# PROCEEDINGS OF THE TENNESSEE ACADEMY OF SCIENCE FOR 1967

James D. Caponetti, Secretary
The University of Tennessee, Knoxville

#### MEETINGS OF THE EXECUTIVE COMMITTEE

### January Meeting

The executive committee meeting of the Tennessee Academy of Science was called to order by President Norman Campbell at 7:10 p.m. C. S. T. at Tennessee Technological University on January 13, 1967. Present were Robert L. Wilson, Donald Caplenor, Clinton L. Baker, Richard J. Raridon, John H. Bailey, Melburn R. Mayfield, Paul Wishart, James Major, Brother George Carney, William Ellis, and Richard Stevenson.

The secretary read the minutes of the November executive committee meeting. After corrections, the minutes were approved.

The editor presented an informal report on the status of the *Journal*. Minimum publication costs have increased to \$26.00 per page, but this price can vary depending on the number of illustrations on a given page. Extra page costs are recovered from the author(s). Approximately 1,300 copies of each issue are printed.

Clinton L. Baker reported that the Reelfoot Lake Biological Station was open June, July, and August. Three researchers were there all summer plus several visitors. The work done by the researchers will be published in the January issue of the *Journal*. The following is a fiscal report of the station.

#### FISCAL REPORT

## Reelfoot Lake Biological Station

\$1,363.67
\$3,000.00
TAS 100.16
\$4,463.83
2,822.12
\$1,641.71
EXPENDITURE
\$1,200.16
200.00
wiez 50.00

DIRECTOR'S ACCOUNT	
Salary	\$ 800.00
Withholding Tax	284.00
Expenses	287.96
	\$1,371.96
	-

Total Expenses

\$2,822.12

Melburn Mayfield raised the problem of renovating the Reelfoot Station. Mr. W. L. Criley who is Chief Planner for the Tennessee Department of Conservation has been in touch with Edward Clebsch of the Botany Department at The University of Tennessee exploring the possibilities of establishing a State Park at Reelfoot Lake. Melburn Mayfield followed this up by stating to Mr. Criley that the Academy endorses the plan. The Academy would like to cooperate but could not make a definite commitment. Mr. Criley suggested that a committee be appointed to study the requirements and meet with a consulting firm. Melburn Mayfield proposed that authorization be given to Clinton Baker and Norman Campbell to further pursue the possibilities of developing the Reelfoot Station. The members agreed.

John Bailey submitted a proposed budget for the Junior Academy. The funds are requested from the NSF for the academic year 1967-68.

Richard Raidon presented the following written report of the Collegiate Division:

"The Collegiate Division of the Tennessee Academy of Science met at East Tennessee State University on November 26, 1966, in conjunction with the meeting of the Senior Academy. Approximately 100 students were in attendance and 14 papers were presented in two sections, following a short business meeting. Expenses for the meeting amounted to \$2,605.00, leaving a balance of NSF funds of \$2,065.00 which will be more than sufficient to finance the spring regional meetings which will be held during April."

Dr. Raridon indicated that in the near future, the NSF will discontinue support for the Collegiate Division.

Paul Wishart gave the following synopsis on the Visiting Scientist Program as of January 13, 1967. One thousand rosters were mailed to high schools in Tennessee. There were 11 individual requests for rosters. There were 97 requests for visits, with 54 scheduled and pending. Twenty-five visits and 13 files have been completed. Dr. Wishart stated that the NSF will also discontinue further support for the Visiting Scientist Program.

\$1,450.16

James Major submitted the following report on the Science Talent Search:

"Sixty-five high schools of the state have entered contestents in the 22nd annual Tennessee Science Talent Search. The National Science Talent Search judging committee is now in the process of selecting the 40 National Winners. The state judging committee will select the Honors Group of the Tennessee Science Talent Search in February. These students will be recommended for scholarships to the colleges of their choice. Plans are tentative concerning the program to honor winners in the 1967 Tennessee Science Talent Search. The annual followup on winners of former searches has not been made this year. A report was mimeographed on the present status of the winners in the searches of 1954 to 1965. The winners in the 1966 search will soon be contacted. This check can be made on other earlier searches if funds are available."

