the Research and Development Branch of the Quartermaster Corps, is light enough to handle and transport easily. The complete unit, including engine and tool box, weighs less than 1,500 pounds. The clothing of approximately 75 men can be fumigated each hour in one of these chambers.

The gas used in fumigating, methyl bromide, is a highly volatile, penetrating substance whose molecules are so fine that they can find their way through solid wood. The glue used in making plywood, however, stops them from seeping out the sides, and the joints and corners of the chamber are leak-proof.

A three-pound can of methyl bromide is placed in a cylinder attached to the exhaust of the motor and punctured by a pin. With the pressure released, and heated by the exhaust, the liquid becomes gas which is fanned into the chamber. It quickly and thoroughly penetrates the clothing or bedding packed in the chamber, instantly killing lice and other insects.

Less than 40 minutes need be allowed to fumigate all articles within the chamber and exhaust the gas so that the chamber is ready to be reloaded.

The used gas is carried off into the air over the chamber. Although a deadly poison, it dissipates quickly and becomes harmless in the open.

A peace-time use for the chamber by furriers and laundries is predicted. The gas acts rapidly, has great penetrating powers and leaves no deposit on fumigated garments.

Science News Letter, March 25, 1944

BACTERIOLOGY

Pencillin Checks Growth Of Plant Disease Germs

➤ PENICILLIN has been found to check the growth of a bacterial species responsible for a plant disease, the destructive rot that has killed off a number of groves of the picturesque giant cactus, or sahuaro, in the Southwest. This discovery, believed to be the first proven instance of penicillin's ability to knock out a plant-disease germ, was made in studies at the University of Arizona, by Prof. J. G. Brown and Miss Alice M. Boyle.

The drug was used on colonies of the bacterium technically known as *Erwinia carnegieana,* growing on culture media in laboratory glass vessels.

Science News Letter, March 25, 1944

NAKED, BUT UNASHAMED—In the spring, no livelier iris changes on this burnished dove — he hasn't any feathers to be burnished. But that doesn't prevent him from putting on a nudist version of regular pigeon courtship. He struts and coos, bows and spreads his wings, as if he had the most dazzling kind of plumage to display before the enchanted eyes of his mate.

GENETICS

Featherless Pigeons

➤ FEATHERLESS pigeons, naked as on the day of their hatching, strut and coo unembarrassed in cages in the genetics laboratories of the University of Wisconsin. These absurd but fascinating fowl are described by Prof. Leon J. Cole and Ray D. Owen, in the March 15 issue of the *Journal of Heredity.*

The featherless condition is hereditary, the two geneticists explain. It is rather difficult to keep the breed going, for a full suit of feathers plays an important part in normal mating, so that though the birds find their nakedness no embarrassment it is nevertheless a handicap. Artificial insemination has been used in propagation, but this laboratory technique is rather difficult. Add to this the facts that the birds are not naturally very fertile, and that they suffer easily from cold, and it becomes easily evident why no encouragement is offered to hopeful potential buyers of squabs that would not need plucking.

Actually, even if the breed became numerous enough to be marketed, it might still be a disappointment in this respect, for the birds do produce a crop of what might be called permanent pin-feathers. Rudimentary or abortive feathers start to grow, and some of the stiff quill-feathers on the wings may become a half-inch or so in length. These are kept frayed off and worn down by the birds' ordinary activities.

The featherless pigeons seem to be unconscious of having nothing on, for they persist in action-patterns that go with feathers and in their absence simply make the birds appear absurd. Thus, when one of them is set down on the edge of a table it immediately takes off as if in flight, flapping its bare wings vigorously, and of course inevitably crashes.

Courtship activities, in which feathers normally play as important a part as fine clothes in the young of the human species, produce some especially absurd antics.

As the two Wisconsin scientists describe it: "They are also active and aggressive lovers. Inadequate attire produces no inferiority complex in them: they strut and coo, puff and bow as if arrayed in the finest of raiment."