There is a demonstrated performance gap - variability or overall less than optimal performance*)

1b.1 Briefly explain the benefits (improvements in quality) envisioned by use of this concept:
There is a relatively high rate of failure of POP surgery, with reoperation rates of 10 – 30%. The vagina is typically divided into 3 separate compartments: anterior, posterior, and apical (which refers to the uterus and upper vagina in women with a uterus and the vaginal vault/apex and upper vagina in post-hysterectomy women). Prolapse can occur in any one compartment individually or in any combination of compartments. It is self-evident that if one does not identify a defect in a specific compartment, one is unlikely to correct it. Failure to fully identify, and treat, all prolapsed compartments is thought to be a significant factor in the relatively high rate of failure in some prolapse surgeries.
ACOG guidelines recommend that when POP surgery is performed defects in all compartments be addressed. We believe that implementing this quality measure will lead to more complete, better pre-operative evaluation of POP which will result in more appropriate, better choice of surgery performed with better surgical outcomes, lower failure rates and fewer repeat POP surgeries.
Additionally, until fairly recently research efforts to assess surgical outcomes for POP were hampered by a lack of standardized terminology to objectively and quantifiably describe the degree of prolapse. With the adoption of the POP-Q system in 1995/1996 by ICS, AUGS and IUGA, such standardized terminology became available and began to be put in use in the research setting. Studies show that its adoption for research purposes, and among specialists, has progressed and become more widespread in the last decade. The performance of a complete, standardized, objective system to evaluate POP outside the research and subspecialty areas, in general practice, appears not to be widespread at this time and hampers the ability to perform larger epidemiologic studies as well as larger studies of surgical outcomes outside of academic research centers. Adoption of this measure will help facilitate performance of such research and facilitate application of research findings to clinical practice.

1b.2 Provide data demonstrating performance gap/opportunity for improvement *(Variation or overall less than optimal performance across providers).* List citations in 1b.3.
For endorsement maintenance, provide performance data on the measure as specified *(mean, std dev, distribution of scores by decile, min, max).* Describe who was included in the performance data in 1b.3.Several authors have inferred from their data

inadequate and/or incomplete pre-operative assessment of Pelvic Organ Prolapse (POP) and suggested such as a potentially significant contributor recurrent prolapse. There are published data from which one can infer that such complete, preoperative characterization is frequently not performed. Treszezamsky et al (1) recently surveyed 235 urology and gynecology residents about their exposure to and current use of POP-Q and/or Baden-Walker assessment tools in evaluating women's pelvic support. 75 urology and 133 ob/gyn residents responded to the survey. They found that although 74% of urologists and 87% of gynecologist report having used the POP-Q during their second year of training only 60% of urology residents and 43% of gynecology residents reported current use. Baden-Walker was used by 15% and 10%, respectively, while the remaining groups were unable to identify if any validated exam assessment was being preformed. It is reasonable to assume that resident exam patterns reflect those of the faculty supervising them, and that graduating residents will continue these patterns after graduation.
Additionally, several authors, looking at recurrent POP following prolapse surgery, have inferred from their data inadequate and/or incomplete pre-operative assessment of POP and suggested such as a potentially significant contributor to recurrent prolapse. Price et al demonstrated that recurrence of POP following an initial prolapse surgery tends to occur early in the post-operative period and involve a different compartment in approximately 60% of cases, suggesting a failure to identify and address fully the POP present at the time of such surgery (2). Additionally, it has been shown that when urologists perform surgery to treat female SUI, they are less likely than gynecologists to perform concomitant prolapse repairs, and that their patients are subsequently significantly more likely to undergo prolapse surgery in the 12 months following their incontinence surgery – again, suggesting a failure to fully identify and address existing POP at the time of initial surgery (3).
It is unlikely that a surgeon would purposefully ignore a known defect at the time of POP surgery, and it is reasonable to assume that, in at least a significant proportion of recurrent POP cases, the full extent of the POP was not recognized at the time of the initial surgery, suggesting incomplete pre-operative evaluation of the full extent of the POP. Other authors, reviewing the available evidence on POP recurrence have reached a similar conclusion (4).

