REPORT OF THE
BEAN IMPROVEMENT COOPERATIVE

No. 22  March 1979

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of his or her intentions.  The Coordinating Committee approved this
statement at the BIC meeting on November 5, 1975.
TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>TABLE OF CONTENTS</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>XXII ANNUAL REPORT OF THE BEAN IMPROVEMENT COOPERATIVE</td>
<td>1</td>
</tr>
<tr>
<td>1979 BIC MEETINGS TO BE IN MADISON</td>
<td>1</td>
</tr>
<tr>
<td>LISTINGS OF BEAN LINES WITH VARIED PHYSIOLOGICAL CAPABILITIES</td>
<td>2</td>
</tr>
<tr>
<td>FIELD PROBLEMS OF BEANS IN LATIN AMERICA</td>
<td>3</td>
</tr>
<tr>
<td>GEORGIA RESEARCH</td>
<td>3</td>
</tr>
<tr>
<td>HEIRLOOMS.</td>
<td>3</td>
</tr>
<tr>
<td>BEAN/COWEA COLLABORATIVE RESEARCH SUPPORT PROGRAM</td>
<td>4</td>
</tr>
<tr>
<td>CIAT BEAN PROGRAM.</td>
<td>4</td>
</tr>
<tr>
<td>INTERNATIONAL BEAN RUST NURSERY.</td>
<td>4</td>
</tr>
<tr>
<td>IN MEMORIUM</td>
<td>5</td>
</tr>
<tr>
<td>HOMER SWINGLE RETIRES</td>
<td>6</td>
</tr>
<tr>
<td>DR. KAISER TRANSFERRED</td>
<td>6</td>
</tr>
<tr>
<td>RESEARCH PAPERS</td>
<td></td>
</tr>
<tr>
<td>Bean Breeding Program at CENA, VI Breeding for Protein: Nutritive Value of Some Varieties—A. Tulmann Neto, A. Ando, O.J. Crocomo and J.E. Dutra De Oliveira</td>
<td>7</td>
</tr>
<tr>
<td>Bean Breeding at CENA, VII Selection of Improved Lines by the Multiple Crosses Method—A. Tulmann Neto, J.O.M. Menten, A. Ando</td>
<td>8</td>
</tr>
<tr>
<td>Bean Breeding Program at CENA, VIII Obtainment of Lines Resistant to Uromyces phaseoli typica through Individual Selection with Stratification and Progeny Test in the Brazilian Variety &quot;Roxo&quot;—A. Tulmann Neto, J.O.M. Menten, A. Ando</td>
<td>9</td>
</tr>
<tr>
<td>Authentication of Interspecific Hybrids in Phaseolus—J. Smartt.</td>
<td>12</td>
</tr>
<tr>
<td>Genetic Control of Peroxidase and Catechol Oxidase Isolezymes in Phaseolus vulgaris L. and their Relationships with Uromyces phaseoli (Reb.) Wint. Typical—E'lane Augustin Oliveira and Antonio Rodrigues Cordeiro</td>
<td>14</td>
</tr>
<tr>
<td>Seed Quality of Australian Green Bean Seed—M. H. Dickson.</td>
<td>17</td>
</tr>
<tr>
<td>Semi-Lethal Chlorosis in Crosses Involving Michigan Beans—N. L. Innes</td>
<td>19</td>
</tr>
<tr>
<td>New Strains of Halo Blight Bacterium in Nebraska—M.L. Schuster, D.P. Coyne and Charlene Smith</td>
<td>19</td>
</tr>
<tr>
<td>Reaction of Phaseolus vulgaris Germplasm to a New Virulent Strain of Pseudomonas phaseolicola—D.P. Coyne, M.L. Schuster and Carol Erwin</td>
<td>20</td>
</tr>
<tr>
<td>Bacterial Diseases of Legumes: A summary of Breeding and Resistance—Dermot P. Coyne and M.L. Schuster</td>
<td>21</td>
</tr>
<tr>
<td>Heirloom Information—Bean Anthracnose—Colin A. Leakey</td>
