



V4.N1.1979

President Les Matthews was injured in an automobile accident in Rome last November. While Les quickly recovered from broken bones and bruises complications soon developed in the form of detached retinas in both eyes. Les' life since has been one of long stays in hospitals, surgery, uncertainty, and extreme frustration. At times it was thought that both eyes might be lost, and so it has gone since November. Just today (July 2) the Secretariat received word from Chris Parker at the Weed Research Organization in England that Les had paid a visit to WRO on a brief leave from a London hospital. Les was in good spirits and his energetic self. One eye has been saved, the other is questionable. We are sure all the members join us in wishing Les the very best and an early return to the battle against weeds.

IWSS CONFERENCE CANCELLED

In the last newsletter it was announced that plans were being made for an international weed control conference in Rome in 1981. Planning meetings were held, programs discussed, and budgets prepared. Support from FAO and regional societies was secure. After President Matthew's accident conference plans became uncertain. Days, weeks, and months went by. The newsletter was held up in hopes that a firm announcement could be made. When it became clear that President Matthews would not return to work in time to organize the Rome Conference a search was started for an alternate location. The search has been unsuccessful and plans for the conference have been cancelled for an indefinite period.

IWSS VICE PRESIDENT

It is time to identify a new Vice President for IWSS. According to our Constitution the President and Vice President will serve two year terms. Dr. Marvin Schreiber will soon assume the duties of President of IWSS. The assistance of every member is requested to help find the best person for this important office. Will you please send your suggestions to the Secretariat. In doing so please try to name people who are not only able but <u>willing</u>. Since the Secretariat and incoming President are located in the United States it is hoped that someone from another area can be elected. Ballots will be sent as soon as possible.

AQUATIC PLANT DATA SYSTEM NOW ON STREAM

A massive, computerized, 10,000-item collection of aquatic weed literature and information, one of the most extensive such data resources found in one location, has been designed and readied to respond to inquiries and requests.

The predominantly English language material, collected from references worldwide by staff at the University of Florida / USA and cataloged under the guidance of International Plant Protection Center Aquatic Weed Program director Dr. George Allen, falls into 15 categories such as biocontrol, chemical control, and plant species.

The system can be directed to print out bibliographic references for an entire cateogry or to cross reference two categories, e.g., chemical control and a particular plant species.

Cataloged material pertains to freshwater macrophytes only and excludes algae and marine plants. The system does not provide abstracts.

Items in the collection include texts, papers, articles, and material from leading international journals and periodicals, as well as relevant leaflets, plus other sources. The majority of printed matter is stored at IPPC/Florida. An average of between 15 and 50 new items have been received, cataloged, and entered into the system each week, according to Mimi Monsour, information specialist with the program.

"We are ready to provide bibliographies (printouts) and material in response to requests," Ms. Monsour said. "However, requestions need to be quite specific and, initially, limited to two questions," she added.

There is no cost for using the service which is supported in part by the U.S. Agency for International Development/Oregon State University weed systems contract coordinated by the International Plant Protection Center.

To request category lists and obtain further specifics of the service, write: Information storage and Retrieval System, IPPC Aquatic Weed Program, 3103 McCarty Hall, University of Florida, Gainesville, FL 32611 / USA. (From: IPPC INFOLETTER No. 38, November 1978, International Plant Protection Center, Oregon State University, Corvallis, OR 97331 / USA.)

International Weed Science Society Secretariat • Oregon State University • Corvallis, Oregon 97331/USA

NEWS OF OTHER SOCIETIES

The WEST AFRICAN WEED SCIENCE SOCIETY (WAWSS) has been formally established. The inaugural meeting of the Society was held on 20 September 1978 in Dakar, Senegal under the chairmanship of Mr. Les Matthews, President of IWSS.

At the Dakar meeting, the Society adopted as a working document, a draft constitution prepared by a Steering Committee mandated to do so in an earlier meeting held at Ibadan, Nigeria in July 1978. The Society had identified a range of objectives, and is out to encourage and promote the development of weed science and weed control technology throughout West Africa. It plans to promote communication among weed scientists and disseminate information in weed science through the organization of conferences, symposia, workshops and training programs. Thirty-three weed scientists registered as Foundation members during the Dakar meeting and elected Dr. I.O. Akobundu as President. Address: IITA, P.M.B. 5320, Ibadan, NIGERIA.

The INDIAN SOCIETY OF WEED SCIENCE held its Annual Conference at Parbhani in January 1979 and is making plans to host the 8th ASIAN PACIFIC WEED SCIENCE SOCIETY Conference at Bangalore in 1991.

