EP32.07. The role of multiple indicators measured by ultrasound in the prediction of endometrial receptivity during FET cycles.

Tao Hu1, Ai-Hong Zhu1, Jing-Jing Yu, Juan Qian, Yi Jin, Yan Su, Yun Wu, Li Cao*
Obstetrics and Gynecology Hospital Affiliated to Nanjing Medical University, Nanjing, People’s Republic of China

OBJECTIVE: To assess the role of multiple indicators measured by two-dimensional (2D) ultrasound and three-dimensional (3D) ultrasound in the prediction of endometrial receptivity during frozen-thawed embryo transfer (FET) cycles.

METHODS: A prospective study on the women (87 cycles) who received FET in stimulated and natural cycles in our hospital from October 1, 2017 to December 31, 2018. 2D and 3D ultrasound were performed in the morning of endometrial conversion day to determine endometrial thickness, endometrial pattern, endometrial peristaltic wave direction/frequency, depth of endometrial blood flow distribution, uterine artery pulsatility index (PI)/resistance index (RI)/systolic/diastolic ratio (S/D), endometrial volume, vascularization index (VI)/flow index (FI)/vascularization flow index (VFI) of endometrial spiral arteries.

CONCLUSION: Multiple indicators measured by ultrasound on the endometrial conversion day are not of sufficient accuracy to predict uterine endometrial receptivity.

RESULTS: In the 87 cases of FET, the pregnancy rate was 62.1% (54/87). The age of women, abnormal pregnancy history, infertility duration were the factors affecting the pregnancy rate. No significant difference was detected in the endometrial thickness, endometrial pattern, endometrial peristaltic wave direction/frequency, depth of endometrial blood flow distribution, uterine artery PI/RI/S/D, endometrial volume, VFI/VFI of endometrial spiral arteries between pregnant and non-pregnant women.