

Ryan and Gene Herman

New Albin, Iowa



In 2003, Ryan Herman, then 25, moved back to the family farm, which hugs the very tip of North-east Iowa. Ryan had attended a technical school, worked for two years as a site manager for an agricultural coop and attended University of Wisconsin at River Falls, where he received a degree in animal science, before returning to the farm.

The Herman farm has a long history with diverse enterprises, including dairy, eggs and swine production. In 2003, Ryan's

parents, Gene and Donna, a school nurse, were raising corn, hay and permanent pasture. They had a 250-head cow herd and focused on finishing their calves conventionally in their feedlot.

Ryan and his wife Sarah, who works off the farm, made the commitment to the family farm with a goal of making the farm profitable for both Ryan and his parents, keeping the farm in the family, and structuring the farming system so that Ryan and

his dad, Gene, both enjoyed their work. To accomplish these objectives, they knew that they needed to make major changes on the farm and in the farm business.

Production Model

Hermans now run a 150-head cow herd and 300 to 400 yearlings and finishers, all on grass. These include purchased stockers in addition to their own calves. They keep their marketing options open, with animals sold into a variety of markets. Some feeders are sold in the late summer when forage supply declines. These may be sold to the local sale barn or to a feeder where they are put on a natural, grain finishing program. Most of their feeders, though, are marketed as natural, grass-finished steers and heifers at 24 to 30 months of age and weights ranging from 1,000 to 1,200 lbs.

Ryan and Gene began researching grass-based livestock systems; attending Holistic Management® meetings and grass-finishing conferences; and reading everything they could find on organic, conventional and grass-based livestock systems. The result? Some big decisions. Ac-

Keys to the Operation

Ryan and Gene avidly seek information about their farming operation and practices that may apply. They read widely, and have been willing to search out information far outside their geographic area. Publications they read regularly include:

- Stockman Grass Farmer
- 'In-Practice' from Holistic Management Int.
- Acres Newsletter
- Organic Broadcaster
- 'Beef' magazine
- 'Drovers' magazine

They have taken a number of courses and attended national conferences, including

- Holistic Management® Training
- Ranching for Profit School
- Stockman Grass Farmer Conferences
- Doug Gunnick's Grass finishing Beef course — Minnesota
- Bud Williams Marketing Class
- Organic Farming Conference, Lacrosse, Wisconsin
- Wisconsin Grazing Conference
- Joel Salatin's 3-day school in Virginia

Ryan and Gene are members of Practical Farmers of Iowa (PFI), a sustainable agriculture organization and participate in their Grazing Clusters.

They also follow the writings of Jim Gerrish, grazing consultant from Idaho; Anabel Pordomingo, an Argentine agronomist; and Michael Pollan, food writer from California.

Other influential readings about business and human relationships have been the books: , Holistic Management: A New Framework for Decision Making, Crucial Conversations: Tools for Talking when Stakes are High, Good-to-Great: The Culture Code, and several by author Stephen Covey.



According to Ryan, 2004 was the last year for corn. In 2005, much of the farm was seeded to permanent pasture, hay, and annual forages. Starting in 2010 they made the decision to purchase all hay needed rather than make hay themselves or hire it done on their land. Ryan cites several reasons for the changes: a grass-based system was a better fit with their farm resources, they planned to increase profits by responding to a growing marketing demand for grass finished beef, and this system better fit both his and Gene's goals and values. The Hermans also sold 2/3 of their 250-cow herd based on a linear measurement system. Linear measurement provided criteria that allowed them to cull cows that didn't fit a standard range of ratios of physical measurements. Many of their cows were deemed too tall, too lean, too heavy or too "far off the ground". Ryan feels that culling on these criteria has led to a more uniform calf crop and greater meat yields

Farm, Soil, and Climate

Ryan and Gene manage 1,400 acres, all now permanently seeded to forages. There are additional acres of timber that the cattle are excluded from. Gene and Donna own 725 of the total pasture acres. They lease an additional 200+ acres from the Iowa Department of Natural Resources (DNR), depending on the year and conditions, which is part of the Upper Iowa River floodplain. They also lease a 400-acre and 35-acre farm from two neighbors.

The farm lies in the “driftless” area of northeastern Iowa, southeastern Minnesota, southwestern Wisconsin and northwestern Illinois. This area was never covered by glacial till or “drift”, so soil developed above limestone bedrock and is fairly shallow, which can limit water holding capacity. Soil on the Herman farm formed mainly under forest and savannah vegetation. The land is rolling to steep, with slopes ranging from 5 to 18 percent slope, except the public, DNR, lands and 200 acres of Gene’s on the flat, river bottom floodplains where the alluvial soils formed from silt deposited by flowing water.

These bottom land soils are highly variable, ranging from sandy to clay, so present challenges with water holding capacity.

