Discussion
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If the single most important criteria for selecting a technique for second trimester MTP is its safety, Ethacridine scores above all the other methods. Its other advantages are - ease of procedure, single time procedure, low cost, no medical contra-indications and antiseptic properties. But the major disadvantages are prolonged induction - abortion interval and higher failure rate. In order to overcome these disadvantages, a combination of ethacridine with prostaglandins was proposed. This is with the idea of synergism of the latter with endogenous prostaglandins released by ethacridine.

Prostaglandins, because of their potent uterotonic action at all times of gestation, have been extensively used both to induce first and second trimester abortions as well as for induction of labour. The extra amniotic route of prostaglandins has special advantage over intra-muscular route in reducing the systemic side effects e.g. vomiting, diarrhoea and also avoiding serious complications of cervicovaginal injuries. The freedom from cervical injuries may be due to cervical ripening by endogenous prostaglandin released from decidua and metreurymeter like effect of the Foley's-balloon. The single extra-amniotic dose of
carboprost reduces its systemic side effects; the cost and inconvenience to the patients.

In the present study the PG analogue used was 15-methyl F\(_{2a}\) which is stable and does not produce pyrexia, rarely causes chilling and has a higher success rate.

In this study, a total number of 120 cases of mid trimester pregnancies were taken for abortion. In 60 cases, abortion was performed by extra-amniotic instillation of emcredel along with single injection of carboprost while in rest of the cases, augmentation was done with 1/V infusion of syntocion drip 6 hours after emcredel instillation. All the cases were taken from the out patient department of Obst. and Gynae., M.T.B Medical College, Jhansi.

Maximum number of cases i.e. 67 (55.8\%) were observed in age group of 16-25 years (Table I) followed by 46 (38.3\%) in age group of 26-35 years. Only one (0.83\%) was in the group of 10-15 years of age, while 6 (5.0\%) were found to be in the age group of 36-45 years; the oldest patient being 42 years of age. These findings resemble with those reported in the literature (Nabriski et al., 1977) Bhosale et al. (1987) observed that 58.24\% patients belonged to age group of 16-20 years.
Out of 120 cases studied, there were 35 (29.1%) primi-gravida and 29 (24.2%) third gravida (Table III). When compared with the studies by Kama et al. (1980) it was found that majority of patients who came for mid-trimester abortions in his study were third gravidas (32.6%).

A higher incidence of primi-gravidas in our study had illegitimate pregnancy. These observations could be due to poverty and illiteracy and lack of awareness in this region. The induction abortion interval was found to be less in multiparous women in Group A as compared to Group B (Table VB). Multiparous women had a lower incidence of incomplete abortions.

The reduced induction abortion interval observed in our study in Group A can be explained by hypothesizing that ethacridine lactate has a cervical priming effect. This effect is probably due to release of endogenous prostaglandins from the decidua which ethacridine induces. This primary action is best observed 6 hours after ethacridine instillation and permits optimal synergism between the cervical ripening effect of ethacridine lactate and the uterine contractility induced by the prostaglandin analogue. This ensures a decreased induction abortion interval and a decreased risk of uterine hypertontous in
second trimester abortions. Studies by Kher R.A., Ingle M.K. et al. have also revealed similar type of results.

In the present series, maximum number of cases [72 (60.0%)] were seen during 18-20 weeks of gestation while minimum number [11 (9.1%)] were seen during 13-14 weeks of gestation. This is mainly due to unawareness in primi-gravidas and lack of decision making in multi-gravidas (Table III). It was also found that out of a total of 120 patients, 77 patients (64.1%) belonged to low socio-economic status while 39 (32.5%) were in middle socio-economic groups (Table IV) indicating the fact that increased mid-tri abortions in low socio economic status were mainly due to illiteracy. These findings were similar to the results obtained by other researchers (N. Wilquist, 1986) who reported that about 68.4% patients in his study belonged to low socio-economic status.

Extra-amniotic instillation of emeredil with carboprost has significantly shortened the induction abortion interval in the present series. Majority of patients [47 (78.3%)] aborted within 24 hours in group A while 19 (31.5%) patients aborted within 24 hours in group B (Table V). Overall success rate was 100% in group A as compared to 96.6% in group B (Table VI).
Cases were considered successful when abortions were achieved within 72 hours. Average induction-abortion interval was 18 hrs 20 min. with the use of ethacridine-carboprost combination while it was 32 hrs 10 min. with ethacridine-syntocinon combination (Table V). There was statistically significant difference in the mean induction abortion interval. \( p < .01 \)

These results are compared with those obtained by other workers. A study by Kher A.R. and Daftary N. showed a success rate of 93.2% in ethacridine-carboprost group with average induction abortion interval of 18 hrs 30 min.

In our study quite encouraging results were achieved. Only 2 patient failed to abort within 72 hours in group B where hysterotomy was performed. There was not a single case of failure when carboprost was used in combination with ethacridine.

No serious complications were encountered in both the groups except in one case of group A, where after abortion silent uterine rupture with broad ligament haematoma was discovered during tubectomy. This was mainly due to patients in compliance whereby intravenous syntocinon was used along with this method which accelerated the effect of carboprost resulting in silent rupture.
Gastro-intestinal symptoms were observed in 4 cases in group A which were treated accordingly (Table IX).

Pyrexia was not much of the observed problem. There was only slight rise of temperature upto 38°C which settled on its own within 6-8 hours without any therapy. Total incidence was 5.1% and it was almost same in both the groups. Similar results have been reported by other workers (J.N. Martuni and M. Hygdeman, 1989), who observed incidence of pyrexia to be 7.4% with emcridil-carboprost combination.

Incidence of incomplete abortion was 13.3% in group A while it was only 10% in group B. Digital removal of retained placental pieces was done in most of the cases but in a few cases, surgical evacuation under I/V syntocinon infusion was needed. A study by Kher, A.R. had shown an incidence of incomplete abortion as 16.8%.

No case of cervical or perineal tear was observed in the present study. Karim and Sharma had reported a single case of cervical tear in their study in 1988 which was stitched and later patient made an ineventful recovery.
The patient's acceptance of this procedure was excellent; the side effects were less with extra-amniotic route and they were outweighed by the rapid abortion time, mild contractions and ease of administration. The low cost and minimum inconvenience makes this a promising procedure for second-trimester abortions.