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OUR GOAL:
MAKE PRECISION FARMING EASIER

Here’s an interesting fact: According to a Meredith Agrimedia study conducted earlier this year, only about 13 percent of farmers consider themselves to be “very” or “extremely knowledgeable” about precision farming. At the same time, farmers are adding precision farming tools to their operations at a record pace. This means farmers have a good understanding of the value precision farming technologies can bring to their operations, but they know they also need support and expertise to make it happen.

Years ago, when we introduced the first yield monitor, it was me who went out into the fields of the handful of customers who bought them. I showed them how to install it, how to set it up and how to use the data that could be collected. It was from my early experiences in my customers’ fields that led me to believe that top-notch service and support is critical in this business. Some 23 years later, while it’s no longer me who provides the field support, our focus on offering the highest level of product support and customer service hasn’t changed.

As we head into harvest season, I want to brag about [and I’m not one to brag] some of the things we do to make it as easy as possible for farmers to understand the products they buy from Ag Leader. It all starts with the product itself. We spend countless hours researching how farmers use our products so that we can make them simpler, more intuitive and better. Some of you may still be using early models of the yield monitor. You’d be amazed at the differences today. Color touchscreen displays designed to be visible even in bright sunlight. Remember fumbling around with memory cards and jump drives? Those days are going away fast as well. And, I’d be remiss if I didn’t mention the work we’ve done on the user interface to make operating our displays more intuitive than any in the marketplace.

And, while product improvements have been ongoing over all these years, I’m also proud that we continue to support even the products sold over 20 years ago.

When we set out early on to establish our dealer network, we had the opportunity to work with the cream of the crop — people who were truly passionate about the promise of precision farming, and not just an operation trying to add another line of products. We hear it every day that our dealers are the best in the business. In fact, often they are asked to help troubleshoot other systems! Of course, great dealers don’t just happen by accident.

Every year, we spend countless hours training our dealers on the newest technologies via webinars, dealer trainings and annual dealer meetings. In fact, just a few years ago, we built Ag Leader Academy, a training center used exclusively for dealer and customer training. In 2014, the Ag Leader Academy held 146 instructor led classes. So far in 2015, 396 dealers have participated in at least one training course, either online or in-classroom.

But one of the most impressive, yet unsung heroes of our product support infrastructure consists of a team of more than 30 product support specialists. This group is unlike any other in our industry. They are 100 percent Ag Leader employees located right here at our headquarters in Ames. Each support specialist has their own workstation specially equipped with all of the latest, fully functioning displays [and older models as well]. This allows them to walk through issues with callers step-by-step using the exact setup that’s being used in the field. In fact, in cases where remote access is enabled on your equipment, they can actually access and troubleshoot your system right from their workstations.

This team responded to more than 85,000 support calls in the past year. And through busy planting and harvest seasons, we make sure you have access to our product support team 4,000 hours per year. That’s extremely handy, because we know that farmers don’t just work and equipment problems don’t just happen during regular business hours.

Harvest season is always an exciting time of year. Good luck in the upcoming months. And if you have questions about your precision farming system, you know who to call. We’ll be ready!

Al Myers

Al Myers
EVERYTHING’S TOUGHER IN TEXAS

The Texas drought of 2011 hit ranchers and farmers the hardest. The damage was devastating – with reported losses in the agriculture sector totaling over $7 billion that year.

The cattle and cotton industries suffered the most. Over a million head of cattle were sold out of state in 2011. Today, the ranching industry is still trying to come back. Some farmers and ranchers never recovered.

Still, Texas remains a leading producer and exporter of agricultural products, ranking 6th in the United States with an estimated value of $5.7 billion in exports in 2013, up from $4.2 billion in 2009 (this according to a 2015 USDA report).

In 2013, Texas’s top five agricultural exports were: 1) Cotton, $1.4 billion 2) Beef and Veal, $906 million 3) Broiler Meat, $398 million 4) Hides and Skins, $351 million 5) Wheat, $329 million.
EVERYTHING’S TOUGHER IN TEXAS IN EXPORTS

$5.7 billion IN EXPORTS

WHEAT $329 MILLION
HIDES & SKINS $351 MILLION
BROILER MEAT $398 MILLION
COTTON $1.4 BILLION
BEEF AND VEAL $906 MILLION

Top 5

Sources:
http://texascorn.org/learn-more/corn-production/
http://stateimpact.npr.org/texas/2013/06/06/why-texas-cattle-ranching-continues-to-decline/

Texas 2015, #6 producer & exporter of Agricultural Products in 2013.
In Bartlett, Texas, there’s a farmer named Lloyd Fischer who grows wheat, corn and milo on 800 acres of land that, for the most part, have been in his family for over 140 years. There in the rolling black hills, Fischer does dry land farming. “With no irrigation, you’re left,” he said, “at the mercy of Mother Nature.”

