

## Serial Ultrasonographic Appearance of Postpartum Uterine Involution in Miniature Schnauzer Bitches

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This study was undertaken to determine the normal appearance of the postpartum uterine involution. Postpartum changes in uterine shape, architecture, echogenicity and diameter were monitored with ultrasonography in 8 Miniature Schnauzer bitches.

The exeretory period of vaginal discharges in 8 normal bitches of uterine involution was finished completely at  $22.87 \pm 2.23$  days (Mean $\pm$ SD) postpartum. The short axis shape of the uterus was varied from circular to polygonal. This lasted until  $16.37 \pm 1.92$  days postpartum, during which time the short axis uterine shape gradually changed to circular. Also, the long axis shape of the uterus was created a beaded appearance of the horns until  $24.12 \pm 3.35$  days postpartum.

The ultrasonographic image of the postpartum uterus consisted of four echogenicity distinct layers. Uterine wall was represented the very hyperechoic serosa, hypoechoic myometrium, hyperechoic endometrium and anechoic structures of fluid in the uterine cavity until 7 days postpartum.

The uterine diameter was decreased not only in the placental sites from  $24.06 \pm 1.98$  mm at 1 day to  $13.31 \pm 1.42$  mm at 7 days postpartum, but also in the interplacental sites  $14.72 \pm 2.22$  mm at 1 day,  $9.99 \pm 0.76$  mm at 7 days postpartum. There was a general trend of decreasing uterine diameter, which occurred more rapidly at the placental sites.

In conclusion, normal postpartum uterine involution in Miniature Schnauzer bitches appeared to be completed around 65 days postpartum by gross findings such as vaginal discharges, and by ultrasonographic findings, uterine shape and echogenicity.

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