

David G. Hallauer
District Extension Agent
Crops & Soils/Horticulture

Hay Harvest Plant Response

Cool season grass harvest began in earnest over the past 10 days or so. As this next dry spell sets in, there will likely be a lot more put up in the next 10.

We think a lot about what we can do *ahead* of the growing season (fertility, etc...) to encourage good growth. We might even put some thought in to what is going on *during* the growing season to affect growth and final production. After harvest, however, its easy to turn our attention to other endeavors and let the plant ‘do its thing’. So...what *is* that ‘thing’?

Since the time the grass plant put on leaves five and beyond, their photosynthesis has been working towards continued vegetative and then reproductive growth. If all the systems work as they should, some of that energy has been pushed back to the roots to replenish energy used during early spring growth. This cycle is what keeps the plant growing year after year.

At harvest, we remove all of the green leaf area used for photosynthesis, and force the plant to pull from root reserves to put out new leaves from the crown and below ground tillers. Some plants are already pushing these tillers, which should help to thicken the stand a little.

If all the plant’s energy needs are met by roots and leaves, the plant continues its life cycle into fall dormancy, ready to start over again next season. If something is out of balance – drought stress kept plants from growing adequately or armyworms remove foliage as soon as it regrows, requiring root systems to repeatedly regrow new leaves – at some point, the plant may lack the root energy or top growth to keep the cycle moving and plants can begin to die.

Post-harvest has increasingly become an important observation time for cool season grass stands. If heat and dry weather persist, regrowth could be reduced. If plants are defoliated by insect pests, or repeated harvests (animal *or* machine...), the plant’s root system may not keep up with the above ground requirements for regrowth and plants can die. Be on the lookout for challenges to the stand now. Observations post-harvest can help us make late summer/early fall management decisions to help the grass persist, while helping explain stand declines.

Squash Bugs

If you’ve ever dealt with squash bugs on pumpkin and squash, you know they can be devastating. Large numbers of the insect (often the *second* generation) suck juice from plants, causing them to collapse and die. If you’ve got squash plants growing, the time for control is sooner than later, so you can get the first generation of these grey, shield-shaped bugs before the second generation causes significant damage.

Because they have a hard body at maturity, squash bugs are difficult to control with insecticides unless very small. Scout young plants, looking on the underside of the leaves for clusters of brick-red eggs and small green insects with black legs. These are they nymph stage that will eventually become adults (which lay eggs that become the second generation).

General use insecticides such as permethrin, malathion, and methoxychlor (multiple products) provide control if a direct application is made to young, soft-bodied squash bugs. This means you **MUST** spray or dust the underside of the leaves where the insects live. If you don’t have too many plants, you can also try to remove egg masses and discard.

For information on squash bug management, including additional cultural controls, check out: <https://bookstore.ksre.ksu.edu/pubs/MF3308.pdf> or request a copy from any District Office.

Cindy Williams
Meadowlark Extension District
Food, Nutrition, Health, and Safety

Dairy Month

June is well known as Dairy Month, but how do we keep those bones strong throughout life? Fortunately, some foods and activities help with that.

When we think of nutrients supporting bone health, our first thought is calcium. Calcium is a key component to healthy bones, but isn't the only one. Because a number of vitamins and minerals team up for strong bones, it makes sense to consider the top foods that tout a variety of bone-strengthening nutrients.

These are some foods that support bone health:

- Dairy products, including milk, cheese and yogurt. These foods also supply phosphorus, another nutrient needed for bone health.
- Seafood. Canned seafood products, including salmon, sardines and shrimp are good options, as they have an even higher calcium content than fresh or frozen.
- Leafy greens, especially spinach, bok choy, collard and turnip greens.
- Legumes, seeds, almonds and tofu.

Other foods and beverages are fortified with calcium and play an important role in our total intake. Breakfast cereals, juices and nut- or seed-based milks often have calcium added during processing, as well as vitamin D. That's important because you cannot absorb the calcium you eat without enough vitamin D.

Your body makes vitamin D when the sun shines directly on your skin and it only takes 10-15 minutes of sunlight a couple of times a week to get what you need. As we age, our skin gets thinner and less efficient at synthesizing vitamin D from sunlight.

Research continues to evolve on how much vitamin D we need and for many of us, a supplement is a good idea.

Other minerals, like magnesium and potassium, help keep bones healthy. Magnesium helps with your body's vitamin D balance and potassium aids in reducing calcium loss from bones. Good sources include spinach and other dark greens, potatoes, sweet potatoes, bananas, legumes, nuts, seeds and whole grains.

Protein is another key nutrient for bone health at all stages of life. Most people, but not everyone, get enough. Older adults don't always eat enough protein. If you are considering eating more protein, consider plant sources too, like nuts and beans. They offer calcium as well as protein.