MEMORIAL
Bernard W. Hammer 1886–1966

Bernard W. Hammer, a prominent dairy bacteriologist, died on September 6 at Sarasota, Florida. He was born on October 7, 1886 at Hillsboro, Wisconsin. Following graduation from Hillsboro High School in 1904, he entered the University of Wisconsin and obtained the B.S.A. degree in 1908. Subsequent to graduation, he was appointed assistant in agricultural bacteriology and worked under Dr. E. G. Hastings from 1908 to 1909. Later, 1909–1911, he served as a bacteriologist in the Wisconsin Hygienic Laboratory at the University of Wisconsin. In 1911 he was appointed professor of dairy bacteriology at Iowa State University.

An extensive research program in dairy bacteriology was established by Professor Hammer at Iowa State University. This program encompassed the entire area of dairy bacteriology, but the bacteriology of butter, cheese and lactic cultures were particularly emphasized. Professor Hammer earned the degree of doctor of philosophy at the University of Chicago in 1920. He was recognized as an outstanding teacher and director of research. This is verified by the many students who obtained advanced degrees in dairy bacteriology during his association with Iowa State University. In 1943, Dr. Hammer accepted a position with Golden State Co., Ltd., San Francisco, California. In this position he was in charge of the research staff in dairy bacteriology. He retired in 1947 but served as a consultant to the dairy industry for many years.

The text, “Dairy Bacteriology,” was written by Dr. Hammer. The first edition appeared in 1928 and revised editions in 1938, 1948 and 1957. In addition, he was author or co-author of approximately 150 scientific publications. The Borden Award in dairy manufacturing was presented to him by the American Dairy Science Association in 1940. Iowa State University awarded him an honorary Doctor of Agriculture degree in 1955 for outstanding achievement in dairy bacteriology.

Dr. Hammer was a member of the American Dairy Science Association, American Public Health Association, Society of American Bacteriologists, International Association of Milk, Food and Environmental Sanitarians, and other professional societies. He is survived by a son, Robert Q. Hammer of Sarasota, Florida, and two grandsons.

F. J. Babel

PROGRAM
ANNUAL MEETING SOUTHERN DIVISION
AMERICAN DAIRY SCIENCE ASSOCIATION

New Orleans, Louisiana
January 30, 31—February 1, 1967

Session at 8:30 A.M.
Board Room, Whitney National Bank

Effect of chemical sanitizers on the Wisconsin mastitis test. R. L. Richter,* and H. E. Randolph, University of Kentucky, Lexington.1

Technique for measuring velocity of portal blood by telemetry, flow rate, and A-V difference for quantitative absorption from the GI tract. S. B. Carr* and D. R. Jacobson, University of Kentucky, Lexington.1

Effect of readily available carbohydrates on rumen fermentation. R. A. Rosser*, J. T. Huber, and C. E. Polan, Virginia Polytechnic Institute, Blacksburg.2

Digestibility studies of Complete dairy rations containing urea and molasses using sheep. Ernesto Villavincencio* and L. L. Rusoff, Louisiana Agricultural Experiment Station, Baton Rouge.1

Nutritive value and yields of barley at three


Relationships among 60-90 day nonreturns diagnosed pregnancies and actual calving of cows bred artificially. B. H. McSparrin and T. E. Patrick, Louisiana State University, Baton Rouge.

Effect of oxytocin injected during the dry period on the succeeding lactation. G. M. Gorman and E. W. Swanson, University of Tennessee, Knoxville.

11:00 A.M.

General Convention Session, ASA&W

Grand Ballroom, Jung Hotel

MONDAY P.M.

Dairy Production

Presiding: D. R. Jacobson
University of Kentucky

1:00 P.M.

Board Room, Whitney National Bank


Comparison of group and individual feeding of concentrates to dairy cattle. G. E. Hawkins, Auburn University Agricultural Experiment Station, Auburn, Alabama.


Ad libitum feeding of complete rations to dairy cows. R. E. Leighton and R. E. Helm, Texas A&M University, College Station.

Relationship of forage quality as reported by DHIA supervisors on milk response in Georgia. O. T. Fosgate and J. M. Durham, University of Georgia, Athens.

Recovery of nitrogen from urea-treated silage. C. E. Polan, J. T. Huber, and C. N. Miller, Virginia Polytechnic Institute, Blacksburg.


Effect of several summer annual green chop crops on voluntary intake and milk production. E. W. Culvhouse and M. J. Montgomery, University of Tennessee Agricultural Experiment Station, Knoxville.


