

Section 6



High-Quality Round Bales of Silage

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Introduction

Making high-quality bales is a tool to manage grass during the main grass growing season. Removing grass surpluses as round bales helps to keep grass in the cow milking area at the desired rotation length of 18-21 days during the summer and provides a high-quality supplement for feeding during periods of grass shortage.

- ① What is the difference between the high-quality bale and the conventional bale of silage?
- ② When should you feed your cows these high-quality bales?

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The high-quality bale is grass cut and baled after 21–30 days growth during the April to August period. They are generally cut at a cover of 2,000 to 2,800kg DM/ha. The high-quality bale can be fed to the cow during her lactation. These high-quality bales will not cause a drop in milk solids. The grass regrowths will appear a few days after the bales are removed. The cow will have high-quality grass ready to be eaten again on this paddock in 18 to 21 days. An ordinary silage bale consists of grass harvested after a longer growing period (35–42 days) and is used for winter feed when the cow is dry.

② When should you feed these high-quality bales?

- Periods of poor grass growth when grass is in short supply; this can be in cold weather, or prolonged periods of dry weather.
- During very wet weather these high-quality bales will increase the dry matter in the cow's diet.
- Bales can be fed in early spring with grass instead of pit silage or meal if there is a shortage of grass; it will increase milk solids.
- They can be fed in late lactation with grass instead of pit silage; this also keeps milk solids higher than if they were being fed pit silage.

Tips on the management of the high-quality bale of silage.

Cutting the bale	Storing the bale	Feeding the bale
Don't cut the grass if it has a cover <1,800kg DM/ha as it can be difficult to rake into a bale and the bales will be very saggy.	Mark the high-quality bales in your storage area so you will know them from the ordinary bales of silage.	The average weight of the bale is 200-240kg DM. One bale would give 50 cows 4kg DM/cow approx. Weigh your bale to get an estimate of the weight.
To increase the quality of the bale, cut the silage in the afternoon and leave to wilt for 24 hours in dry weather.	Don't open more bales than you require as they will go 'off' quickly.	Bales can be fed in a ring feeder in the collecting yard or in the yard as cows leave the parlour. If your feeding area is close to the parlour then the bales can be placed here and the cows can eat them before returning to the paddock.
Yield usually 3–4 bales/acre. Aim to have 100–150 high quality bales per 100 cows each year (surplus to winter feed)	They can be fed back to cows after three weeks.	Reintroduce the strip wire if feeding high amounts of these bale: (1) to ration the grass (2) to make sure the cows are not wasting the grass.

Table 1. Cost of producing high-quality bales in mid-season.

Costs	€/bale including all costs	€/bale excluding fertilizer & land charge
Fertilizer	7.0	0
Cutting	8.0	8
Tedding	4.0	4
Baling & wrapping	12	12
Land charge	6	0
Total costs	37	24
/t	55	36
/t DM	183	120

Table 2. Relative cost of supplement options

	Cost €/t DM	Energy Content UFL/kg DM	Cost per €/1,000 UFL
Concentrate (€250/t)	287	1.10	261
Citrus(€220/t)	253	1.16	218
Forage Maize	157	0.80	196
Baled silage (including full costs)	183	0.87	210
Baled silage (excl. fertilizer & land charge)	120	0.87	138



