

### Thursday Evening, December 11, 1986

The thirty-sixth annual banquet was held in the Aztec Room of the Hershey Lodge, Hershey, Pennsylvania.

On behalf of the Society, the research award was presented to Dr. Dennis Stimart, Department of Horticulture, University of Wisconsin at Madison by Dr. Paul Smeal.

Dr. Leonard P. Stoltz made the following IPPS Eastern Region Award of Merit presentation:

#### AWARD OF MERIT

Our Award of Merit recipient came from a family of small farmers. His life upholds the old adage "You can take the boy away from the farm, but you can't take the farm away from the boy!"

After graduation from high school he entered the army and spent 3 yr in Europe where he became an expert in artillery, travel, and poker—his expertise, however, was not necessarily in that order. With 3 yr of expertise behind him in dealing with numbers and juggling the probabilities of poker he decided to enter Ohio University in 1946 to become an accountant. Upon graduation in 1949 he decided not to become an accountant but entered Stanford Graduate School of Business and graduated in 1951. Being an inveterate gambler and wanting to play for higher stakes but with someone else's money he joined a Wall Street firm as an investment counselor. After 10 years in this position he left to become manager of the Personal Investment Division of another Wall Street firm.

In 1964 the frustrations of picking the right stocks, selling out the unproductive ones, and the volatility of the Wall Street market induced our Awardee to search for a new profession—he longed to get back to the farm and experience **the sedate life** of the nurseryman farmer. In late 1965 he put a binder on a piece of farm land and in July, 1966 he said goodbye to Wall Street, packed up his family, and moved to the country.

Our Awardee joined our Society as a junior "partner" at the 1966 meeting in Newport. He was so impressed and enthused by the events of this meeting that, much to the distress of his family, on that Christmas eve he was "Ho-Ho-Hoing" and sticking cuttings under an electric light in his first real propagating house.

With this new beginning and with a small number of stocks our Awardee found he was still trying to pick winning stocks, trying to accumulate more of them (through propagation), still trying to sell off the unprofitable ones, and he still had to contend with the volatility of the marketplace. He has since come to realize that in his new profession he now has another unpredictable variable to contend with—Mother Nature. Paradoxically, the vicissitudes of Wall

Street kept him constantly frustrated and unhappy while similar problems and uncertainties of the professional propagator have provided him the quietude and satisfaction he was seeking.

Our Awardee is not above insider trading, in fact, he has participated in it each year, willingly trading stock or information with his fellow insiders at these meetings. Through this insider trading he was able to accomplish a very successful merger. He has merged the boy, the farm, and business to produce an outstanding professional propagator.

Ladies and Gentlemen I present to you the 1986 Eastern Region IPPS Award of Merit recipient, James (Jim) E. Cross.

### **Friday Morning, December 12, 1986**

The Friday morning session convened at 8:00 a.m. with Peter Vermeulen serving as moderator.

## **CYTOKININ CONSUMPTION BY MICROPROPAGATED SHOOTS**

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**Abstract.** When shoots of *Actinidia kolomikta* were cultured on a basal medium supplemented with 30  $\mu\text{M}$   $\text{N}^6$ - $(\Delta^2$ -isopentenyl)adenine ( $i^6\text{Ade}$ ), cytokinin was rapidly consumed from the medium at a rate corresponding to  $100\pm 23$  nanomoles  $i^6\text{Ade}$  per g FW per day. At the same time, zeatin ( $i^0\text{Ade}$ ) was excreted into the medium where it reached a level of approximately 8  $\mu\text{M}$  during 10 days of incubation. Rates of  $i^6\text{Ade}$  consumption, expressed as nanomoles consumed per g FW per day, for shoot cultures of other species were as follows: *Actinidia arguta*,  $160\pm 23$ ; *Magnolia*  $\times$  *soulangiana*,  $18\pm 3$ ; *Metasequoia glyptostroboides*,  $120\pm 43$ ; *Nicotiana tabacum*,  $33\pm 8$ ; *Paulownia coreana*,  $130\pm 30$ ; *Sassafras albidum*,  $53\pm 11$ ; *Syringa*  $\times$  *hyacinthiflora*,  $62\pm 10$ . Based on these consumption rates, one can expect that if one uses standard procedures for micropropagation (e.g. 30  $\mu\text{M}$   $i^6\text{Ade}$ , 20 ml per tube), the medium will become totally depleted of cytokinin within about 3 to 10 weeks depending on the species.

## **INTRODUCTION**

Because cytokinin treatments are fundamental to micropropagation by shoot multiplication (1,4,7), improvements in technology will undoubtedly depend on advances in the basic understanding of these important phytohormones. During the last 3 yr, we have taken