According to Mr. Majors, the great majority of the older participants attended college and entered a profession. The majority of recent participants are now attending college.

President Campbell, who is also Chairman of the Research Committee, gave his report.

'In November and December of 1965 six grants were made. These grants, which were reported in detail to the Executive Committee on January 14, 1966, totaled \$470.00, averaging \$78.33 each. These grants left a balance of \$68.00 available from AAAS from the 1965 allotment.

'On January 1, 1966, an additional sum of \$269.00 became available, making a total of \$337.00 available at that time. One application, that of Miss Gayle Burns, of Central High School, Memphis, has just been approved for \$50.00, to be used on studies on dimethyl sulfoxide. Three other applications are currently being considered, and others are expected to be received. It is anticipated that most of the funds available in 1966 will be awarded before January 1, at which time an additional \$269.00 will presumably be made available by AAAS."

During the past several years several members of the Academy have suggested that a certificate of exemption from the Internal Revenue Service be obtained.

This would exempt the Academy from income tax and other taxes and would make certain that contributions to the Academy by various donors could be deductible by the donors on their income tax returns. The suggestion has been translated into action by the treasurer, Robert Wilson, who sought the counsel of a legal firm in Chattanooga. At the executive meeting, Mr. Wilson submitted a letter of reply from Stophel, Caldwell and Heggis, Attorneys and Counsellors at Law in Chattanooga. The letter advised that the Academy should first be incorporated and then apply for a certificate of exemption. Several valid and legal reasons were presented for this course of action. The legal fee for declaring the Academy a corporation would be \$250.00. Richard Stevenson introduced a motion that the Academy go ahead with incorporation. James Caponetti seconded the motion, and it was carried. Clinton Baker stated that the members of the executive committee should be the Board of Directors of the corporation. All present agreed. Clinton Baker further stated that if the Academy was not incorporated within the next six months, we should seek tax exemption anyway. All present agreed. At the January meeting of the executive committee last year, Clinton Baker introduced a motion to the effect that if the Academy should ever dissolve, any remaining funds should go to he AAAS. Richard Raridon seconded that motion, and it was carried. During the present meeting, Clinton Baker reaffirmed that motion of last year, and all members present concurred.

The treasurer, Robert Wilson, further submitted a treasurer's report and an auditor's report, as follows:

### TREASURER'S REPORT

#### April 1, 1966—December 31, 1966

RECEIPTS:		
Bank Transfer in Membership	\$ 8,00	7.94
Regular\$2,160		
Other 271	1.00 \$ 2,431.00	
Journal Subscriptions	630.00	
Sale of Publications	262.47	
Advertising	92.50	
NSF Grants	10,887.54	
Trane Co. Grant	25.00	
Realfoot Lake Repayment	250.00 14,578	3.51
Total Receipts	\$22,586	6.45
DISBURSEMENTS:		
President's Office Expenses	\$ 252.67	
Secretary:		
Allowance\$ 343	3.83	
Office Expense	3.82 727.65	
Editor:		
Allowance 400	0.00	
Office Expense 42	2.25 442.25	

Treasurer:  Allowance Office Expense Executive Committee Expenses  Printing & Mailing of Journal Science Talent Search Expenses Reelfoot Lake Biological Station		973.57 372.16 2,928.55 503.90 3,100.16	
NSF Programs:  Jr. Academy  Collegiate Division  Visiting Science Program  Reelfoot Lake Scholarship Payment  Equipment Rental  AAAS Research Grant  Refund to NSF Grants Account  Miscellaneous Expenses  Balance  Less Outstanding Checks  Balance per Bank Statement, December 30, 1966	2,000.00	5,000.00 250.00 220.90 70.00 194.04 147.34	15,183.19 7,403.26 80.50 \$ 7,322.76

# REPORT OF THE AUDITOR

To The Tennessee Academy of Sciences:

I have examined the Treasurer's Report of cash receipts and disbursements, operations account, Tennessee Academy of Science for the period, April 1, 1966, to December 31, 1966. In my opinion, on the basis of information made available to me, the statement fairly represents the transactions of the operations account. Signed: Rayford J. McLaurin, Auditor.

