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**Abstract Reproduction Form B-1**

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Institution City Country	Albert Einstein College of Medicine/Montefiore Medical Center, Bronx, New York, USA
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Title (type in CAPITAL LETTERS)	THE SIGNIFICANCE OF TOTAL VAGINAL LENGTH IN SURGICAL DECISION MAKING

**Aims of Study:** (1) To determine (a) the total vaginal length (TVL), (b) the distance from hymen to ischial spines (HIS), and (c) the distance from the hymen to sacral promontory (HSP) in a population at risk for pelvic organ prolapse, (2) to determine the feasibility of measuring these distances with simple instruments in use by practicing generalist obstetrician gynecologists throughout the world, and (3) to establish possible treatment protocols for satisfactory anatomic repair of pelvic organ prolapse on principles based on these measurements.

**Methods:** 55 patients seen by the Urogynecology/Reconstructive Pelvic Surgery Service at our institution for various urinary and gynecologic complaints were evaluated by the International Continence Society (POPQ) [1] and New York Classification systems [2]. Measurements of TVL, HIS and HSP were used to establish "normal values" for this population and to determine the ease and feasibility of taking these measurements by digital exam and paper tape measures. If the length of the distance from the hymen to the sacral promontory exceeded the length of the examiner's finger, it was recorded as >10 or >13, etc., to avoid the use of more complex measuring devices not immediately available to most generalists globally. Variables such as age, parity, BMI, previous surgical treatment and hormonal status were compared for differences by Mann-Whitney and chi square tests.

**Results:** The mean vaginal length in this group of patients was  $8.4 \pm 1.2$  cm. The mean HIS distance was  $6.35 \pm .65$  cm. The mean HSP distance was  $11.5 \pm 1.5$  cm. There was no statistical difference in TVL, HIS or HSP in this group when compared for age, parity, BMI, previous surgical treatment or hormonal status.

**Conclusions:** (1) Since the mean TVL is significantly greater than the mean HIS ( $p < .05$ ) and the mean TVL is significantly less than the mean HSP ( $p < .001$ ), most patients would probably be best served by an abdominal sacral colpopexy as definitive treatment for vault prolapse or uterovaginal prolapse, (2) patients should be triaged preoperatively for these measurements for optimal surgical outcome, based on the principles of preservation of vaginal length and coital function [3-5]. We are currently studying other populations with and without prolapse, to determine particularly if patients with



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Bibliography

1. Bump RC, Mattiason A, Bo K, Brubaker LP, DeLancey JOL, Klarskov P, Shull BL, Smith ARB. The standardization of terminology of female pelvic organ prolapse and pelvic floor dysfunction. *Am J Obstet Gynecol* 1996;175:10-7.
2. Scotti RJ, Flora RF, Greston WM, Budnick L, Hutchinson-Colas J. Characterizing and reporting pelvic floor defects: the revised New York classification system. *Int Urogynecol J* (in press).
3. Morley GW, Delancey JO: Sacrospinous ligament fixation for eversion of the vagina. *Am J Obstet Gynecol* 1988;158:872-81.
4. Given FT, Muhlendorf IK, Browning GM. Vaginal length and sexual function after colpopexy for complete uterovaginal eversion. *Am J Obstet Gynecol* 1993;169:284-8.
5. Dickinson RL. The vagina. In: *Human Sex Anatomy*, 2nd ed. Baltimore: Williams & Wilkins, 1949:34-5.