

*Yield.*—Experiments in regard to yield often give contradictory results under some conditions. Speaking generally, however, one may expect a large yield from any of these wheats, often larger than that from Red Fife. On the whole perhaps the bearded varieties (Preston and Huron) are rather more productive than the others. It must be remembered that these comparisons are generally made under conditions favourable to Red Fife. In cases where frost has to be considered the early varieties usually give distinctly heavier yields than Red Fife.

*Appearance of Grain, Grade, Selling Price.*—These early wheats are as hard as Red Fife and, when the kernels with yellow skins are eliminated, are of a rich reddish colour which is (if any difference be seen) rather darker than Red Fife. So long, therefore, as the Grain Inspection Act requires the higher grades to contain certain proportions of hard, red wheat of the Fife class, these varieties should grade quite as high as pure Red Fife. The grade, of course, largely controls the sale price in Canada.

The opinion of an English expert in regard to samples of Red Fife, Preston, Stanley and Percy, grown at Indian Head, Sask., in 1902, was that the Stanley and Percy would sell in London at the same price as the Red Fife, but the Preston would command about three-quarters of a cent a bushel less. Of the same varieties grown at Ottawa he believed the Percy and Red Fife would bring equal prices and the Preston and Stanley about three-quarters of a cent a bushel less.

*Milling Value.*—In their conduct in the flour mill these four wheats closely resemble Red Fife. The bran separates readily, the proportion of middlings produced is large and the middlings are not unusually difficult to reduce. This means a high yield of 'patent' flour. The total yield of flour is very good and not much 'break' flour is produced. These facts are stated as the outcome of twenty milling tests of samples of pure Red Fife and twenty-three tests of samples of the four earlier wheats, all the tests having been carried out during the past few years by the writer, personally.

*Colour of Flour.*—Preston and these other wheats have, like Red Fife, the disadvantage of producing flour not pale enough for the popular taste. Indeed, as now generally grown they yield flour of a deeper yellowish colour than that made from Red Fife. Some millers find it advisable to artificially bleach Red Fife flour; and such treatment would be necessary with Preston if it were desired to bring it to a very pale shade of colour. The colour of the flour produced from the best selected strains of these wheats shows a great improvement in some cases over that made from the ordinary samples. Flour from the best selection of Stanley (Stanley A) is of the same colour as from Red Fife. The best Preston, Huron and Percy have also been improved, but not quite to the same extent.

*Baking Strength.*—It has sometimes been suggested that a comparative baking test should be made to settle once for all the relative merits of these wheats. It is very easy to draw precise conclusions from a single test, but unfortunately such conclusions are usually wrong. During the past few years the writer has baked flour from thirty-eight samples of these five wheats, having made 170 test loaves. This amount of work enables one to draw certain conclusions but by no means answers all the questions that naturally arise. The chief general conclusions may be here stated. As a rule Red Fife gives flour distinctly higher in baking strength than these other wheats, provided the samples compared have been grown under similar conditions and properly ripened. Even when the conditions have not been alike the Red Fife usually gives the stronger flour. In some cases, however, one or other of the early wheats has the advantage. By 'strength' is meant the ability of the flour to absorb water and to produce a large, light loaf of fine texture and good shape. On a scale of points for strength where 75 indicates *weak*, 85 *medium* and 95 or more *very strong*, Red Fife has varied from 84 to 102 and the other wheats from 69 to 93, the Red Fife being usually about 10 or 12 points ahead. This indicates a considerable difference in favour of Red Fife in this important matter, the 'strength' of the wheat from the Manitoba Inspection Division being one of the chief factors in maintaining its high price in England. The most desirable strength for any flour is a matter of taste, if the flour