## Social Science

## A STATISTICAL STUDY OF COLLEGE STUDENTS' VIEWS OF CLASSROOM TEACHING <br> herbert patterson, oklahoma A.\& m. College

During five years, 1923-1928, a questionnaire to students on classroom teaching was used in the School of Education of the Oklahoma Agricultural and Mechanical College. Following is a copy of the questionnaire.

INSTRUCTOR
CLASS
ROOM
HOUR
DAYS $\qquad$
QUESTIONNAIRE TO STUDENTS ON CLASSROOM TEACHING In order to better, if possible, the instruction in the School of Education, I am asking your cooperation. Please be entirely honest. The material will be used in a confidential way, no one seeing the questionnaire except the instructor concerned and the dean. Read each question and put a check in one of the columns which follow the question.
The above statements express my honest judgment.
SIGNED
Date


1. Does he begin and end classes on time?
2. Docs he keep the air in the room as fresh as possible?
3. Does he prepare his work carefully?
4. Is he always kind and courteous?
5. Does he speak loudly and clearly enough?
6. Can you take good notes from his discussions?
7. What is your general estimate of his ability as a teacher?

8. What positive suggestions for improving the work do you offer?

A discussion of the beginning of the use of a student questionnaire on classroom teaching at Oklahoma Agricultural and Mechanical College appeared as a published article in "School and Society," January 31, 1925, under the title "An Experiment in Supervising College Teaching."

Only undergraduate classes were given the questionnaire. Thirteen different instructors participated in the experiment and student responses totalled 11,552 . The following tables, however, are confined to the seven instructors who were in residence during the entire period of the experiment, five years. The student responses considered in the table total 9,701 .

A very simple method of giving quantitative value to the student responses was to call "excellent" $100 \%$, "average" $60 \%$, and "poor" $20 \%$. Each class was taken as a unit and then an average computed each quarter for all classes taught by the same instructor. It is these averages (arithmetical means) which are used in the tables. Per cents for the seven instructors are given under the letters T, U, V, W, X, Y, Z, and an average computed for the entire group.

TABLE 1
Does He Begin and End Classes on Time?

| Time | Instructors |  |  |  | $\begin{gathered} \mathrm{X} \\ \text { Per } \\ \text { Cent } \end{gathered}$ | $\begin{gathered} \mathbf{Y} \\ \mathrm{Per} \\ \mathrm{Cent} \end{gathered}$ | Average |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | T | U | V | W |  |  | Z |  |
|  | Per | Per | Per | Per |  |  | Per | Per |
|  | Cent | Cent | Cent | Cent |  |  | Cent | Cent |
| Fall, 1923 | 86 | 88 | 57 | 85 | 90 | 79 | 86 | 81 |
| Winter | 90 | 96 | 85 | 89 | 93 | 90 | 93 | 90 |
| Spring | 90 | 96 | 95 | 93 | 90 | 94 | 90 | 92 |
| Fall, 1924 | 82 | 90 | 85 | 90 | 92 | 86 | 91 | 88 |
| Winter | 85 | 87 | 100 | 91 | 93 | 94 | 89 | 91 |
| Spring | 88 | 88 | 88 | 93 | 94 | 92 | 93 | 90 |
| Fall, 1925 | 83 | 89 | 87 | 87 | 95 | 94 | 92 | 89 |
| Winter | 90 | 86 | 95 | 81 | 85 | 88 | 89 | 87 |
| Spring | 88 | 96 | 88 | 93 | 97 | 92 | 82 | 90 |
| Fall, 1926 | 82 | 86 | 85 | 93 | 94 | 91 | 95 | 89 |
| Winter | 93 | 95 | 73 | 95 | 93 | 97 | 91 | 91 |
| Spring | 93 | 92 | 96 | 93 | 96 | 93 | 96 | 94 |
| First Sem., 1927 | 89 | 91 | 92 | 87 | 95 | 87 | 85 | 89 |
| Second Semester | 91 | 87 | 90 | 91 | 88 | 94 | 89 | 90 |

Since the semester organization prevailed during 1927-28, it is perhaps better to make comparisons between the first six quarters, 1923-25, and the last six quarters, $1925-27$. If such a comparison be made, it is found that the average for 1923-25 was 88 per cent and for 1925-27 the average was 90 per cent.

