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Figs. 1 and 2 at the end of the issue.

Lamb, C. J., Beachy, R. N. (ed.): Plant Gene Transfer. UCLA, Symp. Molec. and Cellul. Biology. New Ser., Vol. 129. Wiley-Liss, New York–Chichester–Brisbane–Toronto–Singapore 1990. 345 pp. ISBN 0-471-56739-6

The new volume of traditional UCLA Symposia on Molecular and Cellular Biology summarizes proceedings of the Symposium on Plant Gene Transfer held at Park City, Utah April 1–7, 1989. The numerous authors deal with a wide range of different fields of plant molecular biology, represented by individual chapters in the book; Transformation, Gene Isolation, Gene Regulation, Receptors and Signal Transduction, Protein Engineering and Targeting, Engineering Stress Resistance and Metabolic Engineering. Each chapter comprises four to five contributions bringing the newest information in the respective fields. Several contributions describe new techniques and strategies as *e.g.* transformation technologies (Cao *et al.*), strategies for physical mapping of complex genomes (Evans and Evans) or for transposon tagging (Baker and Hehl), strategies for modifying plant lipid composition (Browse *et al.*), for engineering a new flower colour in Petunia (Meyer *et al.*), for targeting to subcellular organelles as vacuoles (Tague *et al.*) or mitochondria (Schmitz *et al.*) and use of antisense RNAs in physiological studies (Rothstein *et. al.*, Cannon *et al.*). The results of studies of several important physiological processes are reported. Using transgenic *rin* mutants of tomato Giovannoni *et al.* showed, that expression of polygalacturonase gene is not sufficient for the completion of ripening process. In studies of plant defense genes homologies in promoters of genes for chalcone synthase and phenylalanine-ammonia lyase were found (Dixon *et al.*). Partial purification and identification of fusicoccin receptor is reported (Weiler *et al.*) as well as structure of site I auxin-binding site from corn (Palme *et al.*). In this material presence of ras- and YPT-related genes coding for GTP-binding proteins was demonstrated. An interesting approach to obtain heavy metal resistant plants by introducing gene for human metallothionein II is reported by Misra and Gedamu.

The first chapter on transformation is closed by a discussion summary. I find it a very good idea and it is a pity, that it was not done also in the other chapters.

The contribution by J. E. Mullet on Reversible Inhibition of Hypocotyl Growth in Soybean Seedlings Exposed to Water Deficit, although very interesting, does not seem to match the book content.

The new volume of UCLA Symphosia brings broad, highly professional information on new achievements and possibilities in the field of plant gene transfer. As such, it will be very useful for all research workers in this field.

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