Tips on Roughage Utilization

July 2019:

Losses at the silage storage.

It has been discussed many times but the ration what is calculated should be lying at the feeding fence.
Calculations and plans for the feeding rations come from analyses, and a plan, usually made with your feeding advisor.

For some reason it occasionally still goes wrong. The silage might have gotten warm which results in loss of energy and taste. Inevitably, the cows will eat less and receive less energy that what was calculated.

What also happens is that crows, starlings and ducks, spend a lot of time at your roughage storage. Predominantly for the corn kernels. Besides taking away valuable energy and starch, and walking around in the storage, they also shit in the cows food

This also happens in the stable…

By keeping the silage storage as clean as possible, and by pulling a protective cover every day over open silage we can eradicate these forms of energy/taste loss.

Making the stable “bird-proof” won’t be easy.

Also pay attention to what extent the sun can shine on the open surface of the silage, this also dries and heats more than intended.

January 2019:

Make the most of good silage.

It’s been another special year for harvesting. After a very good first cut, most dairy farmers were not able to get much from second cut. Most of this was of less quantity and quality with a lot of stalk and containing less nutritional energy because of the drought.

The corn was also different this year. Some farmers got a very good harvest while others were stuck with too little amount and containing too little starch. On top of that, during feeding it seems very hard to keep cold.

What does your roughage stock look like and how many months of good quality supply do you have for your cows? How long can you spread it out?

If that’s considerably less than the supply you need during the winterperiod, then it is crucial to take measures to stretch the duration of your supply.
We don’t want to have to think about the possibility of good cows eating poor quality roughage.

Some example measures you can take: Give non-lactating cows and young cattle other feed (Dry cows could get hammered straw).

Give the lowest producing cows, in a production group, different roughage, perhaps.
Or, strictly select the bottom end of the herd and dry off cows on time (or earlier).

Correct the ration with by-products as well, both on quantity and type of supplementation.
This year, this will be a special field of interest.

Consult with your advisor on these issues. Don’t just take the quality or quantity of silage for what it is. S/he will also experience new situations this year and can tailor solutions to your specific region.

September 2017:

Free products for fens.

Cows often feel exactly what they need.

For this reason it could be useful to always give some extra hay or straw for free at their troughs. If everything goes well, your well rationed feed of corn, grass and extras should be so good they'll always come back for more of that! The first day they eat the hay for curiosity, but after that they only eat from the hay when they need it. The cows that take some extra hay are the ones that have just given birth or aren't feeling very well.

Just keep in mind that the hay has to be tasteful and good.

Even if there is, for a moment, not much good food in front of the troughs, the cow will eat some hay and keep its Pens / rumen and PH stable.

If they don't take the hay, it means that the cows feel well with your ration!

There are also dairy farmers that have good experiences with setting a box of sodium bicarbonate or salt at the troughs. You'll see an increase of consumption during warm weather.

Then the cows who don't need it won't take it.

Discuss the possibilities with your feeding advisor.

January 2017:

Ration, Christmasfeeling by cows.

During the holiday break, Christmas and New Year, did you eat

well and maybe too much?
Did you also notice that afterwards you can take a nice, longer than usual, nap? And going a little later to the barn because it was somewhat more difficult to start with the chores?
That is what we call: “The Christmas feeling”.

Cows have that same feeling when the ration is appetizing but not well balanced. For example: by proportionally having too much starch or other saturating, slow products. Additionally, a ration could also be badly balanced due to fast products that gives the same feeling. Moreover, it could also happen because there wasn’t good and enough feed in the troughs for a few hour(s) so they eat for a while too little and after feed finally arrived then the cows eat too much or too fast.

Also the feeling could develop when a cow changes from group with very different tasty rations occur often to fluctuating feeding.

In conclusion, we notice one severe farms this “Christmas Feeling” a long time! To solve this issue, you need a good ration and feeding-rules to keep the cows healthier and active over a longer period of time.

Read the herd’s behavior: you can see discrepancies in the number of times they visit the VMS, where the cows are and how they act in the barn or how they ruminate.

June 2016:

Ruminating activity.

On average, 50-60% of the cows should be ruminating.

And at the times that you are observing if there are any cows in heat you can also check / count this behavior.

In the meantime, count the jaw movements of an individual cow between two regurgitations.
That should be between 60-70 movements.

Less is not good, then she needs to do less movements because the food has not as much structure as it should have, or she has eaten to little amount!
More is also not good because that means feed has too much structure, mostly instead of energy.
But it is also possible that the extra times she chews implies she wants to make more saliva.
That in return could entail that the cow wants to neutralize the pH in the rumen which possibly indicates subclinical acidosis!

You will also notice that by changes in grass silage also could have an influence on the amount of jaw movements a cow needs to do.

Also warm weather stress could influence this phenomenon, at first she ruminates more often when she has problems making enough sodium bicarbonate on her own, and then she ruminates to few because she needs to much time to breath. And eating less because of warm weather also means she ruminates less.

And an empty feed fence for a few hours also gives irregular rumination.