<td>22</td>
</tr>
<tr>
<td>A Progress Report on Genetic Variation, Genetics and Breeding for Seed Coat Cracking Resistance, Brighter Whiteness and Low Seed Coat Hardness in Great Northern Dry Beans (Phaseolus vulgaris L.)—Safi S. Korban, Dermot P. Coyne and John L. Weihing</td>
<td>24</td>
</tr>
<tr>
<td>Resistance to Leafhopper Empoasca Fabae in Snap Beans—M. H. Dickson and C. J. Eckenrode</td>
<td>25</td>
</tr>
<tr>
<td>Suboptimum Temperature Tolerance in Relation to Early Growth of Phaseolus vulgaris L.—G.A. Kemp</td>
<td>26</td>
</tr>
<tr>
<td>Title</td>
<td>Page</td>
</tr>
<tr>
<td>----------------------------------------------------------------------</td>
<td>------</td>
</tr>
<tr>
<td>Seed, Energy and Protein Yield in Maize and Bean Association</td>
<td>28</td>
</tr>
<tr>
<td>Variation in Pinto Bean Cultivars Grown in Two Soils</td>
<td>30</td>
</tr>
<tr>
<td>Low Temperature Interference with the Photonastic Movement of Bean Leaves</td>
<td>31</td>
</tr>
<tr>
<td>Control of White Mold Disease (Sclerotinia sclerotiorum) of Dry Edible Bean by Fungicide Applications</td>
<td>31</td>
</tr>
<tr>
<td>Yield Potential per Plant and Growth Analysis of an Indeterminate Growth Pole Bean (Phaseolus vulgaris L.)</td>
<td>33</td>
</tr>
<tr>
<td>Effect of Artificial Shading on Yield and its Components in Beans (Phaseolus vulgaris L.)</td>
<td>33</td>
</tr>
<tr>
<td>Effect of Population Density in the Yield Components of a Short Pole Bean (P. vulgaris L.) and Scarlet Runner Bean (P. coccineus L.)</td>
<td>34</td>
</tr>
<tr>
<td>Varietal Response of Snap Beans to Peanut Stunt Virus</td>
<td>35</td>
</tr>
<tr>
<td>Release of Multiple Disease Resistant Germ Plasm</td>
<td>36</td>
</tr>
<tr>
<td>Techniques of Screening Beans for Resistance to Mexican Bean Beetle</td>
<td>37</td>
</tr>
<tr>
<td>Transmission of Bean Common Blight Bacteria (Xanthomonas phaseoli) in Seed of Resistant and Susceptible Bean Genotypes</td>
<td>38</td>
</tr>
<tr>
<td>Effect of Host Genotype on Multiplication and Distribution of Bean Common Blight Bacteria (Xanthomonas phaseoli)</td>
<td>40</td>
</tr>
<tr>
<td>Serology and Selective Enrichment as Aids in the Detection of Xanthomonas Blight Bacteria</td>
<td>41</td>
</tr>
<tr>
<td>Electrophoretic Patterns of the Globulin Fraction of Some Types of Beans</td>
<td>42</td>
</tr>
<tr>
<td>Dry Weight Accumulation and Nitrogen Content in 4 Varieties of Bean in Different Physiological Stages of Growth</td>
<td>43</td>
</tr>
<tr>
<td>Carbohydrate Content in Bean Varieties</td>
<td>45</td>
</tr>
<tr>
<td>Screening Beans for Resistance to Air Pollutants</td>
<td>46</td>
</tr>
<tr>
<td>Interaction Between Ozone and Mexican Bean Beetle Feeding Damage on Beans</td>
<td>47</td>
</tr>
<tr>
<td>Screening Beans for Resistance to Halo Blight</td>
