MATHEMATICS

Intercollegiate Competition Held for Mathematics Prizes

Winning Teams Will Bring Glory and Cash to Both Alma Mater and Themselves; \$1,000 Fellowship at Top

NEW intercollegiate competition, which will pay off in glory and cash for proficiency in mathematics, is being sponsored by the Mathematical Association of America, it is announced here by Dr. W. D. Carins, secretary of this organization, whose nearly 2,000 members teach on college and university faculties.

Football fans who yearly scan the listing of collegiate football team rankings will soon be able to learn the rating of America's college teams in higher mathematics and what schools were "licked" by advanced calculus, analytical geometry or differential equations.

First prize in the annual competition will mean \$500 to the winning department of mathematics. Second and third prizes will be \$300 and \$200 to the respective departments. If these funds are used for the purchase of books, suitable book plates commemorating the prize winning competition will be made available to the departments.

Awards to Individuals

To each of the three members of the prize-winning team medals and \$50 will be awarded. Members of the second and third prize-winning teams will each receive \$30 and \$20 respectively.

As now planned there will be no individual competition between schools so that the visions of "Harvard 2— Yale 1" will still continue to mean baseball or hockey rather than mathematics. On a specified day, throughout the country, teams from all the colleges entering the contest will stand the same examination, which will last a total of six hours. Qualified, disinterested graders will mark the papers of each contestant and submit their marks to the Mathematical Association. Its committee will then determine the winning teams by totalling the separate grades of team members.

To the five students who stand highest in the entire country comes the chance for an additional honor. From this list of five will be selected one person who will receive a \$1,000 one-year

scholarship at Harvard University, or at Radcliffe in the case of a woman.

Funds for the medals, cash prizes and the scholarship will come from the William Lowell Putnam Intercollegiate Memorial Fund, left by Mrs. Putnam in memory of her husband, a member of the Harvard Class of 1882.

The competition is open only to undergraduates who have not received a degree. Full details of the competition will be announced in the forthcoming issue of the American Mathematical Monthly and by letter to the heads of departments of mathematics in colleges and universities.

Science News Letter, February 5, 1938

INVENTION

Planning Invention's Future Seen as National Need

THOSE who want to look ahead and make some sort of plans for bettering the world around us—as experts for the National Resources Committee recently attempted to do—are confronted by two contradictory objections:

1. We cannot plan because the world is changing.

2. We cannot plan because nothing human can be changed.

Prof. Charles E. Merriam, University of Chicago political economist, also National Resources Committeeman, observes that one of these ideals must be wrong. He and other federal planners are convinced that both are wrong.

To the American Institute in New York City recently Prof. Merriam explained that if business men and government administrators took seriously the idea that it is impossible to make plans based upon the shifting foundation of present changes, they would have to fold their hands and watch the approach of change with mere idle curiosity.

It is possible to forecast what is likely to happen and prepare for it. As Prof. Merriam put it:

"From the known we build out into the relatively unknown, struggling to anticipate alternatives as best we may, realizing that mistakes will be made and that waste and loss will be found, but balancing the hope of larger gain against the smaller loss."

Some have paraded the specter of government monopoly in research. They see the government taking in hand all forms of invention and drying up the springs of advance. Prof. Merriam considers this a far cry from what the National Resources Committee actually proposed.

Noteworthy scientific advances made over the decades by the scientists of Uncle Sam's research institutions and their application to industry belie any such fear. What the planners are urging is continued consideration of new discoveries and their social implications by appropriate government agencies.

Invention is "a basic process in our national economy." Invention should be stimulated and at the same time the work-a-day world should be cushioned against temporary unemployment and obsolescence that our research may bring.

Science News Letter, February 5, 1938

CHEMISTRY

DuPont Co. Establishes 24 Fellowships For 1938-9

TWENTY-FOUR fellowships, six post-doctoral and eighteen post-graduate, will be awarded during the academic year 1938-9 by E. I. du Pont de Nemours and Company. These awards, made annually for the last 20 years, are offered to encourage promising students in chemistry.

Eighteen institutions, University of Chicago, Columbia University, Cornell University, Harvard University, University of Illinois, Johns Hopkins University, Massachusetts Institute of Technology, University of Michigan, University of Minnesota, University of North Carolina, Ohio State University, Pennsylvania State College, University of Pennsylvania, Princeton University, Stanford University, University of Virginia, University of Wisconsin and Yale University, will benefit under this plan. These institutions will select both the men and the subjects to be worked on under this fellowship plan, with no restrictions of any kind placed on the type of work undertaken.

The six post-doctoral fellowships will be allotted \$2,000 each, with an allowance of \$1,000 for equipment needed by the six, while the eighteen post-graduate fellowships will be allotted \$750 each.

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