Report of the Smalley Committee—1956-57

HEREWITH is the 39th annual report of the Smalley Committee. This season nine different types of samples were distributed by seven subcommittees. These included cottonseed, soybeans, peanuts, meal, vegetable oils, tallow and grease, glycerine, drying oils, and edible fats. In all 4,183 samples were distributed to 492 collaborators, and approximately 15,000 results were tabulated. Table I shows the distribution and participation.

TABLE I

	Number of collaborators	Number of samples	Number of determinations per sample
Cottonseed	49	10	5
Peanuts	9	7	4
Soybeans	26	10	2
Meal	130	15	3
Vegetable oils	96	6	3
Tallow and grease	90	5	7
Glycerine	29	6	8–3
Drying oils	15	6	4
Edible fats	48	5	7–9

We had a 23% increase in participation over the 1955–56 season. More than one-half of this was due to the addition of the Edible Fat series.

The custom inaugurated last year of giving the total receipts and total expenses in the Smalley Report as well as a detailed accounting to the Governing Board has been followed this year.

Total receipts	$6,467.40
Total expenses	6,298.51
Net	$ 168.89

In all cases a detailed report has been given to the collaborators in each series. Only the less routine features will be discussed.

A subcommittee was formed under the chairmanship of D. V. Stingley to distribute samples of edible fats. Due to the trading in bulk shipments and the more or less rigid specifications of purchases, agreement between chemists became a necessity. This subcommittee did an outstanding job. In its first year there were 48 collaborators. It is recommended that the series be continued next year. In fact, its scope may be enlarged to include dilatometric solids and other values.

The participation in the Drying Oils and Glycerine series has been a bit disappointing. Every effort has been made to increase the participation. Possibly we may be able to show a slow growth yearly.

To expedite Canadian deliveries, all samples of tallow and grease and vegetable oils were shipped in one package to B. F. Teasdale, who re-mailed them in Canada. As only one custom clearance was necessary, per sample, this handling tended to expedite distribution.

Mr. Doughtie asked 33 of the collaborators to determine crude fiber on the meal samples. Much valuable data were obtained on the accuracy of the method.

Reasonably sound grading methods have been established in all of the series except Edible Fats, and certificates will be presented for proficiency. They will be presented in the Glycerine Series this year for the first time.

The new rules adopted last year for the Meal Series have eliminated many ties. In the series 75.4% of the 130 collaborators reported all tests on all samples. More than 95% reported on at least 10 samples.

The Smalley Awards to be given this year are:

Cottonseed Series. Oscar Wilkins, Memphis Testing Laboratory, Memphis, Tenn., gets the certificate for first place with a perfect grade of 100%, covering the analysis of 10 samples of cottonseed for moisture, free fatty acid, oil, ammonia, and linters.

P. D. Cretien of the Texas Testing Laboratory, Dallas, Tex., is second with a grade of 99.70.

Peanut Series. Both awards go to Law and Company organizations: first place for the analysis of seven samples of peanuts for moisture, oil, free fatty acid, and ammonia to T. C. Law, Atlanta, Ga., with a grade of 99.20; second place to Phillip C. Whittier, Montgomery, Ala., with a grade of 98.64.

Soybean Series. In this series, which involved the analysis of 10 samples for moisture and oil, we had a tie for first place with perfect grades. Oscar Wilkins will share the honor with Biffle Owen, Planters Manufacturing Company, Clarksdale, Miss.

Vegetable Oil Series. With 96 collaborators participating in the analysis of six samples of vegetable oil for free fatty acid, color, and refining loss, J. S. Sandifer, Swift and Company, Fort Worth, Tex., was first with a grade of 100.0. A. H. Preston of the Houston Laboratories, Houston, Tex., was second with 99.4.

Honorable mention is given to F. A. Adams, Procter and Gamble, Long Beach, Calif.

Tallow and Grease Series. With 90 collaborators participating in the analysis of five samples of inedible fat for titer, free fatty acid, color, moisture, insoluble, and unsaponifiable John S. Boulden, Lever Brothers Company, Baltimore, Md., is first with a grade of 99.87. Harry Gebel, Swift and Company, Hammond, Ind., is second with a grade of 99.83. Honorable mention is given to Harold Beard, Armour and Company, Spokane, Wash.

Drying Oil Series. In this series V. F. Bloomquist, Minnesota Linseed Oil Company, Minneapolis, Minn., is first with a grade of 95.25. This series called for the determination of saponification value, viscosity, specific gravity, acid value, color, and iodine value on six samples. K. E. Holt, Archer-Daniels-Midland Company, Minneapolis, was second with 92.75.

Glycerine Series. The first Smalley Awards for proficiency in the glycerine series will be presented this year. F. C. Bailey, Lever Brothers Co., Cambridge, Mass., with a point score of 289.5 is first, and T. S. McDonald, Procter and Gamble, Dallas, is second with a point score of 249.0. John S. Boulden, Lever Brothers Company, Baltimore, Md., is given honorable mention. The certificates are given for proficiency in the determination of total glycerol, ash, alkalinity, sodium chloride, and total residue on five samples with 29 chemists participating.

Meal Series. In this series, the original Smalley activity, awards are given for proficiency in the combined determination of moisture, oil, and nitrogen and for proficiency in the three individual categories. The American Oil Chemists' Cup for proficiency in the determination of moisture, oil, and nitrogen will be awarded to Biffle Owen, Planters Manufacturing Company, Clarksdale, Miss., with a grade of 99.76. Participating were 130 chemists. The runner-up was Oscar Wilkins, Memphis Testing Laboratory, with a grade of 99.44.

On the determination of moisture we had a three-way tie, all with 100%. In accordance with the rules the tie was broken by recalculating the proficiency, using no tolerance. On this basis Biffle Owen will receive the certificate for first place. His record was a total of 5 points from the median. Harvey Hutton, Woodson-Tenent Laboratory, Clarksdale, Miss., will receive the second place award. His record showed his results to be 6 points off the median. Honorable mention is given R. C. Pope, Pope Testing Laboratory, Dallas, Tex.

On the determination of oil A. G. Thompson, Jr., Southern Cotton Oil Company, Columbia, S. C., was first with a perfect grade of 100. Two were tied for second place, and a recalculation, using no tolerance, showed both to have a cumulative total of 23 points from the median. Therefore both Biffle Owen and M. F. Etheredge, State Chemical Laboratory, State College, Miss., will receive second place certificates.

On the determination of nitrogen Biffle Owen and Oscar Wilkins were tied with a grade of 99.80. Both will receive first place certificates.

The Society is deeply grateful to all of the subcommittee members who made the program possible.

L. V. ANDERSON
R. T. DOUGHTIE, JR.
D. L. HENRY
J. P. HEWLETT
R. J. HOULE
D. V. STINGLEY
R. W. BATES, chairman

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