

**Sonographic Study of Normal Uterine Size in Reproductive and Postmenopausal Age in Iraqi Women and related with Parity**  
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**Abstract:**

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**Aim:** The study included sonographic assessment of normal uterine size in non-gravid adult females at reproductive and postmenopausal women and its relation with parity. The anatomical variations of uterus particularly those concerning the body of uterus are well known in medical literature. Data on uterine dimensions in parous (prim parous or multiparous) and nulliparous women are vital for public health consideration as the presence of uterine pathology effectively reflects the status of fertility and other gynecological condition in general. The last few decades, sonography has become the most important imaging modality for the study of the uterine pathology. The estimation of uterine size has been widely reported by several authors from different parts of the world.

**Material and methods:** this study included 150 non gravid female subjects were distributed into five age groups A(20-29), B(30-39), C (40-49), D(50-59), E(60-69), each group was divided into nulliparous, primiparous and multiparous women were examined sonographically because of abdominal or pelvic problem unrelated to uterus. All groups were subjected to transabdominal technique of uterine examination with a 3.5MHZ transducer. The length, width and anteroposterior diameter of uterus were calculated. The uterine volume was calculated using ellipsoid algorithm. These dimensions correlated with age and parity status of each study groups.

**Results:** The length means increased at 20-49 age and decrease in 49-69 age. Increase the total means of the length of each group was related to parity, nulliparous ( $5.68\pm 1.24$ ), primiparous ( $6.15\pm 1.72$ ) and multiparous ( $7.28\pm 1.33$ ). Depth and width showed mild significant differences between study age groups. Width and depth were recorded increase related to party in all study groups. Uterus volume of uterus decreased with age groups, while total uterus volume increased in multiparous than the primiparous and nulliparous women.

Means endometrial thickness was decreased with age groups and total means correlated with parity, in nulliparous ( $5.46\pm 2.59$ ), primiparous ( $5.51\pm 3.13$ ) and multiparous ( $6.35\pm 3.07$ )

**Conclusion:** Present study the uterine length and total volume showed clear increase with age and correlated with parity, while the width and depth show little changes with age but clear changes related to parity.

The endometrial thickness was decreased with age and increased significantly with parity.

**Keywords:** Uterus dimension; sonography; Endometrial Thickness

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