Effect of solar radiation and levels of fiber on production and composition of Holstein cows milk. L. D. Guthrie, J. E. Johnston, J. Rainey and J. A. Lee, Louisiana State University, Baton Rouge.


Dairy Manufacturing

Presiding: R. Y. Cannon
Auburn University

1:30 P.M.

Crescent Room, Sheraton-Charles Hotel

Factors relating to the serving of ice cream as desserts with the Type A school lunch. H. E. Randolph, A. W. Rudnick, Jr., University of Kentucky, Lexington, and C. E. Bevins, Kentucky State Department of Education, Frankfort.

Peach purees and dried peach flakes as flavoring materials for ice cream. J. T. Lazar, L. O. VanBlaricom, Clemson University, Clemson, South Carolina.


Consumer acceptance of milk with various off flavors. R. Y. Cannon, Auburn University Agricultural Experiment Station, Auburn, Alabama.

Composition and container fill of market milk in South Carolina. J. J. Janzen, Clemson University, Clemson, South Carolina.

Relationship between bacterial counts and shelf life of milk. H. C. Olson, Oklahoma State University, Stillwater.

Freezing point and milk solids-not-fat values for milk processed in the Southern United States. R. W. Henningson, Clemson University, Clemson, South Carolina.

Extension

Presiding: N. J. Matherne
Louisiana State University

1:00 P.M.

Canal Room, Sheraton-Charles Hotel
1:00 P.M. Implications of recent marketing developments to the future of the dairy industry in the South. W. H. Alexander, Agricultural Economics and Agri-Business, Louisiana State University, Baton Rouge.

1:30 P.M. Comparison of cost and returns on pasture, dry-lot and combination dairy feeding systems. J. Homer Blackstone, Agriculture Economics, Auburn University, Auburn, Alabama.

2:00 P.M. Obtaining, training and supervising labor on the dairy farm. Bob Wells, Extension Farm Management Specialist, North Carolina State University, Raleigh.

2:30 P.M. Recess. Presiding: George Crain, Mississippi State University

2:45 P.M. Louisiana State University Dairy Improvement Center—LABC and dairy cattle identification program. T. E. Patrick, Dairy Science, Louisiana State University, Baton Rouge.

3:15 P.M. Forage Evaluation Panel
Moderator, H. W. Anderson, Louisiana State University
Forage evaluation research. H. D. Ellzy, Supt., S. E. La. Dairy and Pasture Experiment Station, Franklin, Louisiana.
Improving forage quality with forage evaluation program. R. E. Leighton, Dept. of Dairy Science, Texas A & M University.
Using forage evaluation for feeding dairy cows. Sam Jones, Dairy Extension, Auburn University, Auburn, Alabama.

4:15 P.M. Business Meeting.

MONDAY
Student Division

8:30 A.M. Attend meetings of your choice.
10:30 A.M. Business meeting
Presiding: Arnold Baham
Louisiana State University
Crescent Room, Sheraton-Charles Hotel

12:00 Dutch Luncheon—Students, Advisors, Guests
Presiding: Arnold Baham
Louisiana State University
(Place to be announced)

1:30 P.M. Student Mixer
All interested persons invited.
Crescent Room, Sheraton-Charles Hotel.

TUESDAY A.M.
Joint Session—Dairy Production and Dairy Extension

Presiding: W. R. Murley
Virginia Polytechnic Institute
8:30 A.M.
Board Room, Whitney National Bank

Diurnal variation in rumen fluid pH as related to saliva volume entering rumen. G. E. Hawkins* and J. A. Little, Auburn University Agricultural Experiment Station, Auburn, Alabama.
Feeding patterns and rumen fatty acid concentration. A. H. Rakes* and W. L. Coffin-daffer, North Carolina State University, Raleigh.
Influence of soybean meal, raw soybeans, corn gluten feed and urea on nitrogen metabolism in the rumen. G. V. Davis* and O. T. Stallcup, University of Arkansas, Fayetteville.
Influence of the addition of glycine, fumaric acid and ethylene carbonate on ammonia production from urea in an artificial rumen. O. T. Stallcup*, G. V. Davis and L. E. McGuire, University of Arkansas, Fayetteville.
Effectiveness of poloxalene (a non-ionic surfactant) in the control of clover bloat in cattle. L. E. Foote*, J. E. Johnston, J. Rainey, R. E. Girounard, W. H. Willia, P. B. Brown, L. Guthrie, and A. Baham, Louisiana State University, Baton Rouge.

