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Black Victor Meat Scrap, \$4.00, per cwt. If your dealer cannot supply you, we will send it all charges pro-paid on receipt of the regular price.

Cooped-up hens must be supplied with egg-making food. What hens get in Summer—the natural laying season—they must get in Winter or the egg yield will

Meat and Bone take the place of the live bugs, grubs and grasshoppers that go to make up a hen's summer rations. The Poultry experts, the Government bulletins -everyone that knows says "Feed Meat for Winter eggs."

Black Victor Meat Foods are clean healthy meat and bone from which all grease, waste and moisture have been removed; more economical than the cheapest fresh

Write for complete price-list.

Matthews-Blackwell Limited - Toronto



Factors in Hatchability

"Why do eggs not hatch?" has been an eternal and largely unsolvseen an everial and largely unsolved question with poultry keepers. Some experiments that were conducted by Prof. A. G. Phillips when he was at Cornell University, and reported in Farm and Home, serve to

throw some light on the question. In one experiment conducted by Prof. Phillips three lots of 50 eggs each were kept two weeks in average temperatures of 80, 65 and 50 degrees respectively. When they were placed in the incubator the percentage of fertility ran 24, 88 and 90, and the final hatch was 0, 43 and 70 per cent. This indicates clearly the advisability of keeping eggs in a room of not higher than 50 degrees temperature. To determine the effect of age at

To determine the effect of age at time of setting or the hatchability of eggs, Prof. Phillips took those lots of 50 eggs each, which were kept one, seven, 14, 21, 28 and 35 days respec-tively in a suitable place and handled in a proper manner. The longer tively in a suitable piace and handled in a proper manner. The longer time the eggs were kept the poorer they hatched, running from 35 up to 86 per cent for fresh eggs. STAND ON LARGE END

Another experiment proved that eggs held standing on the large end were eight per cent better than eggs egg holder, allowing free circulation and plenty of light, the last lot proved by far the best. The eggs held in bran were second best. Prof. Phillips' experiments did not show that dirty shells have any effect on hatchability.

Another factor in hatchability often discussed, and on which many poultry men have fixed superstitions, is tiy men have fixed superstitions, is the effect of the shape of an egg on its fertility and hatching power. To determine this point eight sets were set as follows: Ridge around the middle, small end twisted, thin shelled, the usual small end enlarged, short and round, long and narrow, small, double yolk. The fertility varied short thought the property of the state of the state of the short the set of the short the shor double yolk. The fertility varied about 10 per cent except with lot 8, which was infertile. The small, thin which was intertale. The small, thin shelled and enlarged end eggs had 70 per cent fertility. The others had 80 per cent. Lot 1 hatched 100 per cent fertile eggs; 2. 63 per cent; 3, 28 per cent; 4, 43 per cent; 5, 86 per cent; 6, 33 per cent; 7, 28 per cent; 8, 0.

HOW TO HANDLE EGGS FOR HATCHING

After numerous experiments Prof. Phillips summarizes his deductions as follows:

"The fresher the egg the stronger it will be in fertility and hatchability. "Never keep eggs at all if the tem-perature is not cool.

"A temperature of 50 degrees or less is desirable.
"Eggs should be turned sometime

or other during the period of keeping. "Washing the eggs affects them

but little. "It makes little difference what

sition the eggs are placed in when being kept. "Abnormalities in the shell of eggs

do not affect fertility and hatchability to any extent.

"I believe the hatching power of eggs is largely controlled by the vigor veges must seaming on the large can eages in largely controlled by the vigor were eight per cant better than eggs of the germ, and the supply of food held in any other manner. Another material for the growing chick. Too experiment in which three lots of many times cases have been noted of eggs were kept 14 days in bran, in an eggs that have been badly abused in ordinary egg case, and in a rotary various ways hatching large percent-ordinary eggs case, and in a rotary various ways hatching large percentages. They did not hatch particularly on account of the conditions, but more in spite of them. I believe that the hen which laid the eggs has a wonderful influence on the hatching power. Shape, etc., certainly has Little influence. power. Shap l'ttle influence.



Is the Incubator a Practical Success?-The Question Answered

There are 2,000 White Leibroras in this flock. Everyone of them were hatched in incubators. Mr. Chas. S. Bennett, who is in charge of the Prescott Co., Ont., edit of the Prescott Co., Ont., and the Company of the Company of the Prescott Compa

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All of my "Eight other four ly account must have weeks is the life."-Roy

ening the

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