

THE scientific school of Harvard University will offer, during the summer, courses in surveying in Martha's Vineyard.

LIEUT. MURRAY, of the First Artillery, United States Army, has been appointed to succeed Capt. Pettit as professor of military tactics at Yale University.

IN addition to the fellowships in the scientific departments of Cornell University, announced in the last number of this JOURNAL, the following appointments have been made: In civil engineering, Stephen Gregory, C.E. (University of Texas); chemistry, Hector R. Carveth, A.B. (University of Toronto); physics, Arthur L. Foley, A.B., A.M. (University of Indiana). Twenty-two fellowships and sixteen scholarships are awarded annually at Cornell University.

DR. ARTHUR ALLIN has been appointed professor of psychology and pedagogy in the Ohio University at Athens.

THE *Naturwissenschaftliche Rundschau* announces the following appointments: Dr. Otto Fischer, associate professor in the University of Leipzig; Dr. Paul Eisler, full professor of anatomy in the University of Halle; Dr. L. Joubin, professor of zoölogy in the Faculty of Science at Rennes; Dr. H. Prous, professor of zoölogy in the Faculty of Science in Lille; Dr. J. A. Wislicenus, professor at the School of Forestry at Tarandt; Dr. G. Frege, full professor of mathematics at the University of Jena; Dr. H. Klinger, full professor of pharmaceutical chemistry in the University of Königsberg, and Dr. Scholl, assistant professor of chemistry at Karlsruhe.

THE following docents have recently been recognized in German Universities: Dr. v. Geitler, at Prague, for physics; Dr. Hans Bateman, at Berlin, for astronomy; Dr. Wagner, of Strasbourg, at Giessen, for zoölogy; Dr. J. Hofer, at the technical high school at Munich, for electrolysis, and Dr. Scholl, at Leipzig, for physics.

DISCUSSION AND CORRESPONDENCE.

THE HABIT OF DRINKING IN YOUNG BIRDS.

TO THE EDITOR OF SCIENCE: In response to a request that has just reached me, may I

ask for space in your columns to say that the statement I made with regard to the habit of drinking in young birds was to the following effect? The chicks that I have observed pick instinctively at any small objects at suitable distance. If a small drop of water be such an object they will peck at that. But if a shallow tin of water be placed in their run the stimulus of the sight of still water does not evoke any instinctive drinking response. If there be grains of sand or food, or other objects at the bottom of the tin, they will peck at these and incidentally find the water. Sometimes they will peck at a bubble on the brim. Sometimes when one is thus led to drink others will follow by imitation. No sooner does the beak touch the water than, in the domestic chick, up goes the head and the instinctive drinking response is shown. I have seen ducklings waddle through the tin repeatedly and not stop to drink, though I had reasons for believing that they were thirsty; for when I dipped the beak of one of them beneath the water he drank eagerly and continued to do so for some time. On the other hand a little Moor hen or water hen, when I quickly lowered it at about 16 hours old into water, drank so soon as its breast touched the surface. It then swam off with instinctive definiteness of coördinated leg-movements.

The statement of fact (so far as my observations go) that I made was this: that the sight of still water evoked no instinctive response; but that the touch of water in the bill at once evoked the characteristic instinctive behavior.

C. LLOYD MORGAN.

A SUGGESTED EXPERIMENT ON HEREDITY.

As far as I have learned, there has been as yet no series of direct experiments on natural selection and heredity of acquired characters with adult animals. The success of Mr. Waller, President Cleveland's sporting friend, in baiting wild mallards with grain on platforms at different depths, so that the ordinary mallard is forced at length to dive six feet for its food, suggests that if such ducks were carefully thus trained, segregated and bred under scientific supervision, there might come some important results as bearing on the modification of struc-