"Now 'tis the spring, and weeds are shallow rooted; Suffer them now and they'll o'ergrow the garden." William Shakespeare, King Henry VI



The EUROPEAN WEED RESEARCH SOCIETY held a General Assembly in November 1978 on the occasion of the British Crop Protection Conference - Weeds in Brighton, UK. The President, Dr. Pfeiffer reported a very secure financial situation and announced that for an experimental period of two years (i.e. 1979 and 1980) all members of the society would receive the journal WEED RESEARCH free of charge. Membership of the Society currently costs 16 F Swiss. There are arrangements for paying subscriptions to EWRS (and simultaneously to IWSS) in Swiss, French, German or Dutch currency. For details contact the Treasurer Mr. P. Hermant, COLUMA, 8 Avenue du President Wilson, 75116 - Paris, FRANCE.

The WEED SCIENCE SOCIETY OF THE REPUBLIC OF CHINA has been established. At its first annual meeting held in the National Taiwan University in July 1978, Dr. Yuh-Lin Chen of the University was elected chairman. Address (temporary): Pesticide Chemistry Laboratory, Department of Agricultural Chemistry, National Taiwan University, Taipei, TAIWAN.

COMALFI, THE COLOMBIAN WEED SCIENCE AND PLANT PHYSIOLOGY SOCIETY, held its llth successful annual meeting in Medellin. Wilson Piedrahita was elected as the new President and Roberto Gomez is now the editor of the quarterly journal, REVISTA COMALFI. Membership to COMALFI, including a subscription to the journal are US\$15.00 annually. Write to COMALFI, A.A. 29688, Bogota, COLOMBIA.

The WEED SCIENCE SOCIETY OF ISRAEL held its 7th meeting in February 1979. Among the works presented in these meetings were studies on the biology and life cycles of troublesome weeds such as <u>Prosopis</u> <u>farcata</u>, <u>Euphorbia prunifolia</u>, <u>Cuscuta</u> sp. and <u>Sorghum halepense</u> as well as studies on various physiological aspects related to herbicide activity and plant resistance. In the session devoted to orchards, several papers dealt with glyphosate performance, whereas diclofop-methyl was a prominent subject in the session devoted to weed control in agronomic crops. Studies which for the first time publically summarized the work in Israel with the new herbicides, fluridone and phenisopham, were presented. Several papers dealt with fluridone performance in cotton and other crops and its effect on nutsedge; phenisopham works involved post emergence activity in cotton. Other works presented were on interaction between herbicide and plant diseases, effect of dust on the activity of post emergence herbicides, weed control by thermal disinfection achieved by plastic mulching and various aspects of chemical and biological weed control in agricultural crops.

The abstracts of the 7th Conference of the Weed Science Society of Israel were published in Hebrew. An English publication of these abstracts will be published in the near future. During this conference, the Weed Science Society of Israel held its General Meeting and voted a new Managing Committee. Dr. E. Koren of Palimport Ltd., was elected as new Chairman of the Society and the new address will be Box No. 13 Tel Aviv, ISRAEL.

> "Bowed by the weight of centuries he leans Upon his hoe and gazes on the ground, The emptiness of ages in his face, And on his back the burden of the world. Edwin Markham, <u>The Man with the Hoe</u>



A new <u>ARAB PLANT PROTECTION SOCIETY</u> was established last April at the University of Aleppo, Syria, with membership from various Arab countries in the disciplines of Weed Science, Plant Pathology, Entomology and other Plant Protection areas. The steering committee which drafted the By-laws was composed of plant protection specialists from the American University of Beirut, and the University of Jordan. The first Executive Committee elected was composed of Dr. G. Hariri (Entomologist, Syria) - president; Dr. W. Abu-Gharbieh (Nematologist, Jordan) - Vice president; Dr. G.M. Adel (Entomologist, Iraq - Secretary/ Treasurer; Dr. M. Basri (Plant Pathologist, Morocco) - Member; and Dr. A.R. Saghir (Weed Scientist, Lebanon). The first Arab Plant Protection Conference will be held in Baghdad, Iraq in 1981. Address: Dr. A.R. Saghir, Faculty of Agriculture, American University of Beirut, Beirut, LEBANON.

NEW BOOKS

Le Desherbage des cultures tropicales (Weed control in tropical crops) by Jacques Deuse and E.M. Lavabre surveys the principles of chemical weed control in the tropics and provides a useful summary of herbicide recommendations with particular relevance to West Africa where herbicide use is developing rapidly. The use of spinning disc "CDA" sprayers receives particular emphasis. It is hoped than an English edition may be available in due course. The book is published by G.P. Maisonneuve et Larose, 15 Rue Victor Cousin, 75005 Paris, and costs 112 francs.