<td>48</td>
</tr>
<tr>
<td>Release of New Phaseolus vulgaris Germ Plasm Resistant to Wisconsin's Bean Root Rot Disease Complex</td>
<td>49</td>
</tr>
<tr>
<td>Title</td>
<td>Page</td>
</tr>
<tr>
<td>---------------------------------------------------------------------</td>
<td>------</td>
</tr>
<tr>
<td>Release of New <em>Phaseolus vulgaris</em> Germ Plasm Resistant to Bacterial Brown Spot (<em>Pseudomonas syringae</em>)</td>
<td>54</td>
</tr>
<tr>
<td>D.J. Hagedorn and R.E. Rand</td>
<td></td>
</tr>
<tr>
<td>Breeding Research in Field Beans (<em>Vicia faba L.</em>)</td>
<td>55</td>
</tr>
<tr>
<td>R.J. Heringa and A. van Norel</td>
<td></td>
</tr>
<tr>
<td>Morphological Differences in Roots of Some Black Beans</td>
<td>57</td>
</tr>
<tr>
<td>P.J. Stoffella and R.F. Sandsted</td>
<td></td>
</tr>
<tr>
<td>Relationship of Root Size to Lodging and Seed Yield in Some Black Beans</td>
<td>58</td>
</tr>
<tr>
<td>P.J. Stoffella and R.F. Sandsted</td>
<td></td>
</tr>
<tr>
<td>The Use of Ethephon as a Screening Tool for Thrips Resistance in Cowpea (<em>Vigna unguiculata L.</em> Walp)</td>
<td>59</td>
</tr>
<tr>
<td>H.C. Wien and C. Roesingh</td>
<td></td>
</tr>
<tr>
<td>Enzyme-Linked Immunosorbent Assay (Elisa) for Detection of Bean Common Mosaic Virus</td>
<td>60</td>
</tr>
<tr>
<td>J.P. Meiners and R.W. Harris</td>
<td></td>
</tr>
<tr>
<td>Sources of Resistance to U.S. Bean Rust - Update</td>
<td>62</td>
</tr>
<tr>
<td>J.P. Meiners</td>
<td></td>
</tr>
<tr>
<td>Resistance in Dry Beans to Seedcorn Maggot</td>
<td>63</td>
</tr>
<tr>
<td>G.T. Hagel and D.W. Burke</td>
<td></td>
</tr>
<tr>
<td>Study of the Aggressivity of Isolates Belonging to the Pseudomonas phaseolicola (Burkh) Dowson</td>
<td>64</td>
</tr>
<tr>
<td>J. Szarka and I. Velich</td>
<td></td>
</tr>
<tr>
<td>Effect of Microwave Drying on Protein Quality of Beans</td>
<td>66</td>
</tr>
<tr>
<td>P.S. Benepal, S.S. Lee, D.P. Mohan and A.Q. Sheikh</td>
<td></td>
</tr>
<tr>
<td>A Sub-Lethal Combination of Two Dominant Factors in <em>Phaseolus vulgaris L.</em></td>
<td>67</td>
</tr>
<tr>
<td>H.A. van Rheenen</td>
<td></td>
</tr>
<tr>
<td>Estimation of the Number of Bean Genes Against Pseudomonas phaseolicola and the Level of Heritability</td>
<td>69</td>
</tr>
<tr>
<td>I. Velich and J. Szarka</td>
<td></td>
</tr>
<tr>
<td>Effect of Air Pollutant Ozone on Protein Content of Beans</td>
<td>70</td>
</tr>
<tr>
<td>P.S. Benepal, M. Rangappa, J.A. Dunning and D.P. Mohan</td>
<td></td>
</tr>
<tr>
<td>Adaptation of Snap Bean to Frontal Mechanical Harvest</td>
<td>71</td>
</tr>
<tr>
<td>G. Eteve and G. Fouilloux</td>
<td></td>
</tr>
<tr>
<td>Recurrent Selection for Root Rot Resistance of Snap Beans</td>
<td>74</td>
</tr>
<tr>
<td>S.E. Beebe and F.A. Bliss</td>
<td></td>
</tr>
<tr>
