

Ministry of Agriculture, Food and Fisheries **Fall 2000**

Hair Sheep - 100 Ewes Kamloops/Okanagan

This information is a tool to project costs and returns for B.C. farm enterprises and is a general guide to plan individual farm operations.

The sample budget should be used as a guide only and should not be used for business analysis. Each farm should develop their own budget to reflect their production goals, costs and market prices.

Information regarding financial planning and other enterprise budgets may be downloaded from the internet at http://www.FBMInet.ca/bc or obtained from your local office of the B.C. Ministry of Agriculture, Food and Fisheries.

Market Factors

While hair sheep are relatively new to British Columbia, lambs bred from hair sheep are sold into well established markets for conventional lamb.

The major markets which presently exist for lamb are auctions, abattoirs and packers. Hair sheep producers in the Kamloops/Okanagon area generally sell their lambs to local kill plants.

Hair sheep have an extended breeding season. This can reduce the market risk for producer-operators since they can market lambs when prices reach seasonal highs.

Key Success Factors

- Meeting animal nutrition requirements
- Market prices
- Lambs weaned per ewe
- Feed costs



Source: N. Central Sheep & Goat Sales; Markets and Economics, AAFRD

Risk Factors & Strategies

Individual operators must address the following risk factors:

- Management practices—hair sheep generally have lower labour and maintenance requirements than wool sheep. However, hair sheep are a wilder breed. As a result, producers who are used to working with wool breeds will need to alter conventional sheep management practices to suit hair sheep.
- Adequate animal nutrition—while hair sheep are generally more resistant to parasites than wool breed, producers need to be particularly attentive to meeting the animal's feed and mineral requirements.
- Lower weight carcasses—hair sheep tend to grow slower and produce a leaner, lighter weight carcass than most wool sheep. Cross breeding hair ewes with wool rams is necessary for efficient meat production.
- Planning—because of the extended breeding season of hair sheep, producer-operators can reduce their market risk by planning breeding and lambing for optimal market prices.

Assumptions

The sample enterprise budget provided should be viewed as a first approximation only. Use the column "Your Estimate" to add, delete and adjust items to reflect your specific production situation. The figures provided are based on interviews with sheep producers and BCMAFF commodity specialists; they are estimates based on standard practices in the area and do not represent any particular farm. The following assumptions are made regarding production practices, costs and revenues:

		As a %		
		of Ewes	Number	Your Estimate
Number of Ewes	All Hair Sheep	100%	100	
Number of Rams	2 Hair; 2 Wool	4%	4	
Cull Ewes		12%	12	
Cull Rams		1%	1	
Ewe Death Loss		2%	2	
Lambing Percentage		300%	300	
(based on 1.5 lambing	s per year, 200% weaning per lambing)			
Lamb Losses		20%	20	
Weaning Percentage		280%	280	
Replacement Ewe Lamb	os	14%	14	
Crossbred Ram Lambs S	Sold for Meat	112%	112	
Crossbred Ewe Lambs S	Sold for Meat	112%	112	
Ram Lambs Hair Sheep	Sold for Meat	28%	28	
Ewe Lambs Hair Sheep	Sold for Breeding	14%	14	

- Eight month lambing interval.
- 80 Ewes are cross bred to wool rams; 20 ewes are pure bred to hair rams.
- An annual target weaning percentage of 300% is assumed. This is based on 1.5 lambings per year, with an average weaning percentage of 200% per lambing.
- 10% of ewe lambs born are pure bred hair sheep, of which half are kept as replacement ewes and the other half are sold as breeding stock for \$200 per head.
- Pure bred hair sheep ram lambs and all cross bred lams are sold to a local kill plant at a price of \$1.90 a pound on the rail.
- Animals are pastured on 20 irrigated acres.
- The ewe flock is fed 2 lbs per day of grain (wild oats) year round. This is supplemented with pasture in the summer and hay in the winter (2 lbs per day for 240 days).
- Rams are pasture fed in the summer and hay fed in the winter (average of 4 lbs per day for 240 days)
- Lambs are creep fed until they are weaned (average of 0.5 lbs per day for 75 days). After weaning, lambs are fed grain until they reach market weight (2.25 lbs for 135 days).
- Dog food costs are for two herding dogs and two guard dogs.
- Pasture production costs are estimated at \$23 per acre and include fertilizer and lime.
- Fuel, oil and lube costs are associated with pasture operations.
- Repair and maintenance costs are estimated as 3% of fences, buildings and equipment replacement value.

Cash Flow Timing

The table below indicates the timing of monthly flow of income and direct expenses as a percentage of total income and direct expenses. It is assumed that lambs are creep and finish fed year round. A complete Projected Cash Flow should include indirect expenses, capital sales and purchases, loans and personal expenses.