October 2014:

Play with the big differences in grass silage quality

A lot of roughage has been harvested this year and again with very different qualities.

It was possible to mow very early this year, and especially the first cut had a lot of energy in it and a lot of crude protein.

But, especially if it’s not really dry it is not good for the cow’s rumen.
They simply cannot handle it!

This grass silage with her fantastic contents can only be used when you mix it with other types of silage, and there’s been a lot of different silage harvested this year!

It will be better if you can dose special silages over a longer period of time for a year!

That is also with the grass you mow this fall, much crude protein, less energie and less tasty => less intake!!

Discuss the feed rations well with your advisor, especially the distribution of it over the whole year if you (despite the top quality and large quantities of roughage) don’t want to “fool around” for a few months at the end.

September 2014:

The corn harvesting season is coming.

Although we all have quite a lot of experience with corn and corn harvesting, things quite frequently go wrong.

If the corn isn’t harvested when it’s ripe, you can get acidosis, which will always result in less milk. This means that if you have a VMS, where the cows go to voluntarily and the cow doesn’t feel well, she won’t go often.

So, does the milk production take a dive twice as much as in traditional milking.
It easily declines the visits with 0.2 – 0.5 visits per cow per day….

If you also have harvested short or wet grass silage and have the problem mentioned earlier, then you know that the food

ration simply isn’t to correct.

Also old corn silage can give rumen acidosis, so be cautious when feeding that to your cows.

Ripe, well chopped, right height and width associated with the feed-rate and sealing:

You decide a large part of your income in two days!

December 2013:

Compensation Roughage when it’s not as good as analyses thinks.

2012 was a special year of growth. In most places felt more than enough rain, good temperatures but with less sunlight. That gave a lot of grass growth. If a cow gives much milk she gets some more kilograms of concentrate. The grassland gets often no extra fertilizer and as a result there is a lot of grass silage won with less energy. Less sunlight means less sugar, and that means less tasty ….! Bacteria need sugars what they use to make lactic acid. This is necessary for the silage to succeed well.

These bacteria grab their part so your silage and the analysis seems all right. But too little sugar left for the taste. Usually, we are happy if you do not cut for your silage to short, but this year seems longer mowed grass at a disadvantage with comparatively much stalk and less energy and taste. And crude fiber is inherently uncomfortable. Additionally, you might not always have the opportunity to mow in the afternoon or evening, which also gives more sugars in the silage.

It seems not always to be seen in the silage analyses that we get disappointing results because the cows make far too little from your roughage. (How quick that goes see Tip sept. 2011).

Roughage consumption is easy 10-20% lower when a cow comes less to the feed fence or already stops eating as the biggest draw is resolved ..

- Do the analyses show same numbers as your eyes and hands?
- Does your ration to feed fence have enough flavor?
- Can you e.g. longer, shorter or otherwise different silage mix to feed?
- Do you compensate what is missing?

For example:

- Good silage, good analysis but they eat too little: Molasses??
- Moderate silage, too little energy, sugar and flavor: Press Pulp??
- Many crude fiber but is not sufficiently digested: Brewers' grains??
- …….

Especially since food purchases this year is very expensive, it is very important with your (feed) advisor to see which supplement is good and which is not good for your business. If you can control that the costs might not go too heavy.

September 2011:

Influence of more palatable roughage

In the spring grass is more than 1000 VEM and is delicious! In summer and autumn this drops to ± 950 VEM.

Imagine a cow eats about 18 kg dry grass in spring, far more than the autumn grass for example:

18 x 1000 = 18,000 VEM (accounts for ± 28 liters)
15 x 950 = 14,250 VEM (accounts for ± 20 liters)

difference …….3,750 VEM

1 kg of concentrate is ± 950 VEM. From August you usually feed some dry matter from grass silage and/or maize but that also has not VEM of spring grass. So when you want to compensate the high yielders there is required 3 to 4 kg of additional concentrate… …

Lower yielding cows have with 14,000 VEM often enough.

So it is with the various cuts this year, the spring silage is energetic and very tasty with lots of sugar. The later is less tasty and has less VEM. Again count that the cows just easy eat 2 kg more of the spring silage than from later harvested.
Compare it with the situation you also like to eat more when mother/wife has done a very good cooking job.

So then you will have easily a drop in the feeding of 2 x 950 = 1900 VEM per cow per day! That is also 2 kg extra feed to maintain the VEM level….

In addition, there are also large fluctuations in protein, etc.

It is very difficult to keep the cows on the milk all seasons round. So another possible motivation to make several pits to distribute de harvest and make it possible to spread the ration wider over the year.

Also fluctuations, especially in protein is not only bad for the production but also bad for laminitis and resistance for diseases.
And so this has also a lot of influence on behavior, the count of visits to the VMS, production and lifetime production from the cow!

Additional problem this year is that the second and third cut silage this year is almost impossible to keep cold. So when the silage is stored too high or the feed speed to slow the

silage analysis can be easy different than the silage you are feeding.

And then the feed rate is actually the boss about the ration instead of you …!?!