<td>Bean Breeding Program at CENA</td>
<td></td>
</tr>
<tr>
<td>IX. Occurrence of Ashbya Gossypii (Ashby &amp; Nowell) Guillermond Associated with <em>Nematospora coryli</em> Peglion Causing Yeast Spot in Bean (<em>Phaseolus vulgaris L.</em>) Seeds</td>
<td>76</td>
</tr>
<tr>
<td>J.O.M. Menten, W.J. Giacomelli, A. Tulmann Neto e A. Ando</td>
<td></td>
</tr>
<tr>
<td>X. Effect of Yeast Spot on the Quality of Bean Seeds</td>
<td>76</td>
</tr>
<tr>
<td><em>Phaseolus vulgaris L.</em>-J.O.M. Menten, W.J. Giacomelli, A. Tulmann Neto e A. Ando</td>
<td></td>
</tr>
<tr>
<td>XI. Evaluation of Damages Caused by the Bean Golden Mosaic Virus-J.O.M. Menten, A. Tulmann Neto e A. Ando</td>
<td>77</td>
</tr>
<tr>
<td>Effects of Inoculation with <em>Rhizobium</em> and Nitrogen Fertilizer on Bush Snap Beans</td>
<td>Mei-Hwa Wang Ma and H.J. Mack</td>
</tr>
<tr>
<td>Amino Acid Analysis of Black Bean Varieties (<em>Phaseolus vulgaris L.</em>)</td>
<td>Ma. Luisa Ortega D. and Clara Luz Morales H.</td>
</tr>
<tr>
<td>Genetic Variation within Plant Introduction Lines for Days to Flowering</td>
<td>Eric E. Roos</td>
</tr>
<tr>
<td>Cold Tolerance in Beans-H. Bannerot</td>
<td>81</td>
</tr>
<tr>
<td>Results - Uniform Snap Bean Rust Nursery, 1978-J.P. Meiners</td>
<td>85</td>
</tr>
</tbody>
</table>
Development of Resistance to Wisconsin's Bean Root Rot .......................... 86
Interactions of Pseudomonas syringae with Susceptible and Resistant Lines of Phaseolus vulgaris—M.E. Daub and D.J. Hagedorn ................ 89
New Sources of Resistance to Pseudomonas syringae in Phaseolus vulgaris—S. Antonius and D.J. Hagedorn ............. 89
Genetic Interaction between Phaseolus vulgaris and Bean Common Mosaic Virus—E. Drijfhout ....... 90
Effect of Cultivation on Pythium Populations and Pythium Species Inhabiting Bean Fields in Wisconsin—R.D. Reeleder and D.J. Hagedorn ...... 92
Sources of Disease Resistance in Turkish Bean Varieties (Phaseolus vulgaris)—K. Rudolph .......... 93
Bean (Pea) Leafroll Virus—J.W. Ashby and L. Bos ....... 96
A Comparison of Four Breeding Procedures for the Improvement of Seed Yield and Protein Content in Phaseolus vulgaris—H.E. Gridley and A.M. Evans .... 96
Loss of Quality in Machine-Threshed Bean Seeds—Harry M. Brouwer and Elspeth Scott ........ 99
Early Flowering - The Heritability of Nodes-To-First-Flower—R.C. Hardwick and J.M. Hardaker .... 101
Release of 12 Root Rot Tolerant Snap Bean Lines—M.H. Dickson and M.A. Boettger ........ 102
Southern Cooperative Snap Bean Variety Trials—Charles A. Mullins .......... 103
LIST OF MEMBERS ........................................ 104
BIBLIOGRAPHY ........................................ 120
FINANCIAL STATEMENT .................................. 148
THE XXII ANNUAL REPORT
OF THE
BEAN IMPROVEMENT COOPERATIVE