TABLE II
Does He Keep The Air In The Room As Fresh As Possible?

| Time | T <br> Per <br> Cent | Instructors <br> Per <br> Pent | V <br> Per <br> Cent | W <br> Per <br> Cent | X <br> Per <br> Cent | Y <br> Per <br> Cent | Z <br> Per <br> Cent | Per <br> Cent |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | ---: | ---: |
| Fall, 1923 | 84 | 89 | 100 | 74 | 86 | 81 | 80 | 84 |
| Winter | 93 | 86 | 100 | 81 | 89 | 80 | 76 | 86 |
| Spring | 87 | 87 | 100 | 94 | 85 | 82 | 84 | 88 |
| Fall, 1924 | 87 | 89 | 99 | 88 | 96 | 89 | 95 | 91 |
| Winter | 96 | 96 | 84 | 82 | 92 | 94 | 94 | 91 |
| Spring | 92 | 88 | 100 | 83 | 84 | 88 | 80 | 87 |
| Fall, 1925 | 90 | 92 | 96 | 81 | 90 | 86 | 85 | 88 |
| Winter | 96 | 97 | 100 | 88 | 91 | 83 | 84 | 91 |
| Spring | 93 | 92 | 95 | 85 | 94 | 88 | 94 | 91 |
| Fall, 1926 | 85 | 81 | 97 | 85 | 77 | 74 | 83 | 83 |
| Winter | 88 | 92 | 94 | 83 | 95 | 85 | 84 | 88 |
| Spring | 93 | 95 | 95 | 90 | 93 | 88 | 90 | 92 |
| First Sem., 1927 | 87 | 95 | 87 | 81 | 90 | 78 | 78 | 85 |
| Second Semester | 94 | $\mathbf{8 7}$ | 89 | 83 | 91 | 93 | 84 | $\mathbf{8 8}$ |

Comparing again, the average for the first six quarters, 1923-25, is 87 per cent, and the average for the last six quarters, 1925-27, is 88 per cent.

TABLE III
Does He Prepare His Work Carefully?

| Time | Instructors |  |  |  |  |  | Average |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | T | U | V | W | X | Y | Z |  |
|  | Per | Per | Per | Per | Per | Per | Per | Per |
|  | Cent | Cent | Cent | Cent | Cent | Cent | Cent | Cent |
| Fall, 1923 | 97 | 91 | 99 | 88 | 89 | 98 | 98 | 94 |
| Winter | 98 | 96 | 100 | 92 | 97 | 98 | 98 | 97 |
| Spring | 97 | 96 | 99 | 88 | 95 | 96 | 100 | 95 |
| Fall, 1924 | 91 | 98 | 99 | 95 | 97 | 98 | 98 | 96 |
| Winter | 96 | 96 | 100 | 92 | 97 | 99 | 99 | 97 |
| Spring | 97 | 94 | 100 | 93 | 95 | 96 | 98 | 96 |
| Fall, 1925 | 98 | 94 | 99 | 97 | 91 | 94 | 99 | 96 |
| Winter | 100 | 96 | 100 | 95 | 98 | 94 | 100 | 97 |
| Spring | 96 | 94 | 100 | 96 | 99 | 96 | 100 | 97 |
| Fall, 1926 | 96 | 91 | 99 | 97 | 97 | 93 | 100 | 96 |
| Winter | 98 | 96 | 100 | 97 | 97 | 93 | 95 | 96 |
| Spring | 97 | 96 | 100 | 92 | 94 | 95 | 100 | 96 |
| First Sem., 1927 | 97 | 93 | 100 | 96 | 95 | 96 | 97 | 96 |
| Second Semester | 98 | 88 | 91 | 98 | 89 | 95 | 97 | 93 |

Once again comparing, the average for $1923-25$ is 95 per cent, and for $1925-27$ it is 96 per cent.

TABLE IV
Is He Always Kind And Courteous?

| Time | Instructors |  |  | Cent W | Cent | Cent | Average |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} \text { Cent } \\ \hline \end{gathered}$ | $\begin{gathered} \text { Cent } \\ \mathrm{U} \end{gathered}$ | $\begin{gathered} \text { Cent } \\ \mathrm{V} \end{gathered}$ |  |  |  | $\begin{gathered} \text { Cent } \\ \text { Z } \end{gathered}$ | Cent |
|  | Per | Per | Per | Per | Per | Per | Pcr | Pcr |
|  | Cent | Cent | Cent | Cent | Cent | Cent | Cent | Cent |
| Fall, 1923 | 97 | 98 | 97 | 86 | 98 | 100 | 98 | 96 |
| Winter | 99 | 96 | 96 | 95 | 100 | 100 | 99 | 97 |
| Spring | 98 | 97 | 83 | 95 | 99 | 96 | 100 | 95 |
| Fall, 1924 | 95 | 98 | 92 | 97 | 98 | 97 | 99 | 96 |
| Winter | 97 | 96 | 100 | 98 | 97 | 99 | 99 | 98 |
| Spring | 96 | 96 | 98 | 98 | 99 | 100 | 99 | 98 |
| Fall, 1925 | 96 | 96 | 99 | 96 | 98 | 98 | 99 | 97 |
| Winter | 96 | 93 | 100 | 97 | 99 | 97 | 99 | 97 |
| Spring | 97 | 93 | 95 | 97 | 99 | 98 | 100 | 97 |
| Fall, 1926 | 97 | 94 | 97 | 95 | 98 | 97 | 97 | 96 |
| Winter | 98 | 98 | 100 | 98 | 99 | 98 | 98 | 98 |
| Spring | 98 | 99 | 99 | 96 | 97 | 95 | 100 | 97 |
| First Sem., 1927 | 96 | 98 | 98 | 93 | 96 | 96 | 98 | 96 |
| Second Semester | 96 | 97 | 99 | 98 | 96 | 96 | 97 | 97 |

A similar comparison to that made in the case of previous tables shows the average for $1923-25$ is 96 per cent and for 1925-27 it is 97 per cent.

