

province is zoned, as you will see. I can pass copies of this around. Ontario is divided into five zones on a climatic basis. Zone 1 just takes in the south-western peninsula, Essex and Kent counties, whereas zone 2 goes eastward to about Hamilton, zone 3 is further north extending along the north shore of Lake Ontario to Kingston, and zone 4 includes territory further north and eastward along the St. Lawrence and takes in the Ottawa district. These zones, as I said, are based on climatic conditions, average temperatures for the season. These are climatic zones for corn, but they apply to soybeans as well, because soybeans and corn are full-season crops. They have a soybean yield contest in each of these zones.

I will give you the results in 1953, to give you a little background with respect to the possibilities from the standpoint of yield. In zone 1 there were 23 contestants, and the average yield of these 23 was 35.9 bushels. The highest, the winner, obtained 58.4 bushels, and the low was 24 bushels. In zone 2 there were 18 contestants, and the average yield was a little down 35.5 bushels per acre. The high was 46.4 bushels; the low was 21.8 bushels. In zone 3 there were 20 contestants. 33.3 bushels was the average yield per acre, down about two bushels on the average as compared with the other zones; the high was 44.5; the low was 24.7. In zone 4, which takes in Ottawa, we have had very little soybean production so far. A number of the 12 contestants who were in this competition last year were new growers and have not had much experience. However, the 12 growers averaged 28.7 bushels per acre, the winner getting 40.5, and the low 19.7. In these four zones, giving you a general picture for the whole province, there were 73 growers in this contest, and the general average was 33.9 bushels, or approximately 34 bushels to the acre. These are the bushel yields that we can get from this crop. I do not say that we have reached the highest bushel yield yet, because in the United States they are talking about 75 bushels per acre as a potential yield, and it may go to 100 bushels per acre, but here the winner got 58.4. Those are the results, and I just wanted to give you a little more background with respect to the possibilities of this crop from the yield standpoint.

Detailed statistics concerning acreage, production and farm value of soybeans are presented in appendix table 1. I have a copy of this here and I presume I can leave this with the committee and there is no use in my going over these statistics. The table gives the full statistics from 1942 to 1953 with respect to the acreage, yield per acre, total yield and farm value. I may say that the prices received by farmers for soybeans for the past five or six years have been about \$2.50 per bushel for commercial beans grown for processing for the mills. The range has been from approximately \$2.20 up to the present price, which is unusually high because of a shortage, around \$3.50 per bushel. In most years they have run from about \$2.25 to about \$2.95 per bushel.

There has been a remarkable increase in the quantities of soybeans crushed and the amounts of oil and meal produced in Canada since 1944. The statistics given in appendix table 2 show that in 1944, 389,261 bushels of soybeans were crushed, resulting in the production of 3,330,000 pounds of oil and 9,358 tons of meal. In 1953, only nine years later, we crushed 8.6 million bushels as compared with 389,000. We produced almost 91 million pounds of soybean oil as compared with about 3 million, and we produced 206,582 tons of soybean meal as compared with 9,358 tons in 1944. There are three main plants engaged in the processing of soybeans in Canada. They are, firstly, Victory Mills Limited, Toronto; secondly, Toronto Elevators Limited, Toronto; thirdly, Vegetable Oil Mills, Hamilton. Those are the main processing companies. The first two have very up-to-date plants. They use what we call the solvent method for taking the oil out of the beans after the beans have been flaked. It extracts the oil down to one-half of one per cent or less. The method used previously to this was the expeller method, with a screw type of