The reports for the BIC this year have been very interesting and of high quality. It is stimulating to read them all and find out what so many people are doing. I also appreciate those who put stamps on their envelopes rather than a label from a stamp machine.

My leave last year was most interesting. I was lucky enough to see most of the Australian bean industry and most of the people working on beans. I appreciated Drs. Wallace and Sandsted co-editing the BIC for me. Fran VanKirk has continued to keep the books which becomes a larger job as our membership grows. Jeanne Keplinger has again typed the report and watched carefully for any inconsistencies. We all owe them our thanks for their efforts.

Do you find the literature review at the end of the report useful? Should we continue to produce it? Let me know if you make use of it.

We have included an index of the first 21 BIC volumes bound as a pull-out section for your convenience should you prefer to remove it.

The Coordinating Committee looks forward to seeing you at the Biennial meeting in Madison in November.

Michael H. Dickson
for the Coordinating Committee

1979 BIC MEETINGS TO BE IN MADISON

The 1979 BIC meetings will be held at the Park Hotel in Madison, Wisconsin on November 7 and 8. The National Pea Improvement Association will meet there November 6, and the National Dry Bean Council on November 8 and 9. Those subjects of real mutual interest to both BIC and National Dry Bean Council will be taken up the afternoon of November 8. More details will be forthcoming but suggestions for papers to be presented orally or via poster at our BIC meetings should be forwarded before May 1 to:

D. J. Hagedorn
Department of Plant Pathology
University of Wisconsin
Madison, WI 53706
LISTINGS OF BEAN LINES WITH VARIED PHYSIOLOGICAL CAPABILITIES

D. H. Wallace
Department of Plant Breeding
Cornell University, Ithaca, NY

At the Western Region-150 bean project (Breeding beans for yield, pest resistance and nutritional value) the concept was conceived that it would be helpful if lists were compiled of cultivars and other bean lines that have been demonstrated to differ in physiological characteristics. It was concluded that such listings should be developed and included in the BIC annual report, beginning with the 1980 issue. In addition to the benefit that this would have for those of us actively concerned with beans, a major benefit that would develop over time would be that physiologists who use beans as a tool may begin to do their work with lines of known physiological response rather than merely taking an available lot of seed from the shelf or seed store. Thus, more research using beans would be helpful in understanding beans, rather than being a random approach to a multitude of physiological, biochemical or other considerations.

Such listings should probably have a format similar to the following partial listing. Literature references should be included to permit the interested person to read in detail about the indicated genotypic comparison.

<table>
<thead>
<tr>
<th>Photosynthetic Rate Per Unit Leaf Area</th>
<th>Identified genotypic variation</th>
<th>Literature citations</th>
</tr>
</thead>
<tbody>
<tr>
<td>High rate:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Michelite-62</td>
<td></td>
<td>Izhar and Wallace, 1967;</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Wallace, Peet and Ozbun, 1976</td>
</tr>
<tr>
<td>Low rate:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Red Kidney and Redkote</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>


The formal request for such listings will be submitted with the request for notes, etc. for the 1980 BIC report. If you would like to submit such a listing in the interim, please send it to Donald H. Wallace, Plant Breeding Department, Cornell University, Ithaca, New York 14853.

The WR-150 meeting also concluded that such a listing should be developed for disease and insect resistance characteristics and for nutritional characteristics. Requests for these listings will also be formally submitted with the request for notes, etc. for the 1980 BIC report.
FIELD PROBLEMS OF BEANS IN LATIN AMERICA

The CIAT Bean Production Program has produced a small field booklet to aid scientists, technicians, extension agents and farmers in the identification of dry bean diseases, insect pests, soil nutritional problems and miscellaneous production problems commonly encountered in Latin America and other parts of the world.

The booklet is entitled, "Field Problems of Beans in Latin America, Series GE-19", is 136 pages in length, contains 146 color illustrations, briefly describes 66 problems of beans, is available in English and Spanish, and sells for US $5.00.

Interested persons may contact the CIAT Publication Office, Apartado Aéreo 67-13, Cali, Colombia, S.A. to obtain copies.

Interested persons may also contact the CIAT Publication Office to receive a free copy of the International Bean Rust Nursery Results 1975-1976 in English or Spanish.

*****

GEORGIA RESEARCH

Research on snapbean, lima bean, and southern pea in irrigated, multiple-cropping systems on Lakeland sand and Tifton loamy sand was initiated in 1978 at the Coastal Plain Experiment Station, Tifton, Georgia. Scientists in horticulture, agronomy, plant pathology, nematology, entomology, agricultural engineering, and agricultural economics are investigating the influence of water management, fertility levels, and tillage practices on cropping systems including two and three sequential crops per year for 3 to 6 years. Several agronomic and vegetable crops are included in the rotations. Research is being done under both center-pivot and permanent-set irrigation systems.

