## ECONOMIC CONSIDERATIONS IN THE MARKETING OF OREGON WOOL

by

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# ECONOMIC CONSIDERATIONS IN THE MARKETING OF OREGON WOOL

#### CHAPTER I

#### INTRODUCTION

Oregon wool marketing has been accused of being ineffective in conveying to the producer the requirements of the consumers of wool products. The channels of trade have been inadequately understood by producers. The wool grower is often at a loss to know how best to maximize his returns for the wool that he has. At the farm level it has appeared that the pricing mechanism is ineffective in relating the manufacturers' needs.

For the Oregon producer, as with producers in other areas, the basic problem has been the obtaining of the greatest possible return from wool consistent with his land, labor, capital and management invested in wool production. At any given time this must be accomplished within the existing marketing framework. Operating within the market organization, the Oregon wool producer has been handicapped by a lack of complete understanding of the product he has for sale. The producer's knowledge and understanding of what happens to his wool after it leaves the farm has been vague and incomplete. In making decisions as to the use of resources he operates under a handicap.

The result of a lack of knowledge has been uncertainty and confusion on the part of the wool producer. His objectives are confounded by the relationship of his sheep enterprise within his farming program and the types and amounts of wool to be produced. In many cases, progress toward the objectives the producer may have in mind is handicapped by the uncertainty in the production and marketing of wool. It has resulted in the failure of many producers to realize the full value of their product and a feeling of insecurity.

According to Dr. Julius Nordby of the United States
Sheep Breeding Laboratory at DuBois, Idaho, too often wool
is taken for granted. Little is done by the producer to
determine the actual value of his wool (18, p.586).

In order to market his wool effectively, the producer must know what he is producing. His management of his flock and his preparation of the wool affect the value of his product. In addition, he must have a knowledge of the market structure through which his wool must pass.

#### Objective

The objective of this study is to establish a basis for an understanding by the Oregon wool producer of the product he has for sale and market opportunities. Methods of production impose limitations within the existing market structure. Exposure of these is the first step toward problem solution.

Before the producer can be effective in production improvement he must be better informed so that he can know where he needs to improve. The wool grower can then integrate this knowledge in relation to the size of his enterprise and its place into his total farm program.

The traditional attitudes of many producers in expecting aid from external sources such as government policies
or regulations need to be overcome. The producer himself
must become informed so as to be able to operate within
the structure of the wool industry as he finds it. Reliance
on various forms of government assistance such as tariffs
and subsidies is an uncertain basis for planning. Increased
understanding on the part of the producer concerning the
wool industry and his position in it would assist in dispelling a great deal of the uncertainty which now exists.

The producer is also suspicious of the processing and distributive functions in the wool industry. This is an understandable attitude in view of his lack of knowledge of their functions and problems. He needs information about the outlets available to him, the routes that his wool must take to reach the final consumer, and the changes in form that must occur before the wool can be used by the ultimate consumer.

With better knowledge, it is felt that the grower could accomplish a more satisfactory job of production and marketing improvement.

#### Method and Scope

This study describes the production and marketing of wool as it affects the Oregon producer. The wool production situation in Oregon is described in order to provide the basis for a better informed producer concerning what he has produced, and to provide a background for the movement of wool to processors.

From the production phase wool is followed into the channels of marketing to outline the markets available, their structure and their effect on the producer's decisions.

In considering the influences on production and marketing as they affect the Oregon wool grower, certain outside factors are recognized:

- (1) Governmental assistance programs, either in the form of non-recourse loans or compensatory payment programs.
- (2) The tariff and counter-vailing duty programs.
- (3) The influence of fashion and environmental requirements in wool consumption.
- (4) The competitive relationship between wool and synthetic fibers.
- (5) The status of the national economy and its effect on wool (production and) consumption.
- (6) The tendency toward static conditions, or at most the very slow change in market structure and manufacturing methods.

These factors influence wool production generally, but are ones over which the individual wool producer has little

or no direct control. For this reason they are not discussed at length, but only as they have a bearing on a particular point.

This study will emphasize the small producers (those producing less than 1,000 fleeces) more than the large producer, primarily because of their greater number, and their importance in the western section of the state, which is the part that has been most intensively investigated in this study. A survey was conducted among a group of Western Oregon producers to determine how they prepared their wool, the market outlets used, and the prices received for their wool. This survey compares the results of marketing wool on two bases which are available to producers.

The whole of this approach to the problem of wool marketing is based on gathering the information needed and analyzing the facts in order to present to the wool producer a chance to improve his understanding of the production and marketing of his product.

#### CHAPTER II

#### EFFECTS OF PRODUCTION

Producers, through their geographic location, management of their flocks, and the preparation of their wool, determine the product that is presented for sale. In order to establish a basis for a discussion of wool marketing relative to the product (or products) being handled, a discussion of production of wool under Oregon conditions is necessary.

#### Areas of Production

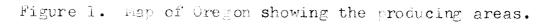
Oregon is divided into two main producing areas,
each area being quite different in the types of wool produced and in the methods of production. (See Figure 1.)

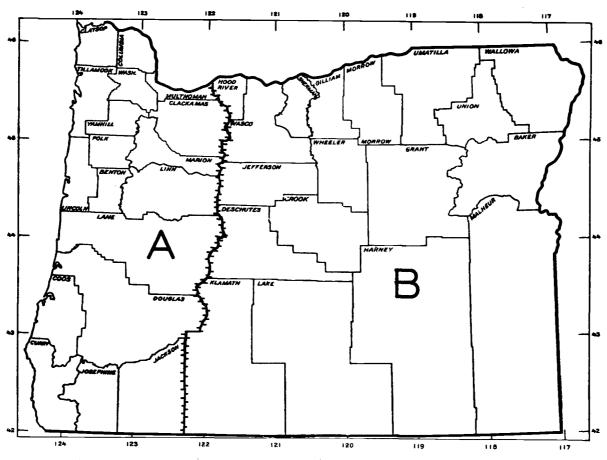
These two areas are:

- (1) Western Oregon, which comprises the area from the Pacific Ocean to the summit of the Cascade Mountains.
- (2) Eastern Oregon, which includes the part of the state east from the Cascade Mountains to the Idaho border.

Western Oregon is an area where sheep production is carried on in farm flocks operated in addition to other enterprises on the farm. The wool produced is designated fleece wool. The is comparable to the types of wool and

<sup>1</sup>See Appendix I for glossary of terms.





a = seatern Ors on producing area.

E = pastern une on producing area.

growing conditions of the farm flock areas east of the 100th meridian.

range conditions, often in large flocks. Hany Eastern Oregon producers specialize in sheep production, though there are sections, particularly in irrigated areas and valleys, where small flocks are operated in addition to other enterprises on the farm. Eastern Oregon wool is designated as territory. It is similar to wool produced in the rest of the range and mountain states of the West, both in type and the conditions under which it is grown.

#### Joint-Product-Relationship

In both Eastern and Western Oregon wool and meat are joint products of the sheep enterprise. Except for those farms specializing in the production of breeding animals, meat and wool are the main products of the sheep project.

Within this joint-product relationship there is some latitude of substitution of one product for another. Over a period of time, adjustments can be made in the combination of outputs of meat and wool. This is accomplished by selection among the breeds of sheep, or in selection within a given breed for emphasis on meat output or wool production and quality (10, pp.204, 216-217).

Wool and meat may compete for emphasis within the limits imposed by growing conditions and the ability of the producer to operate and manage a sheep enterprise. The competition between wool and meat for emphasis is apparent in the choices of breeds of sheep by the producer for his ewe flocks and his flock sires, and in the relationship between meat and wool in the joint income from the sheep enterprise. In Eastern Oregon, wool comprises between 25 and 40 percent of the income from sheep. Under Western Oregon conditions, wool includes from 10 to 25 percent of the income from sheep production.

The emphasis received by wool depends on the geographical location of the producer, his attitudes and abilities, the price relationships between mest and wool in addition to the grower's outlook concerning the future.

## Trends in Oregon Wool Production

Oregon has been a major wool producing state in the past. In 1910 Oregon ranked fourth among the states in the production of wool (2, p.11). By 1951 the state had dropped in ranking to thirteenth (2, p.21).

The decline in production in Oregon started as early as 1932 and has been on the down-grade almost steadily since that year. Compared with the national trend in wool production, the decline in Oregon started about 10 years

earlier. The national downward trend became pronounced in the early 1940's. Only in the past three or four years has production stabilized to the point of only mild fluctuations. (See Figure 2).

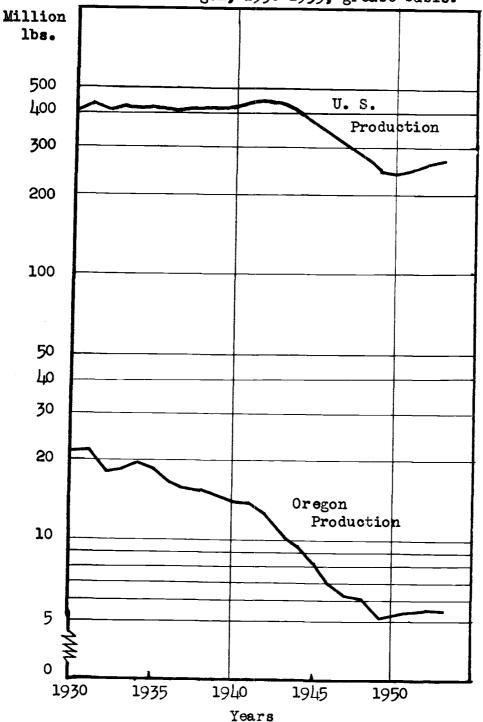
Changes in production within the state have been significant. Most of Oregon's decrease in wool production has
been in the Eastern Oregon range area. This area accounted
for seven-eighths of the state's production in 1919, but by
1949 accounted for only slightly over half. In pounds of
wool, grease basis, production has decreased from 15,681,500
pounds in 1934 to 2,777,000 pounds in 1949. During the same
interval, wool production in Western Oregon changed from
2,550,200 pounds in 1934 to 2,116,100 pounds in 1949.
(See Figure 3.)

Thus, it would appear that a much smaller proportion of the wool produced in Oregon is of the fine, heavy shrinking types than in the past, and that small lots of wool now account for a greater part of total production than formerly.

## Characteristics of the Wool Produced

Types and qualities of wool in Oregon exert an influence on the disposal of wool relative to the market outlets available, the methods of handling and processing, and the types of manufactured products for which the wool is used.

Figure 2. Production of wool in the United States and in Oregon, 1930-1935, grease basis.



Source: Oregon State College, Department of Agricultural Economics.

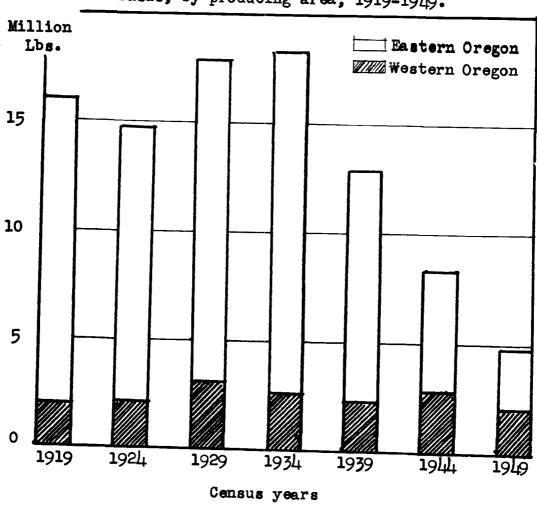


Figure 3. Wool production in pounds, grease basis, by producing area, 1919-1949.

Source: Agricultural census data.

The best source of information concerning the grades, staple length, shrinkage and other data is the research of the Commodity Credit Corporation on the 1946 wool clip (26). In that year the C.C.C. purchased almost all the wool produced in the state and consequently is able to detail quite accurately the wool produced. Since then, wool has been sold through numerous private and cooperative agencies as well as to the C.C.C., so that more recent reports are not available.

#### <u>Grades</u>

Oregon wools fell into six grade classifications in addition to off wools. Table 1 shows the proportions of the 1946 Oregon wool clip in each of the grades.

Table 1. Grades of wool produced in Oregon, expressed as percent of total state production, 1946.