TABLE V
Does He Speak Loudly And Clearly Enough?


The average for $1923-25$ is 90 per cent and for $1925-27$ it is 93 per cent.

TABLE VI
Can You Take Good Notes From His Discussion?

| Time | Instructors |  |  |  |  |  | Average |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | T | $\mathrm{U}^{\text {a }}$ | V | W |  |  |  |  |
|  | Per Cent | Per Cent | Per Cent | Per |  | $\begin{aligned} & \mathbf{Y} \\ & \text { Per } \end{aligned}$ | $\begin{aligned} & Z \\ & \text { Per } \end{aligned}$ | Per |
| Fall, 1923 | 77 | 80 | $\bigcirc$ | Cent |  | Cent | Cent | Cent |
| Winter | 83 | 82 | 92 | 72 | 73 | 71 | 84 | 78 |
| Spring | 75 | 80 | 86 | 79 81 | 83 | 84 | 94 | 85 |
| Fall, 1924 | 75 | 91 | 96 | 81 | 80 | 73 | 93 | 81 |
| Winter | 87 | 84 | 76 | 86 | 79 | 70 | 82 | 82 |
| Spring | 83 | 88 | 98 | 86 | 83 | 76 | 92 | 83 |
| Fall, 1925 | 83 | 95 | 88 | 87 | 84 | 71 | 93 | 86 |
| Winter | 83 | 83 | 82 95 | 89 92 | 81 | 72 | 92 | 84 |
| Spring | 87 | 86 | 89 | 92 86 | 87 | 78 | 94 | 87 |
| Fall, 1926 | 85 | 84 | 89 93 | 86 | 87 | 81 | 94 | 87 |
| Winter | 86 | 94 | 88 | 88 | 80 | 75 | 86 | 84 |
| Spring | 88 | 90 | 90 | 89 | 84 | 74 | 92 | 86 |
| First Sem., 1927 | 86 | 84 | 77 | 92 | 85 73 | 77 | 93 | 87 |
| Second Semester | 90 | 78 | 80 | 88 | 73 80 | 75 | 89 | 81 |
| Second Semester | 90 | 78 | 80 | 89 | 80 | 76 | 87 | 82 |

Comparing again, the average for $1923-25$ is 82 per cent and for 1925 27 it is 85 pper cent.

TABLE VII
What Is Your General Estimate Of His Ability As A Teacher?

| Time | Instructors |  |  |  |  |  | Average |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | T | U | V | W | X | Y | Z |  |
|  | Per | Per | Per | Per | Per | Per | Per | Per |
|  | Cent | Cent | Cent | Cent | Cent | Cent | Cent | Cent |
| Fall, 1923 | 99 | 88 | 98 | 77 | 88 | 87 | 95 | 90 |
| Winter | 99 | 90 | 96 | 87 | 97 | 89 | 98 | 93 |
| Spring | 96 | 92 | 96 | 88 | 95 | 87 | 97 | 93 |
| Fall, 1924 | 94 | 97 | 97 | 91 | 94 | 86 | 95 | 93 |
| Winter | 100 | 93 | 100 | 91 | 98 | 88 | 98 | 95 |
| Spring | 96 | 91 | 100 | 90 | 94 | 84 | 97 | 93 |
| Fall, 1925 | 97 | 96 | 92 | 93 | 95 | 88 | 98 | 94 |
| Winter | 98 | 90 | 100 | 94 | 94 | 85 | 98 | 94 |
| Spring | 96 | 93 | 94 | 95 | 95 | 91 | 98 | 94 |
| Fall, 1926 | 97 | 89 | 99 | 93 | 91 | 87 | 99 | 93 |
| Winter | 98 | 99 | 94 | 94 | 91 | 86 | 96 | 94 |
| Spring | 97 | 95 | 99 | 93 | 86 | 87 | 98 | 93 |
| First Sem., 1927 | 95 | 94 | 96 | 92 | 88 | 93 | 96 | 93 |
| Second Semester | 97 | 88 | 93 | 93 | 80 | 88 | 94 | 90 |

The average for $1923-25$ is 92 per cent and for $1925-27$ it is 93 per cent.
A study of the seven tables gives room for the following three conclusions:
(1) The average varies but little throughout the five years.
(2) There is a slightly higher average for the six quarters, 1925-27, than for the six previous quarters, 1923-25. This amounts to from one to three per cent.
(3) The averages for the fifth year, under the semester plan, tend to be slightly lower than the averages for the third and fourth years under the quarter plan. This amounts to from one to four per cent.