<u>Modern Weed Science - in the tropics and sub-tropics</u> by O.P. Gupta and P.S. Lamba should prove an admirable textbook for students in India and other developing countries. It provides a very thorough grounding in the principles of weed control and herbicide physiology and summarizes the possibilities for herbicides in a wide range of crops and other situations. At the same time it emphasizes the need for a proper balance between chemical and non-chemical methods. It is a well presented volume from Today and Tomorrow's Printers and Publishers Desk, Bandhu Gupta Road, New Delhi 11005, INDIA. Cost is US\$25.00 or Rupees 125.00.

<u>Grundlagen der Unkrantbekampfung</u> (Principles of Weed Control) by W. Koch and K. Hurle. This 207-page paperback textbook is very well reviewed by "Weed Abstracts". It covers the fundamental principles of weed biology and ecology, the importance of weeds in terms of competition and economic losses, and methods of weed control and prevention. Details of herbicides and their use are based on those compounds registered for use in the German Federal Republic. The review ends "The attraction of this book lies in concise presentation without simplification and it can only be a matter of time before this formula for such handbooks is emulated. Meanwhile the authors are to be congratulated for the lead they have given." The book is published by Verlag Eugen Elmer (UTB) for DM 16.80.

<u>A bibliography on associated cropping</u>, "Les Cultures Associaes", was published by IRAT (Institut de Recherches Agronomiques Tropicales et des Cultures Vivrieres) 110, Rue De L'Universite, 75340, Paris, FRANCE. It contains 1033 references with abstracts in English or French. The index and overall organization are excellent and there are more than 20 references to weed control in associated cropping systems. Publication date was 1977. There are 281 p. and no price was stated.



"Here follows my little herbal of some familiar and useful "weeds." Unfortunately, we have corrupted this word and its meaning. Originally the word was weeds, and it was the Anglo-Saxon name for all herbs or small plants. Some plants these early people of Britain called wyrt, and our present-day term "wort" is derived from this Old English word."

--Audrey Wynne Hatfield

From <u>How to Enjoy Your Weeds</u> Sterling Publishing Co. Inc. New York



The book 'Algemene Onkruide in Suid-Afrika (Common Weeds of South Africa) by Mayda Henderson and J.G. Anderson is still readily available. Published as long ago as 1966, and with black and white illustrations only, it is nevertheless still the most comprehensive guide to the identification of Southern African weed species. Copies of this book (number 37 in the Botanical Memoirs of S.A. series, produced by the Botanical Research Institute) can be obtained at a cost of \$2,40 (overseas R3,55) from the publications office of the Division of Agricultural Information, Department of Agricultural Technical Services, Private Bag X114, Pretoria 0001. (Thanks to "Newsletter" of Southern African Weed Science Society - Address: Private Bag X134, Pretoria 0001.)

"An annotated bibliography of weeds as reservoirs for organisms affecting crops" has been published by Ohio State University as Research Bulletin No. 1109. The authors, L.E. Bendixen, D.A. Reynolds, and R.M. Riedd have embarked on an ambitious literature search to document the instances of weeds serving as reservoirs of organisms effecting crops. This research bulletin is the first in a series of three and covers nematode-weed associations. Later issues will cover insect and disease relationship. Copies are available from Ohio State University, Department of Agronomy, Columbus, OH 43210 / USA.

The Weed Science Society of America, with a grant from the Environmental Protection Agency, has published an excellent reference, <u>"Common Weed Seedlings of the United States and Canada</u>". It is in full color and contains 76 of the most common broadleaf species. No grasses or sedges are included. Copies are available from the WSSA office (309 W. Clark Street, Champaign, IL 61820 / USA) at \$2.00 each. <u>Parthenium Newsletter</u> - That one weed species, <u>Parthenium hysteropherus</u>, warrants its own newsletter attests to the seriousness of this annual composite which is causing so much trouble in Australia and India. The new Editor is Dr. P.V. Subba Rao, Department of Biochemistry, Indian Institute of Science, Bangalore, INDIA.

<u>Herbicide Handbook of the Weed Science Society of America</u>, Fourth Edition is now available from WSSA, 309 West Clark Street, Champaign, IL 61820 / USA. The new edition contains 479 pages of information on the herbicides registered for use in the United States. Such information as chemical characteristics, herbicidal use, precaution, physiological and biochemical behavior, and toxicological properties is included. This is <u>NOT</u> a recommendation handbook. Price US\$7.50.