1b.3 Citations for Data on Performance Gap provided in 1b.2.
For endorsement maintenance, describe who was included in the performance results reported in Ib.2 *(number of measured entities; number of patients; dates of data; if a sample, characteristics of the entities include)*
1) Treszezamsky AD et al Teaching of Pelvic Organ Prolapse Quantification System Among Obstetrics/Gynecology and Urology Residents in the United States Female Pelvic Medicine & Reconstructive Surgery: January/February 2012 - Volume 18 - Issue 1 - p 37–40
2) Price et al. The incidence of reoperation for surgically treated pelvic organ prolapse: an 11-year experience. Menopause Int. 2008 Dec;14(4):145-8
3) Anger, JT et al. Variations in stress incontinence and prolapse management by surgeon specialty. J Urol 2007;178(4 Pt 1):1411-7.
4) Salvatore, S et al. Risk factors for recurrence of genital prolapse. Curr Opin Obstet Gynecol 22:420–424.

1b.4 Provide data on disparities by population group. List citations in 1b.5.
For endorsement maintenance, provide performance data by population group on the measure as specified *(e.g., mean, std dev)*. Describe who was included in the performance data in 1b.5.
No data available.

1b.5 Citations for Data on Disparities Cited in 1b.4:
No data available

1c. Evidence (*Concept focus is a health outcome OR meets the criteria for quantity, quality, consistency of the body of evidence.*)
Is the concept focus a health outcome? Yes☐ No☐ If not a health outcome, rate the body of evidence.

Quantity: H☐ M☐ L☐ I☐ Quality: H☐ M☐ L☐ I☐ Consistency: H☐ M☐ L☐ I☐

Quantity	Quality	Consistency	Does the concept pass subcriterion1c?
M-H	M-H	M-H	Yes☐
L	M-H	M	Yes☐ IF additional research unlikely to change conclusion that benefits to patients outweigh harms: otherwise No☐
M-H	L	M-H	Yes☐ IF potential benefits to patients clearly outweigh potential harms: otherwise No☐

L-M-H	L-M-H	L	No ☐

Health outcome – rationale supports relationship to at least one healthcare structure, process, intervention, or service	Does the concept pass subcriterion1c? Yes☐ IF rationale supports relationship

Please see the attached Evidence Submission Worksheet for evidence specifications.

Was the concept approval criterion, *Importance to Measure and Report*, met?
(*1a & 1b must be rated moderate or high and 1c yes*) Yes☐ No☐
Provide rationale based on specific subcriteria:

3. USABILITY

4.1 Current and Planned Use
Performance results from NQF-endorsed measures are expected to be used in at least one accountability application within 3 years and publicly reported within 6 years of initial endorsement (in addition to use for performance improvement).
(Check only the current and planned uses; for any current uses that are checked, provide a URL for the specific program)
Current Use:
Planned Use:

5. COMPARISON TO RELATED AND COMPETING CONCEPTS & MEASURES

5.1 If there are related measures *(either same measure focus or target population)* or competing measures *(both the same measure focus and same target population*), list the NQF # and title of all related and/or competing measures:
0099 : Urinary Incontinence: Characterization of Urinary Incontinence in Women Aged 65 Years and Older

5a.1 If this concept has EITHER the same focus OR the same target population as NQF-endorsed measure(s): Are the specifications completely harmonized?

5a.2 If the specifications are not completely harmonized, identify the differences, rationale, and impact on interpretability and data collection burden:
These measures will compliment each other allowing for a more complete assessment of the pre, intra and post-operative facets of care delivered to patients with pelvic floor dysfunction, including pelvic organ prolapse and urinary incontinence. They focus on processes of care to promote thoughtful, safe and effective care for patients having uterovaginal prolapse surgery. Both measures seek to ensure thoughtful surgical planning through use of standardized, well accepted systems to describe vaginal support. During phase 2, AUGS Quality Working Group will review the measure specifications for #0099 and ensure that appropriate specifications are included for this new measure.

5b.1 If this concept has both the same focus and the same target population as NQF-endorsed measure(s):
Describe why this concept is superior to competing measures *(e.g., a more valid or efficient way to measure quality);* OR provide a rationale for the additive value of endorsing an additional measure. *(Provide analyses when possible)*:
The addition of this new measure will allow for a more complete assessment of pelvic floor function or dysfunction. Urinary incontinence is one aspect of pelvic floor disorders and pelvic organ prolapse is another. By approving both of these measures, NQF is assuring women a complete assessment of their condition.