Texas leads the nation in number of farms and ranches, with 248,800 farms and ranches averaging 523 acres and covering 130.2 million acres in all. Surrounding Fischer’s farm are huge Texas ranches (some 10,000 to 15,000 acres) and farms (ranging from 5,000 to 8,000 acres). Therein lies the problem for Fischer: Land, even in Texas, is tough to come by.

“There were several changes that took place upon Fischer taking over. For starters, marketing their grain became a tougher task. Whereas the local grain elevators used to sell it for them, Fischer now markets all of his own grain. Getting the best price, he said, is always a challenge.

Fischer also began looking into precision agriculture technology. He spent several years researching different types of products before going with an Ag Leader Versa display for guidance in both planting and harvesting.

“I first looked into Ag Leader because of the availability. There’s a dealer real close by. And I chose to go with Ag Leader for the ease of use,” Fischer said.

Fischer said his son Trenton knows the Ag Leader system better than he does. This comes as no surprise to him, because whereas computers were just showing up on the scene when Fischer graduated high school, his son’s been using iPads for textbooks.

“Trenton really wants to push the technology side of the operation. He’s so much better at it than I am. Operating the precision technology comes so much more naturally to him. But at the same time, after I’ve done it a few times, it is rather easy to use,” Fischer said.

Fischer is now looking into adding variable rate seeding. Variable rate seeding is available through the Ag Leader Integra display and SeedCommand. It allows seeding rates to be controlled based on a prescription map. Yield increases are experienced when seeding rate is altered based on field conditions, rather than blanketing the field with the same planting population. In Texas, Mother Nature makes things quite difficult on farmers, so Fischer needs every advantage he can get. Three of the last five years, he said, have been bad to really bad. Even the good years, he learned, can turn out bad.

“In 2011, we had extreme drought all across Texas. In corn, we did anything from 20 to 40 bushels an acre that year.

Fischer has been involved in the family operation pretty much his whole life. When he and his wife married 18 years ago, they built a house on the family land. But with his uncle and father still involved in the operation, crop production wasn’t enough to support three families. So in addition to working on the farm, Fischer made ends meet by doing custom application for a number of surrounding farmers.

Then a few years back his uncle passed away, and not long after his father’s eyesight began to fade. Suddenly, it was just Fischer running the farm operation, with the help of his teenage son, Trenton, who Fischer hopes to pass the farm down to someday.

“The Fischer family, and Ag Leader dealer, John Evans of Evans Ranch, stand near a sign proudly displaying the heritage of the family farm.
Then last year we had one of our best crops we’ve ever raised. What did corn prices do? Dropped around three dollars,” Fischer said.

This year has been no different, he said. As soon as things look up, they have a tendency to turn just like that. Whereas drought wreaked havoc across the state in 2011, this year the problem was just the opposite.

“This year we’ve had ample moisture. My milo crop looks excellent. My corn crop looks pitiful. The wheat crop was one of the better wheat crops we’ve ever had, or would’ve had anyway. Then it rained too much and it sprouted too much in the head. Nobody around here wanted to buy our wheat,” Fischer said.

Corn typically fairs pretty well in the area, Fischer said, producing 100 to 120 bushels an acre. While corn isn’t always the first thing that comes to mind when people think of the Lone Star State, it’s a major contributor to the state’s economy.

A recent Texas A&M AgriLife study found that corn contributes more than $3.5 billion and over 22 thousand jobs to the High Plains region alone. In 2014, Texas corn growers planted more than 2 million acres, yielded an average of 148 bushels per acre, and produced 295 million bushels of corn.

“When you’re dealing with a climate of extremes, where it can be bone dry or sopping wet, 20 degrees in the winter or 120 degrees come summer, you just have to take your licks and move on,” Fischer said. “What I can say about farming down here in Texas is sometimes you’re the windshield, and sometimes you’re the bug.”

Which is why, Fischer explained, most farmers in the area have adopted precision ag technology. And those who haven’t will soon enough.