*****

HEIRLOOMS

Wanigan Associates is the corporate name for a one-man hobby operated by John E. Withee, 262 Salem Street, Lynnfield, Massachusetts, 01940. It has been granted non-profit status as an operating private foundation.

Wanigan has engaged in the search for and the cultivation of seed stocks of heirloom beans, the provision of seed stock to researchers and the NSSL, the research, development and testing of various foods having beans as the primary component, and the development of photographic and historical records of various bean lines.

The above listed objectives have resulted in the collection of over 500 varieties from family growers through an exchange and renewal program, centered around a quarterly newsletter.

More uncatalogued varieties are welcome. A catalog and details of the project are available at no charge.
In July of 1978, the Board of International Food and Agricultural Development of the United States approved the planning of a Collaborative Research Support Program (CRSP) for dry beans and cowpeas. This CRSP is one of about 20 that will be developed under the Title XII act approved by the U.S. Congress in 1975. The intent is to provide an international agriculture component as an adjunct to bean and cowpea programs conducted in the United States. The goal is for U.S. scientists and institutions with relevant expertise to establish collaboration with scientists of similar interests in developing countries. The CRSP will use USAID funds plus funding provided by each participating institution to assist the developing countries in achieving higher production and use of beans and cowpeas. To achieve this goal, the international, regional and national research centers, including U.S. institutions, will collaborate on a complete and balanced program of research on beans and cowpeas. The research will be aimed at solving the constraints to improved production and use of beans/cowpeas.

Michigan State University is representing all other U.S. bean and cowpea institutions in developing the bean/cowpea CRSP. Dr. D. H. Wallace is at Michigan State University, on leave from Cornell University to work, along with Dr. M. W. Adams of Michigan on this planning effort. Planning should be completed by early 1980, after which the Collaborative Research Support Program will be funded and activated.

Two new post-doctoral candidates will work on the bean program: 1) Dr. Francis Morales is working on bean virus diseases; 2) Dr. Steve E. Beebe is working on common bacterial blight and root rot diseases of beans.

The results of the International Bean Rust Nursery for 1975 and 1976 have been published at CIAT and are available to interested parties:

Center for International Tropical Agriculture
Apartado Aereo 6713
Cali, Colombia

The papers published in French from the Sept. 10-12, 1975 Eucarpia Bean Conference (Titles in BIC 20:136-137) have been translated into English. Photocopies at five cents (U.S.) per page can be obtained from M. J. Silbernagel, USDA-SEA/AR, PO Box 30, Irrigated Agric. Res. & Ext. Center, Prosser, WA 99350.
IN MEMORIAM

Professor Roelof Prakken

Roelof Prakken was born in the village of Enter on 13 November 1898. After graduating from the Deventer Teachers Training College in 1918, he was a primary school teacher until 1927, first at Enter, then at Culemborg near Utrecht. In this period his interest in biology was evident from a number of articles on plant communities. By following lectures at the University of Utrecht, Prakken, in his spare time, prepared for the "Akte m.o. K IV" (geology and biology), which degree qualifies for teaching in all secondary schools.

In 1927 followed the appointment as teaching assistant in zoology and experimental histology at the Department of Zoology of Utrecht University where, in 1931, Prakken graduated cum laude in botany, zoology and genetics. Afterwards, as scientific assistant to Prof. Dr. J. A. Honing at the Department of Genetics of the Agricultural University at Wageningen, he prepared a thesis "Inheritance of colours and pod characters in Phaseolus vulgaris" and, with Honing as promoter, obtained the Doctor's Degree (cum laude) of Utrecht University.