Grade	Percent of total production
Fine 1/2 blood 3/8 blood 1/4 blood Low 1/4 blood Common and braid Off wools	35.0 9.4 17.8 15.0 7.8 5.6 9.4 100.0

Source: U.S. Lept. of Agriculture. Production and marketing administration. Livestock branch. The domestic wool clip. Washington, June 1951. p. 15.

<sup>20</sup>ff wools in this case include seedy and burry, black and gray, fed lamb wool, crutchings, clippings, and tags.

The relative amounts of wool in the various grades differ markedly between the two producing areas. The Eastern Oregon range area produced almost all the fine wool raised in the state, with relatively small amounts of wool classified in the other grades. Western Oregon wool is of coarser grades, and more variable. Table 2 gives an indication of the volumes of wool in the various grades produced in the two areas.

Table 2. Quantities of fleece and territory wool purchased in Oregon by the Commodity Credit Corporation, by type and grade, 1946.

Grade	Pounds t	ece wool Percent of total quanti- ty fleece vool bought		ritory wool Percent of total quanti- ty territory
Fine 1/2 blood 3/8 blood 1/4 blood Low 1/4 blood Common and braid Off wool	38,598 114,200 765,667 763,839 495,870 363,938 436,035 2,978,147	1.3 3.8 25.7 25.6 16.7 12.2 14.6 100.0	2,773,46 508,13 407,69 334,55 22,41 8,99 181,60 3,626,85	14.0 11.2 11.2 14.6 13.2 15.5

Source: U.S. \_c t. of agriculture. Production and marketing administration. Livestock branch. The domestic wool clip. Washington, June, 1951. pp. 16, 17.

#### Staple length

Staple length of the wool fiber is also important in determining the use to be made of Oregon wool. Staple

lengths of Oregon wool in the various grades are the result of breeding in the sheep flocks, growing conditions, forage, and the operators' methods of feeding as they relate to the nutrition of the sheep. The coarse wools characteristically have a longer staple than do the fine wools. Fine wool in Oregon is lacking in staple length. In 1946 the state produced no strictly staple fine wools and more than 70% of the fine wool was classified as French combing and woolen lengths. This shortness of staple affects the uses to which the wool can be put and also the methods of manufacturing through which the wool is processed. Table 3 shows the length of staple by the various grades. (See page 16.)

#### Shrinkage

Shrinkage is important to the Oregon producer because of its effect on the price he receives for his wool. This will be discussed more fully in Chapter VII. Shrinkage will vary considerably depending on the type of sheep, growing conditions and the management of the producer. Shrinkages tend to be greater in the Eastern Oregon producing area than under Western Oregon conditions. Table 4 shows the shrinkages by grade for wool from the fleece and territory portions of the state. Variations in the shrinkage occur not only between areas, but among grades within each

Table 3. Quantity of wool, by grade and length of staple, purchased in Oregon by the Commodity Credit Corporation, 1946.

				Stapl	e length			
Grade	Strictly staple	Percent	Staple and good Frend combing	ch Per-		ercent	Woolen	Percent
Fine 1/2 blood 3/8 blood 1/4 blood Low 1/4 blood Common and brai	207,190 241,886 741,104 518,284 6 372,931	33.3 20.6 75.0 100.0 100.0	653,021 101,910 546,287	28.2	1,585,668 302,445 289,153 36,921	48.6	73,376 10,791 95,513 210,365	3.2 1.7 8.1 21.3
	2,081,375	34.8	1,103,758	21.7	2,214,187	370	390,045	6.5

Source: U.S. Department of Agriculture. Production and Marketing administration. Livestock branch. The domestic wool clip. Washington, June, 1951. p. 41.

area. This is a result of differing densities of the wool fibers on the different types of sheep. Medium and long wool breeds have characteristically less dense fleeces.

Table 4. Quantity of wool, by shrinkage, grade and type purchased in Oregon by the Commodity Credit Corporation, 1946.

Grade	Fleece wool shrinkage percent	Territory wool shrinkage percent
Fine 1/2 blood 3/8 blood 1/4 blood Low 1/4 blood Common and braid Average	52.0 49.4 43.4 39.8 37.6 36.9 40.7	62.9 57.7 52.5 48.0 44.9 44.7 59.7

Source: U.S. Dept. of Agriculture. Production and marketing administration. Livestock branch. The domestic wool clip. Washington, June, 1951. pp. 16, 17.

#### Producing Conditions

Wool production in Oregon is affected by the environment in which the sheep enterprise is found. Environmental conditions differ markedly between Bastern and Western Oregon. These differences in surroundings aid in explaining the types and qualities of wool produced in the areas, and the condition in which they are marketed. Methods of disposal of wool, and the routes which wool takes through the channels of distribution are influenced by variation in conditions.

## The Eastern Oregon Producing Area

## Operating Conditions

Sheep production in Eastern Oregon tends toward specialization. Most of the farms and ranches on which sheep production is the major enterprise are located in the Eastern Oregon producing area. There are also many farms where the sheep are kept in addition to other farming enterprises, particularly in irrigated areas and scattered diversified farming sections.

There are several factors which affect the wool produced in Eastern Oregon. These factors are inter-related in their action on each other and upon the wool produced.

The nature of the area - its climate, topography and vegetation - limits the manner in which the sheep enterprise is conducted, and tends to define the product presented for marketing. Growing conditions are similar to range conditions in the inter-mountain states. Sheep are run on arid ranges and in mountain forests. Rainfall tends to be scanty in most parts of the area. The soil is fairly loose and tends to be sandy in parts. Vegetative covering in the drier areas is sparse.

#### Characteristics of the Wool

Fine-wool sheep seem to be best adapted to the conditions of the area. Consequently, sheep of hambouillet and other fine-wool background predominate. The fine wool sheep possess a herding instinct that is essential, especially where the sheep are grazed in bands under the care of herders. These sheep are hardier and more adapted to the weather and forage conditions than are other types of sheep. Greater production of the finer grades of wool is the result of the necessity of raising sheep to fit the conditions under which they are to be run.

Crossing of fine-wool ewes with long-wool rams is practiced in order to produce a somewhat better meat carcass. Many of the ewes now run in the area are crossbreds. The herding instinct seems not to have been lost, nor has the adaptability of the sheep to the range conditions. The wool loses slightly in fineness, but the large part of the wool produced in the region tends to fall in the fine and 1/2 blood grades. (See Table 2.)

During periods when wool prices are low in comparison with meat prices, many producers use mutton breed rams on their ewes, disposing of all the lamb crop for meat. If any of these lambs are kept for breeding, the fineness of the wool will be decreased and variability of the fiber will be increased. Extremely fine wools (70s, 80s) are

no honger common in Eastern Oregon, reflecting the increasing tendency to emphasize the meat aspects of sheep production rather than wool quality.

Staple length of the fleeces is affected by the growing conditions reflected in the forage available, and in the nutrition management of the operator. In dry years when vegetation is sparse, or when the forage is limited by heavy snows, the length of staple is affected as well as the strength of the wool fibers. Staple length can also be affected by the selection of breeding stock by the producer. In the market place generally longer stapled wool is more desirable because of the flexibility of its uses.

Shrinkage is affected by the types of sheep raised and the conditions of the range. Fine wool sheep tend toward a denser fleece containing more wool grease than do sheep of medium and long-wool breeds. The vegetative covering of the range and the loose soil, combined with low rainfall, act to allow more dirt and foreign matter to become trapped in the wool than is the case in other areas. As a result, shrinkages are greater in the range areas.

Shrinkage of Eastern Oregon wools has been reduced in recent years. Some clips that were formerly appraised at from 65 to 70 percent shrinkage have lately been marketed on a basis of 60 percent shrink. This has been attributed

to the improved forage cover on the ranges following the range improvement in recent years.3

Limited variations in the breeding of the sheep have given an advantage to the Eastern Oregon producer in the uniformity of his wool. The variations in grade of wool are less than in areas where a wider selection of breeds and types of sheep are available to the producer. This uniformity not only exists concerning the individual animal, but also within the flock and, to an extent, from flock to flock throughout the range area. The advantage to the producer lies in the greater care of grading and in a more desirable product from the point of view of the manufacturer.

#### Size of Enterprise

Size of operation varies greatly, ranging from enterprises with several thousand head to farms with only a few
sheep. The extremely large flocks of many thousand sheep
that existed in the past are rare. Data secured from Forest
Service and Bureau of Land Management grazing permits indicate that the number of producers with over 1,000 head
of stock sheep may be about 100. Table 5 is presented to
show an approximation of the size of the grazing permits.
Size of the smaller operators was computed from relating
this data to data from the 1950 Census of Agriculture.

<sup>3</sup>Letter from James Coon, President of Western Wool Storage Company, Portland, Oregon. November 4, 1953.

Table 5. Size of sheep enterprise in Eastern Oregon, by district.

	Control of the Contro	District	
Margin state of the state of th	A	В	С
Total number of farms reporting sheep <sup>2</sup>	29 <b>3</b>	480	390
Total number of sheep shorn3	117,811	80,989	පිපි,513
Number of known operators with grazing rights for more than 1,000 head?	25	32	34
Total number of sheep covered by grazing rights of operators with more than 1,000 head	57 <b>,</b> 880	62,480	73,745
Average size of operation, pro- ducers with grazing rights for more than 1,000 head?	2,315	1,953	2,169
Producers with less than 1,000 he	ad 224	41	42

District A: Counties of Gilliam, Hood River, Horrow,
Umatilla, Sherman, Wasco, Wheeler.

District B: Counties of Eaker, Malheur, Union, Wallowa.
District C: Counties of Crook, Deschutes, Grant, Harney, Jefferson, Klamath, Lake.

2Source of data: 1950 Census of agriculture.

3Source of data: Survey of Bureau of land management and forest service grazing permit records.

From table 5 it can be seen that even in the Hastern Oregon producing area the number of large sheep enterprises compared to the number of farms with sheep is quite small.

Producers of large volumes of wool have more flexibility in the preparation of their wool for market. For

the large producer, wool becomes an important part of his farm income. It is advantageous for him to prepare the wool in the most acceptable manner possible in order to improve the acceptability of his wool by the processors. Large operators, because of the volume over which they may spread preparation costs, are able to do advanced preparation, possibly to the extent of ranch grading, or the separation of off wools such as off-color fleeces, tags and crutchings, stained, or burry fleeces.

## Causes of Decrease in Production

The decrease in wool production in Eastern Oregon has been attributed to several factors (5, p.7).

- 1. The availability of qualified skilled labor has been limited in recent years at salaries the wool producer could afford to pay.
- 2. Competition from other enterprises, particularly cattle, has caused some producers to take advantage of alternative opportunities. In recent years cattle prices have been higher relative to the risks and costs involved than have wool and lamb prices.
- 3. Wool producers have not increased their efficiency of production as have other agricultural enterprises. Output of product has not increased relative to the increases in costs and investments.
- 4. There has been much uncertainty on the part of the wool producer in regard to wool and meat prices, governmental range policies, and tariff and import policies.

#### The Western Oregon Producing Area

In the Western Oregon producing area the sheep enterprise is usually only one of several enterprises of a given producer. It is true that on some farms sheep production is a large enterprise, but it is not as often the major enterprise as is true east of the Cascade Mountains.

Sheep are maintained by the Western Oregon producer for several reasons:

- Labor is utilized that may not otherwise have a market. In Western Oregon much of the heavy work in the sheep enterprise comes at periods of the year when the labor is not demanded in other farming operations. On most operations lambing takes place before spring crop work, and shearing is done between the spring farming and the early summer field work. The time and labor involved in the ordinary farm sheep flock is not extensive during the seasons when the demands of other enterprises on the operator's time is at a peak, such as at spring or fall cultivation periods and at harvest time.
- 2. Sheep can make use of crop aftermaths and byproducts. Very often these by-products are not
  efficiently utilized by other methods which fit
  as well into the operator's farming organization.
  Sheep can also make use of waste areas of the farm
  such as fence rows, wood lots and land too rough
  for farming.
- 3. A sheep enterprise can be useful to the Western Oregon farmer in the integration of pasturage with his crop rotation or soil conservation program.
- 4. As an additional uncertaking sheep production aids in the diversification of farm operations. Many Western Oregon producers practice diversification to spread out risks and make more efficient use of labor, land and equipment.
- 5. Cash receipts from wool and lambs provide a source of revenue at times when farmers' working capital is low. This may assist in reducing his need for operating capital.