“Pretty much everybody our size or bigger has gone to precision farming, whether it be for guidance or spraying,” he said. “For those few who haven’t yet, I suspect they’ll try it soon, and when they do, I know they’ll stay with it. I know we will.”
A big shift happened in the industry when the yield monitor was introduced in the mid-1990s. Farmers started to realize that their fields are not equal. Even Ag Leader was just beginning to realize the broad variability that was present in fields. Believe it or not, this was not common knowledge at one point — yet we now hold these truths to be self-evident! Thanks to yield monitors, even in the most “perfect” fields where variability appears to be zero, the yield map is not a single color.

Our fields are packed full of opportunities to learn and make better decisions. When margins are tight, knowing our fields well and which crop investments have a positive ROI becomes critical. Of course, lots of green on the yield map is a good sign as it confirms the conditions are right and what you are doing is working. Insights can be gleaned from green areas but the real opportunity for improvement in yield comes from studying the areas showing colors other than green (yellow through red). But without a well-calibrated, accurate yield monitor, there is essentially no way to know where these profitable yield opportunities lie in your field.

Ag Leader has years of expertise in the yield monitoring market. Al Myers, company president and founder, is credited for inventing the first commercially successful yield monitor over 20 years ago and today it’s the most widely used yield monitor in the world. The unique patented non-linear sensor calibration ensures utmost accuracy in the lowest grain flow environments to the highest grain flow and every grain flow rate in between.

Ag Leader has built, and continues to build, its reputation as being the most accurate, reliable, and trusted yield monitoring system on the market. This doesn’t come by accident. This reputation is built on years of satisfied customers who have experienced the accuracy and reliability that comes standard with Ag Leader yield monitors.

Yet with all its potential, the powerful data collected by the yield monitor can be useless without proper calibration. Taking the time to collect proper calibration loads and ensuring your yield monitor is up to par for the season really doesn’t take long and you can reap the benefits of doing so all year long. A quality Ag Leader weight calibration consists of four to six harvest loads weighing 4,000 to 6,000 pounds (1,815-2,721 kilograms) each. It is important to vary swath width or vary ground speed for the yield monitor to learn the different grain flows it can expect to see throughout the season. A properly calibrated Ag Leader yield monitor can be accurate within two percent across all loads, and in many cases,
Ag Leader recommends calibrating the yield monitor each year (once per crop type) for the variability in each season’s crop. Additionally, Ag Leader yield monitors can back calibrate the season’s harvest data so you don’t need the weigh wagon with you on the first few big days of harvest.

Can fewer calibrations be done you might ask? Yes, but given the data we’ve seen over the course of 20 plus years of yield monitor development, it can result in a major reduction in accuracy of the monitor. Taking the time to get a proper calibration is critical to getting quality data to use throughout the year. You know the saying - garbage in, garbage out?

Harvest can be a rushed and stressful time, but taking the time to focus on your yield monitor can ensure valuable management data to make a whole year’s worth of decisions on. Why skimp on taking the time to properly calibrate your yield monitor when the data collected has year-round implications on your management decisions? Especially when those decisions can have big return of dollars and cents.

Follow these seven easy steps, in this order, to ensure your yield monitor is dialed in for accuracy.

1. Acclimate Temperature Set Point Based on Conditions
2. Adjust Header Stop Height
3. Set Machine Vibration
4. Measure Distance
5. Check/Set EMU Auger Motor
6. Set Moisture Based on Average of 5-6 Samples
7. Calibrate Weight

Now is the time to be proactive about this year’s harvest. Pull the combine out now and check it out to minimize troubles in the field this season.

Need help? Give our free, friendly Tech Support a call or watch our tutorials on YouTube at youtube.com/agleadertutorials.
100% DEDICATED TO PRECISION FARMING

Founded in 1992 by Al Myers
HEADQUARTERED IN AMES, IOWA
INDEPENDENTLY OWNED COMPANY

OUR VISION:
Exceeding customer expectations in technology, quality and service.

PRODUCTS BACKED BY:
2 year warranty, free support for the life of the product.

YEAR-ROUND PRECISION

PLANT  APPLY  MANAGE  HARVEST  PLAN
49% use precision farming expected to reach 97% in the coming decade.

