

Automatic Dairy Calf Feeders

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Automatic calf feeders are designed to provide dairy calves multiple small “meals” of milk over the course of the day. Thus, personnel caring for these calves change from being the one which feeds and washes the milk bottles or pails to the person who manages the calf feeding program. Depending on the system purchased, reconstituted milk replacer or pasteurized waste milk can be fed to calves. Dairy calf managers can use the data received from the feeders to manage the calf program. Automatic calf feeders may tell you how much milk individual calves have consumed, how fast they consumed it, and how many different times a day they visited the feeder. These systems can increase milk allowance gradually over several days and then can decrease allowance to provide a “soft” weaning. “Soft” weaning has been reported to decrease the stress associated with weaning calves.

Here is some advice for farmers considering incorporating an automatic calf feeder(s) into their calf raising program:

- Aggressive colostrum management systems are critical for successful adaptation to automatic calf feeding. Calves should absolutely receive 4 quarts of high-quality colostrum within 6 hours of birth.
- Monitoring serum protein levels in calves can help you determine the success of your colostrum program. Serum total protein should be 5.5g/dl or greater. Calves with less than 5.0g/dl are at greater risk for health problems.
- Raise calves individually for 3-10 days after birth to monitor colostrum and milk intake, nipple suckling ability, and health.
- Calves should be stocked no more than 25 calves per nipple. Some farmers like to keep calves of a similar age together. Therefore, they use two separate feeding stations, one for calves less than 3 weeks of age and the other for those older until weaning.
- Each calf will need around 40 to 50 square feet of bedded area to be successful. Bedded area does not include the area for the feeding station.
- Once placed in groups for automatic feeding, make sure calves have clean and dry bedding. The surface under the bedding should be gravel with drainage tiles underneath the rock area to help with removal of liquids. Concrete floors do not allow for drainage of urine and other liquids and if used require a large amount of bedding.
- Calves should have access to clean water, calf starter, and a draft-free environment.
- Natural ventilation with lower and upper curtains on temperature controlled systems or tube ventilation is often used in automatic calf feeder groupings.
- Milk allowances should range from 5.6 to 9.2 quarts of liquid per day.
- Meal sizes vary from 0.5 to 2.6 quarts per meal. Most calf feeder systems are set up to where a calf must earn enough “credits” to achieve their minimum meal size specified by the system. The credits help determine the time between each meal allowed.
- Monitor the mixer cleaning cycle in your system, and run it at least twice a day. Keep the water sensor in your mixer free of mineral build-up.
- Routinely check the suction and nipple, and monitor the flow rate of milk. Calibrate your powder delivery and any medication delivery once a week within your system. Milk replacer should be mixed at the normal feeding temperature since these actions happen almost simultaneously, at 100-105 degrees Fahrenheit. If milk replacer powder is used, check to see that it can be mixed at these temperatures for optimum mixing.

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