## Operating Conditions

Operating conditions under which sheep are raised are quite different from the range areas of the state. The climate in Western Gregon is temperate, with heavy rainfall during the winter months. Summers are normally dry, occasionally to the point that forage may be in relatively short supply in later July, August and September. The soil is fairly heavy, and usually has a heavier covering of vegetation than most areas of Eastern Oregon.

The land is cut up into relatively small fields and pasture plots. Unfarmed areas of Western Oregon are mostly undeveloped for utilization, with most of the forested and cut-over land too brushy and covered with undergrowth for efficient use by sheep.

## Characteristics of the Wool

Most breeds of sheep can be raised in Western Oregon.

Long and medium wool breeds are the established types because of their superiority in meat production. Fine wooled sheep are seldom found in this area because of their inferiority as meat producers and because the heavy winter rains are detrimental to the production of superior quality of fine wool.

Predominance of long and medium wool sheep results in most of the Western Oregon wool being of coarser grades.

(See Table 2.) Staple length varies according to the breeding of the sheep and the level of nutrition maintained. The long wool breeds, as their title implies, produce a fleece that tends to have staple lengths sometimes as long as eight or nine inches, with very little wool averaging less than three inches. The medium wool breeds vary in staple length with average length less than the long wools. Some of the medium wool breeds produce quite short stapled wool under ordinary conditions, such as the Southdown and the Suffolk.

Hampshires and Suffolks, two of the common breeds, produce fleeces that contain black fibers. Wool with black fiber cannot be used in light colored fabrics. This decreases the acceptability of those wools in the market place.

Long and medium wool sheep have less dense fleeces. The high rainfall during the winter and spring months tends to wash out dirt and grease. Less dirt and foreign matter are picked up from the ground because of the vegetative cover. Because of this, shrinkage of Western Oregon wool averages less than for wools produced in the range areas.

A big factor with Western Oregon wool is the extremes of variation in quality to be found. This variation in wool quality is found not only from flock to flock, but

within flocks, and even on individual sheep. This variability stems primarily from the low level of selection practiced with respect to the wool characteristics of the breeding stock. There is insufficient monetary incentive to make worthwhile more intensive selection. Exceptions can be noted, particularly in the case of purebred flocks selling rams or foundation stock. Figure 4 gives an indication of variability of wool fiber in fleeces.

Almost all breeds and types of sheep can be grown in Western Oregon, in contrast to the range areas where there is a definite tendency toward only a few closely related types which are adapted to the growing conditions there. Many farmers with sheep have a personal preference for a particular breed. Consequently there are breed differences from farm to farm. Some producers even raise two or three different breeds on the same farm. Often the differences in fleece characteristics are significant, but because of the extremely small lots, many of these operators do not feel that it pays them to differentiate among the various kinds of wool.

Not only are the different breeds found, but there has been a tendency to mix the breeding indiscriminately, depending on the operator's ideas at the moment or on what kind of breeding rams are available at the price he wants

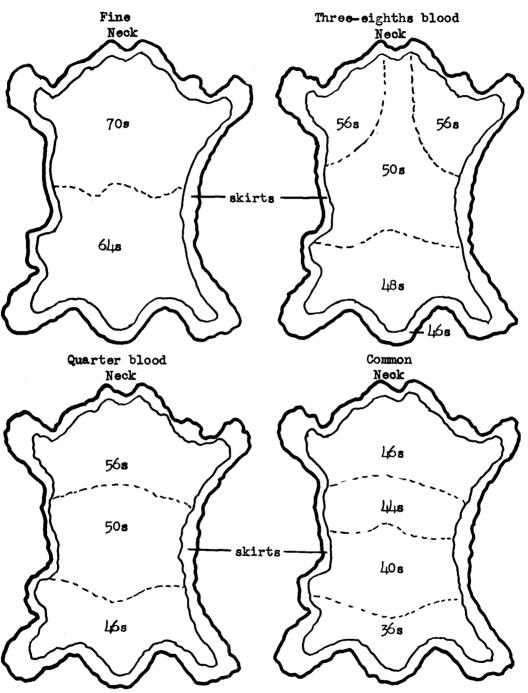


Figure 4. Diagrams of fleeces showing fiber variations.

Source: (30, p. 393)

to pay. As a result, many producers do not follow a clear-cut long-range planned breeding program. This mixture of breeds has increased the variability of the wool resulting in a product with limited uses.

## Size of Enterprise

Western Oregon sheep enterprises are usually small, particularly where operated in conjunction with other enterprises. There are also many producers so that while an individual flock is small the total number of sheep is nearly as great as in the range area. Table 6, taken from agricultural census data, emphasizes the small size of sheep operations in the western part of the state.

With the small number of sheep per farm, the volume of wool from the individual sheep enterprise is limited. The small volume of wool limits the amount of preparation that the producer can effectively perform on his wool clip. The amount of off wools would be too small to be a marketable unit and the added returns to the producer for detailed preparation of wool for market would be unlikely to pay the costs.

Income from wool in Western Oregon is secondary to the income from sheep sold for meat and makes up only a small part of the producers' total farm income. At the

Table 6. Number of sheep and average size of operation in Western Oregon, by section and county, 1950.

Area	County	Number farms reporting sheep	Numb <b>er</b> sheep sho <b>rn</b>	Average size of operation
I	Benton Clackamas Lane Linn Marion Multnomah Polk Washington Yamhill	196 443 436 651 500 38 220 54 258 2,796	13,806 13,013 21,567 40,711 27,872 504 14,098 1,939 15,185 148,695	70.4 29.4 49.5 62.5 55.7 13.3 64.1 35.9 58.9
II	Clatsop Columbia Coos Curry Lincoln Tillamock	17 41 133 130 65 8	458 3,000 20,819 30,274 2,433 133 57,117	26.9 73.2 156.5 232.9 37.4 16.6 145.0
III	Douglas Jackson Josephine	753 130 37 915	61,593 9,643 753 91,989	108.4 74.2 23.5 100.6
	Total	4,110	297,811	72.5

Source: 1950 Census of agriculture.

Oregon State Central Experiment Station in 1952 the returns from wool on the hill pasture speep amounted to 10 to 17 percent of the gross receipts (3, p.2; 2, p3). This situation precludes much effort on the part of the producer to improve the wool that he produces or the preparation of the wool for the market.

It is seen here that production factors, both in the range areas and the farm flock production areas, have an influence on any marketing programs. The differences in production organization among the producers of the state must be taken into consideration. The goals of the individual producer and his reasons for maintaining a sheep enterprise must be related to any improvements in marketing.

#### CHAPTER III

#### PREPARATION OF WOOL

The extent of the preparation that the individual producer performs on his wool depends on the extent to which the producer can see its effects on the price he receives for his wool.

Large volume wool producers are more likely to see
the advantages of superior preparation because of the
part their returns from wool play in their total farm
income. It is difficult to persuade the small producer,
whose wool returns are a minor part of his farm income,
that improved preparation of his wool is desirable under
existing prices.

The technical knowledge and experience of the operator limit the amount of preparation he is able to perform. Here again, the large volume producer has the advantage. As a specialist in wool production he has more experience and it is easier for him to gain some technical knowledge of wool than is the case with the small producer.

Small flock operators must allocate their managerial resources among several enterprises. Of necessity those enterprises which make up the bulk of their farm returns receive the greatest consideration. They cannot afford to spend very much effort to obtain an extensive knowledge of wool.

Regardless of the desires of dealers and manufacturers, the individual operator must find the level of preparation that best fits his technical knowledge, experience and production situation.

How far preparation should be carried by the producer has been a point of discussion for many years. Relative to much of the wool produced in other areas of the world, domestic wool has not been extensively prepared. The extent of wool preparation varies considerably, even in oregon.

# Preparation in Eastern and Western Oregon Compared

Comparison of Eastern and Western Oregon wools shows that the Eastern Oregon producer has fewer problems to begin with. His wools are more uniform, and, in the case of the large operators, in greater volume. The wool is easier to handle, the problems of separating inferior wools are less and experienced personnel are more readily available.

In Western Oregon the small lots and the extremes of variability of quality and condition of the wool complicate matters. Because of the characteristic methods of preparing Western Oregon wools more sorting and handling are required at warehouse points and at the mills before this wool is satisfactory for the manufacturers' use.

Separation of already small lots into even smaller lots is often not practical. It is not feasible to hire personnel experienced enough to do the separating or grading at the farm.

Buck, of the U.S. Department of Agriculture, gives twelve points for acceptable preparation of wool (3, p.1-4).

- 1. Shear sheep only when dry.
- 2. Shear on dry clean surface.
- 3. Avoid second cuts; keep fleece in one piece.
- 4. Tag sheep before shearing.
- 5. Roll fleece with flesh side out.
- 6. Tie each fleece separately.
- 7. Use good paper twine.
- 8. Keep wool free from trash.
- 9. Pack in regulation sized bags.
- 10. Store in clean dry place.
  11. Pack kinds and types separately.
- 12. Use branding paint sparingly.

Most of these suggestions are ones within the capabilities of any sheep operator, but there exists a great variation in the extent to which they are followed by the individual sheep operators, particularly in Western Oregon.

Shearing in the large flocks in Eastern Oregon is an important occasion. Travelling crews of professional shearers are hired. These shearers have had experience and can do the job efficiently and smoothly. Most often temporary shearing facilities are set up where the sheep are, although in some places permanent shearing sheds are still used. Some of the operators will go so far as to keep large crews idle if there has been a rain and the fleeces

are damp. The correct methods of tying the fleeces and the use of wool twine and bags are not the problems in large operations as they are the most efficient way of handling large volumes of wool. Most of the Eastern Oregon wool does not stay long on the ranch because of lack of storage.

Where variation in preparation practice begins in the large sheep operations is the extent of separating various qualities and conditions of wool. In most operations, only a minimum of separation is carried out, usually limited to separating out tags and black fleeces and the off wools. On some very large operations, the yearling fleeces, ewe wool, and ram wool are packed separately.

There have been several attempts to perform ranch grading and sorting in an attempt to make domestic wool more nearly equal to Australian wool in preparation. These efforts have not been successful in the past. Lack of qualified technicians, lack of acceptance by dealers and processors, and lack of any widespread interest by growers have been the major factors for these past failures.

P. A. Reid, an Australian wool economist, says "...the introduction of skirting, classing ... along the lines of Australian practice appears to be both unwarranted and impracticable " (22, p.150).

among large flocks. Operational practice has been to brand the sheep for identification with various fluids, some of which are not easily removed in the manufacturing processes. Removal of the brands is an expensive operation for the manufacturer, as it involves much hand labor. Von Bergen estimates that use of scourable branding fluids might mean a saving of about three cents per clean pound by the elimination of the expensive hand labor, extra processing and losses on the painted wool (29, p.9). Patisfactory scourable branding fluids are now available on the market, but have not yet been universally adopted.

Preparation of Western Oregon wool has been mainly at the convenience of the producer, limited by his knowledge and technical skill. The sheep are sheared by the producer himself or by individual professional sheep shearers where they are available. Time of shearing is dependent on fitting the operation with other farm work, or whenever the travelling shearer will be available. Facilities for shearing vary considerably as does the care of the wool. Although not nearly as prevalent as in the past, a few farmers still tie fleeces with whatever is handy and pack them into any bag they have available. Some Western Oregon farmers store their wool on the farm, often in unsatisfactory places where the wool may become dirty or draw moisture, until it becomes convenient to take the wool to market.

Very little separation of the various types and qualities of wool is done at the farm. Even off-wools such as tags, crutchings, burry fleeces, cotted wool, or dead fleeces are often thrown with the better wools. The Western Oregon producer is limited in the amount of separating he can do by the small amounts of the separates, which makes for inefficient handling, and by the technical knowledge that he possesses or is available to him.

# Results of a Survey of Preparation Practices in Western Oregon

On a survey conducted among sheep producers in four counties in Western Oregon - Yamhill, Polk, Marion and Linn - 78 producers were asked questions concerning their preparation of wool for market. These producers all had small flocks of blackface breeding ranging in size from 25 to 500 head, and were raising sheep in addition to other farming activities. The following results were obtained:

- 68 producers indicated they performed a crutching operation.
  10 indicated that they did not.
- 62 producers said that they separated their tags.
   16 said they did not.
- 57 producers sheared in a barn, shed or other shelter.21 did not.
- 4. 76 producers sheared their sheep on a board platform or some other surface away from the ground
  or litter.
  2 did not.