Technical Support

- 30+ technical support representatives
- 85,000+ calls processed each year
- 4,000+ hours dedicated to product support
- 100% dedicated to precision agriculture
- Free support for the life of the product.
A FORCE TO BE RECKONED WITH
Margraf, a 44-year-old farmer from Seneca County, Ohio, admits he unknowingly abused the down force on his planter for many years. In the late 1990s, he and his father Gene went no-till on all 1,100 acres of corn, soybeans and wheat. With all that residue resting on the surface, serving as a barrier between seed and soil, there was only one logical thing for them to do.

“Our John Deere planter gave us three or four choices for spring down force settings. I always thought in no-till that the ground would be much harder, so our settings were always near the maximum amount of down pressure,” said Margraf. “We sure got an eye-opening experience when we went to Ag Leader’s Hydraulic Down Force. Found out that we were probably over applying down force on over 70 percent of our acres.”

Margraf learned the consequences of uneven down pressure the hard way. When dry conditions swept through the region in the spring of 2011, turning most of his 1,100 acres into near solid rock, he observed as the corn emerged at staggeringly varied rates.

“The ground kept getting harder and harder. By the end of the planting window, the last couple days we planted, we had such terrible emergence on our corn, which was mainly due to uneven down force,” said Margraf. “We had uneven depth in our seed so our emergence was just terrible across the field. You had some corn that was six collars and some that was just germinating. I said to my dad, ‘This isn’t going to happen again.’ So we traded planters and I knew we needed to put some sort of controlled down force on it so we could monitor it.”

Margraf upgraded to a John Deere 1770NT planter with an Ag Leader Integra display controlling all planting and spraying functions. He opted for Hydraulic Down Force because it offers automatic response time, unlike air bag systems that can take up to 20 seconds or more to respond. Plus, with as many as 8 to 10 different soil types in a field – ranging from heavy clay silt loams to muck – Margraf said he liked that Hydraulic Down Force offers row-by-row sensing and 8-section control. The system’s performance has been as good as advertised, he said, if not better.

Bret Margraf has a tip for all you farmers out there: **Stop using so much down force.**

— Bret Margraf, Ohio
“I find now, more often than not, the only weight we have applied is the weight of the row unit. That’s the part that’s hard to believe because it’s no-till and everything. There are very few times that we have to crank the pressure,” Margraf said.

One such time is when the planter crosses over buried gas lines. Margraf said it’s amazing to watch as the pressure builds and the down force is applied. Once the planter gets over the 20-foot trench that was opened for installation of the gas line, the system immediately returns to its normal setting.

In addition to farming, Margraf serves as a Nutrient Management Technician for the Seneca Conservation District. He gives several presentations throughout the year, and farmers in attendance are almost always floored by Margraf’s findings on the connection between down pressure and yield.

“It’s funny how it correlates. It seems like where more down force is applied many times that’s where the lower yielding areas are in the field. Most people can’t believe that this is all the down force we’re applying in a no-till environment. They hold the same line of thinking that I once did: It’s no-till, so we’ve got to have more down pressure in order to get that seed into the ground. When in reality, the longer we’re in a no-till environment, the less down force we need,” Margraf said.

Margraf attributes this phenomenon to several things, namely the soil composition. Low yielding areas often contain heavier, harder clay soils that contain less organic matter and are situated on sloped parts of the field. More down force is needed in these areas compared to those with more high-quality topsoil where the best yields are typically found.

Still, Margraf believes applying the right amount of down force at all times leads to consistent seed depth, which ultimately leads to more consistent emergence and root development. Consistency, he said, gives you the best chance at optimizing yield.

“Every time we shift or speed up, or slow down, we see a change in the seed drop and a change in the down force pressure. All of this ultimately affects the growth of the crop. We’re just trying to be more consistent.”

- Bret Margraf, Ohio
Although just released in late fall of last year, SteerCommand’s praises have already been rolling in from operators all over the country. From ease of steering kit installation to differential signal retention, SteerCommand is proving to be a very robust steering system. Just read what these dealers and growers had to say on the next page!
'WE HAVE INSTALLED' three SteerCommand systems so far. ...I personally like the way that the antenna hooks up. ...We switched the first one from manual guidance to SteerCommand and had RTK fixed signal within a minute’s time.”

'INSTALLATION HAS BEEN' straightforward and easy. The harnessing is laid out in a very logical way and it is not overcomplicated. Our customers are blown away by the reliability of the signal and the overall steering performance.”