Rainfall averages 35 to 36 inches per year, which includes at least two feet of snow every winter.

Pastures/ Grazing Management

“In our older pastures, bluegrass and white clover used to dominate. We have done high stock density grazing on these pastures, as well as giving it extra recovery time after feeding bales on it in the winter. We usually achieve a stock density of 150,000 pounds of animal per acre each day for the daily rotations. This has shifted the grass composition to naturally-occurring orchard grass. We have frost-seeded red clover in the past, and it has also been coming back on its own — either from self-seeding or from animals moving seed to different paddocks. We like the effect on the pasture mix and forage yields, but may have given up some animal performance at those stock densities. We’re trying to figure out how to balance animal performance and high-stock density.” Ryan states.

As they continued to shift additional acres into pasture, Ryan conducted his own research to determine what worked well and what did not. Orchardgrass did well, as did endophyte-free tall fescue, meadow fescue, medium red and white clover, some alfalfa, and chicory. Perennial rye did not fare well due to the need for 15-20 day

Human Relationships and Networks

Ryan and Gene, Sarah and Donna have a commitment to maintaining good relationships and to making the generational farm transfer work. They have a strong commitment to using the Holistic Management® decision making framework to help guide their farm business decisions. They try to hold regular family meetings once a month.

They also recognize the importance of a strong social network and the support that provides when trying something new on the farm. Their social support network includes the Practical Farmers of Iowa Grazing Clusters, their Holistic Management local management group, and the Northeast Iowa Graziers and Great River Graziers groups that coordinate local pasture walks. They also appreciate the technical support of their regional NRCS grazing specialist.





recovery periods between grazings. The Hermans now allow longer recovery/rest periods, between 60-120 days, before grazing a paddock again. As part of this transition, they also experimented with annual forages, particularly for the finishing animals. They were still using some annual forages in 2006, but have phased them out of their production system. On the home farm, cows graze the 530 forage acres two to three times per year. A portion of the ground is left to stockpile and then is normally grazed in the winter and early spring for the 2nd or 3rd grazing of the calendar year.

The Hermans have a grazing lease on 200+ acres with the Iowa Department of Natural Resources (DNR) for three months, from June 1 through August 31 each year. The leasing arrangement is to help the DNR to achieve their objective for wildlife management. Grazing has helped keep the willows and other brush from grasslands that are used by migrating waterfowl in the spring and

fall. Starting in 2006, the cows and calves grazed the state-owned land near the Upper Iowa River, with animals moved to a new paddock once a day at a minimum.

This bottom land is swampy, with no fence. Hermans con-

struct temporary fences each year that must be removed by September 1 to accommodate hunters and free movement of wildlife throughout the fall, winter, and spring. The area has two artesian wells which supply the livestock water. The forage resources were poor — reed canarygrass, sedges, willows, and many forbs — when they began grazing the government-owned flood plain in 2006. The DNR charges the Hermans a moderate lease fee each year.

This has been attractive enough to keep the Hermans engaged, despite the short access period and stipulations for fence removal. On the less flood prone areas the forage resource has improved since they began grazing the allotment. “We are beginning to see some bluegrass and some clovers coming back on these areas every year now,” Ryan observes. “The lower-lying areas still present a struggle, though. Reed canarygrass, because of its hollow stem, continues to respire

during flooding, so is one of the few species that can survive getting its feet wet for long periods. In these areas we are now just concentrating on keeping the forage vegetative for the wildlife and incorporating the forage litter into the soil with the cattle’s hooves.”

Their attention to good grazing management was noticed in the neighborhood, and in 2009, Ryan and Gene were asked to lease a 400-acre grass farm. With this additional land base and the improved forage on the DNR leased land, they experimented with combining the cow herd and the finishing cattle into one herd and running all the farms together as one grazing system or cell. When moving cattle from one land base to another, they haul them by truck. “We were concerned about both the cost and the ‘hassle’ of moving animals from site to site during the grazing season, but we were able to move animals between farms for \$1.40 to \$1.60 each. Because this allows each farm’s forage more recovery time between grazings, we will grow more total grass in our operation, and I can overcome each animal’s hauling cost with only one day’s extra grazing in the winter,” says Ryan.

Cows usually start grazing new forage growth April 15th in the spring, though this varies from year to year. In 2010, due to the early spring and having stockpiled forage still available, they started in early March. When grazing early forage growth



times, hay is supplemented in a portable feeder to slow the passage of the low-fiber, high protein young grass through the animal. Or, if there is stockpiled forage from the last growing season in with the new growth, less supplemental hay is used.

Cattle are moved at least daily, and sometimes more frequently. “We wait until at least 10 am to rotate the cattle to new pastures because the sugars are greater in the crop by that time in the day. Also, we want to make sure to offer enough pasture in the evening so that the rumen is full until the next morning,” Ryan states.