- 5. 32 producers indicated that they kept shearing locks and other bits of wool separated from the fleeces.
  - 46 indicated that they did not keep these stray bits separate.
- 6. All producers who sheared lambs kept the lamb wool separate.
- 7. 2 producers separated black fibered fleeces.
  76 producers did not separate the black fibered fleeces.
- 8. No producer in the survey separated cotted fleeces.
- 9. 3 producers separated burry fleeces.
  75 producers included burry fleeces, if they had any, with the rest of the wool.
- 10. 64 producers did not mix wool from dead sheep with the other fleeces.
  14 producers did not separate dead wool from the other wool.
- ll. All the producers surveyed tied their fleeces with paper string and packed them in regulation wool bags.

On none of these farms was wool graded or skirted.

Western Oregon operations are too small and the wool too

variable to permit effective farm grading or sorting, be
yond a minimum of separating out certain types of off-wools.

It will be noticed from the survey taken that in most in
stances very little sorting of off-fleeces was done. It is

not feasible for small producers to separate small quantities

of wool. There is also the question of degree - whether the

fleece in question is enough inferior to be separated from

the rest of the fleeces. In some cases the inferior wools

are not recognized by the producer.

One of the major criticisms by other segments of the wool industry of the producer methods of preparation of wools is presence of tags or dung locks in the fleeces. These inferior parts create problems in cleaning the fleeces and in other manufacturing processes as well as causing stains in the wool. Increases in the estimation of shrinkages on clips in which the tags are included directly affect the producer himself. Western Oregon wools have been heavily criticized for this fauit.

Survey results indicate that while the majority of the producers separate tags, a number of them make no effort to do so. Western Oregon producers receive no notion of the shrinkage of their wool and consequently, may not be aware of the effect of the presence of heavy tags in their wool.

Preparation of wool for market can be improved in both Eastern and Western Oregon. The extent of preparation on the farms and ranches is far less than in most of the wool producing areas of the Southern hemisphere. Domestically produced wool is in competition with these wools and with synthetics for utilization by the manufacturers of textiles.

Australian wool particularly is well tagged, skirted and sorted within very narrow classes so that the manufacturer need order only the specific wools that he needs for

shed. The competitive position of poorly prepared wools has been weakened. In domestic wools, lack of the uniformity found in Australian wools and the lower levels of preparation of wools produced in this area increase the manual handling necessary, further increasing the disadvantage (31, p.3).

Improved or additional preparation of wool by domestic producers is dependent upon whether the costs to the producer are offset by higher prices for the improved wools. The producer must also realize to what extent the price he receives is dependent on the preparation of his wool.

#### CHAPTER IV

# THE PRODUCER'S APPROACH TO MARKETING OF WOOL

Producers vary in their attitudes toward the marketing of their wool. When the individual producer is ready to market his wool, he is faced with making a decision as to where, when and how that wool is to be marketed. The decision that the producer makes is consciously, or more often unconsciously, based on several factors:

- 1. The producer's knowledge of his product and its value.
- 2. The producer's knowledge of the outlets available to him and his understanding of the market structure.
- 3. The importance of wool among the commodities produced on the farm.
- 4. The amount of interest the producer has in marketing of wool.

# Factors Affecting Producer's Decisions

Knowledge possessed by the producer concerning the product that he has produced varies considerably. Because of his greater volume, the large producer is more likely to possess greater knowledge of his product, and may have made a greater effort to attain that knowledge. he will have made an effort to find out the value of his wool by gathering information as to his grades, staple length, shrinkage, acceptability on the part of the trade besides checking on the activity of the wool market and the prices being paid. His scurces of information and its accuracy

may be varied - his neighbors, market information from radio, newspaper, magazines, dealers. A few of the large producers may go so far as having a sample of their wool tested.

Small producers, on the other hand, may have only an incomplete knowledge of the product they have for disposal and little information concerning prices. Their understanding and ability to relate price and market information may be lacking. They may have put little or no effort into trying to ascertain the value of their product in the market place.

The producer's knowledge of the market outlets, and an understanding of how each of these outlets operates, may be only hazy and vague. His ability to appraise his market opportunities is limited by his knowledge of the outlets available to him.

The producer's effort to find out the value of his wool and the best means of disposing of it will tend to very with the importance of wool among the products of his farm to be marketed. The producer for whom wool is an important source of income will usually make a greater effort to find out what his wool is worth and how the wool can be marketed to obtain as closely as possible his estimate of its value. A difference of one or two cents a pound in the price received for the producer of large volumes has quite an influence on the returns he obtains.

Where wool is but a minor source of income for the producer, he will usually not give the marketing of the wool great emphasis. A difference of even five cents a pound may not mean as much to him as the variation of a cent a pound to a large operator. The producer of small volumes of wool is more likely to be limited in his knowledge of the value of his product and its relationship to the market. This limitation on the producer's knowledge of wool and markets will influence his ability to obtain the full value of his wool.

Interest of the producer in effective wool marketing is important in influencing the amount of effort that he will make. Although interest will tend to vary directly with the importance of wool to the producer farm income, it often cuts across size influences. A small producer, because of his interest in wool regardless of its relationship among his other farm products, may have as great a knowledge of the value of his product and how best to market it as almost any large producer. Farmers who lack an interest in marketing their product will tend to sell to the most convenient buyer, or the first buyer to offer them a price for their wool.

Some farmers build up a confidence in a given way of selling or some particular market agency and will use that outlet invariably, even though they could do better elsewhere. Many of these farmers lack confidence in their

ability to better their returns by finding other outlets. The producer's prejudice against a specific outlet or way of marketing may also interfere with his obtaining the best possible price for his wool.

## Lines of Approach

There are two lines of approach that the producer might take in making his marketing decisions. The producer may take what could be called a "rational" approach to the problem. He would determine the value of the product he has for sale. In doing this he would have to have the necessary knowledge of what he has produced and be able to relate his wool with a price. To do so the producer must have the needed information available and have the training and ability to interpret what he finds.

Secondly, the producer would have to appraise the marketing opportunities to ascertain where he could obtain the value of his product and how to go about obtaining the full price.

On the other hand, the producer might act "irrationally" by selling his wool to the closest dealer or the first buyer to come along at whatever price was offered. In this case he would have made no effort to learn the value of the wool nor the market opportunities. The producer who receives the full value for his wool in this situation would do so only by chance.

Very few Oregon wool producers would fit either extreme. The large volume wool producer would tend toward the first approach, and the small producer, particularly in Western Oregon, would possibly tend toward the second situation. However, on the basis of each individual producer's situation he may actually be acting toward his best interests even though it might appear on the surface that he was not marketing his wool most effectively. Actually a producer is marketing his wool rationally if he is making the most effective use of the knowledge that he has in making his marketing decisions in relation to his sheep enterprise and its place in his farm organization. In this sense, the producer with a small amount of wool to market relative to his total output of actual farm commodities may be acting rationally in selling his wool to a convenient dealer located close by.

The amount of knowledge and understanding that a producer has is important in making marketing decisions. Availability of information is also important. One of the reasons that producers market their wool with incomplete knowledge is that the information needed by them to assess the value of their product and the market opportunities is difficult to obtain. An expenditure of extensive time, effort and money to gather information relevant to the marketing of his wool may not be made up by the additional

receipts obtained. A statement made by Johnson and Haver regarding management situations applies very much to the wool producer and his production and marketing of wool:

First among the principles for handling change and acquiring knowledge is not to spend more, in time, foregone alternative opportunities, money, and effort, in performing additional amounts of any of the managerial functions than such additional performance is worth (16. p.33).

Producers need to become as informed on the marketing of their wool as their situation will allow. Ease of obtaining information may make its use more widespread within the limits imposed by the production and marketing framework of the individual producer.

#### CHAPTER V

#### METHODS OF SELLING WOOL

In making his marketing decision the producer makes several choices involving how the wool is to be sold and with whom he deals. The grower needs to know the possibilities available to him relative to the wool which he has to offer. In order to achieve maximum returns the producer should decide how his wool is to be sold as well as to whom he will sell it.

#### Basis of Sale

Wool can be sold by the producer on basis of grade or it can be sold ungraded. No blanket statement can be made that sale on a graded basis is best for the producer in all market situations. Each basis of sale has advantages and disadvantages, depending on the producer and the wool that he has for sale.

#### Sale on Graded Basis

Selling wool on the basis of grade means that the fleeces are graded and the weights of wool in the various grades taken. The producer is paid on the basis of the amount of wool he has in each grade and the value of the particular grade of wool. Grading is done by trained technicians who are able to separate the fleeces into the

various grades in line with the processors' requirements and the relative prices for each grade of wool. If there is a particularly heavy demand for certain grades to the extent of influencing the price, the graders can place borderline fleeces into the grades which have the greatest price advantage.

Producers who sell their wool on a graded basis have an opportunity to educate themselves as to the qualities of wool that they produce. This information can be useful to the producer in formulating his breeding program if he wishes to breed for the qualities of wool which are in demand. The grading of wool also can inform the producer as to the uniformity of the wool. If the fleeces are separated into many grades with no preponderance of the wool in any one grade, the producer can see that there is a lack of uniformity in the wool produced by his flock. The knowledge of the grades of wool he has may be useful to the producer in future marketing decisions, providing he does not change the breeding in his flock.

Selling wool on a graded basis is advantageous for the producer who is producing a fairly uniform wool of qualities most in demand, particularly if he is in an area where much of the wool is deficient in uniformity and is of less desirable grades. Because of a tendency to price wool on the basis of averages where wool is bought outright on an ungraded basis, the producer of the high quality wool may realize more for it by selling the wool on a graded basis. Conversely, the producer of the poor wools may not make as much selling on a graded basis as he would have ungraded, as the present marketing framework now exists. This advantage-disadvantage situation in regard to grading exists particularly in the mestern Gregon producing area.

## Sale on Ungraded Basis

The producer selling his wool on an ungraded basis will have a limitation placed on his knowledge of the value of his wool, unless he has through previous knowledge or experience discovered the quality of wool produced by his flock. Without the knowledge of the quality of his wool, the producer is at a disadvantage in attempting to obtain its full value.

Sale on an ungraded basis may not be seriously detrimental to producers of wool which is relatively uniform
throughout the clip. This type of wool, particularly in
large volumes, may be sold as "original bag" wool. This
wool goes through marketing agencies without grading or
repacking. Mandom bags may be opened for inspection by
the buyers. The uniformity of the wool makes it unnecessary to go to the expense and effort of grading the clip.

Original bag clips come mainly from the large flocks in the range area.

#### Methods of Selling

Four principal methods of selling wool are practiced in Oregon. These methods are: (20, p.5)

- (1) Sale by contract.
- (2) Outright sale.
- (3) Sale on consignment.
- (4) Co-operative selling.

## Sale on Contract

Contracting for producers' clips in advance of shearing is sometimes done in Oregon, particularly for large clips in the range areas. Sale by contract means that the producer agrees to deliver his worl to the buyer, usually at a stipulated price, although occasionally, depending on the type of enterprise with which the contract is made, the contract will call only for delivery of the wool to the marketing agency. The producer may be paid a preshearing advance on the basis of the contract.

The producer, where price is stipulated in the contract, assures himself of an outlet and price for his wool.

By contracting, he is not taking a chance on a rise in wool prices, or allowing himself to suffer the consequences of a falling market. Froducers tend to be critical of contracting and complain when prices rise above the price in

the contract, but are very satisfied when prices are below the price contracted. By this method it is more to the producer's benefit to contract his wool when failing prices are likely to occur and not to contract on a rising wool market unless he can see other advantages to having his wool contracted, such as convenience or financial aid. Buyers, on the other hand, are more likely to offer contracts when there are prospects of a rising wool market, or a possibility of a short supply of a particular kind of wool.

