Journal Club April 2014 ANSWERS
Female Pelvic Medicine & Reconstructive Surgery

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Original Article: Is Postoperative Bowel Function Related to Posterior Compartment Prolapse Repair?

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1. The third paragraph of the introduction states, “Some women undergoing prolapse repair may have a relatively asymptomatic rectocele and may experience defecatory dysfunction.” Please clarify this statement since many providers feel that if a patient has defecatory dysfunction and a rectocele it cannot be asymptomatic by definition.

   A rectocele defect that descends no further than 1 to 3 cm proximal to the hymenal remnant may not be contributing to the patient’s symptoms specifically of bulge or protrusion, particularly if there is a relatively large and distinct anterior or apical bulge that is descending to or beyond the hymenal remnant. A patient may have apparently good posterior vaginal support visually but then on a digital rectovaginal exam may have a palpable defect or weakness in the rectovaginal septum or perineal body that is not obviously contributing to the patient’s symptom of bulge or protrusion.

2. The study design is a retrospective cohort comparison between all patients who underwent surgery for apical/anterior pelvic organ prolapse using different approaches, and compared those patients who received a traditional native tissue rectocele repair, perineorrhaphy or perineoplasty to those who did not. Clearly, there is potential of surgeon selection bias in who is offered a posterior repair. This bias was demonstrated in Table 1 where the reason more women who received a posterior repair had worse prolapse of the posterior vaginal wall (Bp -1.0) but better apical support (C -4.0) compared to women who did not receive a posterior repair who had better posterior vaginal wall support (Bp -2.0)
but worse apical prolapse (C -2.0). If the authors wanted to control for baseline risk factors, this would lead some to believe that POPQ point Bp (and even potentially POPQ point C despite lack of significance) should be included in the regression model rather than or in addition to overall POPQ stage. Why did the authors not include this more specific point in the model? Should they have?

We chose to exclude the C point from our model as this was not significantly different between our two groups and to exclude the Bp point from the model given that we would expect the point of maximal posterior descent would inherently be different between those undergoing and not undergoing a reconstructive procedure for posterior prolapse. But you raise an excellent point as this could potentially help control some surgeon bias. We repeated our regression analysis with the addition of point Bp in the model, along with adjusting for preoperative CRADI-8 score, age, chronic constipation, chronic laxative use, advanced prolapse, and BMI. Women who underwent a posterior repair (PR) scored 4.5 points lower on the postoperative CRADI-8 compared to those who did not undergo a PR [95% CI 0.5, 8.6 lower score (P =0.02)]. These results are relatively similar to the results from our initial model [4.9 points lower with 95% CI 1.0, 8.8 and P=0.2].

3. The author’s second statement in the discussion is “those who underwent a PR had a significantly greater margin of improvement in bowel symptoms compared to those who did not undergo a PR, and these differences persisted when controlling for potentially confounding factors in a regression analysis.” In fact, this regression score is most reflective of the comparison after controlling for risk. However, do you the authors believe that a predicted regression model score of 4.9 CRADI-8 points better in the women who underwent PR is a clinically meaningful difference compared to those who did not receive a PR? If this is indeed unknown as mentioned in the discussion do the authors feel they can conclude that those who receive a PR have greater improvement with reasonable certainty?

We do understand and elaborate on the limitations of our data and conclusions. As we review in the discussion, the minimal clinically important difference (MCID), which aids in interpretation of whether statistically significant results are clinically significant, has not been reported for the CRADI-8. Our data show that postoperative CRADI-8 scores were statistically different in women who underwent a PR compared to those who did not. This could be clinically significant, but knowing the MCID for the CRADI-8 would certainly help inform this conclusion further. Among all of the subjects, the mean preoperative CRADI-8 scores were 19.5 ±1.96 [median 12.5 IQR 3.1 to 32.7] with mean postoperative CRDAI-8 scores of 7.5 ±14.3 [median 0.0 IQR 0.0 to 9.3]. Given the particularly relative low scores after surgery, a difference of 4.9 could plausibly reflect a clinically significant difference.
4. Can the authors speculate as to why symptoms may be different but quality of life does not appear to be different between those who receive a PR compared to those who do not? Could it be that posterior repair actually results in more patients whose quality of life gets worse or is less likely to improve as much despite symptoms improving?

Quality of life has been shown to improve significantly after surgical prolapse repair.¹ We speculate that the lack of statistical difference is attributed to the fact that both groups (PR and no PR) improved to such a large degree after surgical repair.

5. The authors end the discussion with the statement that one option is to correct a rectocele if a patient has symptoms but they don’t describe really what qualifies as a surgically correctable rectocele by anatomy. They also don’t really describe what qualifies as defecatory dysfunction. Can you elaborate on these important details to guide surgeons in the potential selection? Are there other options that should be described based on the findings?

We chose not to define this anatomically as it is difficult to determine which rectoceles do and do not warrant surgical repair based upon anatomic prolapse quantification measurements alone. Furthermore, some posterior anatomic defects such as perineal rectoceles are not always conveyed on POP-Q exams. The decision for surgical repair involves assessments of patients’ goals, activity, and symptoms of bulge, protrusion or pressure as well as defecatory dysfunction. Defecatory dysfunction can include an array of symptoms such as obstructive defecation, straining, incomplete bowel emptying, splinting to defecate, sensations of stool trapping or urgency, and accidental bowel leakage. A thorough history can elucidate these symptoms, and if present, an attempt should be made to correlate defecatory dysfunction symptoms with exam findings. If clinical exam is out of proportion to symptoms, another option can be to further evaluate defecatory dysfunction symptoms with colon transit studies, anorectal manometry, or endoanal ultrasound prior to discussion of surgery.

References