

AGRICULTURE

Yellow "White" Potato Made To Order Through Research

Small South American Tuber of Low Yield Has Become 500-Bushel-Per-Acre Potato Containing Vitamin A

NOW THAT the matter of producing sufficient food for the population is no longer a problem, the question of developing new food products to suit more closely the needs and tastes of consumers is receiving the attention of progressive farmers.

Uncle Sam, through the cooperative activities of the Bureau of Home Economics and other bureaus of the U. S. Department of Agriculture, aids in this new sort of consumer's research. The method he uses is described by the Secretary of Agriculture, Arthur M. Hyde, in the current issue of the *Journal of Home Economics*.

"In South America some time ago plant explorers of the Department of Agriculture discovered a new variety of potato," said Secretary Hyde. "It was no ordinary, corner-grocer store potato. It was yellow of flesh, yet was not a sweet potato. Except for that yellow flesh, it looked and tasted pretty much like our staple Irish potato.

"A yellow 'white potato' so to speak, aroused the curiosity of our nutrition experts. They wondered whether the yellow color indicated the presence of vitamin A. If it did, then the humble potato would make still another contribution to good nutrition and the problem of the low-cost diet would be that much easier to solve.

"The scientists satisfied their curiosity by establishing the fact that the yellow flesh of this new potato did in fact signify the presence of vitamin A. That was good news, but it was only the first step. Would this South American potato yield well in North America? Would it be resistant to disease? Would it have the qualities that attract consumers?

Crossed in America

"The newly discovered potato from South America thus became one in a series of investigations. The plant breeders crossed the newcomer with American varieties to create a potato that would rival our popular varieties in

yield and marketability and still retain that precious vitamin A."

Next will come tests in the laboratory to find out whether it meets the housewife's and the professional chef's requirements in the matter of cooking, keeping, and palatability.

"Here we have a complete case history of a farm product," Secretary Hyde said. "We can determine what variety, what environment, and what cultural practice will produce the most marketable potato. We can devise fairly specific standards—not only for size, but for flavor, mealiness, and other cooking qualities—and actually control our production to achieve those standards."

Egg or Butter Potato

The yellow potato referred to by Secretary Hyde is one which has appealed to all plant explorers who have visited the South American home of the potato. It was first brought to the United States for the Department of Agriculture in 1899 by David Fairchild, who was then making his maiden voyage as an explorer. This importation was the first potato brought in for the new Division of Foreign Plant Intro-

duction of the U. S. Department of Agriculture during the first year it existed as an independent office.

It has always been highly prized by the people of Peru, Bolivia, and Chile for its delicious flavor and bright yellow color. They call it the egg potato or butter potato. The chief drawbacks of the variety are that it has a very low yield, no matter what the conditions under which it is grown, and it has very deep-set eyes with prominent "eyebrows."

The new hybrid, developed by Dr. C. F. Clark of the Bureau of Plant Industry, has a smooth skin, good flavor, cream color, and an abundance of vitamin A. It has given the extraordinarily good yield of 500 bushels an acre on an experimental farm in Maine.

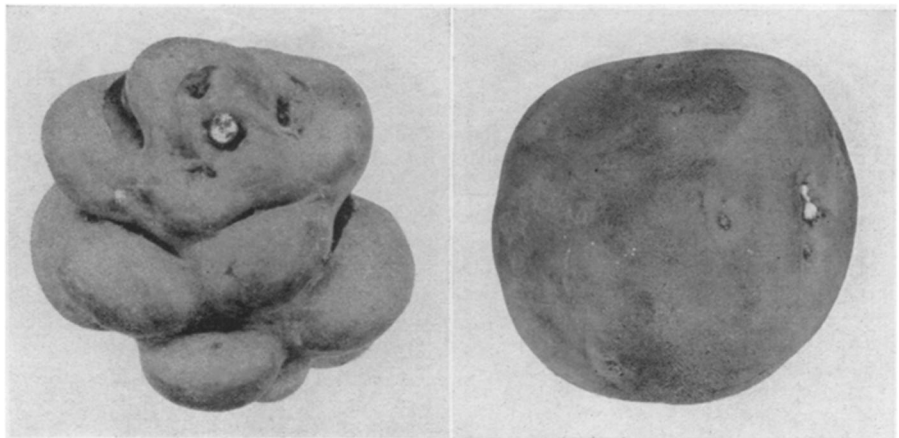
Science News Letter, February 11, 1933

ARCHAEOLOGY

Three Centuries Added To Assyrian History

LITTLE clay tablets unearthed at Tell Billa in Mesopotamia have added three hundred years to the history of ancient Assyria. This discovery has just been announced by the University of Pennsylvania Museum whose expedition, working jointly with the American Schools of Oriental Research, unearthed the important documents.

The tablets reveal that the old Assyrian system of naming each year in honor of an official was practised as early as 1300 B.C. These officials, known as eponyms, held office for a single year. The long lists of eponyms therefore provide historians with a com-



EVOLUTION OF A POTATO

The yellow "white" potato as grown on the ancient terrace farms of Peru, and as grown by scientists of the U. S. Department of Agriculture. On the left is a primitive variety of yellow potato with irregular shape, deep-set eyes, and overhanging "eyebrows." On the right is the new hybrid developed by Dr. C. F. Clark, of the Bureau of Plant Industry. The flesh of the hybrid is a cream yellow in color which adds a decorative note to the table as well as supplying the precious vitamin A.