

Why should the livestock producer be interested in grade standards for meat and how is he likely to profit from such standards? He should be interested because such a system puts him in almost immediate contact with his real market—the meat consuming public. Because it enables him, the producer, to inform the buyer or consumer regarding the thing he has to offer and makes it possible for the consumer to tell the producer exactly what he wants.

Use of Grades to Producer

The livestock producer will profit from such standards because, under such a system, if the consumer wants choice steer beef the producer will not send him an animal which will produce medium grade cow beef. Because by knowing in advance what the consumer wants the producer can govern his operations accordingly and avoid much waste in time and effort which frequently occurs from trying to force on the consuming market commodities for which there is little or no demand. Finally the producer will profit by being able intelligently to read and interpret market reports, learning from such reports not only what the consuming market demands, but just what prices it will pay for the various classes and grades of livestock and meat.

C. E. GIBBONS.

MECCHANICAL Corn Picker in the Corn Raising States

In eastern South Dakota and southwestern North Dakota there are more mechanical corn pickers on farms than in any section of similar size located within the States which are commonly referred to as making up the Corn Belt. This situation exists because the picker meets a big demand from farmers for a method of harvesting which will eliminate husking by hand the low-growing varieties of corn which many of them grow. The corn picker does not necessarily eliminate all possible difficulties that may be experienced when the crop is harvested by hand power.

During corn harvesting in the Dakotas, variation in soil and weather conditions affect operation. When the ground is slippery the machine does not work well on account of poor traction, as the drive wheel often becomes clogged with mud and trash. The machine does its best on a firm, dry, or damp soil. In corn that stands up well the picker does a very good job, and in corn that is not too badly lodged it does fairly good work. If corn is lodged crosswise a better job can be done than when it is lodged lengthwise of the row. The picker wastes less corn and does the cleanest job of husking in corn that is slightly damp and the stalks are tough. Under these conditions few ears are left in the field, practically all the husks are removed from the ears, and the stalks do not break loose from the ground when passing through the machine. To some extent the quality of work is dependent upon the operator and his knowledge of the machine and the proper adjustments to make under different conditions.

Work Done Per Day

The work done per day by a picker depends upon the power used, equipment, soil, weather, topography, yield, and hours of work.

Table 18 shows the rate of work per day for crews of the same size using different methods of unloading and for different sized crews. According to men who use a tractor to pull the picker, a larger acreage can be covered in a day than when horses are used.

TABLE 18.—Rate of work per day for mechanical corn picker with different sized crews

Picker crew		Hauling crew		Method of unloading	Yield per acre	Acres per day	Bushels per day	Hours per day	Bushels per hour	Bushels per man
Horses	Men	Horses	Men							
					<i>Bushels</i>					
5	1	2	1	Hand.....	26	6¼	163	8½	20	82
5	1	2	1	Elevator.....	32	6½	203	8	25	102
6	1	2	1	Hand.....	25	6¾	164	8½	19	82
5	1	4	2	do.....	29	7½	220	9	25	73
5	1	4	2	Elevator.....	34	7	241	8¾	29	80
6	1	4	2	Hand.....	30	7	206	8¾	23	69
6	1	4	2	Elevator.....	29	8	236	9	27	79

From interviewed farmers who own pickers, it is learned that acreage in corn is not the factor which most of them consider first or which influences them in purchasing a machine, but rather the advantages to be gained by its use. The average area in corn on farms where pickers were owned was 105 acres, but only an average of 89 acres was harvested with the machine. Although the present price of a picker, \$400 to \$425, may seem high, the advantages of ownership may more than offset the first cost.

Supplants Labor on Farm

Many owners feel that the principal advantage of a picker is that it enables them to do away with high-priced, inefficient, and undependable hired help for husking the corn crop by hand. Others feel that the elimination of hand husking, which they and their families are required to do, is more important. Practically every owner feels that either is of enough importance to warrant the expenditure necessary for the purchase of a picker.

With a comparatively small acreage of corn to husk, the ownership of a machine by an individual farmer may not be warranted because of the cost, even though it enables him to do his husking quicker and with less expense and labor. The joint ownership of a picker is often practical and where satisfactory arrangements can be made, such ownership is recommended by men who own their machines jointly.

L. A. REYNOLDSON.

MILK Flavors and Odors Ascribed to Four Main Causes

Cow's milk invariably has a characteristic flavor and odor more or less pronounced, but comparatively little is known concerning the factors contributing to these characteristics. The flavors vary from those which make the milk pleasing to others which make it objectionable and unpalatable.