In the past, Ryan and Gene felt

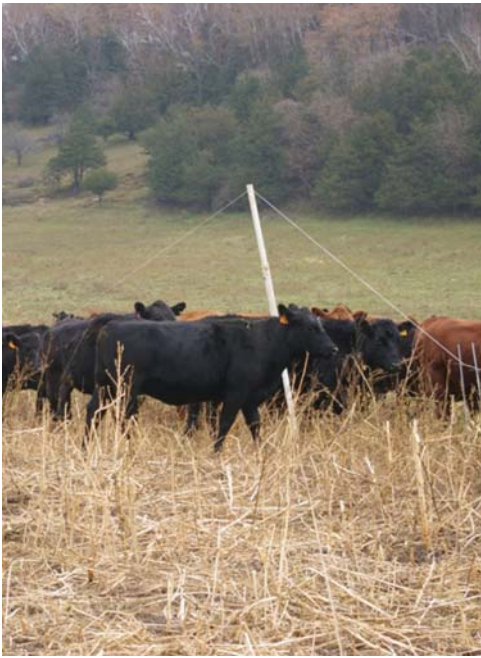
that when you have more forage than you needed in the summer, you should bale it or bring in a custom baler to do the job, then stockpile the regrowth from August on. Holistic Management® decision making led them to some alternate practices. The Hermans began putting up less hay in the summer and stockpiled more forages into the fall and winter for cattle to harvest themselves. They also experimented with skipping these paddocks until the next grazing rotation and then using high stock density and short grazing periods (mob grazing) to transform the extra plant material into litter on the soil surface.

Recently, they decided to drop

the unprofitable haying enterprise, choosing to buy some hay and haylage needed to supplement animal feed and to import nutrients onto the farm. “We try to let the cows do as much of the work as possible including harvesting the forage. Where conventional livestock management takes the feed to the cattle, we take the cattle to the feed,” Ryan said.

Winter Feeding

“The winter hay-feeding period is our main determinate of profitability,” Ryan states. He and Gene attempt to have grass to graze until the cows can’t get through the snow to find it and have had stockpiled forage available into December most years.



hay left laying there provides fertility for the soil in subsequent years. Bales are fed in different areas so that they are on fresh snow and manure is distributed. Concerns about killing the underlying seeded where bales are fed haven't been realized.

They sometimes also use ring feeders. Ryan and Gene supplemented the high protein hay ration with energy tubs in the winter of 2008, which contained natural flax and molasses. This cost an additional \$3.00 per cow and \$6.00 per market animal. With better stockpiled forages and a longer grazing season, they don't feel as if this necessarily is a needed practice and are working toward a system that will not require these supplements.

In the winter of 2008/2009 they fed hay for 130 days starting December 15th and ending exclusive hay feeding April 25th. For 9 days that spring, some hay was supplemented on pasture. In the winter of 2009/2010 they fed hay for 90 days starting on the December 8th snow and ice storm and quit exclusive hay feeding in early March. Hay was supplemented on pasture until early April when the forage dry matter from pasture species increased.

A normal year now consists of three months of hay feeding, though the grazing plan is set

up for grazing all winter, if the conditions are right. Their decision to purchase hay was made due to two factors. The key factor was the less hay needed as they have moved to the longer grazing period and shorter hay feeding period. It is no longer financially reasonable to own and operate their own haying equipment. The second factor is that "purchased hay is a great way to import fertility," says Ryan.

Beef Herd Management

The Hermans now average 150 cows in their herd. Genetics are Red and black Angus, with a smattering of Red Devons. In the past, they used a variety of bulls — some Gelbvieh; a ½ Lowline bull, to bring the size of their cow herd down; and some other crossbred bulls. Their focus now is on Red Angus genetics that they think will contribute toward their selection for deep-bodied cows. Currently, mature cows weigh 1,150 lbs and have frame scores of 3 to 4.

Hermans traditionally calved in a 90-day window in April through June. When they tried later calving, their late-May and June calves did well, but the July calves had too many flies, so they felt they needed to shift the calving season back to May and June, and shorten it to 60 days. Calves are wintered on the cows, then weaned together in March, at 10 months of age. They are kept separate from the cows for about two months then brought back to the herd. According to Ryan, they still need to tweak



They are lengthening this period into January, but wonder how far they can push this window, since have very regular snow and ice cover year in and year out in from January through March. In the winter, when snow and ice make it unreasonable to graze, hay bales are set or un-rolled to give all animals access. Although animals may lie on the bales,

the system to make over-wintering calves with cows and the 10-month weaning age work better. "I would like to have some prime spring forage ahead of the calves to wean them to" said Ryan. "We should probably be calving in just June and weaning in April when we know we have good forage most years. This would also allow the cows two months, April and May, to regain condition on cheaper, grazed forage before calving again. It is the cow's body condition at calving that determines how effectively she will breed-back." There are only four years of data with this system, but to date, this has helped them tighten their calving window. When the weaned calves are returned to the herd, it consists of cows, yearlings and two-year-old finishing steers and heifers. Ryan feels there are several benefits to this. The most obvious is the labor savings — having only one group to move each day. Also it helps grow more forage. Grazing only one group of animals leaves a longer recovery period for the rest of the paddocks before the animals return.

