MATERIAL
&
METHODS
MATERIAL AND METHODS

The present study was conducted in the department of obstetrics and gynaecology, Maharani Laxmi Bai Medical College, Jhansi. The aim was to compare the efficacy, safety and tolerance of intra-vaginal misoprostol with the use of intra-cervical misoprostol in mid-trimester abortion. A total of 240 patients were recruited for this study. Total number of patients were divided into two study groups (of 120 each) A & B.

Patients for this study were selected from the women attending the gynae O.P.D of department of obstetrics & gynaecology and who had come for medical termination of pregnancy. They were fully counselled and were admitted in the hospital for termination.

A detailed history was taken which included the age, address, parity, socioeconomic status, period of gestation and status. Detailed history regarding the present pregnancy, including a full past obstetric history was also noted. All particulars regarding the numbers of children, their age, sex, number of previous abortion and also history of previous uterine surgery was noted. Lastly, a full family history of any chronic ailments in the patients were also enquired. Finally full consent was taken.

A complete examination of patient was done which includes –

**General examination**

- General condition
- Pulse
- Blood pressure
- Body temperature
- Respiratory rate
- Pallor
- Icterus
- Cyanosis
- Oedema
- Clubbing
- Lymphadenopathy

Systemic examination
- Respiratory system
- Cardio-vascular system
- Central nervous system

Per-abdominal examination
- To see the fundal height and look for any organomegaly, if present.

Pelvic examination
- Per speculum examination for any local pathology in vagina and cervix.
- Per vaginal examination for assessment of uterine size, mobility and to rule out pelvic pathology, if any.

Investigations included
- Hb%
- Rh typing, if necessary
- Urine routine and microscopic examination

To each case, prior to application of misoprostol or dinoprostone tetanus toxoid was given with a single dose of injectible antibiotic.
Selection criteria for study were:
1. Age 18 - 45 yrs
2. Parity 0 - 5
3. Uterine size > 12 - 20 weeks

Exclusion criteria for both groups was:
1. Uterine scar either caesarean or myomectomy.

Exclusion criteria for dinoprostone group:
1. Bronchial asthma
2. Cardiac disease

Procedure
In each patient, part was prepared, consent was taken, injection tetanus toxoid and a single shot of injectible antibiotic was given. Patient was asked to empty bladder. Pelvic examination was done under strict aseptic conditions and group A patients were applied misoprostol 400µg, 4 hourly intra-vaginally in posterior fornix in powder form by crushing the tablets. Two tablets were placed in posterior fornix in powder form. Each tablet used in study was of 200µg strength. Group B patients were applied intra-cervical dinoprostone gel (0.5 mg) 12 hourly.

All patients were monitored for cervical ripening and dilatation, uterine contractions and induction abortion interval and side effects such as bleeding per vaginum, nausea, vomiting, and fever etc. oxytocin supplementation was done as and when required in both groups.

Misoprostol was given 400µg, 4 hourly upto 3 doses and if patient did not abort after three doses, they were applied two more
doses after a rest of 8 – 12 hours. Total five doses were used for misoprostol group.

In dinoprostone group, patients were applied dinoprostone gel 0.5 mg, 12 hourly for two doses and if patient did not abort one more dose was applied after a rest of 8-12 hours. Maximum three doses of dinoprostone were used.

Following abortion, a pelvic examination was done to check completeness of abortion. The cervix was explored for any cervical injury. Incomplete abortions were managed with oxytocin drip and surgical evacuation. Patients were discharged 12-24 hours after abortion.

The trial was considered successful, when the patient aborted within 40 hours. Any case was taken as a failure if it did not abort within the above-mentioned period.