Clinton Baker moved that both reports be approved. Richard Stevenson seconded the motion, and it carried.

The question arose of mileage allowance for members who travel by automobile on Academy business. After discussion, the figure of 6c/mile seemed reasonable. Clinton Baker put this into the form of a motion; it was seconded by Richard Stevenson, and it carried.

Clinton Baker presented a report of the Academy Conference and AAAS Council meeting in Washington, D. C., December 27, 1966.

Melburn Mayfield also attended the Academy Conference and submitted a report.

President Campbell requested the members present to appoint Academy representatives to the next AAAS Academy Conference and Council Meeting. For the Academy Conference, William Ellis, Norman Campbell, and Clinton Baker were chosen. For the Council Meeting, William Ellis and Norman Campbell were selected. The secretary was then instructed to submit the names of the representatives to the AAAS.

The next order of business was the selection of a director for the Reelfoot Station. James Caponetti moved that Clinton Baker be named director. Richard Stevenson seconded the motion, and it carried.

The topic of future NSF support for the Visiting Scientist Program and the Collegiate Division was re-

opened by Melburn Mayfield. During the past several years, the NSF has been cutting back on such programs, and all of us have had the idea that they would eventually stop all funds. While Melburn Mayfield was president last year, he realized that the Academy would have to seek support elsewhere. Accordingly, he sent a summary to Education Commissioner Warf, Revenue Commissioner Benson, and Special Assistant to the Governor Richard Barry on December 12, 1966.

President Campbell, with the aid of the several appropriate executive committee members, outlined the following tentative budget for this next year.

## I. INCOME

Total

1. Dues	\$5,200.00	
2. Journal Subscriptions	775.00	
3. Sale of Publications	250.00	
4. State Department		
of Education	3,000.00	
5. Advertisements	300.00	
Total		\$9,525.00
II. EXPENSES		
1. Journal Printing Costs	\$3,700.00	
<ol><li>President's Expenses</li></ol>	250.00	
3. Secretary's Expenses	775.00	
4. Editor's Expenses	600.00	
5. Treasurer's Expenses	1,000.00	
6. Executive Committee		
Meetings	400.00	
7. Annual Meeting	300.00	

\$7,025.00

Several members of the executive committee raised the question of how the \$3,000.00 from the State Department should be spent. Clinton Baker moved that \$225.00 be allotted to the Science Talent Search Committee to help defray the expenses of follow-ups. Richard Stevenson seconded, and the motion was carried. Richard Stevenson then moved that \$500.00 be turned over to the Junior Academy. Melburn Mayfield seconded the motion, and it carried. As for the remainder of the \$3,000.00, the members of the executive committee agreed that the President be given the power to spend the money as he sees fit. Clinton Baker introduced a motion that the whole tentative budget be approved. Richard Stevenson seconded the motion, and it carried.

Paul Wishart then moved that the meeting adjourn. Clinton Baker seconded, and the motion was carried. The time was  $11:50~\rm p.m.$  C. S. T.

# November Meeting, Cookeville

The executive committee meeting of the Tennessee Academy of Science was called to order by President Norman Campbell at 7:50 a.m. CST in the restaurant meeting room of the Holiday Inn in Cookeville, Tennessee, on November 17, 1967. Members present were Norman Campbell, Roger Rusk, James D. Caponetti, Robert L. Wilson, Donald Caplenor, Clinton L. Baker, Richard J. Raridon, John H. Bailey, Melburn R. Mayfield, Paul Wishart, James Major, and William Ellis.

