

RECOMMENDATIONS TO THE CURRICULUM AND ACADEMIC STANDARDS COMMITTEES

Submitted by the Subcommittee on Science Requirements, May 14, 1957.

Members: Behen, Cohen, Dehnostel, D'Isa, Dykema, Ellis,
Evans, Malak, Miller, Reilly, Scudder, Wilcox.
Chairman: Dr. Scudder.

NOTE: The Subcommittee came to unanimous agreement on all recommendations.

I. Integrated courses in mathematics and science.

It is recommended that the Committees appoint a standing committee which shall provide a detailed prospectus for and supervise the instruction of the following four courses. The committee should consist of one member each from the departments of Mathematics, Physics, Chemistry, and Biology, one member from the department of Education, and one member to be rotated among other departments starting with the School of Business Administration.

- A. A 3-hour course in General Mathematics.
- B. A 3-hour course in Properties of Matter (Prerequisite: the above math course or its equivalent). Essentially physics and astronomy, possibly meteorology. Laboratory and lab. fee to be included.
- C. A 3-hour course in Varieties of Matter (Prerequisite: the above two courses or equivalent). Essentially chemistry, metallurgy, geology. Laboratory and lab. fee to be included.
- D. A 3-hour course in Living Matter (Prerequisite: the above three courses or equivalent). Study of form and function in living organisms. Laboratory and lab. fee to be included.

II. Changes in curricula, 1958.

It is recommended that the Committees initiate whatever actions are necessary in order to effectuate the following regulations for students entering the University in September, 1958, or later.

- A. The major in Elementary Education shall include 9 hours of the integrated math and science program. This change shall be conditional on the following:
 - 1. The courses shall be approved by the Committees.
 - 2. The courses shall be approved by the Education Department.
- B. The major in General Business shall include 12 hours of the de-

III. Changes in curricula, after 1950.

- A. Business Administration. It is recommended that all other department in the School of Business Administration enter the integrated program as soon as is feasible, but only with approval by that School.
- B. Liberal Arts. It is recommended that the Committees examine the integrated program with the aim of deciding whether these courses are or can be the most suitable method of incorporating science in the liberal arts curricula. If not, some other method should be decided on and the problem settled as soon as possible.

IV. Physical Limitations.

The proposed science courses are to include some individual laboratory work and much demonstration. This will require more laboratory space than we now have, and properly designed lecture rooms outfitted for demonstrations. Furthermore, all departments of the School of Business Administration, and possibly liberal arts, should eventually be included in the program. This will put severe demands not only on the physical plant but also on the teaching personnel, especially in the Mathematics Department. It is therefore recommended that the Committees study the problems of facilities and personnel and make the above proposed changes with these limitations in mind.

V. Objectives.

It is recommended that the Committees revise the University Catalog to include the following statement in an appropriate place.

Courses in science are included in all our curriculums because science is an important part of modern culture. Such courses have a twofold function: (1) To provide a knowledge of certain facts vital to modern living--knowledge which the lower schools do a good job of supplying--and (2) the primary purpose of the college program--to gain an understanding of the natural world and of science itself. The insight and knowledge developed through the realization of this second function should provide:

- (1) An acquaintance with a selection of laws, hypotheses, and theories which will make possible further pursuit of the subject.
- (2) An appreciation of the power and limitations of exact, thorough observation and rigorously critical thinking, with sufficient practice to apply these procedures independently and to deal intelligently as a citizen with scientific advance.
- (3) An enrichment of life through an appreciation of the workings of nature.

We propose that an honor society be established at The Youngstown University for the dual purpose of recognizing outstanding students in the liberal arts and sciences, and of encouraging superior students to distinguish themselves through high scholastic achievement while pursuing a liberal education.

Candidates for election to the society must meet the following minimum requirements:

- (1) They shall be seniors who are candidates for graduation and whose major field of study is one in the College of Arts and Sciences;
- (2) Their honor-point average for all of their college work shall place them in the upper ten percent of their class, and shall not be below 2.5, where a perfect record is reckoned to be 3.0;

Their honor-point average will be figured on courses completed up to the final twenty hours of degree requirements;

- (3) Their record must demonstrate that their course of study has not been narrowly specialized, but has included a sufficient number of courses in both the arts and sciences to indicate a breadth and depth of study in several disciplines.

A student who meets the above minimum requirements will be eligible for election into the society, but will not be assured of automatic admission. In addition, recommendations will be sought from department chairmen. Final determination of membership shall be by vote of a permanent faculty committee which shall meet to review the individual records of students eligible for election.