The Communications Office of CIAT, A.A. 6713, Cali, Colombia has prepared a series of <u>autotutorial</u> <u>slide-tape sets</u> on seven weed control topics. Each set contains approximately 100 slides, cassette tapes, study guide, and packing case. It sells for US\$40. All material is in Spanish only, and the topics covered include the following: Principles of weed management and control in crops; Information on weed competition in crops; Herbicides: Mode of action and symptoms of injury; Principles of weed management and control in pastures; Practical guide for pasture weed control; Factors affecting herbicide performance; Management and control of weeds in cassava. Additional topics will be available in the future.

Meet <u>Herbert I. Cide</u> who is a cartoon character used to illustrate some of the factors which can influence a herbicide once it is released into the environment. Herbert I. Cide stars in a 23-page bulletin prepared by Robert L. Zimdahl, Colorado State University. The bulletin is available for US\$2.75 or the bulletin and an illustrated slide set for US\$25.00 can be ordered from the Office of Educational Media, Colorado State University, Fort Collins, CO 80523 / USA.



MEETINGS 1979

- August 5-12
 9th International Congress of Plant Protection, Washington DC / USA; contact Dr. B.G.

 Tweedy, c/o Pesticide Co-ordinator, Office of Secretary, USDA, Washington DC 20250 / USA.
- August 7-9 32nd Annual Conference New Zealand Weed and Pest Control Society, Dunedin, New Zealand. Contact Ms. M.J. Hartley, N.Z. Ministry of Agriculture and Fisheries, Private Bag, Palmerston North, NEW ZEALAND.
- August 7-9 3rd National Weeds Conference, Pretoria, SOUTH AFRICA.
- October 10-12 42nd German Plant Protection Conference and EWRS International Symposium, Mainz, West Germany; contact Biologische Bundesanstalt Messeweg 11-12, D-3300 Braunschweig.
- October Symposium on Weed Research in Sudan, Wad Medani, Sudan. Contact: M.E. Beshir, University of Gezira, P.O. Box 20, Wad Medani, SUDAN.
- November 26-30 7th Conference of the Asian-Pacific Weed Science Society, Sydney, Australia. Contact APWSS, P.O. Box 287, Haymarket, N.S.W. 2001, AUSTRALIA.

MEETINGS 1980

- January 23-25 Colombian Weed Science and Plant Physiology Society, Bogota, Colombia. Contact COMALFI, A.A. 29688, Bogota, COLOMBIA.
- February 5-7 Weed Science Society of America annual meeting Toronto, Canada. Contact Dr. Will Carpenter, Monsanto Chemical Co., 800 N. Lindbergh Blvd., St. Louis, MO 63166 / USA.
- April 15-17 Association of Applied Biology Symposium "Weeds and natural vegetation in relation to the ecology of pests and diseases". York, England. Contact J.M. Thresh, East Malling Research Station, Maidstone, Kent ME19 6BJ, ENGLAND.
- May Latin American Weed Science Society (ALAM), Guayaquil, ECUADOR.
- July 13-16 Annual Meeting Aquatic Plant Management Society, Fort Walton Beach, Florida / USA.
- July 13 Brazilian Congress of Herbicides and Weeds, Bahia, BRAZIL.
- July 22-295th International Symposium on the Biological Control of Weeds, Brisbane, Australia.Contact:Dr. K.L.S. Harley, Division of Entomology, CSIRO, Brisbane, AUSTRALIA.

COURSES 1979

July 29-November 1 8th International Course on Plant Protection at International Agricultural Centre, Wageningen, NETHERLANDS.

PARASITIC WEEDS

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A successful workshop on <u>Striga</u> and <u>Orobanche</u> was held in Khartoum from 5-9 November 1978. The University of Khartoum and the International Development Research Council (IDRC) of Canada collaborated to bring 25 workers together from nine countries to discuss their work and co-ordinate future activities. The main developments are currently in artificial germination stimulants and the selection and breeding of resistant varieties. Research on <u>Striga</u> in particular is increasing in several countries, and there will be further exchange of results at the 2nd Symposium on Parasitic Weeds to be held in USA in July. One of the topics to be discussed will be the recent discovery of <u>Striga gesnerioides</u> in Florida. At present it is only occurring on wild legumes but there is inadequate knowledge of the host specificity of strains within this species, to tell whether or not it might also be able to attack US crops such as tobacco and soybeans. To cater for the current upsurge in interest in parasitic weeds a newsletter on parasitic higher plants under the title "HAUSTORIUM" is now being distributed by the Department of Biological Sciences, Old Dominion University. Norfolk, Virginia 23508 / USA.