Most of the contracting is done in the large clips of Eastern Oregon. The volume of wool is attractive and the uniformity and quality of the wool mean less risk to the buying agency. Very little wool contracting is done in Western Oregon, as the volumes are small, causing higher costs to the contracting firm. The lack of uniformity of the wool and the methods of preparation also produce greater risks to the buyer. Some contracting in Western Oregon wools occurred in 1951 when buyers were anxious to procure supplies of wool. Buch of the contracting at that time was for speculative purposes, with prospects of war goods contracts and extremely high wool prices.

#### Outright Sale

Producers who sell their wool outright receive a flat

price for all the wool that they deliver to the buying agency, regardless of the quality. Most of the wool sold by producers in Oregon is marketed in this manner. The producer is paid at the time of delivery of the wool to the purchaser.

A majority of the outlets in Oregon operate on this method of marketing wool. Because of the number of the firms and their location in the producing area, particularly in Western Oregon, they are close to the producer and have the advantage of convenience.

Producers who sell their wool outright sell wool ungraded. Unless they know the value of their product, they are limited in their bargaining power and are at a disadvantage in dealing with the purchasers on this basis.

Neither do they have the advantage of payment for quality which selling on basis of grade might bring them.

For some producers, selling wool in this manner is an advantage for the deal is consumated and ended when the buyer takes possession. The producer does not usually have to wait for his money as he is paid on the spot.

# Sale on Consignment

By selling on consignment, the producer sends his wool to a marketing agency which does the selling and returns to the producer the proceeds of the sale minus marketing expenses, which include the consignee's commission. The

firm to whom the wool is consigned does not take title
to the wool, but markets the wool in the most advantageous
manner possible for the producer. In so doing, it acts
more or less as the producer's agent.

Much of the wool sold on consignment is graded before it is sold, unless the consignee feels it will be advantageous to sell on original bag basis. The grading is done by technicians employed by the consignee. Selling of the wool will take place over a period of time, depending on market activity and the merchant's ideas as to when is the best time to sell the wool.

This method of selling will not be advantageous to the producer who needs or wants his money soon after delivery. Often it will take a period of several months before the producer will receive his final payment. A further disadvantage to the producer is that the commission merchants in Oregon are at a distance from the places in which the wool is produced, which adds the inconvenience to the producer of having to haul or ship his wool to the warehouses of the merchant.

Primary advantage to the producer in selling wool on consignment is that he hires the services of a firm that is experienced in wool marketing and the producer is most likely to get the full value of his wool. Because of the grading, the producer is assured of being paid what

the wool is actually worth, an advantage to the producer with superior wool. He also can be better informed as to the quality of his product.

### Cooperative Selling

Cooperative marketing may be carried on at two levels: (6, p.11).

(1) A local pool.

(2) A centrally located marketing agency.

Where the growers market cooperatively under the local pool system, they band together to sell their wool to take advantage of volume and better marketing direction. Each producer commits his wool to the common lot and the wool is sold as a unit. Only very rough grading or separating is done to make the pool more attractive. The wool is sold to a buyer who wants wool in large quantities.

Cooperative marketing through a large centrally located organization is much the same as selling on consignment. The major exception is that the producers themselves are the owners of the facilities and a manager is hired whose function is similar to the commission merchant.

The producers must send their wool to the cooperative's warehouses where it is graded and sold for them. Selling cooperatively is advantageous to the producer of better quality wools as the wool is handled on graded basis. There is also the opportunity to learn more about the wool that

the producer has grown. Other advantages claimed for marketing cooperatively include reduced costs of handling of wool between the producer and manufacturer, and a stabilizing effect on the market through the orderly disposal of wool (6, p.57,58).

Producers who have inferior wool may find that they can market more advantageously elsewhere. A further disadvantage is that the wool must be taken or shipped to the cooperative's warehouse. Also, time is involved in marketing cooperatively. The producer may not receive his final payment until almost time to harvest the next clip of wool. However, cooperatives will offer a loan on the wool in the form of an advance which most producers accept (6, p.20).

# Auction Marketing

Oregon but have not become a major method of selling wool. They are a factor to the producer only as his wool is represented in the auction through his agent, such as the cooperative or commission dealer. However, the wool producer should have some notion about the operation of the auction method of selling wool, as he has some rights and duties if his wool is sold in this manner. Auction selling is of more importance for the large producer as it is only large clips that are most likely to be sold as a single lot.

The first step in auction procedure is to display samples of the lots of wool offered for sale for the buyers' inspection. Catalogs are issued for the sale and the sale is carried on in a place separate from where the wool is exhibited.

Producers have the right to place a reserve tid. If the bids on the particular lot are below the reserve price set by the grower, the highest bidder has the sole privilege for 24 hours of bargaining with the grower. This means that the grower must have some knowledge of his clip and market possibilities, and the ability to bargain. Wool that is unsold at the auction may be submitted at a later auction or sold privately.

Wool growers have given the following reasons why they favor wool auctions: (7, p.15-16)

- (1) There is competitive bidding and an accumulation of buying power.
- (2) The educational value of seeing wool sold.
- (3) Open bidding buying, with the buyer and seller on a more open basis.
- (4) Sales are fairly quick and relatively close to home and have the further advantage of immediate returns.
- (5) Wool is sold on the basis of its merit.(6) Buying by the mills is more direct than through the ordinary channels.

On the other hand, other wool producers have conceived the following disadvantages of wool auctions:

- (1) Not enough competition among the buyers.
- (2) Auctions involve additional selling costs.(3) Not enough mill buyers attend the auctions.
- (4) There haven't been the sufficient volumes to attract large numbers of buyers.

(5) Collusion among buyers has been claimed.(6) No date which is satisfactory for all buyers can be arranged.

Australian experience has shown a gain for producers three years out of four through the auction system of selling wool. In that country auctions are well established and the production and marketing systems are so organized as to be able to use wool auctions effectively (31, p.30,43).

At present the auction system of selling wool is not widespread, but in time may become important. Limitations to its use now are the variability of the wool, difficulty in getting together sufficient volumes of attractive wool and a lack of real support on the part of some segments of the wool trade.

# Producer Consideration

The producer needs to be aware of the various methods of selling so that he may make a wise decision as to where and how he wants to sell his wool. Each method has its advantages and disadvantages for various producers. The individual producer must be able to choose the method which most nearly fits his particular situation relative to the wool he has to sell. He must consider what he can afford to do in the way of marketing effort, when he needs his money, the knowledge and understanding he has, and his attitude toward wool marketing in general.

#### CHAPTER VI

#### MARKET OUTLETS

Wool producers must decide where and to whom they will sell their product. As with the other decisions that the producer makes, his choice of market outlet often follows the path of convenience or least resistance. This may be caused by the unimportance of wool returns or it may be the result of incomplete knowledge on the part of the producer concerning the outlet opportunities that are available to him. In the light of his production situation and the knowledge that he has, the producer must examine the outlets available to find the one most suited to his needs. The more information a producer has, the more likely he is to make the correct choice in line with his product and what he needs in a market outlet.

Each producer may have several possible outlets for his wool. Each outlet has advantages for particular producers. The market outlet chosen by one producer may not be the most logical choice for another.

# Function of the Market Outlet

Market outlets serve as the link between the producers of the raw wool and the manufacturers who use the wool.

The dealers, buyers, and others who buy or handle wool add

to the utility of the product in several ways. Form and place utility is given the wool by assembling volumes of raw material in convenient locations for sale to processors. Users of wool prefer to buy in quantities suited to their needs, and in the form in which they can use the wool. It is inconvenient and expensive for the manufacturer to travel about buying small quantities here and there. Grading and sorting, in addition to skirting, aid in putting the wool in a form so that the manufacturer need buy only the types and qualities of wool that he needs for his operations.

Time utility is also imparted to the weel through storage by the dealers and handlers. Mills have in the past several years accustomed themselves to buying on a hand-to-mouth basis, purchasing the worl they need only when they have orders for products, or in anticipation of orders (6, p.9). Storage in the producing regions has increased in recent years. Storage of wool by dealers and handlers increases their costs through the necessity of having warehouse space, and through the risk of changes in wool prices.

There are four general types of market outlets available to the Oregon wool producer. These are:

<sup>(1)</sup> Cooperative marketing organizations.

<sup>(2)</sup> Primary market dealers.

<sup>(3)</sup> Local wool dealers. (4) Manufacturers.

## Cooperative Marketing Organizations

Two types of cooperative marketing organizations exist, the small local wool pool and the large regional cooperative marketing agency. These organizations are an extension of producer activities into the marketing field. Cooperative marketing became important when wool producers felt there was a need for such organizations, because of their distrust of the private marketing agencies. Cooperative marketing organizations are an advantage to the producer only as they are able to inject competition into the wool marketing structure and are able to offer greater service to the grower than he could obtain elsewhere.

The small local wool pool is not a common outlet for producer's wool in Oregon although such organizations do exist in scattered localities. No producers were contacted in the Willamette valley survey who marketed through a pool. The operations of the local pools include the accumulation of producers lots to form a more marketable volume of wool. The wool is usually sold to or handled by larger primary market dealers. The producer is paid on the basis of the amount of wool he contributed to the pool after operating expenses are met.

Oregon has one large regional cooperative marketing agency, the Pacific Wool Growers Cooperative Association

located in Portland. This organization was originally formed to serve producers in the Willamette valley, but has since expanded to receiving wool from all over the Pacific Northwest.

The cooperative receives, grades and pools the producer's wool. These graded lots are then sold to processors or other dealers in the most advantageous manner possible. The number of grades used by the cooperative are shown in table 7.

Table 7. Number of grades used by the Pacific Woolgrowers in the grading of producers' wool, 1950-53.

Year	Total number grades	Number of grades for Western Oregon producers covered in survey		
1951 1952 195 <b>3</b>	29 29 3 <b>3</b>	20 19 22		
4-14-14-14-14-14-14-14-14-14-14-14-14-14				

Source: Pacific woolgrowers association. Unpublished data.

Most of the Western Oregon wool graded three-eighths, quarter blood and low quarter. The staple length was variable, falling generally in all staple classes, even in the lower grade wools.

The cooperative also stores wool, marketing it throughout the year when marketing conditions are good. It is bonded for storage under Commodity Credit Corporation nonrecourse loan provisions. The "orderly marketing" process distributes the sales of wool throughout the entire season. Producers may have to wait for extended periods of time before receiving their final settlements on the wool they have consigned.

Financial assistance is offered to growers through the practice of making advances on the wool at time of delivery. The advance is actually a form of loan which is cancelled when the final payments to the producer are completed. The acceptance of the advances is not mandatory, but almost all producers take them (6, p.20).

Other services offered by the Pacific woolgrowers include the retailing of supplies and various educational activities.

In areas where the wools are variable in quality and preparation, ungraded wools are bought on the basis of the average of the wool produced. Producers with above average quality wool do not obtain commensurate returns except by sale on a graded basis. The cooperative provides this service.

Cooperative marketing organizations cannot market wool effectively without the support of their members. Producers have had the tendency to expect their cooperative to market their wool to advantage in years of adverse price situations, and then desert the co-op in years of price upswings (13, p.4).

# Primary Market Outlets

Primary market dealers are those who are located in a large marketing center where wool is collected to be sent to the manufacturing and trading centers of the East Coast. Portland, Oregon, is an example of such a primary market. Wool comes to Portland not only from all parts of Oregon but also from surrounding states and Alaska.4

Primary market outlets available to the wool producer are of two types: (a) dealers who handle wool on consignment, and (b) those who buy wool outright. An example of a consignment dealer is the Western wool Storage Company of Portland. Examples of primary dealers who buy wool outright are Blue Mountain Hide and wool Company and Portland Hide and wool Company.

Most dealers who take wool on consignment do not take title to wool or do buying on their own. This allows them to devote their full energy to the effective marketing of the wool entrusted to them. These dealers charge their fees usually on the basis of a percentage of the selling price. In the past commissions of a flat rate

Portland also has aspects of a terminal market, as a large part of the wool used in local manufacturing plants passes through the city.

per pound have been charged. Some of these dealers have engaged in buying activities for themselves. These practices tended to make them less effective in marketing wool consigned to them. Most of the evils that existed in the past have since been eliminated (14, p.327).

consignment handlers offer such services as informed selling, volume handling, grading and storage. Some place restrictions on the sizes and types of wool that they will handle. This is done to take advantage of specialization, and because of the cost of handling small clips. The President of the Western wool Storage Company stated that he preferred not to handle clips of less than 1000 pounds. Clips of less than this size were too small to handle efficiently.