CONTACT INFORMATION

Co.1 Concept Steward (Intellectual Property Owner): American Urogynecologic Society, 2025 M. Street, NW Suite 800 | Washington | District Of Columbia | 20036

Co.2 Point of Contact: Colleen | Koski | Colleen@augs.org | 202-367-1240-

Co.3 Concept Developer if different from Concept Steward: American Urogynecologic Society | 2025 M. Street, NW Suite 800 | Washington | District Of Columbia, 20036 Co.4 Point of Contact: Colleen | Koski | Colleen@augs.org | 202-367-1240-
Co.5 Submitter: Colleen | Koski | Colleen@augs.org | 202-367-1240- | American Urogynecologic Society
Co.6 Additional organizations that sponsored/participated in concept development:
Co.7 Public Contact: Colleen | Koski | Colleen@augs.org | 202-367-1240- | American Urogynecologic Society

ADDITIONAL INFORMATION
Concept Developer/Steward Updates and Ongoing Maintenance Ad.3 Year the concept was first released: Ad.4 Month and Year of most recent revision: Ad.5 What is your frequency for review/update of this measure? Ad.6 When is the next scheduled review/update for this measure?
Ad.7 Copyright statement:
Ad.8 Disclaimers:
Ad.9 Additional Information/Comments:
Date of Submission (*MM/DD/YY*): Jul 16, 2012

NATIONAL QUALITY FORUM—Evidence (1c) Pilot Submission Form

Measure Title: Objective characterization of pelvic organ prolapse, prior to surgery
Date of Submission: 7/16/2012

- Respond to all questions with answers immediately following the question.
- Maximum of 6 pages (*6 pages includes questions/instructions in the form*); minimum font size 11 pt
- All information needed to demonstrate meeting the evidence criterion (1c) must be in this form. An appendix of *supplemental* materials may be submitted, but there is no guarantee it will be reviewed.
- See NQF guidance on evaluating evidence. Contact NQF staff for examples, resources, or questions.

STRUCTURE-PROCESS-OUTCOME RELATIONSHIP

1c.1.This is a measure of:

Outcome

☐ Health outcome: Click here to name the health outcome

☐ Intermediate clinical outcome: Click here to name the intermediate outcome

☒ Process: Objective characterization of pelvic organ prolapse prior to surgery

☐ Structure: Click here to name the structure

☐ Other: Click here to name what is being measured

HEALTH OUTCOME MEASURE *If not a health outcome, skip to 1c.3*

If the measure focus identified in 1c.1 is a health outcome, answer 1c.2 and 1c.2.1.

1c.2. Briefly state or diagram how the health outcome is related to at least one healthcare structure, process, intervention, or service.

1c.2.1. **State the rationale supporting the relationship between the health outcome and at least one healthcare structure, process, intervention, or service**.

Note: For health outcome measures, no further information is required

STRUCTURE, PROCESS, OR INTERMEDIATE OUTCOME MEASURE

If the measure focus identified in 1c.1 is a structure, process, or intermediate outcome answer all the following questions (except as indicated by skip pattern).

1c.3. Briefly state or diagram how the measure focus is related to desired health outcomes and proximity to desired health outcomes. *(Do not summarize the evidence here.)*

Pelvic organ prolapse (POP) may involve the anterior, posterior or apical compartments of the vagina, or any combination of the three. Many patients with symptomatic POP will chose to undergo surgery to correct their prolapse. Complete, objective, standardized preoperative evaluation of POP → increased likelihood of choosing appropriate surgical procedure(s) to fully address the prolapse → reduced risk of recurrent prolapse with its attendant morbidity and costs. Complete, objective, standardized preoperative evaluation of POP also → improved communication between providers → facilitation of research and evaluation of surgical outcomes.

1c.4. Is there a guideline recommendation supporting the measure focus identified in 1c.1.? YesX No
If no, skip to #1c.6

If yes, *answer 1c.4.1-1c.5.*

1c.4.1. **Guideline citation** (*including date*):
Bump RC, Mattiasson A, Bø K, Brubaker LP, DeLancey JO, Klarskov P, Shull BL, Smith AR.
The standardization of terminology of female pelvic organ prolapse and pelvic floor dysfunction.
Am J Obstet Gynecol. 1996 Jul;175(1):10-7.

1c.4.2. **URL** (*if available online*):
http://www.ajog.org/article/S0002-9378(96)70243-0/abstract?source=aemf

1c.4.3. **Identify guideline number and/or page number**:
p. 10

1c.4.4. **Quote verbatim, the specific guideline recommendation**:

This article presents a standard system of terminology *[POP-Q]*recently approved by the International Continence Society, the American Urogynecologic Society, and the Society of Gynecologic Surgeons for the description of female pelvic organ prolapse and pelvic floor dysfunction. An objective site-specific system for describing, quantitating, and staging pelvic support in women is included. It has been developed to enhance both clinical and academic communication regarding individual patients and populations of patients. Clinicians and researchers caring for women with pelvic organ prolapse and pelvic floor dysfunction are encouraged to learn and use the system