9:30 A.M. SOUTHERN DIVISION ADSA
Business Meeting
11:00 A.M. GENERAL CONVENTION SESSION ASAW

Dairy Manufacturing
Presiding: J. T. Lazar
Clemson University
8:30 A.M.
Crescent Room, Sheraton-Charles Hotel

Stability of numbers and phage types of staphylococci in herd milks in the Athens milkshed. R. H. Jones, University of Georgia, Athens, E. Butt, Georgia Department of Public Health, Atlanta and F. W. Bennett*, University of Georgia, Athens.
Incidence of spreading colonies from milk plated in glass and polystyrene petri dishes. E. R. Garrison and T. E. Patrick*, University of Arkansas, Fayetteville.
Effects of various added salts on the development of hydrolytic rancidity in milk. M. L. Peeples, Texas Technological College, Lubbock, Texas.
Simple quantitative catalase test for detecting abnormal milk. J. J. Janzen*, and W. C. Cook, Clemson University, Clemson South Carolina.
Effect of filtering and clarifying milk on the catalase and the Wisconsin mastitis test results. H. E. Randolph* and J. L. Buce, Uni-
TUESDAY P.M.

**Joint Symposium—Dairy Science and Animal Science**

1:30 p.m.
North Hall, Jung Hotel

CORN SILAGE AND UREA FOR HIGH LEVEL PRODUCTION IN CATTLE

Presiding: D. R. Jacobson
University of Kentucky

1:30–1:45 Introduction

1:45–2:15 Problems in feeding urea to ruminants.
W. V. Chalupa, Clemson University.

2:15–2:45 Corn silage as a fattening feed for beef cattle.
J. P. Fontenot, Virginia Polytechnic Institute.

2:45–3:00 Recess

3:00–3:30 Urea treated silages for beef cattle.
H. W. Essig, Mississippi State University.

3:30–4:00 Urea in high corn silage rations for dairy cattle.
J. T. Huber, Michigan State University.

4:00–4:30 Discussion.

6:30 **ANNUAL BANQUET AND HONORS PROGRAM, Southern Division ADSA** (Place to be announced)

Speaker: Mr. Ray Samuel, Senior Vice-President, International City Bank, New Orleans.

TUESDAY

**Special Activities, Southern Student Division**

Canal Room, Sheraton-Charles Hotel

8:00–10:00 A.M. Student Section Business Meeting, Election of Officers

10:00–11:00 A.M. Student Section Executive Committee Meeting—Old and New Officers and Advisors.

6:30 P.M. **ANNUAL BANQUET AND HONORS PROGRAM, Southern Division ADSA** (Place to be announced)

Students are invited to attend.

Speaker: Mr. Ray Samuel, Senior Vice-President, International City Bank, New Orleans.

WEDNESDAY A.M.

**Joint Session—Dairy Production, Dairy Extension and Dairy Manufacturing**

Presiding: Sam Jones
Auburn University

8:30 A.M.
Board Room, Whitney National Bank

Effect of decaborane injections in the goat and the cow. G. C. Graf, Virginia Polytechnic Institute, Blacksburg.

Some factors influencing the rate of genetic and environmental progress in a dairy herd. C. Branton* and D. L. Evans, Louisiana State University, Baton Rouge.

Phenotypic, genetic, and environmental correlations among milk constituents. S. Logonathan and N. R. Thompson*, Virginia Polytechnic Institute, Blacksburg.

Phenotypic and genetic relationships among milk yield, length of production life, type and fertility in a Louisiana Holstein herd. D. L. Evans* and Cecil Branton, Louisiana State University, Baton Rouge.


Parallelism between some semen characteristics and phosphorus levels in bovine spermatozoa and seminal plasma. J. D. Roussel* and O. T. Stalleup, University of Arkansas, Fayetteville.

Confidence limits for twin efficiency values. F. G. Martin and C. J. Wilcox*, University of Florida, Gainesville.


Cow turnover in Virginia dairy herds. N. R. Thompson* and W. N. Patterson, Virginia Polytechnic Institute, Blacksburg.

Prevalence of mastitis in dairy herds of North Louisiana: Report of a survey study. W. N. Philpot* and J. M. Johns, Louisiana State University, North Louisiana Hill Farm Experiment Station, Homer.

Influence of age, stage of lactation and season on milk composition of Jersey and Guernsey cows. A. V. Davis* and R. S. Woodward, North Louisiana Experiment Station, Calhoun.

One, two and four hours of grazing with and without silage for lactating dairy cows vs all silage. E. B. Morgan*, H. D. Ellzey, Billy Nelson, Marvin Allen, Louisiana State University Agricultural Experiment Station, Baton Rouge.