Managing Heifers During Different Stages

This Infosheet covers:

- The characteristics and management requirements of heifer over time.

Key points

- Heifers go through six management stages, each with its own requirements: new born calf, calf on milk, R1 year old, R2 year old, first calf heifer, and mature cow.
- As animals mature the management intensity required will decrease and the emphasis will shift to mob management.
- Calves need high intensity, individual management as this is the stage where there is the biggest scope to affect their future health and growth.
- It is the stock owner’s responsibility to make sure graziers understand the different stage requirements of the stock under their care.
Importance of meeting heifer management stage requirements

Heifers have specific management requirements during life. Meeting their requirements will give animals the best chance of reaching minimum weight-for-age targets and set them up to achieve their mature liveweight target.

Investing time and energy into younger animals allows you to take advantage of their smaller size (which makes handling easier) and growth efficiency. At this stage they are most sensitive to their nutrition and environment.

Stock owners need to give contract graziers an understanding of their expectations for each management stage, including any mob or individual management expectations.

Features of management stages

- **New born calves**: individual care.
  Focus on colostrum intake, naval health and other health indicators, identification, and teaching them to drink from a feeder.

- **Calves on milk**: small group care.
  Calves are managed in small groups; however, individuals are still observed to monitor their ability to compete within the group, any health issues such as hernias or scours, and their transition to eating meal. They are also dehorned, and weighed to ensure they meet individual weaning weight and weight-for-age minimums.

- **Rising one year old (R1)**: mob management within a larger group.
  Heifers are fed as a mob. Individuals receive regular animal health treatments and their weight is monitored to ensure they will meet the weight required for puberty to occur.

- **Rising two year old (R2)**: mob management within a larger group.
  Heifers are fed as a mob. Individuals receive regular animal health treatments and their weight and body condition score (BCS) are monitored to ensure they reach pre-mating and pre-calving targets.

- **First calf heifer**: herd management with possible preferential treatment in first and second lactations.
  From this point forward individual animals are only assessed through herd tests and pregnancy scanning, unless they stand out from the herd in other ways e.g. non-cycling, mastitis, lameness, or other illness.

- **Mature cow**: compete with mixed age animals in the herd.

The benefits of individual care, and its impact on farm productivity and profitability, lessen as heifers grow older. The greatest gains come from focusing on individuals early on and then gradually moving to mob management. By 22 months of age well-grown heifers should be ready to compete in a seasonal herd and the focus can move to system management.
Figure 1. The characteristics of each management stage and transition from high intensity individual care to lower intensity mob management as heifers age.

<table>
<thead>
<tr>
<th>Management Stage</th>
<th>Characteristics</th>
</tr>
</thead>
<tbody>
<tr>
<td>New born</td>
<td>Individual ID and assessment • Minimum colostrum intake based on weight • Taught to drink from feeder • Naval care</td>
</tr>
<tr>
<td>Calf on milk</td>
<td>Managed in small groups • Compete with animals of similar age • Drink from multi-teat feeder • Start eating meal / grass</td>
</tr>
<tr>
<td>R1 and R2 heifers</td>
<td>Mob management based on age • 3 monthly weighing • Check weight against expected weight • Assess individuals to check achieving minimum weight-for-age</td>
</tr>
<tr>
<td>First calf heifer</td>
<td>Distinguishable from mature herd or run as second herd • Train to milking routine • Compete in multi-age group • Assessed for mating/culling</td>
</tr>
<tr>
<td>Mature cow</td>
<td>Mixed age • Individual care only for health or welfare concerns • Assessed for culling</td>
</tr>
</tbody>
</table>

More information

For more about managing each management stage:
- Weight-for-age targets - Heifer Infosheet: Selecting Liveweight Targets.
- Stock relocation - Heifer Infosheet: Shifting Heifers Off-Farm.
- Herd management – visit www.dairynz.co.nz/animal/herd-management.
Prioritise your calf rearer’s role. Calf rearing is really important, that’s when heifers are in the dairy farmer’s control but farmers often miss their chance. The first role we want filled on our team in the spring is the calf rearers.

_Dairy farmers, 850 cows, Leeston, Canterbury_

Remember your calves, don’t just focus on the milking cows. Calf rearing is so important but some operations lose the personal touch with calf rearing, the business becomes milking cow focused rather than getting young stock started right.

_Dairy farmers, 680 cows, Winton, Southland_

Capture early calf growth. Focus on the first six weeks of life, it is key to growing heifers well. Calves can't have any growth checks.

_Dairy farmer, 225 cows, Palmerston North, Manawatu_

The four months after weaning is important so that calves transition to full ruminants. In the past we never put any time into our heifers post-Christmas and that’s where we failed to grow them well.

_Dairy farmers, 320 cows, Rerewhakaaitu, Bay of Plenty_