Primary market dealers who buy wool outright are not an important direct outlet for the Western Oregon producer. These agencies usually buy through local agents who are situated throughout the producing areas. In the survey of Western Oregon producers only one farmer was contacted who sold directly to a primary market dealer. Primary market dealers buy wool outright at a flat price per pound. Few additional services for the benefit of the producer are provided.

#### Local Outlets

Local buyers and dealers located in the producing areas serve as an important outlet for Oregon woolgrowers. Taking the state as a whole, there are a large number of these local outlets, particularly in Western Oregon. The individual woolgrower usually patronizes only those located within a few miles of his farm.

There are three main types of local outlets available to the wool producer. These are:

(1) Transient buyers of eastern mill and primary agencies.

(2) Local buyers who purchase wool for primary market agencies or for central market agencies or mills.

(3) Independent local dealers who are not directly affiliated with a larger marketing agency.

Transient buyers of eastern mill and primary agencies are major outlets for wool in Eastern Oregon range areas; they are experienced wool men and come to the ranches to inspect and bid on the wool clips. Transient buyers are particularly active prior to and during the shearing season. In years when price rises are forecast these men may contract to buy many range clips far in advance of the shearing time.

Buyers for the primary market firms and a few of the larger local independent dealers are usually residents of the community in which they operate. Buying of wool is

usually a sideline occupation for them. This type of buyer is prevalent throughout the fleece wool areas. The survey of Western Oregon producers found the farmers selling to persons who were grain elevator operators, feed and seed dealers, livestock buyers and feeders, professional sheepshearers, and part-time farmers.

Local buyers purchase the wool outright from the producer. The grower is paid a flat price per pound for his wool regardless of its quality or the manner in which he has prepared his wool. No advantage in price is paid to the producer for high quality wools which are worth more on the market than the average of the area. Producers of wool which is equal to or below the average of the area in grade, shrinkage, and preparation may find it to advantage to sell to this type of outlet, as they would be receiving more than they would if the wool were sold on the basis of grade.

These local buyers are paid a flat per pound commission for the wool that they buy for the larger marketing organizations. This commission averages about two cents a pound for valley buyers. Local wool buyers do not pay much attention to the quality of the wool. They are not technically informed as to the qualities, shrinkages, and staple lengths of the wool that they buy, and may not be any more advanced in knowledge of wool than the producers

whose wool they are buying. They receive their instructions from the market dealers who employ them. As wool buying is a sideline with them, they cannot afford to spend the amount of time and effort to become experts in wool, and the structure of the wool channels does not encourage them to learn.

There are a few local independent dealers of varying sizes in the larger towns in the producing areas. Examples of this type of outlet are brown and Fitzmaurice in Salem, Senders in Albany, and Harris in Corvallis. These local dealers buy the wool outright from the producer, basing their prices on the average quality of the wool from the area, in line with their competition. Local dealers sell to the most profitable outlet they can find. They make their margin on their trading ability, combining of lots to make attractive volumes, and at times rudimentary grading and repacking. These dealers engage in speculation. They may even store wool at a primary market warehouse for extended periods of time in order to take advantage of a hoped-for rise in prices.

#### Manufacturers

Local mills and manufacturers occasionally purchase
wool from producers. This practice, once the way in which
mills obtained all their wool, is done only in the localities

in which the mills are located. Consequently it is not done in Eastern Oregon, except as manufacturers may have travelling buyers inspecting and purchasing in the producing areas. The practice occurs in Western Oregon, as it is the location of several small mills who can use the wool that is grown in their manufactured products. Examples of these local mills that buy from the producer are Thomas Kay in Salem, and Paris Woolen Mills in Stayton. The wool processing firms in Portland do not usually buy from the producers as they manufacture products which require wools of different quality than that usually found in Western Oregon.

Mill buying is no longer common in most areas. The problems of storage and the risks of price changes make it undesirable to the mill operators. Wool in the area in which the mills are located is quite variable, and renders quality control of the product difficult. The wool that is bought is purchased outright from the producers. There are no extra services to the grower. The prices paid by the mills for wool bought from the producers is little different from that paid by other outlets.

Table 8 gives an indication of the outlets that the producers contacted in the survey used for disposal of their wool. It must be borne in mind that the large number of producers who sold to the cooperative is not

necessarily representative of the proportions of the producers in the area who use the cooperative as an outlet for their wool (see Chapter VIII).

Table 8. Outlets used by producers in the Central Willamette Valley in selling their wool, as obtained in a producer survey.

	Numbers of	roducers	using outlet
Outlet	1951	1952	1953
Cooperative Mills Primary market dealer	41 12	41 10	37 10
Local independent dealer Local buyer	6 12	13 12	13 <u>17</u>
Total	71	76	78

Source: Survey data.

Not all producers who were contacted in the survey sold wool every year, and some sold wool to more than one agency in the same year.

## Competition among Market Organizations

The wool industry is highly competitive within itself and in relation to other products. On the dealer level there is competition because of the large numbers of dealers and buyers in the business. This competition is reflected to the grower only as he has knowledge of the outlets available. All growers in a given community will not receive the same price for their wool. The price will

depend on the grower's knowledge. However, the price range among the growers will not be large. Some dealers may differentiate between growers by paying an individual grower who has a particularly attractive lot of wool, or one who has a particular quality of wool, a small premium.

Dealers, when they perform a storage function, also take the risk of price changes. In 1951 when wool prices rose to extreme heights and then fell rapidly, many of the wool dealers in the area suffered losses. They had bought wool at inflated prices from the growers. Before these dealers could sell it to the mills, the price had broken, leaving them with large inventories of wool for which they had paid high prices and with no chance to sell the wool for any approximation of the amount they had paid for it. At least one of the woolen mills in the area was caught in the same position.

The various wool merchants discussed above perform
the necessary service of moving the wool from the producers
to the users of the raw material. Their existence within
the market structure is dependent on the utilization of
their services by both the producer and the processor.
The structure of the marketing system is the result of
meeting the changing needs of producers and manufacturers.
The structure is always subject to change as conditions
and requirements change.

#### CHAPTER VII

#### THE WOOL PRODUCER AND PRICES

Producers' knowledge concerning their wool is incomplete unless they can relate the wool produced to a value. The individual producer cannot market his wool effectively without an understanding of what his wool is worth. The amount of knowledge of wool prices and market information needed is dependent on the producer and his production situation. If wool is a major product from the producer's farm or he is interested in marketing wool to obtain the greatest possible return, he needs to know more about prices and the factors that affect prices than would be the case where income from wool is only a minor part of farm income or where the producer lacks the desire to obtain maximum returns for his product.

#### Sources of Information

Information needed to place a value on a particular lot of wool is difficult for the individual producer to obtain and only with limits can most producers ever attain more than an approximation of what their wool is worth.

The producer must know what the buyers are looking for. He must keep abreast of market prices and market trends to judge whether a price offered is in line with the value of

the wool, and what the possibilities are of the price being advanced or decreased in the near future. If he deals through a firm that handles his wool on consignment, much of this is done for him. But if he desires to sell the wool outright, he has to pit his knowledge against that of the buyer.

Sources of information available to the producer are in many respects unsatisfactory because of the producer's inability to relate them to the wool that he has for sale. Producers usually have a general notion of the prices being offered in their locality, but the individual has no way of knowing if the prices are consistent with the type and quality of his wool. Much of the producer's price information comes from his neighbors or from what he hears in town. This information is usually from sources of the same level of knowledge as himself.

Much of the information on prices is of a general nature. Newspapers such as the Oregonian usually quote a general average price for the area, such as "Valley wools, 53 @ 55 cents." This type of price quotation may serve as a basis for bargaining, but tells the grower little about what his own wool is worth. Detailed quotations from the Boston wool market are not usable unless the producer can interpret them. To do this requires information on shrinkage, transportation rates and operating margins

in the wool trade. Too often growers do not make use of what market information is available to them.

## Genesis of Wool Prices

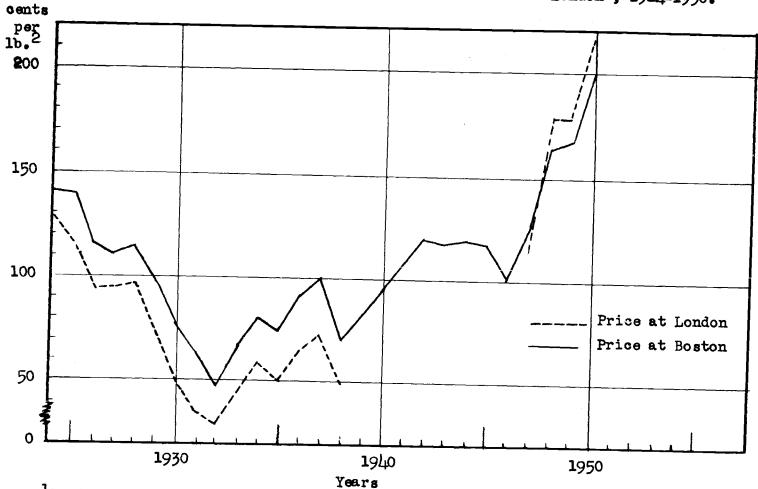
The prices which the individual farmer receives for his wool have their genesis far away from the producing area in which the grower is located. The price making forces, even though they be far removed from the producer, nevertheless affect his price.

Domestic wool prices are made in Boston and reflect down to the producer through various marketing channels. Some of the reasons why Boston is the most important wool market are: (5, p.73)

- 1. Boston is the only place in the United States with enough concentration of the wool industry to assure a market for large lots of wool.
- 2. The Boston area has the support of specially adequate and enterprising bank facilities.
- 3. Boston has built up large storage facilities.

Supply and demand on a world wide basis affect wool prices. Boston wool prices follow the same general pattern, allowing for influences of tariff and differences in methods of preparation (11, p.33). Figure 5 shows the relationship that exists between Boston prices and the London wool market. Supply forces include the amounts of wool produced and carry-over stocks.

Figure 5. Open-market prices of fine wool at Boston and London 1, 1924-1950.



London auctions were suspended August, 1939 to August, 1946.

2Price per pound clean basis.

Source: (11, p. 35).

Demand for wool is derived from consumer demand for wool products. Factors affecting consumer demand include: consumer purchasing power and the general level of business activity; population changes; customs, style and fashion changes; cost of wool products relative to the cost of substitute items and other items in the consumer's budget; central heating and improved transportation facilities; consumer stocks of wool goods; and advertising (11, p.18).

Supply changes at the world level are minor, particularly in regard to short-term variations. Responsiveness of supply to price is quite low in the short run. Market demand, however, has a great influence on prices (1, p.216).

Farm prices for wool in Oregon reflect the prices on the Boston wool market, allowing for transportation charges and the costs of handling wool by the various agencies through which the wool must go before reaching the processor. In a study of prices of Willamette Valley wools, Mittelman found a close relationship between the upward and downward movements of farm prices and the dealer prices in Boston (19, p.18).

Prices are usually quoted as averages of the prices in the market, or else as ranges between two prices. On the Boston market these prices are quoted on a clean basis. The clean basis price must then be translated to a raw wool price in the producing area, or at the primary market before it is of value to the producer.

Producers selling wool on a graded basis receive a price for each grade of wool that they market. These prices are usually in terms of raw wool. The relationship of the raw wool price to the clean price at the place of grading reflects the yield of clean wool.

Prices quoted for ungraded Western Oregon wools are the result of a system of averaging. Dealers in Western Oregon wool know from experience about what grades, staple lengths, and shrinkages to expect from Western Oregon wool. These are averaged out to reflect a single price, which is the basis on which the ordinary wool buyer operates. The price the individual producer receives will vary around this general average price depending on his dealing with the buyer.

Buyers representing large eastern firms are somewhat more careful in their buying from producers and from the primary dealers. These buyers carefully appraise a lot of wool before submitting a bid.

## Factors Important to Buyers

Factors which are considered by the buyers for mills or other processing firms include: (1) quality (grade), (2) length of staple, (3) yield, (4) uniformity, (5) character, (6) elasticity, (7) soundness, and (8) handle (17, p.13). Almost all of these factors are subjectively

evaluated. Buyers will usually tend to be as conservative as possible in their estimations of the various factors. Most producers, because of their limited knowledge of wool, are at a disadvantage in dealing on this basis. The ability to evaluate correctly these characteristics subjectively comes only through training and experience.

