

## References on the Administration of Deoxycorticosterone Using ALZET<sup>®</sup> Osmotic Pumps

**Q9022:** M. Tian, *et al.* Adiponectin attenuates kidney injury and fibrosis in deoxycorticosterone acetate-salt and angiotensin II-induced CKD mice. American Journal of Physiology Renal Physiology 2018;315(3):F558-F571

Agents: Angiotensin II; Deoxycorticosterone acetate Vehicle: Saline; Route: SC; Species: Mice; Pump: 1002; Duration: 3 weeks;

**ALZET Comments:** Dose (1 ng/min/g); animal info (Transgenic Mice); Blood pressure measured via taill cuff method;120 mmHg - 145 mmHg;Angiotensin II aka Ang II, Deoxycorticosterone acetate aka DOCA; dependence;

**Q6066:** D. J. Morris, *et al.* Glucocorticoids and gut bacteria: "The GALF Hypothesis" in the metagenomic era. Steroids 2017;125(1-13

**Agents:** Chenodeoxycholic acid, progesterone, 11b-hydroxy-, corticosterone, deoxy-, corticosterone, 3α,5α-TH-, progesterone, 3α,5α-TH-11β-hydroxy- **Vehicle:** Not Stated; **Route:** SC; **Species:** Rat; **Pump:** Not Stated; **Duration:** Not Stated; **ALZET Comments:** steroidal derivatives of corticosterone; Review presents the role of gut microbial metabolism of endogenous adrenocorticosteroids as a contributing factor in the etiology of essential hypertension.

**P3238:** M. J. Lobo, *et al.* Effect of chronic intravenous injection of steroid hormones on body weight and composition of female rats. Biochem. Molec. Biol. Intl 1993;29(2):349-358

**Agents:** Progesterone; Cortisol; Cortisone; Corticosterone; Dehydroepiandrosterone; Androstenedione, 4-; Androstendiol, 5-; Testosterone; Nortestosterone, 19-; Estradiol, B-; Estrone; Estriol; Deoxycorticosterone **Vehicle:** PEG 400; **Route:** IV (lower cava); **Species:** Rat; **Pump:** 2002; **Duration:** 15 days;

**ALZET Comments:** controls received mp with PEG; no stress (see pg. 351); pumps placed into peritoneal cavity and sutured to musculature; surgical wound sprinkled with sulphathiazol

**P0612:** R. Phillips, *et al.* Effect of mineralocorticoids and glucocorticoids on compensatory adrenal growth in rats. American Journal of Physiology Endocrinology and Metabolism 1985;248(4):E450-E456

**Agents:** Aldosterone; Fluorocortisol acetate, 9a-; Corticosterone; Deoxycorticosterone; Dexamethasone **Vehicle:** Ethanol; Propylene glycol; Water; **Route:** SC; **Species:** Rat; **Pump:** 2001; **Duration:** 3 days;

**ALZET Comments:** replacement therapy (unilateral adrenalectomy); each mp used twice, 3 days in one animal, then 3 days in another; cannot tell if stability/concentration of ald. determined by RIA before or after exp

**P0194:** P. Komanicky, *et al.* Hypertensinogenic potencies of aldosterone and deoxycorticosterone in the rat. Hypertension 1982;4(1):140-145

Agents: Aldosterone acetate; Deoxycorticosterone acetate Vehicle: Ethanol; Propylene glycol; Water; Route: SC; Species: Rat; Pump: 1701; Duration: 3 weeks;

ALZET Comments: additional pump implanted after 7 and 14 days adjacent to the 'spent' pumps

**P0182:** J. Carroll, *et al.* The relationship between plasma 18-hydroxy-11-deoxycorticosterone levels and production of hypertension in the rat. J. Steroid Biochem 1981;14(989-995

Agents: Deoxycorticosterone, 18-OH-; Deoxycorticosterone acetate, 11- Vehicle: Ethanol; Propylene glycol; Water; Route: SC; Species: Rat; Duration: 3 weeks; 2 days;

ALZET Comments: Pumps replaced on days 7 & 14 in Exp. 1

**P0140:** J. Carroll, *et al.* 5a-dihydro-11-deoxycorticosterone: effect on blood pressure in the rat. Steroids 1981;37(1):111-120 **Agents:** Deoxycorticosterone acetate; Deoxycorticosterone acetate, 11-; Deoxycorticosterone, 5a-dihydro-; Deoxycorticosterone, 5a-dihydro-11- **Vehicle:** Ethanol; Propylene glycol; **Route:** SC; **Species:** Rat; **Duration:** 7 days; **ALZET Comments:** no comment posted

## ALZET<sup>®</sup> Bibliography



**P0061:** P. C. Will, *et al.* Polyethylene glycols as solvents in implantable osmotic pumps. Journal of Pharmaceutical Sciences 1980;69(6):747-749

**Agents:** Aldosterone; Corticosterone; Deoxycorticosterone acetate; Dexamethasone acetate; Estradiol, 17B-; Hydrocortisone; Progesterone; Spironolactone; Testosterone **Vehicle:** PEG; PEG 400; PEG 600; **Route:** IP; **Species:** Rat; **Pump:** 1701; **Duration:** Not Stated;

ALZET Comments: 3-7 days aldosterone, 6 days PEG only; replacement therapy (adrenalectomy)