Book Reviews

Colleges for Our Land and Time. The land-grant idea in American education. Edward Danforth Eddy, Jr. Harpers, New York, 1957. 328 pp. \$4.50.

Three dates constitute milestones in the history of the land-grant institutions of our nation. The first was 1862, when, in the midst of the Civil War, President Lincoln signed the bill, sponsored by Representative J. M. Morrill of Vermont, "to donate public lands to the several states and territories which may provide colleges for the benefit of agriculture and the mechanic arts." In 1887, the second major development came with the passage by the Congress of the Hatch Act (named for a representative from Missouri), providing \$15,000 of federal support annually to each state and territory that would create an "agricultural experiment station, in order to aid in acquiring and diffusing among the peoples of the United States, useful and practical information on subjects connected with agriculture, and to promote scientific investigation and experiment respecting the principles and applications of agricultural sciences."

The third milestone came in 1914, when federal grants were given to states and territories having land-grant colleges, to aid in "cooperative agricultural extension work [which] shall consist of the giving of instruction and practical demonstrations in agriculture and home economics to persons not attending or resident in said colleges in the several communities, and imparting to such persons information on said subjects through field demonstrations, publications and otherwise."

E. D. Eddy has summarized the facts regarding the inception of the land-grant institutions, their development over the 100 years since 1862, and their current status. It is a record of remarkable growth in both size and influence. For years to come this book is certain to be a source that will be frequently referred to by those concerned with the historical record.

Previous to 1860, nearly all of the colleges in this country were church-sponsored and denominationally inspired. Their graduates became clergymen, schoolmasters, doctors, and lawyers. Science received little emphasis and usually was treated like philosophy, theology, the dead languages, and mathematics something to be studied and learned by rote, which remained essentially the same decade after decade.

Attendance at college gave respectability and social prestige but very little, if any, specific training that would enable the graduate to be more efficient in the vocations upon which the economic progress of society depended. Harvard College, as late as 1850, was declared by Louis Agassiz to be "a respectable high school where they taught the dregs of learning."

Although the new land-grant colleges were characterized by much more zeal than experience or skill in the devising of ways to attain their goals, they were dissatisfied with the colleges then in existence, hopeful that science might be used more effectively to advance the public welfare (particularly in regard to agriculture), and determined that higher education should no longer be a monopoly of the socially elite.

But it is not surprising that very few students sought entry to the new landgrant colleges and that farmers had little confidence in what professors could do for agriculture. Many of the early programs of instruction in agriculture were both ridiculous and pathetic.

The professors, trained in the classical institutions, knew little science, and what they taught was not focused on the physical and biological problems confronting farm operators. The first professor of agriculture at the University of California, according to E. J. Wickson, gave "a thorough course in fruit growing in the Garden of Eden, passing spiritedly to grain growing in Egypt and the conditions surrounding the corner in sorghum which Joseph contrived for Rameses II, pausing to look carefully into the dairy practices of the Scythians, and was rapidly approaching the relatively modern cabbage growing of Cincinnatus when, as tradition declares, both instructor and pupils fell asleep while pursuing dryfarming by the encyclopedestrian method of teaching."

The clear need was for new scientific facts and the development of improved

farm practices based on careful research. With the creation of the agricultural experiment stations the professors of agriculture learned new facts and new processes that would benefit farmers. Their research findings also enabled the professors to put new substance into their college teaching, and thereby they won the interest and respect of increasing numbers of students.

As research showed the way, the agricultural colleges became more specialized. No longer were there just professors of agriculture, but whole new departments were created in agricultural chemistry, dairy husbandry, animal husbandry, agronomy, horticulture, entomology, and a dozen other fields of science related to plant and animal production.

By 1955 the 69 land-grant institutions (including 17 for Negro students) enrolled more than 20 percent of the students in the nation's degree-granting colleges and universities. They awarded nearly 40 percent of all doctoral degrees granted in that year. Over half of all officers commissioned in 1955 through the Reserve Officers' Training Corps were from the land-grant institutions.

But for those who seek a critical analysis of the hows and whys of the accomplishments and shortcomings of the landgrant institutions, this publication will not supply the answers. For example, it does not tell in what ways, if any, the progress of the larger state universities incorporated in the land-grant system has been better than or different from that of other large state universities. Whether the "mechanic arts" part of a land-grant institution is significantly different from the engineering school in other universities, the book does not say. Neither does it explain why, with only a few exceptions, the land-grant institutions in the older and more densely populated states did not experience anything like the relative growth and prestige that their sister institutions in other parts of the nation did. It would be helpful, also, to know whether academic freedom and the support of fundamental research have, on the average, fared as well in these institutions of higher education supported by the public as in those depending upon religious groups or other private sources.

Many of us would welcome a critical review of the record of our land-grant colleges and universities, which the world recognizes as being, in so many ways, unique and also so peculiarly American. We believe such an analysis would disclose much that would be enlightening, and that it would likewise confirm the confidence so many persons have in these land-grant institutions.

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