

EVALUATION OF THE EFFICIENCY OF SYNCHRONIZATION PROTOCOLS OF BOVINE EMBRYOS RECIPIENTS FOR TETF USING ESTRADIOL BENZOATE OR ESTRADIOL CYPIONATE.

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The aim of the present experiment was to verify the effect of the administration of estradiol benzoate (BE) or estradiol cypionate (CE) as ovulation inductor in four different protocols for embryo transfer in fixed time. 168 crossbred heifers (*Bos Indicus* x *Bos taurus*) that kept grass with a corporal condition of 3,5 (1-5) in average belonging to the Unopar Experimental Farm in Tamarana, Paraná had been used. The animals had been divided in four homogeneous groups (factorial 2x2) in accordance with the used protocols. The experiment was carried out in two stages, the first one in August of 2005 and second stage in March of 2006, being synchronized 96 and 72 animals respectively. All animals received an intravaginal device (DI) impregnated with 1,9g of natural progesterone (P4) (CIDR[®], Pfizer, Brazil) and 2 mg of estradiol benzoate (Estrogin[®], Farmavet, Brazil) in day 0. In the D8 the DI withdrawal was applied and 0,15mg of D-cloprostenol (Preloban[®], Intervet, Brazil) was administered via intramuscular (IM). The groups BE and CE had respectively received 1mg of Benzoate Estradiol (BE) and 0,5mg of Estradiol Cypionate (CE, ECP[®], Pfizer, Brazil) IM in D8. Groups BE24 and CE24 received 1mg of BE and 0,5mg of CE IM 24 hours after DI withdrawal (D9). After 17 days of the device insertion the recipients was evaluated through transrectal Ultrasonographie (500 ALOKA SSD, Transducer 5 Mhz). The animals that had presented Corpus Luteum (CL) with a diameter above 18mm had received embryo in fixed time. A total of 132 embryos (fresh, freeze and of PIV) had been transferred in the two stages of the experiment, which had been homogeneous distributed between the groups. The precocious pregnancy diagnosis was carried out 30 days after the embryo implantation. The average of recipients that presented CL \geq 18mm was the following one: BE = 73%, CE = 76%, BE24 = 85% and CE24 = 78% ($P > 0,05$, qui.square test). The pregnancy rate of the groups BE, CE, BE24 and CE24 was respectively 23%, 41%, 33% and 39% ($P > 0,05$). The use of BE and CE in the day of the DI withdrawal and 24 h after its withdrawal was efficient in synchronizations rate of recipients of bovine embryos. The use of ovulation inductors in the day of the DI withdrawal represents a good alternative, because it can reduce the number of animals handling. On the other hand, although no significant difference could be observed in the pregnancy rate between the groups, new experiments must be carried through to confirm these data.