	J	F	M	A	M	J	J	A	S	О	N	D
% Income	25	10					10	20	25	10		
% Direct Expenses	9	9	9	9	7	7	7	7	9	9	9	9

Sample Enterprise Budget and Worksheet Hair Sheep - 100 Ewes Kamloops/Okanagan

Projected Income	Head	Avg. Wt	Units	Price (\$/Unit)	Total	Your Estimate
Hair Sheep Ram Lambs	28	50	lb	1.9	2,660	
Hair Sheep Ewe Lambs	14		head	200	2,800	
Crossbred Ram Lambs	112	65	lb	1.9	13,832	
Crossbred Ewe Lambs	112	55	lb	1.9	11,704	• • • • • • • • • • • • • • • • • • • •
Cull Ewes	12		head	30	360	•••••
Cull Ram	1		head	50	50	
Ram Purchase	1		head	400	(400)	
Total Projected Income					31,006	
Projected Direct Expenses						
	Head	Quantity	Unit	Price	Total	Your Estimate
Feed and Supplements		(per head)		(\$/Unit)		
Hay - Ewes	100	480	lbs	0.05	2,400	•••••
Hay - Rams	4	480	lbs	0.05	96	•••••
Grain - Ewes	100	730	lbs	0.07	5,110	•••••
Creep Feed - Lambs	280	37.5	lbs	0.10	1,050	•••••
Grain - Lambs	280	304	lbs	0.08	7,065	•••••
Milk Replacer - Lambs	14	1	bag	30	420	•••••
Minerals & Salt	104		head	4	416	
Dog Food	4	400	lbs	0.5	800	
Pasture production		20	acres	23	460	
Irrigation		20	acres	20	400	
Livestock Supplies and Services						
Vet & Medicine	104		head	2	208	
Miscellaneous Supplies	104		head	3	312	•••••
<u>Marketing</u>						
Frt. and Trucking	279		head	2	558	
<u>Other</u>						
Fuel, Oil & Lube					203	•••••
Repairs and Maintenance					1,128	•••••
Total Projected Direct Expenses	8				20,626	•••••
Calculation of Projected Net I	ncome					
To assess the net income of an envary with the level of output and ar		-				•
B						

Projected Income Less Projected Direct Expenses -	
= Projected Contribution Margin =	
Less Projected Indirect Expenses	
Depreciation (e.g., buildings and equipment) -	
Interest -	
Other Indirect Expenses (e.g., operator labour)	•••••
= Projected Net Income	

Labour Requirements

Feeding and grazing	365
Cleaning and repair	260
Health	15
Lambing	60
Management	40
Total Hours / Year (100 ewe flock)	740
Hours/Ewe/Year	7.40

Sensitivity Analysis Projected Income

The profitability of a hair sheep operation will be strongly influenced by market prices and lambs weaned per ewe. The tables below lists changes to income as weaning rates and prices per pound vary.

Weaning Percentage 1	er Lambing	Income*
Low	150%	22,388
Average	180%	27,576
Target	200%	31,006
High	220%	34,532

^{*}Based on 1.5 lambings per year and a price of \$1.9/lb

Price \$/lb (on the rail)		Income*
Low	1.5	25,070
Average	1.75	28,780
Target	1.9	31,006
High	2.15	34,716

^{*}Weaning 200% per lambing (300% per year)

Herd, Buildings and Machinery Replacement Cost

The figures below provide an estimate, based on replacement cost, of the capital investment required to get involved in a 100 ewe enterprise. It should be noted that some of these items are likely to be used in more than one enterprise—as a result these costs should be allocated (prorated) among the different uses accordingly.

Ewes and Rams	21,600
Fencing	3,600
Buildings	5,000
Small Tractor	12,000
Field Machinery	3,000
Vehicle (farm portion)	9,000
Stock Trailer	5,000
Total	59.200

References

- Characteristics and General Production Parameters of Hair Sheep—Sheep Factsheet, Sheep 99-01, BCMAFF
- Nutrition Guide for B.C. Sheep Producers, BCMAFF, 1985.
- B.C. Agricultural Fencing Handbook, BCMAFF, 1996
- Farm Business Management Information Network website at http://www.FBMInet.ca/bc

Contacts

- Okanagan Hair Sheep Association (250) 547-6253
- Basil Bactawar, P.Ag., M.Sc., Livestock Industry Development Specialist, BCMAFF Abbotsford (604) 556-3081
- BC Sheep Federation (250) 455-6651

The following people and organizations contributed to the preparation of this factsheet:

- Okanagan Hair Sheep Association
- Basil Bactawar, P.Ag., M.Sc., Livestock Industry Development Specialist, BCMAFF Abbotsford (604) 556-3081
- Andrea Harris, MSc., Farm Management Consultant, Vancouver