In 1939, a Rockefeller grant enabled him to join Muntzing at Lund. In the meantime, World War II had led to the occupation of The Netherlands, and Prakken chose to stay in Sweden although expiration of his grant left him financially at the breadline. Later on, in the service of the Dutch government in exile (London), he devoted himself to the analysis of agricultural and agro-economic problems to contribute to the postwar reconstruction of agriculture in The Netherlands. For this work and for his activities for famine relief he was officially honoured. Some of the reports, notably those on different aspects of plant and animal breeding, were published after the war.

After 1945, Prakken returned to Wageningen, where he became botanist at the Department of Genetics, and in 1949 succeeded Honing as Professor Genetics, accepting the chair with the inaugural address "Chromosoomperspectieven."

During Prakken's directorship, the Department staff was gradually extended, and specialized teaching and research in the fields of population and quantitative genetics, cytogenetics, biochemical genetics, mutagenesis and microbial genetics were initiated.

On 1 September 1969, at the age of 70, Prakken retired after 50 years of service, and having published over 60 scientific papers. His farewell address "Fifty years of Genetics" derives its title from the fact that 50 years ago he have his first public lecture on genetics.

Being fit and young at heart, and at last having time for it, he devoted himself to the analysis of the extensive data on seed-coat colour in Phaseolus vulgaris, which had accumulated over the past 20 years. This resulted in three large publications and several smaller ones, the latter in the BIC Newsletter.
It was a great satisfaction to him when in 1977 the Bean Improvement Cooperative honoured him with the Meritorious Service Award "for outstanding research on beans."

On September 20th, 1978, Roelof Prakken suddenly and quietly died at his home, leaving behind his flowering bean plants in the greenhouse of the Department of Genetics.

The born scientist Prakken never had to really retire and never saw his clarity of thinking fade.

*****

HOMER SWINGLE RETIRES

Dr. Homer D. Swingle retired on January 15, 1979 as Professor of Plant and Soil Science at The University of Tennessee, Knoxville. A native of Hixon, Tennessee, Dr. Swingle holds degrees from the University of Tennessee, Ohio State University and Louisiana State University. Dr. Swingle taught vocational agriculture in Rhea County, Tennessee for seven years and served a short period as a special assistant agent in horticulture. After receiving a Masters degree, he joined the Horticulture Department. Dr. Swingle has been leader of the vegetable research project for several years. This project has included considerable research and publications in snap beans. Teaching duties have included vegetable and physiology classes, a major freshman level plant science course, and advising numerous graduate students. Dr. Swingle has been an excellent teacher and researcher. Honors have been numerous. Two of the latest have included outstanding service to the Tennessee Institute of Agriculture and being elected a fellow of the ASHS. Dr. Swingle will be greatly missed at The University of Tennessee.

*****

DR. KAISER TRANSFERRED

Dr. Walter J. Kaiser, research plant pathologist, USDA, SEA, AR was transferred recently from Kenya, East Africa to Washington State University, Pullman, Washington as plant pathologist on the staff of the USDA Regional Plant Introduction Station. During the four years that Dr. Kaiser was stationed in East Africa, he served as Director of the East African Plant Quarantine Station which is located near Nairobi at Muguga, Kenya. At Pullman, where the USDA Plant Introduction (PI) collection for beans in maintained, Dr. Kaiser will be devoting a major part of his research to disease problems of bean and will be screening the collection for resistance to various important pathogens of this crop.
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Entomology

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Pouzat, J. 1977. Effects of stimulations coming from the host-plant, the bean (*Phaseolus vulgaris* L.), on the egg-laying behaviour of the bean weevil (*Acanthoscelides obtectus* Say). Comp Insectes Milieu Troph 265:115-131. (French)


Dogras, C. C., D. R. Dilley, and R. C. Herner. 1977. Phospholipid Biosynthesis and fatty acid content in relation to chilling injury during


Additional References


BEAN IMPROVEMENT COOPERATIVE
FINANCIAL STATEMENT

Balance on hand as of March 22, 1978 $1404.78

Income

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<th>Description</th>
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1524.22

Expenses

1978 annual report

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1979 annual report

(Partial accounting, remainder of costs to be shown on 1980 statement)

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Balance on hand March 30, 1979 $1460.94