

of cysteine would be completely oxidized only after a period of about 7 days) but if the cysteine were completely metal-free the oxygen consumption would undoubtedly be still less. The oxidation which has been observed by Gerwe can not be called autoxidation

until the presence of other metals such as copper and manganese has been studied.

C. A. ELVEHJEM

DEPARTMENT OF AGRICULTURAL CHEMISTRY,
UNIVERSITY OF WISCONSIN

SPECIAL ARTICLES

A NEW MUTATION IN THE HOUSE MOUSE (*MUS MUSCULUS*)

IN the fall of 1926 a female mouse of unusual color, caught in the country several miles from the nearest town, was brought to our laboratory. The eyes were pink, indistinguishable from the eyes of the common pink-eyed varieties but the coat color, though plainly agouti, was lighter than that of a pink-eyed black agouti.

A mating of this animal with a pink-eyed brown non-agouti produced young phenotypically like the ordinary wild. This result indicated that this new mutation was different from the common pink-eyed form. Further matings of the F_1 's produced dark and pink-eyed agoutis, blacks, browns and the new mutation. This new mutation which is tentatively called p_2 is not in the pink-eye (P, p), color (C, c^h , c^d , c), or dilution (D, d) series.

The new p_2 gene seems to dilute both the yellow and black or brown in agouti individuals. So far a non-agouti in the new mutation has not been found. The combination of the new pink-eye gene and extreme dilution $c^h c^d p_2 p_2$ produces an animal with very little color and eliminates pigment from the ears. A complete report of the inheritance of this new character together with linkage studies will be published later.

ELMER ROBERTS

COLLEGE OF AGRICULTURE,
URBANA, ILLINOIS

"AT THE TOP IS MAGIC"

IT is sometimes difficult to understand how certain books can get published, especially by reputable publishers. Many readers of *SCIENCE* will doubtless raise that question if they dip into "The Adventure of Mankind," translated by Robert Bek-Gran from the original German of Eugen Georg.¹ The "blurb" on the jacket states that "to read it thoughtfully and to weigh its challenges should become the pleasure as well as the duty of all enlightened Americans."

Thumbing its pages as a botanist, though possibly not as an enlightened American, and more in pursuit of the promised pleasure than from a sense of duty, we read as follows:

The poplar tree fell ill throughout all of Middle Germany. None of the trees were raised from seed, but

¹ Putnam's, September 28, 1931.

were slips from a single mother tree; that is, they were a single individual distributed along a thousand highways. Suddenly these shoots perished, because the life energy of the mother plant (in the park of Wörlitz) became exhausted. Similarly the La France rose has languished, the blood-beeches have become decrepit, Malvasier grapes and Borsdorfer apples have turned sterile, and certain varieties of potato have disappeared, whenever they have been raised from shoots rather than, as formerly, from seeds of their kind. All these descendants, these grandchildren, these daughter cultures are but segments of a super-individual unity. When the root dies, they die (p. 234).

In other words if Ephraim Bull's original Concord grape-vine, at Concord, Massachusetts, should suffer from mildew all the other Concord grape-vines in the country, being descended from the Concord vine by cuttings, would also suffer from mildew; if the Concord grape should die that would be the end of all the Concord grapes in the world! This, we are told, is owing to the fact that there is a "rhythm of all living substances," "a magic bond which thus disregards space and time to unite the parent of a race, a family, a species with his heirs. Sometimes the links are so strong that the offspring perishes with the parent, the branch with the root, the daughter with the mother—be it plant, nation or civilization." A terrible thought for daughters!

What a pity that the French physiologist, Leo Erera, whose researches illuminated the subject of "physiological action at a distance," was not possessed of these data!

On page 246 we learn that, "The influence of the moon reaches the elemental depths of our animal and plant world," so that "The sap of trees rises and falls with the phases of the moon. If the walla tree of East Africa is felled at the time of the new moon, it produces splendid building material. Cut down at the full, it has no durability at all. Plants sown under the waxing moon are strongly rooted, but those set under its wane turn mostly to leaf; hence the first phases of the moon insure the best harvest."

This passage should insure a good sale of the book in Vermont, so that those engaged in the maple sugar industry will not fall into the error of tapping their trees at the wrong phase of the moon.

In the discussion of sunspots (p. 247) we note