FIFTH SYMPOSIUM ON PARASITIC WEEDS

The Fifth Symposium on Parasitic Weeds is scheduled for June 24-30 at the Safari Park Hotel in Nairobi with a field trip to Lake Victoria and intermediate stops. The program is full and this should be the largest and one of the most interesting of any of our symposia! For further information, contact:

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The tentative program is as follows: Session 1 taxonomy/ecology (14 papers); Session 2 morphology/structure (7); Session 3 physiology/biochemistry (6); Session 4 germination (7); Session 5 economic impact (11); Session 6 resistance (17), in addition to posters and the field trip there are two invited papers and the meeting of the African Striga Network (PASCON). It will be a busy and informative meeting!

NEW RECORD OF ALECTRA VOGELII IN TANZANIA

Alectra vogelii, a hemi-parasitic weed of leguminous crops, was observed for the first time during the 1988/89 season in national trials at Hombolo Research Station. The parasite infested cowpeas. During the same season, A. vogelii was reported on farmers fields at Nalien-

de in southern Tanzania. The parasite has large yellow flowers, 10-15 cm across and a coffee shaped stigma. In the 1989/90 crop season preliminary observations were made on trials sown at the same location. Severe A. vogelii infestation was observed on cowpea Uniform Yield Trial, with the range from 94 to 287 A. vogelii per plant. In Tanzania, early Cowpea Maturing Variety Trial range was from 20-242 A. vogelii per plant. Groundnut planted about 200m from A. v. infested plots were free of the parasite. A. vogelii has already been reported in some countries south of the Sahara viz. Zimbabwe, Botswana, South Africa, Burkina Faso, Mali, Egypt and Ethiopia. The hemi-parasite has been reported to have a wide range of hosts which include cowpeas, groundnuts, bambara gourds, fodder legumes, pigeon peas and mung beans.

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MORE MONEY PROBLEMS FOR HAUSTORIUM!

We still do not have a sponsor for our newsletter! In an era witnessing the demise of donor agency projects, federal and state financial stringency and university budget cuts, are thankful that we can produce this issue with miscellaneous residual funds. But it may be last! Can any one help?

LITERATURE
Bharathalakshmi, C. R. Werth and L. J. Musselman. 1990. A study of genetic diversity among host specific populations of the witchweed *Striga hermonthica* (Scrophulariaceae) in Africa. Plant Systematics and Evolution 172: 1-12. (There was greater genetic diversity between geographically separated populations than between host specific populations as determined by allozymes.)


Chessin, M. and Z. E. Zipf. 1990. Alarm systems in higher plants. The Botanical Review 56: 193-235. (Dwarf mistletoes are briefly mentioned but an alarm system is not involved because the initial insult is not to be a result that part of the plant has much higher temperature.)

dePamphilis, C. W. and J. D. Palmer. 1990. Loss of photosynthetic chlororepiratory genes from the plastid genome of a parasitic flowering plant. Nature 348(6299): 337-339 + cover. (The plastid genome of *Epifagus virginiana*, a common member of the Orobanchaceae of Eastern North America, has lost most, if not all, of the 30 or more chloroplast genes for photosynthesis as well as other genes. This is in remarkable contrast to the chloroplast of *Striga asiatica* which has a typical complement of genes.)


Gauslaa, Y. 1990. Water relations and mineral nutrients in *Melampyrum pratense* (Scrophulariaceae) in oligo- and mesotrophic boreal forests. *Acta Oecologia* 11(4): 525-537. (The parasite had a higher conductance for water in nutrient poor soil compared to more mesic areas. This may enable the parasite to capture more of the host’s nutrients.)

Gauslaa, Y. and A. M. Odasz. 1990. Water relations, temperatures, and mineral nutrients in *Pedicularis dasyantha* (Scrophulariaceae) from Svalbard, Norway. *Holartic Ecology* 13: 112-121. (The transpirational rate of *P. dasyantha* was almost twice as high as *Dryas octopetala*, the most frequent host. Interestingly, the dense pubescence on the inflorescence is thought to reduce transpiration and as a result that part of the plant has much higher temperature.)


Enepper, D. A., R. A. Creager and L. J. Musselman. 1990. Identifying dodder seed as contaminants in seed shipments. Seed Science and Technology 18: 731-741. (Cuscuta dodder, seeds are some of the most frequent contaminants of commercial seed shipments. This study described the differences in seed structure among the three subgenera. Figure 3 is mislabelled.)

Untersuchungen vom Archeuthobiurn importaut relationship Striga - Arten Vergleichende Phytochemistry.


Krause, D. and H-C. Weber. 1990. SEM observations on seeds of Striga spp. and Buchnera americana (Scrophulariaceae). Plant Systematics and Evolution 170: 257-263. (The purpose of the research was to elucidate the relationship between Striga and Buchnera. Seven Striga species were examined but only one of Buchnera).


Parker, C. and T. I. Polniaszek. 1990. Parasitism of cowpea by Striga gesnerioides: variation in virulence and discovery of a new source of host resistance. Annals of Applied Botany 116: 305-311. (Samples cowpea from West Africa exhibit different degrees of virulence. A cowpea line from Botswana was resistant to all parasites to which it was exposed).

Pate, J. S., J. Kuo and N. J. Davidson. 1990. Morphology and anatomy of the haustorial root parasite Olax phyllanthi (Olacaceae), with special reference to the haustorial interface. Annals of Botany 65: 425-436. (This is one of the most detailed descriptions of the haustorial interface).


(Continued on following pages)


Sprich, H., J. Sauerborn and W. Koch. 1990. (The solarizing effect of sprayable films.) Zeitschrift für Planzenkrankheit und Pflanzenschutz 12: 455-461. (None of 12 films tested were as effective as polyethylene. Eight significantly reduced *O. crenata*, only one reduced *S. asiatica*).

Uotila, P. 1990. *Orobanche crenata* in Helsinky Botanical Garden. *Lutukka* 6: 125-126. (*Orobanche crenata* is seldom found as far north as Finland so it was surprising to discover it in September on broadbeans, apparently introduced with its host).
