



Feeding management of sheep in various life stages

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Feeding Management of Sheep in Various Life Stages



Nutrient requirements and feeds requirement for

- ▶ Young Lambs
- ▶ Growing lambs
- ▶ Finisher / Fattening lambs
- ▶ Flushing or feeding of breeding ewes
- ▶ Adult sheep
- ▶ Pregnant ewes
- ▶ Lactating ewes
- ▶ Wool sheep
- ▶ Breeding ram



Feeding of lambs from 10th day till weaning

After 10th day of age, lambs should be fed good quality legume along with concentrate mixture about 50-100 g /day along with salt and mineral mixture.

► **Following concentrate mixtures can be used for this purpose:**

Ingredients	% Inclusion
Ground maize grain	57
Groundnut oilcake	20
Wheat bran	10
Fish meal	10
Mineral mixture	2
Common Salt	1
DCP:15-17%; TDN: 75%	



It should be supplemented with vitamin premix and antibiotic preparation.

Feeding of growing lambs

- ▶ When good quality fodders are available following concentrate mixture can be used.

Ingredients	% Inclusion
Ground maize grain	25
Groundnut oilcake	32
Wheat bran	40
Mineral mixture	2
Common Salt	1
DCP: 13%; TDN: 70%	



The above mixture should be fed as per the following recommendations.

Body weight	Concentrate mixture	Dry roughage	Remarks
10-15 kg	200 g	400 g	8 hours grazing can be substituted in place of roughage
16-25 kg	250 g	600 g	
26-35 kg	300 g	700 g	

If the quality of fodder is not good then the concentrate mixture should be given as 300g, 400g and 600 g respectively.



Feeding of fattening rams

- ▶ The feedings schedule for fattening rams is dependent on the age and weight expected at the time of marketing.

Composition of concentrate mixture

Feed ingredients	Inclusion level
Cereal grains	50 %
Deoiled Bran	25 %
Oil cakes	25 %



Supplemented with mineral mixture and vitamin mixture can be used.

This concentrate ration should be fed at the rate of 110-450 g/day/head depending on the weight of ram to be fattened along with grazing / ad libitum roughage.

Flushing or feeding of breeding ewes

- ▶ Flushing is the special nutritional care for improving nutritional status of ewes 3-4 weeks before mating by providing additional concentrate mixture.
- ▶ It is very much important to have better nutrition and body condition before ewe is allowed to mate with ram.
- ▶ The effect of flushing is more evident in ewes that were underfed.
- ▶ Thus with flushing ewes have better body condition and will increase fertility by way of increased incidence of oestrus and increased ovulation rate.
- ▶ The majority of sheep in arid and semi-arid regions are bred 2-3 weeks after the onset of rains as grazing conditions are improved by this time.

To obtain increased lambing rate, breeding ewes should be given

250 g concentrate mixture or 500 g of good quality hay / head /day

3-4 weeks

before breeding in addition to usual hours of grazing.



Feeding of adult sheep

- ▶ Allowed to graze free of choice on pasture or grass land and should be supplemented with 100 g of concentrate mixture.
- ▶ If legume or hay is available then concentrate mixture need not be given.
- ▶ Dry fodder like straws should be given along with legume fodder.
- ▶ Sufficient pastureland is not available and straw is available then feeding of straw along with 300-400g of concentrate mixture should be done.

Nutrient requirement

Body Wt. (kg)	DMI (g)	DCP (g)	TDN (g)	Ca (g)	P (g)
30	775	38	350	1.5	1.0
40	960	48	430	1.9	1.3
50	1150	56	515	2.3	1.5



Feeding of pregnant ewes

- ▶ Gestation period of ewes is about 143-151 days, on an average 147 days.
- ▶ During the first half of gestation period, the growth of foetus is not so rapid and thus the maintenance required of nutrients can take care of pregnancy during early half of gestation period.
- ▶ During latter half of gestation period, the rate of growth of foetus increases with the result increasing nutrients requirement for its nourishment .
- ▶ For this purpose following concentrate mixture can be used.

Ingredients	% Inclusion
Ground cereal grains	30
Oilcakes	20
Rice Bran / Deoiled rice bran	40
Molasses	7
Mineral Mixture	2
Common Salt	1
DCP:12-14%; TDN: 62-65%	

This concentrate mixture should be given to about 150-250 g/day in addition to 8-9 hrs of grazing on good pasture or grasses.



- ▶ If grazing is not practiced- vitamin preparation at the rate of 25g/100 kg of concentrate feed.
- ▶ Excessive energy intake during last 6 weeks of gestation leads to fattening - birth difficulty
- ▶ Low energy intake - low birth weight with reduced viability in lambs, Pregnancy toxemia- in ewes with twin lambs.

The advantages of extra allowances of feed given during last half gestation are

1. Increases birth weight of lambs.
2. Reduces number of weak or crippled lambs
3. Reduces chance of lambing paralysis which occurs just before lambing.
4. Increases milk yield of ewes

Nutrient requirement

Body Wt. (kg)	DMI (g)	DCP (g)	TDN (g)	Ca (g)	P (g)
30	1280	90	665	3.8	2.7
40	1590	115	830	5.2	3.7
50	1880	135	980	5.6	4.3



Feeding of lactating ewes

- ▶ During first 10 days after lambing- legume hay may be fed.
- ▶ After 10 days up to weaning -250 g of concentrate mixture + good quality legume hay. After 3 months maintenance allowance is sufficient.
- ▶ Feeding of 800 g good legume hay or 100 g concentrate mixture /day for 75 days after lambing in addition to 8 h of grazing.
- ▶ The dry matter intake may go up to 4 % of body weight.
- ▶ **Nutrient requirement is tabulated below.**

Body Wt. (kg)	DMI (g)	DCP (g)	TDN (g)	Ca (g)	P (g)
30	1400	108	760	7.0	4.7
40	1750	135	945	8.7	5.8
50	2070	160	1120	10.3	6.9



Feeding of wool sheep

- ▶ Wool is a protein rich in sulphur containing amino acid, cysteine.
- ▶ Minerals like copper, cobalt, iodine, iron and small quantities of selenium are essential for the proper growth of wool.
- ▶ Energy requirement for maintenance is also high due to lower temperature.
- ▶ **Nutrient requirement**

Body Wt. (kg)	DMI (g)	DCP (g)	TDN (g)	Ca (g)	P (g)	S (g)
20	730	40	330	1.5	1.0	1.7
30	1000	54	450	2.0	1.3	2.4
40	1230	67	555	2.5	1.6	2.9
50	1470	80	660	2.9	1.9	3.5



Feeding of Breeding Ram

- ▶ Should not be too fatty, which may influence rate of fertility and mating behavior.
- ▶ If breeding ram is fatty- fed on dry fodder for 8 weeks before ram is allowed to mate with ewes.
- ▶ Before 2 weeks of mating again normal feeding schedule is followed.

- ▶ Concentrate mixture for breeding rams during summer

Crushed gram – 2 parts

Wheat bran – 2 parts

Salt – 1 part

Daily 300-500 g should be given depending on the quality of the roughage being fed / pasture.



Conclusions

- ▶ Feeding of concentrate mixture for sheep should be 0.5 to 2.0% of body weight depending on
 - ▶ Age
 - ▶ Breed
 - ▶ Growth rate
 - ▶ Pasture quality
 - ▶ Physiological needs
 - ▶ Quality and quantity of available roughage sources
 - ▶ Grazing hours
 - ▶ Season / environmental temperature

Reproduction and body condition should be monitored to assess the nutritional status of animal



Thank you