

Right mediolateral episiotomy and rupture of the anal sphincter in primiparous women during delivery

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INTRODUCTION AND AIM OF THE STUDY

The episiotomy is surgical enlargement of the vaginal orifice by an incision of the perineum during the last part of the second stage of labour. Anal sphincter injury is clinically diagnosed short after delivery and is an important factor of the subsequent development of anal incontinence. Many authors described endoanal ultrasound as

suitable method to evaluate anal sphincter anatomy.

OASI is linked to midline episiotomies and mediolateral episiotomies with post-delivery angles of <30 and >60 degrees.

We wanted to know if there are any factors other than the angle of the episiotomy that could influence anal sphincter injury.

MATERIALS AND METHODS

The study was prospective. The recruited women were pregnant nulliparous women pregnant 28-33 weeks who came to routine check to our gynaecological outpatient department.

The participants were examined twice: First in the 28--32 weeks of pregnancy and second 6-7 weeks after the delivery when the volunteers came back to the second examination. Imaging was performed using a crystal probe such as the B&K Medical scanner (B&K Medical, Sandhoften, Denmark). The probe was inserted into anal canal and the 3D scan was done. Data were analyzed using the Wilcoxon rank sum test for equal medians

RESULTS

Sixty five women completed the two session pre and post partum. Thirty two women had episiotomy on the right side. No differences were observed in global parameters such as age, weight, BMI or infant weight between patients with or without episiotomy.

Within the group of patients with episiotomy, a significant smaller episiotomy length was observed in patients with visible sphincter rupture ($p < 0.05$), while no differences were observed in the angle of episiotomy.

INTERPRETATION OF RESULTS

From our results, we cannot conclude that episiotomy can help in reducing the incidence of anal sphincter injury at delivery but only that clinical diagnosis in women with episiotomy is more difficult to make.

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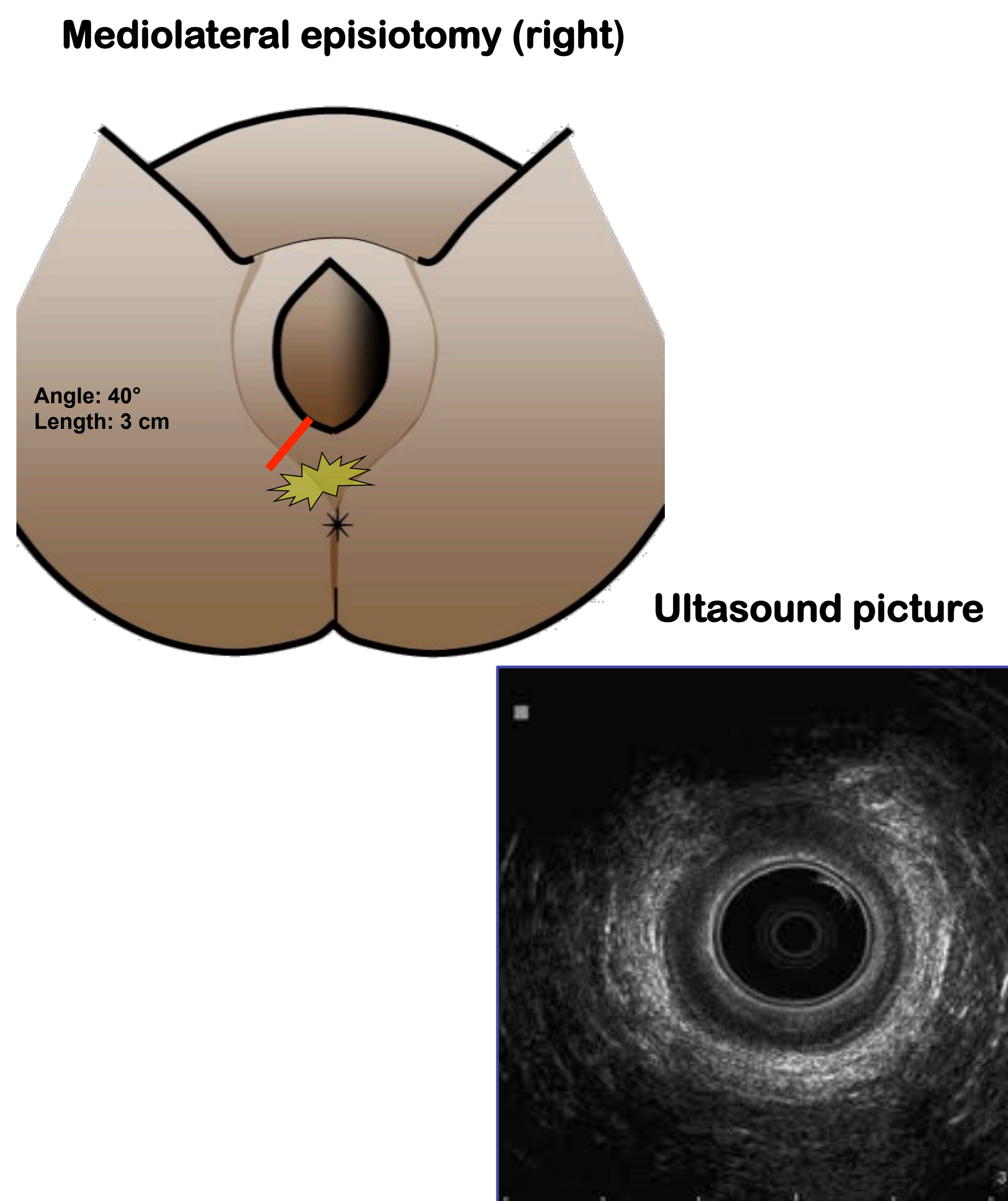


Figure 1.
Example of a patient with a mediolateral episiotomy on the right side with anal sphincter tear.

CONCLUSIONS

A short episiotomy does not provide sufficient stray of forces away from anal sphincter. We didn't find the differences of the anal sphincter injury in connection of the angle of episiotomy because all of the episiotomies were done in the range 40 to 50 degree. In case we decide to do the episiotomy it should be done longer than 2 cm to avoid anal sphincter rupture.