1c.4.5. **Grade assigned to the recommendation with definition of the grade**:
No grade was assigned to the recommendation

1c.5. Did the guideline developer systematically review and grade the body of evidence for the specific guideline recommendation? Yes☐ Nox *If no, skip to #1c.6*

If yes, *answer 1c.5.1. (**Note:** Findings of the systematic review of the body of evidence for the guideline recommendation must be reported in 1c.8-1c.13.)*
1c.5.1. **Grade assigned to the body of evidence with definition of the grade**:

1c.6. Is there another published systematic review of the body of evidence supporting the measure focus identified in 1c.1? *(other than from the guideline cited above, e.g., Cochrane, AHRQ, USPSTF)*
Yesx No☐ *If no, skip to #1c.7*
If yes, *answer 1c.6.1-1c.6.3. (**Note:** Findings of the systematic review of the body of evidence must be reported in 1c.8-1c.13.)*

1c.6.1. **Citation** (*including date*):
Mouritsen L. Classification and evaluation of prolapse. Best Pract Res Clin Obstet Gynaecol. 2005 Dec;19(6):895-911.

1c.6.2. **URL** (*if available online*):

1c.6.3. **Grade assigned to the body of evidence with definition of the grade**:
No grade was assigned to the body of evidence
If a systematic review of the evidence was identified in either 1c.5 or 1c.6, skip to 1c.8

1c.7. If a systematic review of the body of evidence was not identifed and reported in 1c.5 or 1c.6, did the measure developer perform a systematic review of the body of evidence supporting the measure focus identified in 1c.1? Yes☐ No☐

If yes, *answer 1c.7.1-1c.7.3. (**Note:** Findings of the measure developer's systematic review of the body of evidence must be reported in 1c.8-1c.13 and unpublished evidence review products such as evidence tables provided in an appendix.)*

1c.7.1. **Who conducted the measure developer's systematic review of the body of evidence**?

1c.7.2. **Grade assigned to the body of evidence with definition of the grade**:

1c.7.3. **Describe the process used for the systematic review**:

If no systematic review of the body of evidence identified in 1c.5, 1c.6, or 1c.7, the evidence criterion can not be met.

FINDINGS FROM SYSTEMATIC REVIEW OF BODY OF THE EVIDENCE SUPPORTING THE MEASURE FOCUS

(Items 1c.8-1c.13 must be answered and should support the measure focus identified in 1c.1. If more than one systematic review was identified (1c.5, 1c.6, and 1c.7), provide a separate response for each.)

1c.8. What is the time period covered by the body of evidence? (*provide the date range, e.g., 1990-2010*). Date range: 1996-2004

QUANTITY AND QUALITY OF BODY OF EVIDENCE

1c.9. How many and what type of study designs are inlcuded in the body of evidence? (*e.g., 3 randomized controlled trials and 1 observational study*)

Case-control (2)
Reliability Study(3)
Survey (1)
Retrospective series (1)

1c.10. What is the overall quality of evidence across studies in the body of evidence? (*discuss the certainty or confidence in the estimates of effect due to study factors such as design flaws, imprecision due to small numbers, indirectness of studies to the measure focus or target population*)

There is a high level of confidence in the reliability of the POP-Q based on multiple studies (including over 100 subjects) evaluating inter-rater reliability. The inter rater reliability for the nine measurements as follows: r_s for Aa 0.817, $p < 0.0001$; Ba 0.895, $p < 0.0001$; C 0.522, $p = 0.0003$; D 0.767, $p = 0.0004$; Bp 0.746, $p < 0.0001$; Ap 0.747, $p < 0.0001$; genital hiatus 0.913, $p < 0.0001$; perineal body 0.514, $p = 0.0004$; and total vaginal length 0.488, $p = 0.0008$.

In addition, the use of the POP –Q as descriptive terminology in the literature increased significantly during the early years of its use (1999 and 2002), POPQ from period 1 (13.3%) to period 2 (28%) ($P = .03$). The usefulness of this data is limited by its age, but additional data (see below) affirm that the use of this tool has been widely adopted.

ESTIMATES OF BENEFIT AND CONSISTENCY ACROSS STUDIES IN BODY OF EVIDENCE

1c.11. What are the estimates of benefit—magnitude and direction of effect on outcome(s) across studies in the body of evidence? (*e.g., ranges of percentages or odds ratios for improvement/ decline across studies, results of meta-analysis, and statistical significance*)

There are no estimates of benefit in the body of evidence

1c.12. What harms were studied and how do they affect the net benefit—benefits over harms?