CYPERUS ROTUNDUS

The Faculty of Agronomy of the University of Tolima in Ibague, Colombia, is sponsoring a symposium on purple nutsedge (<u>Cyperus rotundus</u> L.) as a celebration of their 25th anniversary. It will be held on campus from September 26-28, and will feature national and international speakers. The program will cover the biology and systems of control of purple nutsedge, possible beneficial uses, biotypes, competition, allelopathy and future research directions on this world famous weed.

NEW WEED RESEARCH PROGRAM IN INDIA

A new program, the all-India Co-ordinated Research Program on Weed Control, was launched in April 1978 in conjunction with the Science and Education Administration of the U.S. Department of Agriculture under US public law 480.

Dr. H.K. Pande, Director of the Central Rice Research Institute at Cuttack, Orissa, co-ordinates the program and the work of six additional principal investigators at locations throughout India. The group includes Drs. K. Krishnamurthy, S.C. Mogdal, V.M. Bhan, H.S. Gill, B.N. Mittra, and S.S.S. Solanki. Project co-operating scientists are Drs. Robert Andersen, USDA/SEA University of Minnesota and Peter Frank, USDA/SEA University of California, Davis.

NEW PROGRAM FOR ADVANCED DEGREE IN WEED SCIENCE

To meet the needs of the region, the Faculty of Agricultural Sciences at the American University of Beirut offers a program of graduate study leading to the Master of Science degree in weed science. The program is supervised by Dr. Abdur-Rahman Saghir, Professor of Weed Science. Address given earlier in this newsletter.

NEW IWSS MEMBERS

D. Johansson - Sweden

Those people joining IWSS since the last newsletter are:

Asociacion Boliviano de Control de Malezas - Bolivia R. Amartalingam - Malaysia V. de Andrade - Brasil Aquamarine Corp. - USA A. Beltran - Costa Rica B. Bengtsson - Denmark A. Bronnimann - Switzerland A.L.P. Cairns - South Africa R. Callihan - USA M. Coleman-Harrell - USA B. Devisetty - USA E.F. Eastin - USA J.D.G. Esterbanaz - Spain C. Fernandez-Quintanilla - Spain R. Frans - USA R. Gipson - USA B. Granstrom - Sweden H. Haas - Sweden S. Hakansson - Sweden R.J. Hance - England



TIME REQUIRED FOR HANDWEEDING

The last newsletter contained a request from President Matthews for data on hours required to handweed various crops. The response has been disappointing because files around the world are guarding pages of such information. Many thanks to those who took time to respond. It was particularly encouraging to learn that Mr. vanHeemst at the Center for Agrobiological Research, Wageningen, The Netherlands, is collecting data on this very topic. Following is a brief summary of information received by the Secretariat. The full name and address of the people listed as sources will be provided upon request.

Crop	Location	Hours per Hectare to Handweed	Source
Soybeans	Peru	360 if 6 hour day	R. Frans
Transplanted Tomatoes	Ohio, USA	71 following herbicide 133 following cultivation	R.C. Henne
Maize	Rhodesia	24-48 if 6 hour day only between rows	P.E.L. Thomas
Beans	Wyoming, USA	4.4-15.5 following broadcast herbicide 31.8 no herbicide	R. Comes
Sugarbeets	Washington, USA	2-111 following broadcast herbicide 141 no herbicide	J.H. Dawson
Various vegetables	California, USA	10 following broadcast herbicides	H. Kempen

Following is a summary of data gathered by H.D.J. vanHeemst from many sources:

Rice	Various	16-500 depending on culture	location and
Wheat	-	101	
Sorghum	-	50	$\langle \gamma \rangle$
Millet	-	88- 298	E V
Maize		160-441	IV.
Cotton	-	50- 700	
Jute	-	140	W Y
Groundnut		102-293	
Cassava	-	115-1069	4

OUR WORST TRAMP

"Weeds are great travelers; they are indeed the tramps of the agricultural world. They are going east, west, north, south; they walk, they fly, they swim, they steal a ride, they travel by rail, by flood, by wind; they go underground and they go above, across lots and by highways. But, like other tramps, they find it safest by the highway. In the fields they are intercepted and cut off; but on the public road every boy, every passing herd of sheep or cows, gives them a lift. Hence the incursion of a new weed is generally first noticed along the highway or on the railroad."

--John Burroughs From <u>Pepacton and Other Sketches</u>, Chapter VII, A Bunch of Herbs. 1909 Edition, published by William H. Wise and Co.



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Striga lutea Lour. 1, habit; 2, leaf, undersurface; 3, leaf, upper surface; 4, flower; 5, portion of stem with the capsule enlarged; 6, seeds. From: The World's Worst Weeds Distribution and Biology by L.G. Holm, D.L. Plucknett, J.V. Pancho, and J.P. Herberger