

- 1990;1
- 2 秦金山,王 莉,牛德水等. 枸杞同源四倍体新物种类型的建立. 遗传学报,1985;12(3):200
- 3 贾敬芬,谷祝平,郑田昌. 百合花丝组织培养及其细胞学观察. 植物学报,1981;23(1):17
- 4 陈素萍,王 莉,宋秀清. 党参多倍体育种的研究. 中草药,1991;22:224
- 5 裴新澍编著. 多倍体诱导与育种. 上海科学技术出版社,1985:95

## Studies on the Breeding of Autotetraploid of *Salvia miltiorrhiza* Bunge

Gao Shanlin, Xu Deran, Cai Zhaohui, Zhu Danni

Department of Genetics and Breeding

A study of inducing polyploidy of *Salvia miltiorrhiza* Bunge in the process of tissue culture was made. The results indicated that it was an effective way to add 10—50 ppm colchicine in MS medium in tissue culture for inducing polyploidy. The chromosome of obtained plantlets was determined by microscopic observation. Four lines were autotetraploid plants. After repeated chromosomal determinations for three times, the four lines were transplanted in the fields for identification and observation in agronomic characteristics. The obtained information demonstrated that these lines showed the typical characters of tetraploid plant. The main chemical constituent in root of tetraploidy was significantly higher than that in original plant. It is hopeful to develop new varieties of *S. miltiorrhiza*.

**Key words** *Salvia miltiorrhiza* Bunge; Tissue culture; Polyploidy

【文摘 039】大鼠结扎左冠脉后全心性去甲肾上腺素和腺苷三磷酸的耗竭 荣 沛,戴德哉,张姣娥. 中国药理学报,1992;13(4):333

结扎大鼠左冠脉的心梗模型,观变心肌内 NE 和 ATP 的排空,梗死区中二者的排空均呈双相性。NE 的排空速率常数为  $K_1=0.71\text{ h}^{-1}$  和  $K_2=0.015\text{ h}^{-1}$ ; ATP 排空速率常数为  $K_1=0.52\text{ h}^{-1}$  和  $K_2=0.016\text{ h}^{-1}$ 。非梗死区 NE 的排空呈单相而持久,速率常数为  $K_3=0.018\text{ h}^{-1}$ ; ATP 的排空呈一过性。普萘洛尔及维拉帕米均可改善 NE 和 ATP 的耗竭。

【文摘 040】尼群地平合成的化学动力学 翁元凯,黄 山,盛以虞,马继革. 中国医药工业杂志,1992;

23(8):344

以无水乙醇或甲苯为反应介质,用  $\beta$ -氨基巴豆酸甲酯和间硝基苯亚甲基乙酰乙酸乙酯合成尼群地平为二级反应,速度常数分别为  $2.76\times 10^{-1}$  和  $3.90\times 10^{-2}\text{ L}\cdot\text{mol}^{-1}\cdot\text{min}^{-1}$ 。

【文摘 041】沙参类的研究 II. 多糖的含量测定 屠鹏飞,徐国钧,徐珞珊,金蓉鸾. 中草药,1992;23(7):355

应用分光光度法测定 28 种(亚种、变种)沙参类药材的多糖含量。展枝沙参等 10 种沙参中多糖含量高达 50% 以上,为沙参类药材的品质评价提供了依据。