

EXPERIMENT 3.—April 18th. Drew a pruning saw through the diseased bark of a Bartlett pear tree, and then with the saw made incisions into the bark of three pear trees and three apple trees, also cut off small branches from the same trees.

*Result.*—By the end of May, four of these cases developed the disease.

*Conclusions.*—When pruning, one should take care to cut well below cankered areas, and after cutting out a diseased limb should disinfect the cutting instrument.

EXPERIMENT 4.—May 6th. Isolated pure cultures of *B. amylovorus* in beef-extract agar, and gelatin from:

(a) Cankered pear limbs brought from the orchards of Mr. Onslow, Niagara-on-the-Lake.

June 10th. (b) Apple twigs from O. A. C. orchard.

(c) Young apple fruit, O. A. C. orchard.

(d) Exudate on diseased Bartlett pear, O. A. C.



Fig. 53. Surface colony of *B. amylovorus* from agar plate culture shown in Fig. 51. Magnified 50 dia.

EXPERIMENT 5.—June 16th. (a) Inoculated one twig on each of twelve young healthy pear trees and on each of twelve young healthy apple trees with agar culture of *B. amylovorus* obtained from diseased pear tree limbs, Exp. 4 (a).

(b) Duplicated the above on the same trees with agar culture of *B. amylovorus* obtained from diseased apple tree twigs, Exp. 4 (b).

These inoculations were made by puncturing and slightly tearing the bark at the tip of the twig with a steel needle sterilized in an alcohol flame. The needle was then reesterilized, and with it a small portion of the culture from the surface of the agar was transferred to the puncture.