In addition, Ryan observes that "When you get several hundred animals in one herd, they start exhibiting more herd or mob behavior, moving together as a group, grazing more aggressively and actually performing better." Ryan and Gene see cows, calves and yearlings grazing in family groups too. Continuing to graze

with mothers that raised them appears to be good for performance and herd health. "We are already grazing for performance, and as the forages get higher quality, I feel we can readily grass finish cattle in the mob with the cows," says Ryan.

Herd Health

Ryan and Gene had traditionally vaccinated cows prebreeding, but were "pushing the envelope" to control input costs, so dropped all vaccinations for reproductive diseases in 2007. Their rate of open cows increased after that, so they vaccinated again in 2010 but have seen no change in the number of open cows. "The increase coincides with our grazing management changes too. If we are pushing the cows too hard with mob grazing more are not going to fit with our system and fall out of the herd." They know they are getting a more resilient group of cows but feel they need to closer balance the expense of culling cows with their budget.

Though they do see an occasional case of pink eye, they treat with diluted hydrogen peroxide and eye patches, but haven't seen the need to return to vaccinating for pink eye.

The Hermans continue to adjust their mineral supplement to achieve good herd health at the lowest cost. In the past, they fed kelp, Redmond salt and Desert Dynamine. They now mix their own minerals using Remond salt, feed-grade lime, iodine, selenium, and copper sulphate. This has reduced their mineral costs from \$8.00 per cow in 2008 to \$5.00 per cow in 2009.

Marketing

"In 2008, we purchased our first organic calves from a neighbor in the next county," said Ryan. "Those we sent to market to another neighbor who initiated a small, start-up regional marketing group for grass-based meats. Ryan has since become a partner in the marketing company, Grass



Run Farm. “It has been very interesting to learn the ‘ins and outs’ of a small meat company that sells its products in three states,” said Ryan.

According to Ryan, it’s easy for farmers to produce, but marketing is tough. Following a grassfed, natural protocol for a number of years has assisted the Hermans in transitioning to organic. “We’re trying to be low-cost producers looking for as much flexibility as possible,” said Ryan. “This will allow us to sell organic, grassfed or into the conventional market if need be. Grass Run Farm normally (2009-2010) has a purchase price of \$1.75 per pound carcass weight.”

Cattle are processed at Lorentz Meats in Cannon Falls. An advantage to this processor is the individual carcass data provided for each animal harvested. When the meat company was smaller and processing about 10-12 head every other week Ryan was doing most of the trucking himself, which helped spread the cost of ownership of their truck and trailer. With the growth in numbers marketed, the Hermans now hire the trucking done.

Summary — Challenges

“We have shifted our business model, not only from row crops to livestock, but toward a management-intensive, low-cost livestock production system. We want to put money toward cows that produce a calf every year as opposed to machinery that depreciates,” said Ryan. “We pre-

viously identified overcapitalization (too much machinery and buildings) and lack of animal units per full-time labor unit as our core issues. We are getting past these with the sale of much of our machinery and taking on more pasture and animals. Ryan likes fellow organic grazier Tom Frantzen’s quote, “I have yet to see a tractor reproduce a baby tractor! It’s one of the great miracles of a natural system to produce something from scratch with free sunlight and our management.”

“Currently, we are struggling with getting the correct animal genetics for our grassfed and organic, grassfed markets”, Ryan admits. “We also continue to address our winter feeding period because feeding stored forages is cutting into our profitability. We continue to work for a higher rate of gain on our finishers and more animals grading choice. These changes will likely come from improved genetics, a different forage mix, and improved

grazing management. We hope to be able to achieve these without going back to using annual forages”

Ryan and Gene are constantly looking to learn, to improve. “When you are producing and marketing a niche product, you need to search far and wide for information,” Ryan said. “We both (Dad and I) continue to read widely and attend key farming and grazing conferences (see sidebar). This give us a wide perspective, where we can see some parallels to our area with what graziers are doing in Ireland, Argentina and New Zealand. Joining Practical Farmers of Iowa (PFI) and their grazing clusters has been great. I also really use the social network our local Holistic Management group.” The Hermans continue to observe that the Holistic Management® decision making framework is helping them make the changes needed to boost profits and create the work environment that they want on their farm.