Some progress has been made toward the objective measurement of these factors. The Department of Agriculture has defined the various grades and has distributed a kit with comparative samples. Tests can be run on most of the other factors, but the process is time consuming, difficult, and inconvenient for the ordinary producer.

Grade, length, and yield are the most important of the factors; price differentials exist between the various grade and staple length classifications. Table 9 gives an example of the differentials as quoted in a recent market report.

Estimation of yield has important effects on the grower's returns from wool. Where shrinkage of the grease wool is estimated by the buyers, the appraisals tend to be conservative to avoid risk on the part of the buyer in underestimating the shrinkage. Their practice may be expensive, particularly for producers of large wool clips.

Loss to the grower through the over-estimation of shrinkage is best illustrated by an example. Assuming

Table 9. Domestic wool price quotations on the open market at Boston, selected grades, week ending July 30, 1954.

Grade	Clean basis prices
Graded territory wools	arman den upp met ster de ge Europeig flest megen Ethiologie Ethiologie State (Ethiologie State (Ethiologie St
Fine: Good French combing and staple	%1.69 <b>-</b> 1.80
Average and good French combing Short French combing and clothing	1.65-1.70
One-half blood: Good French combing and staple Average to good French combing Three-eighths blood:	1.55-1.60 1.50-1.55
Good French combing and staple Average French combing One-quarter blood:	1.30-1.40 1.20-1.25
Good French combing and staple Average French combing Low quarter blood: Common and braid:	1.20-1.26 1.05-1.10 1.08-1.12 .95-1.05
Original bag territory wool	Ls
Fine: Good French combing and staple Average and good French combing	1.70-1.80
Graded fleece wools	
Fine: Good French combing and staple Short French combing and clothing	1.63-1.70 1.50-1.55
One-half blood: Good French combing and staple	1.48-1.52
Three-eighths blood: Good French combing and staple One-quarter blood:	1.13-1.24
Good French combing and staple Low quarter blood: Common and braid:	1.11-1.16 1.07-1.10 .95-1.00

Source: U. S. Department of agriculture. Agriculture marketing service, Livestock branch. Weekly review of Boston wool market 30(30):2 July 30, 1954.

a clip of 10,000 pounds of wool and a clean wool price of \$1.25 at the ranch, a shrinkage test which shows the actual shrinkage to be 60%; multiplying the clean price by the yield (100% - shrinkage of 60%), the grease value of the wool would be 50 cents per pound, or \$5,000 for the clip. If the buyer, wishing to be conservative, estimates the shrinkage at 65%, the grease price he would quote the grower would be approximately 43½ cents per pound and the total return to the grower would be approximately \$4,350, which is \$650 below the actual value. If the buyer had estimated the clip at 62% shrink, the producer would have received \$4,750, which would be \$250 below the actual value.

The U. S. Pepartment of Agriculture has developed core testing techniques in which samples of wool are taken by the use of a coring device from the sacks or bales, and sent to a testing laboratory for analysis. Core-testing has proven to be accurate within slight tolerances, depending on the technique of the tester. Acceptance, although slow, is becoming more widespread among the various marketing agencies. This method is used by government agencies such as Commodity Credit Corporation and customs officials. Its disadvantages lie on the amount of time to get the results of the report and the fact that it is useful only on large clips.

## Seasonal Price Variations

Wool prices are not static throughout the year. They are constantly fluctuating through continual reappraisal by manufacturers of the market situation. This has led some growers to attempt to time their sales of wool so as to take advantage of any price rises that might occur later in the marketing year.

The price changes that occur throughout the year are produced through the reappraisal of the price making forces rather than through regular seasonal price fluctuations. Consequently, price variations are due to chance rather than according to a constant pattern. Table 10 shows monthly variation from the yearly average price in Oregon as computed from a 12 month moving average covering a period of 40 years.

Table 10. Monthly wool prices expressed as a percent of the average price, Oregon, 1912-1952.

Month Mean	price percent	Month Mean	price percent
January	99.3	July	106.1
February	100.5	August	99.0
March	101.7	September	100.0
April	98 · i	October	100.3
May	99.2	November	100.4
June	100.2	December	101.2

Source: Compiled from monthly average wool price series kept by department of agricultural economics, Oregon state college.

Only an intensive and continued study of the market situation would enable a producer to know when to time his wool marketing to coincide with price increases. This is beyond the abilities of most producers.

## Dealers' Margins

wool growers have often criticized dealers for extracting large profits at the expense of the producer. Undoubtedly some dealers have taken undue advantage of individual producers. Competition among the many dealers has tended to keep their margins at a minimum. This competition exists not only among the marketing agencies of the wool industry, but between the wool industry and other textile products and with wool and wool products from abroad. The merchandising function receives only slightly over two percent of the consumer's dollar spent for wool. Large proportional reductions in the cost of merchandising wool would have relatively little influence on the total spread between farm prices and retail prices of wool articles (12, p.68).

Much of the cost in converting raw wool on the farm into manufactured goods is involved in the labor necessary to carry out the various steps. The producer could be instrumental in helping to reduce the costs of converting wool into useful articles through improvements in the wool

ed for marketing. Variable wools and poorly prepared wools increase the amounts of labor nedessary to handle wool throughout the marketing and manufacturing chain. Improvements in the wool presented for marketing could reduce the amount of labor necessary to convert it into manufactured products. Closer integration of the types and qualities of the wool produced with the types of wool products desired by consumers would also be helpful in reducing some of the manufacturing costs.

#### CHAPTER VIII

# COMPARISON OF SELLING WOOL ON GRADED AND NON-GRADED BASIS

Sale of wool on graded basis has been proposed as one of the possible solutions to the wool producers' marketing problem. This basis does have worth in its educational value to the producer, and in selling the wool on its merits. However, it has disadvantages in that it is not as convenient to the producer, and full payment for the wool is delayed until after the wool has been graded and sold. Few producers in the state of Oregon are large enough that grading can be economically done at the site of production. Under Western Oregon conditions grading on the farm under present marketing structures is unfeasible because of the small volume of wool per farm, and because of the variability of the wool and methods of preparation, as well as the lack of enough qualified personnel. Almost all of the grading, therefore, is done at warehouses in the primary market centers, except for the wool that is shipped to Boston without going through the hands of a primary market dealer.

#### The Survey and its Objectives

A field survey was performed to find out if it actually was advantageous for western Oregon producers to sell wool on a graded basis within the given limits of their management ability and preparation practices.

Other objectives were to find out what Western Oregon wool producers were doing in the preparation of their wool for market, where they were selling their wool and what prices they were receiving.

#### Methodology

In order to eliminate the effects of variations in growing condition, grade, shrinkage, and to keep within farm flock type of production several limitations were imposed on the sample used.

The area comprised the central Willamette valley counties of Yamhill, Polk, Marion and Linn. These counties are similar in growing conditions and climate.

Farm flock production is the dominant type of sheep enterprise in the area chosen. A limitation of the size of enterprise in the survey was set at between 25 and 500 head in order to eliminate extremely small and extremely large flocks.

Flocks surveyed were limited to sheep with Hamp-shire or Suffolk blood in the breeding. A few of the

flocks were purebred Hampshire or Suffolk sheep. Most were commercial type flocks which had Hampshire or Suffolk breeding as foundation stock, or where these breeds had been introduced.

The time period covered was the 1951, 1952, and 1953 market seasons. These seasons are recent enough so that accuracy of the records could be maintained and memory bias reduced.

Records were obtained from 78 producers in the area. The division of the numbers of these producers who sold on graded and ungraded basis varied from year to year. In 1953, the last year covered, the division was 38 producers selling on a graded basis and 40 selling on an ungraded basis.

Table 11. Number of producers selling wool on graded and ungraded basis, 1951-1953.

County	<u>l</u>	9 <u>51</u>	<u>l</u>	952	<u>l</u>	953
	Graded	Ungraded	Graded	Ungraded	Graded	Ungraded
Yamhill Polk Marion Linn Tota	10 10 10 10 11 141	5 5 12 8 30	11 10 11 9 41	6 6 12 11 35	10 7 11 10 38	6 9 14 11 40

Source: Survey data.

Information was obtained from the producers on the basis of a personal interview recorded on a prepared questionnaire.

Three areas were covered by the questions asked:

- (1) The producer's management.
- (2) Preparation of the wool. (3) Disposition of the wool.

Questions concerning management of the flocks were asked in order to ascertain if there was a difference in the management between the two groups of producers.

Four management aspects were covered which it was felt would expose any differences that might exist. These management factors were:

- (1) The number of lambs weamed compared to the number of ewes bred.
- (2) The weight of lambs marketed compared to age at marketing.
- (3) Death loss.
- (4) Pounds of wool produced per animal.

Preparation of the wool was investigated to find out if there were any differences between the two groups of producers in the amount and types of preparation of the fleeces for market, and also to find out what valley farmers were doing in the matter of preparation. Items included were:

- (1) Crutching before shearing.
- (2) Separation of tags.
- (3) Conditions under which the sheep were sheared.

(4) Separation of shearing floor sweepings.(5) Amount of separation of various types of off-wools.

(a) lamb wool.

(b) fleeces with black fiber.(c) cotted fleeces.

(d) burry wool.

(e) dead wool.

(6) Tying of fleeces and type of string used.(7) Type of bag the fleeces were packed in.

These practices have been considered by members of the wool trade as affecting the market value of the wools and the marketability of the product.

Disposal of the wool was the major area covered. Producers were questioned as to:

(1) Where they marketed their wool.

(2) The prices received for the wool.(3) The time of marketing.

Where wool was sold on a graded basis the quantities as well as the prices of the various grades were obtained. Each management factor was scored and arranged by an array. Each array was marked off in deciles. The producer's scores for each factor were totaled to give an index which gave a composite rating. On this basis it was assumed that the higher the index, the better the producer. The averages for the graded and ungraded producers were compared statistically by use of a t-test at the 95 percent level. No significant difference was found in the level of management between the two groups. Because of this, differences in management of the flocks were eliminated

as a factor influencing returns between selling graded and ungraded wool.

Preparation was scored by totaling up for each producer the items that he answered yes and dividing by the total possible items for that producer. This percentage score was accepted as the producer's preparation rating. The levels of preparation of the graded and ungraded sellers were compared. Using a t-test at the 95 percent level, no significant difference was found between the two groups. From these results it was concluded that there was no difference in the preparation of the wool between producers who sold on a graded basis and those who did not.

## <u>Analysis of Results</u>

Average prices per pound of wool for each group were computed for each of the three years in the survey. These averages were compared statistically. Results of these comparisons are given in table 12, p.89.

Table 12 interpreted indicates that:

- In 1951 average price of producers selling wool on an ungraded basis received almost double the average of the prices received by producers selling on a graded basis.
- In 1952 no significant difference in the prices received between the two groups existed.

In 1953 the average price of wool for producers selling wool on an ungraded basis was significantly greater than for producers selling wool on a graded basis.

Table 12. Wool prices received by producers selling on graded and ungraded basis, 1951-1953.

Basis of Sale	1951	1952	1953
Producers selling on graded basis	\$ <b>.</b> 630	\$ .488	<b>•</b> •505
Producers selling on ungraded basis	1.220	.482	•518
		t= 0.81	t= -2.22

Source: Computed from survey data.

## Conclusions

These results are not conclusive as to the profitability of selling wool on a graded or an ungraded basis. All
the graded wool was sold through one organization. It is
possible that the operating procedures of this organization
in these particular years influenced the results obtained.
In this particular area farmers wanting to sell their wool
on a graded basis have no other alternative outlet. For
this sample, selling wool on a graded basis did not return
to producers any more than if they had sold wool ungraded

during the three years. On the average producers were better off selling their wool outright.

Individual producers within the two groups would find it advantageous to sell wool on a graded basis. Producers with wool that is low shrinking and longer stapled should consider selling their wool on basis of grade. Each producer should carefully consider how and to whom he sells his wool from the standpoint of what he has to sell.

Producers will attempt to market their wool in the manner that is most advantageous to them within the framework in which they produce and sell their wool. To long as the local buyers are able to offer producers advantages in convenience and price the farmers will continue to patronize them.