The secretary read the minutes of the January executive meeting. They were approved. During 1967 there were 36 new members, 2 drops, and 4 deaths. At this moment, the total membership of the Academy stands at 843. The secretary read a letter of invitation from Dr. H. Malcolm Owen of the University of the South to hold our annual meeting at Sewanee in 1969. Action on the invitation was deferred until the business meeting.

The editor reported that during 1967, six issues of the Journal were published, making the Journal now up to date. Volume 42 has been completely distributed. It consisted of 137 pages containing 35 articles. Journal costs were \$35.00 per page. Thirteen hundred copies of each issue were printed. Numerous requests were received for back issues. The editor suggested that a cumulative index for the Journal be published and that a new news editor be sought since Dr. Richard Stevenson has resigned from the executive committee. Action on both topics was deferred to the January meeting.

The director of the Reelfoot Station reported that there are plans for a new biological station. Preliminary plans are for the new station to be located in a clear area about 1 1/2 miles from Tiptonville. About \$100,000 would be needed for a start on a durable T-shaped building containing 9,000 square feet of space for administration and research. Lodging, dining, recreational facilities, and an airport could be added later.

The director of the Junior Academy submitted a final report to the NSF on projects completed during 1966-1967. The total cost of the programs was \$5,470.25. Of this, \$500.00 was supplied by the Senior Academy. For the present academic year, \$5,497.00 is available to the Junior Academy; \$4,997.00 from NSF, and \$500.00 from the Senior Academy. On October 31, 1967, Dr. Bailey submitted another proposal to the NSF for 1968-1969 requesting \$4,994.00. The 1967 Junior Academy Handbook and Transactions has been published. It is an excellent compilation of all activities of the Junior Academy during the year and contains five papers of excellence presented at the annual meeting at Vanderbilt University, April 14-15, 1967. Dr. Bailey proposed that we send two students to the National Junior Academy meeting to be held in New York in conjunction with the AAAS meeting in December. It was moved and seconded that we make it financially possible to send Dr. Bailey and two students to the meeting. The motion passed.

The director of the Collegiate Division submitted the following report: The Seventeenth Annual Meeting of the Collegiate Division was held November 26, 1966, at East Tennessee State University. Approximately 100 students attended and 14 papers were presented by students from eight schools. Regional meetings were held during the spring of 1967 at Lambuth College, David Lipscomb College, and Lincoln Memorial University, attended by 150 students and faculty. Papers were given by 41 students representing 15 schools.

While Bro. George Carney is on leave, the Western Regional Sponsor is Dr. Richard F. Jacob, Christian Brothers College. The other sponsors are Dr. Robert E. Martin, Tenn. Tech., and Professor Robert G. Zeigler, Lincoln Memorial University.

The Collegiate Division received \$4,670.00 from NSF for 1966-1967 and spent \$4,092.79, including \$181.00 to the Academy for indirect costs and \$100.00 to the Journal. The Division has received \$2,250.00 for 1967-1968, the last year of NSF support.

The director of the Visiting Scientist Program submitted his report. During 1966-1967 there were 166 actual visits. Visitor costs amounted to \$7,204.93. Operating costs were \$2,815.96, indirect costs \$420.00, and the total was \$10,440.89.

The director of the Science Talent Search Committee submitted copies of the 1967 Honors Group in the twenty-second annual Science Talent Search. One student, John N. Hooker, Jr., of Knoxville, was a national winner in the Westinghouse Science Talent Search. Four other Tennessee students received national recognition. The director announced that at the end of this year he will resign because he is now retired from active teaching.

The treasurer reported that the Academy now has tax exempt status. The Academy's operations account had \$7,322.76 cash in the bank as of January 1, 1967.