
COMPARATIVE STUDY OF PROSTENOON-GEEL & VAGINAL TAMPONS WITH PROSTENON SOLUTION FOR CERVICAL RIPENING AND LABOR INDUCTION

Szirko F.

Tallinn Central Hospital Women's Clinic, Tallinn, Estonia

Objective: To compare the effect of the application of Prostenoon-geel (1mg Prostenonum/dose, KEVELT Ltd, Estonia) (Pg-J) and prostaglandin solution tampons (Sol.Prostenoni spirituosa 0,1%-1ml, Estonia) (Pg-T)

Methods: During a period 1995 May - 1996 May 131 Pg-J and 63 Pg-T were used for the ripening of the uterine cervix and labor induction. The patients were divided into three groups - in the first one only the Pg-T, in the second one only the Pg-J and in the third one both - the Pg-T and Pg-J were used by various indications.

The age of the patients, parity, previous artificial and spontaneous abortions, gestational age, cervical Bishop-score, indications of prostaglandin application, mode of delivery, duration of delivery, time between the last application and onset of labor, data of newborns, hospital stay and adverse effects had been protocolled.

Results: There was no significant difference between 3 groups except the frequency of adverse effects - local itching appeared more often among Pg-T users.

Conclusion: The Prostenoon-Geel is easier to apply than the Pg-T, causes less discomfort to the patients and makes unnecessary an additional vaginal examination (removing the tampon).

FETAL CELLS IN MATERNAL CIRCULATION

Takabayashi H.¹, H.Takahashi¹, M.Ozaki¹, M.Kita¹, S.Kuwabara², T.Ukita², K.Yamafuji², K. Ikawa³

1-Division of Human Genetics, Medical Research Institute, Kanazawa Medical University, Uchinada Ishikawa; 2-Ukita Hospital, Ishikawa; 3-Ishikawa Health Service Association, Ishikawa Japan

Advances in molecular genetics have led to prenatal DNA diagnosis. Molecular geneticists are currently using either an invasive or noninvasive approach for prenatal diagnosis. The research has been focussed in the last few years on the development of non-invasive techniques which do not harm the fetus. One such approach would be to isolate fetal cells from the maternal circulation.

Several attempts have been made to detect and retrieve fetal nucleated cells including nucleated erythrocytes (NRBCs), leucocytes and trophoblasts in maternal blood. Fetal cells in peripheral maternal blood offer an alternative source for specimens to those obtained by invasive techniques such as amniocentesis, chorionic villus sampling and fetal blood sampling.

The non-invasive recovery of fetal cells has revolutionized fetal medicine and opened up the doors for its possible clinical application. Efforts are currently in the direction of enrichment as well as culturing of the fetal cells, and exploration of their further use in genetic analysis using FISH, PCR and PEP-PCR techniques.

We have developed a new method for non-invasive fetal DNA diagnosis from maternal blood(FDD-MB). We were successful in retrieving NRBCs from maternal blood using a micromanipulator and also in analyzing NRBCs on a single cell level by PCR, FISH and PEP-PCR. This new technique opens up fetal DNA diagnosis from maternal blood during the first trimester of pregnancy to the whole population because there is no risk to the fetus or the mother.