There were no harms evaluated by the body of evidence.

UPDATE TO THE SYSTEMATIC REVIEW(S) OF THE BODY OF EVIDENCE

1c.13. Are there new studies that have been conducted since the systematic review(s) of the body of evidence? Yesx No☐ *If no, stop*

If yes,

1c.13.1. **For each new study provide: 1) citation, 2) description, 3) results, 4) impact on conclusions of systematic review**.

Digesu GA, Athanasiou S, Cardozo L, Hill S, Khullar V. Validation of the pelvic organ prolapse quantification (POP-Q) system in left lateral position. Int Urogynecol J Pelvic Floor Dysfunct. 2009 Aug;20(8):979-83. 218 subjects were underwent prolapse evaluation by POP-Q in the left lateral position by two examiners. The POP-Q showed a high degree of reliability (0.88). There was a high degree of correlation between the POP-Q findings in left lateral and lithotomy position (rho > 0.95, p < 0.001). Supports the validity of the POP-Q as a communication tool by again affirming inter-rater reliability. Affirms the systematic review.

Swift S, Morris S, McKinnie V, Freeman R, Petri E, Scotti RJ, Dwyer P. Validation of a simplified technique for using the POPQ pelvic organ prolapse classification system. Int Urogynecol J Pelvic Floor Dysfunct. 2006 Nov;17(6):615-20. Prospective randomized trial of 48 patients undergoing evaluation using standard POP-Q and simplified POP-Q. The weighted kappa statistics for the inter-examiner reliability of the simplified prolapse classification system were 0.86 for the overall stage, 0.89 and 0.86 for the anterior and posterior vaginal walls, respectively, 0.82 for the apex/cuff, and 0.72 for the cervix. For the inter-system association between the simplified POPQ and standard POPQ, the Kendall's tau-b value for overall stage was 0.90, 0.83, and 0.87 for the anterior and posterior walls respectively, and 0.78 for the cuff/apex and 0.98 for the cervix. Supports the validity of the POP-Q as a communication tool by again affirming inter-rater reliability. Affirms the systematic review.

Barber MD, Lambers A, Visco AG, Bump RC. Effect of patient position on clinical evaluation of pelvic organ prolapse. Obstet Gynecol. 2000 Jul;96(1):18-22. Prospective study. 189 women underwent evaluation using the POP-Q in dorsal lithotomy and in a birthing chair. There was significant correlation between measurements. Supports the validity of the POP-Q as a communication tool by again affirming inter-rater reliability. Affirms the systematic review.

Treszezamsky AD, Rascoff L, Shahryarinejad A, Vardy MD. Use of pelvic organ prolapse staging systems in published articles of selected specialized journals. Int Urogynecol J. 2010 Mar;21(3):359-63. Articles from eight journals in 2004 and 2007 were evaluated for use of POPQ. Use of the POP-Q in research

articles increased from 64.9% to 82.1% (p = 0.01). Supports the findings of the review article, documenting an increase in the use of POP-Q as a tool for communication. Affirms the systematic review. While this article demonstrates that the POP-Q has become more commonly used for research purposes, allowing communication of outcomes for research, it does not provide information regarding the clinical use of the POP-Q

Pham T, Burgart A, Kenton K, Mueller ER, Brubaker L. Current Use of Pelvic Organ Prolapse Quantification by AUGS and ICS Members. Female Pelvic Med Reconstr Surg. 2011 Mar;17(2):67-9. 308 pelvic reconstructive surgeons responded to survey evaluating the use of POP-Q. 76% of respondents were using the POP-Q to evaluate pelvic organ prolapse. Supports the use of the POP-Q as useful in clinical communication. Affirms the systematic review.

Treszezamsky AD et al Teaching of Pelvic Organ Prolapse Quantification System Among Obstetrics/Gynecology and Urology Residents in the United States Female Pelvic Medicine & Reconstructive Surgery: January/February 2012 - Volume 18 - Issue 1 - p 3.

235 urology and gynecology residents were surveyed regarding their exposure to and current use of POPQ and/or Baden-Walker in evaluating women's pelvic support. 75 urology and 133 ob/gyn residents responded to the survey. They found that although 74% of urologists and 87% of gynecologist report having used the POP-Q during their second year of training only 60% of urology residents and 43% of gynecology residents reported current use. Baden walker was used by 15% and 10% respectively while the remaining groups were unable to identify if a validated exam assessment was being preformed. There is a gap between the published data using POP-Q, and the clinical assessment of pelvic organ prolapse.