#### CHAPTER IX

#### CONCLUSIONS

Substantial costs are involved in any wool improvement program. Part of these costs would occur in the production of the wool, in breeding and management of the sheep enterprises. Improved preparation would involve costs of time and effort. Market information would have to be extended and expanded. The individual producers would have to invest time and effort in the study of their product and its relationship to the market.

If these additional costs are to be undertaken by producers or their agents, it is necessary that they be compensated by additional returns. Survey results were inadequate to show whether additional income has accrued from the expenditure of time and effort on improved management and marketing.

Any program of wool improvement would have to be related to the individual producer. In Oregon this would be difficult because of the numbers of wool producers and the differences that exist among the various wool producing enterprises. In Oregon, wool has ceased to be a major product of the sheep enterprise. Particularly is this so in Western Oregon. To improve, the importance of wool to the wool producer would have to be increased.

The knowledge that the individual producer has of his wool and its value on the market must be extended. Costs of imparting that knowledge would be great. The producer would have to be convinced of the material advantage in improving his knowledge of his product.

More efficient functioning of the price mechanism in reflecting the demands of the ultimate consumers of wool products to the producer would be necessary. Incentive for change is lacking under western Oregon conditions of production and marketing, where many producers receive a price based upon an average or averages of an area for their wool regardless of the quality and preparation of the product.

Price incentive programs may initiate some improvement, particularly where wool is at least an important source of income to the producer. In areas such as Western Oregon wool is a very minor part of the farm output of products. Price incentives would probably have little effect on most Western Oregon producers because of the small amount of income that would be added.

Changes may need to be instituted in the present market structures. Resistance to change is always present in existing organizations. However, they will continue to operate as they do only as long as their use by producers

and consumers indicates a need for their existence in their present form.

Producers can move in the direction of either wool improvement or retrogradation. Under present price relations some of the less costly improvements would be adopted as producer knowledge is improved. It is unlikely that extensive breed improvement based on wool will be undertaken. If the trend persists in the direction of less favorable wool prices, the adoption of improved methods would stop and a reversal take place. Under these circumstances vertical integration of marketing functions is a possible solution. By combining forces the producers can achieve a stronger position and create a more marketable product.

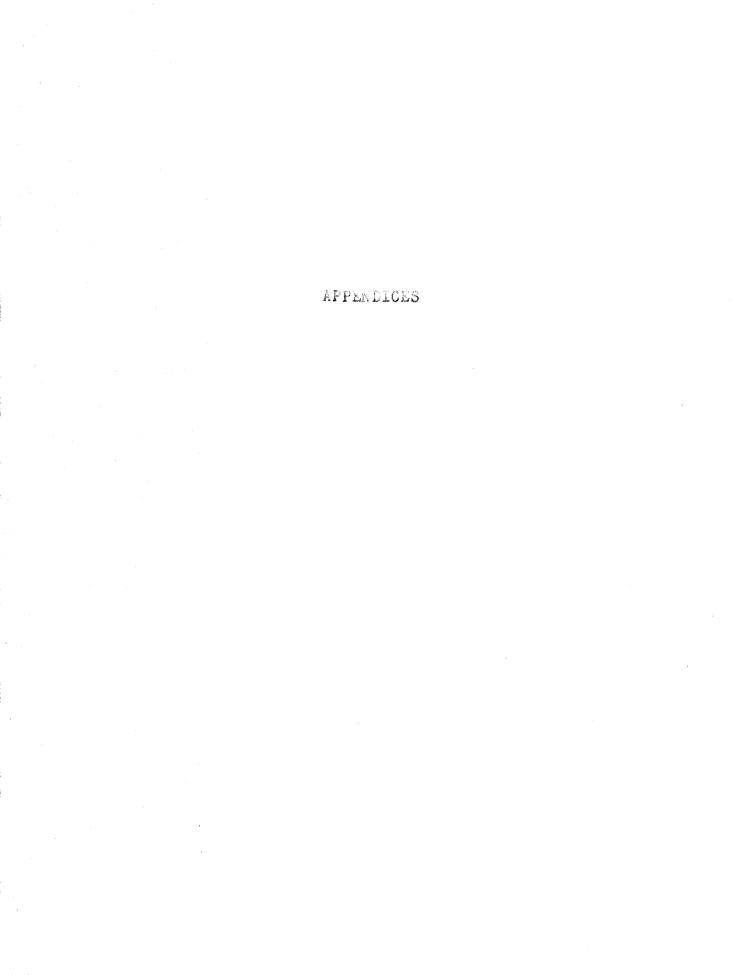
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#### APPENDIX I

#### GLOSSARY OF TERMS

This partial glossary of wool terms is taken from U.S.D.A. Technical bulletin no. 1678 (4, p.85-88), and California Extension service circular 171 (32, p.50-52).

- 1. Apparel wool. --- Suitable for making clothing or apparel, as distinguished from carpet wool.
- 2. Black, grey wool. --- Black wool is that wool which is entirely or partly colored. Occasional black fibers in an otherwise acceptable fleece will class it with the greys.
- 3. Break. --- Weak place in a fleece or staple of wool caused by malnutrition, over-feeding, or fever.
- 4. Britch wool. --- From the lower parts of the thighs, often coarse and hairy.
- 5. Carpet wool. --- Coarse, hairy wool used in making floor coverings.
- 6. Character.---Crimp, handling qualities, and general appearance.
- 7. Classing. --- Allocation of the fleece to any particular standard quality, according to its quality or qualities.
- 8. Clean basis. --- Price based on what the wool will cost when scoured, but not including the cost of scouring.
- 9. Clean content. --- The yield of clean secured wool from a given quantity of fleece after allowance for any vegetable or other foreign matter which may be present after securing.
- 10. Clothing wool. --- Too short to comb economically.

- 11. Combing wool. --- Long enough to comb on the English or Noble comb. Longer wool suited for worsted yarns.
- 12. Combing. --- Straightening of wool fibers, and the extraction of shorter lengths and particles of vegetable matter from the continuous rope-like strands of long, parallel fibers used in making worsted yarns.
- 13. Core-testing. --- A method of testing packaged wool for shrinkage. A boring tool extracts samples from various parts of each bag in the sample. Samples of these borings are then tested for shrinkage.
- 14. Cotted wool. --- Wool that is matted or felted before being shorn from the sheep.
- 15. Crossbred. --- In the U.S. a wool from a crossbred sheep, usually long-wool X fine-wool.
- 16. Crimp. --- Natural waviness of the wool fiber.
- 17. Crutching. --- Removing the britch and udder wool from bred ewes prior to lambing, or from flocks before leaving winter quarters for lush spring pastures. Crutchings applies to the wool removed in the process.
- 18. Domestic wool .--- Wool grown in the United States.
- 19. Elasticity. --- Ability of the wool to return to its former position or length after being stretched.
- 20. Fine wool .-- Wool with small fiber diameter.
- 21. Fleece wool. --- Wool from farm flocks of Western Oregon and farm flock states east of the Mississippi and Missouri Rivers.
- 22. French combing. --- Too short to comb on the English system but long enough to comb on a French comb.
- 23. Grade. -- Relates primarily to fineness, or diameter, of the woolfibers.
- 24. Grease wool .--- Wool as it comes from the sheep.

- 25. Handle.--Term used to denote how a yarn or fabric feels when touched, felt, or handled, such as harsh, soft, smooth, resilient, limp, compact, springy.
- 26. Kemp.---White, opaque, weak and brittle fiber found in some fleeces of wool and mohair. It will not take dyes as wool does, and has little value in manufacturing.
- 27. Long wool. --- Wool from the long wool breeds of sheep. Generally long stapled fibers, and coarse.
- 28. Luster. -- Brightness, sheen, or shine of the wool, yarn, or fabrics.
- 29. Matchings. --- The different sorts of wool into which the fleece is divided in sorting.
- 30. Medium wool. --- Medium fineness of fiber. Breeds with diameter of fiber midway between long wool and fine wool sheep.
- 31. Murrain .--- Wool from dead sheep.
- 32. Noils .--- Short fibers removed in combing.
- 33. Off sorts. --- Portions or sorts of a fleece that are less valuable than the main or regular sorts in the same fleece because of paint brands, stains, etc.
- 34. Off wools.---Less desirable fleeces that do not match the characteristics of the bulk of the clip, such as badly stained, dead wools, black, burry.
- 35. Quality. -- Degree of fineness. Grade of wool under the spinning count system.
- 36. Raw Wool .--- Wool as it comes from the sheep.
- 37. Scouring. --- Washing process to which wool and fabrics are subjected in order to remove grease and dirt.
- 38. Seedy, burry .--- Containing excess seeds, chaff, or burrs.
- 39. Shrinkage. --- Percentage of the weight of grease wool lost in scouring.

- 40. Skirting. --- Removal of the belly, britch, neck, leg, and stained portions from the main part of the fleece and sometimes the backs.
- 41. Sorting. -- Breaking up the individual fleeces into a number of quality lines, according to the uses to which the wool is to be put in the mill, and also according to the character or evenness of the fleece.
- 42. Soundness. --- strength.
- 43. Spinning count.---Now, arbitrary numbers used to denote degree of fineness. Originally represented the number of hanks (560 yds.) of worsted yarn that could be spun from a pound of top.
- 44. Stained.---Colored by contact with manure or urine, or by bacterial action.
- 45. Staple length. --- Length of the wool fibers.
- 46. Staple wools. --- Those that more than meet the minimum length requirements for combing wools.
- 47. Tags. -- Heavy dungy wool. In the trade applies to every description of broken wool locks, etc. sorted from the fleece or swept from the floor of the shearing pen.
- 48. Tar. -- One of the offsorts. Wool stained by or containing paint brands used on sheep. All brands are classified as tar by the sorter whether or not the substance is real tar.
- 49. Tender .-- Wool lacking in strength, unsound.
- 50. Territory Wool. --- Produced in certain Western States, largely those in the Rocky Mountain area. The term originated through the fact that most of these states were important for wool growing before they were admitted to statehood.
- 51. Top. --- Continuous untwisted strand of wool made up largely of the longer fibers resulting from the combing process.

- 52. Woolen .-- Fabric or yarn made of uncombed wool.
- 53. Worsted. --- Fabric or yarn made of combed wool.
- 54. Yield. -- Quantity of clean wool obtained from a specified amount of grease wool.

#### APPENDIX II

## WOOL GRADE AND STAPLE LENGTH CLASSIFICATIONS

## STANDARD U.S. WOOL GRADES

Blood Grade	U.S. Domestic Spinning Count	Approximate Average Diameter (microns)
Fine	80s 70s 64s 62s	19.0 20.5 22.0 23.0
Half blood	60s 58 <b>s</b>	24.0 26.0
Three-eighths blood	56s	28.5
Quarter blood	50s 48s	31.0 33.0
Low Quarter blood	46s	35.0
Common	448	37.0
Braid	40s 36s	3€.5 40.0

Source: Von Bergen, Werner, and Herbert Mauersberger.
American wool handbook. 2nd ed. New York,
Textile book publishers, 1948. pp.307,394.

# STAPLE LENGTH CLASSIFICATION1

	Strictly combing	French combing	Baby combing	Clothing
Fine	over 2	1 1/4-2		under 1 1/4
Half blood	over 2 1/4	1 1/4-2 1/4		under 11/4
Three-eighths blood	over 2 1/2		1 1/2-2 1/2	under 1 1/2
Quarter blood	over 2 3/4		1 1/2-2 3/4	-
Low quarter	over 3			under 2

The length measurements are those suggested by the U.S. Pept. of agriculture, bureau of agricultural economics. Commercial wool buyers generally demand 1/2 to one inch longer fibers in the combing classes.

Source: Cooper, J. M. Range sheep production. Washington, U. S. Government printing office, 1933. p.31. (U.S. Lept. of agriculture. Farmers' bulletin no. 1710).

#### AFPENDLX ILI

#### TYPES OF BREEDS OF SHEEP

Type

Breeds

Fine wool

Merinos Rambouillet

Medium wool

Shropshire Hampshire Dorset Horn Southdown Cheviot Oxford Suffolk Corriedale Columbia Panama Romeldale

Long wool

Lincoln Cotswold Leicester Romney

Source: Von Bergen, Werner, and Herbert
Mauersberger. American wool handbook. 2nd ed. New York, Textile
book publishers, 1948. p.85.