'JEFFERY GASTON'
DELTA PRECISION SYSTEMS, AN AG LEADER DEALER IN CLARKSDALE, MS

'THE SYSTEM STAYS' green in places where my old system would not — like under trees. ...I bedded that entire field and I did not drop signal a single time.”

'BUCKY SKYES'
FARMER, SKYES FARMS IN HASTINGS, FL

'I RAN TWO' SteerCommand systems on RTK this spring and both worked flawlessly, like a steering system should. SteerCommand is very simple and easy to use. It just works!”

'MIKE HOUGHTALING'
PC AG SOLUTIONS, LLC, AN AG LEADER DEALER IN REESE, MI

'WE DON'T EXACTLY' have the most reliable CORS network in Florida. ...The SteerCommand has not lost its fix yet. In fact, the grower recently forgot to shut down the system after working one day last week. When I went to the tractor, the system was still on and fixed. I pulled the history on the network account and learned that it had indeed been fixed for 56 hours straight. I am very impressed!”

'GARY MANTERNACH'
FARMER, MONTICELLO, IA

'STEERCOMMAND HAS BEEN' comfortable. Compared to our other steering systems, SteerCommand is less stressful on the operator. The line acquisition is a gentle sweeping motion instead of a series of sudden jerks.”

'SCOTT GRADDY'
AGTASTIC SOLUTIONS, AN AG LEADER DEALER IN ST. AUGUSTINE, FL

'JUSTIN CULLER'
FARMER, WINDRIDGE FARMS IN FREDERICK, MD
Pinery Grain Growers are fifth generation broad hectare farmers located in South Australia. They rotate crops such as wheat, lentils and canola on 3,500 hectares (8649 acres) with an average paddock size of 200 hectares (494 acres). The average annual rainfall for their districts is 375-420 mm. Brothers Clinton and Derek Tiller manage the farm and have been using Ag Leader equipment for four years. Clinton explains that efficiency and innovation have long been their focus at Pinery Grain Growers, which has led to their integration of technology.

The Tillers have always been early adopters of new technology because they have seen and experienced the benefits. Clinton explains, “All of our equipment have auto-steer, and has for the last 15 years. This includes our tractors, headers and self-propelled sprayer. We are currently finalizing a controlled traffic system with three meter centers and based on a multiple of 12 meters.”

Ag Leader dealer, G&J East, located in Kadina, South Australia, has helped Pinery Grain Growers discover the benefits of turning their data into profitable decisions.

Pinery Grain Growers discover the benefits of turning their data into profitable decisions.

The Tiller brothers, along with the encouragement of their agronomist, have been forging ahead with their tech drive and are now embarking on variable rates. Clinton said, "With auto-steer, it is an immediate noticed improvement, you
can see it in the paddock because it’s a visual thing. It’s all straight, there’s no overlaps – it just makes sense. A farmer can see their return on investment straight away and justify it pretty quickly. When you move onto variable rates it’s not as visual but it’s very exciting for us to learn what it can do for our business.”

Mark Oster from G&J East and Roger Modra from Ag Leader, have been on hand to ensure Pinery Grain Growers experience the full benefits of variable rate technology. Clinton said, “We’re excited to use Ag Leader’s Technology to its full potential. All of our equipment is now variable rate ready. All we need do is gather as much data as possible to make the right decisions to maximize potential yield. With the aid of our agronomist and SMS software we can easily build prescription maps, load them to our Ag Leader displays, and let technology do the rest.”

Modra adds, “Variable rate in Australia is just starting to take hold. Growers are understanding they need to prepare their businesses to take advantage of this technology. Once they have their machinery and hardware set up for variable rate, it’s much easier to adopt ideas from their agronomist using information gathered over multiple seasons. OptRx sensors are one of those tools that can be used to collect this vital data.”

Clinton explained a benefit experienced already. “Rye grass is a weed here in South Australia and one of the many ways to reduce its plant population is to outgrow it. We have a paddock where we have picked rye grass areas and doubled the seeding rate to help control the rye grass. The results so far are promising.”

Pinery Grain Growers have also recognized the benefits of correcting the PH of their soils within a paddock. Clinton explains. “Lentils are now 35 percent of our program and lentils are sensitive to acidic soils. We are planning to test the paddocks with a PH testing unit that will produce a prescription map for that paddock. This will enable us to apply lime at the correct rates in the correct areas to optimize PH levels. The results will be twofold, increasing yield as well as decreasing costs.”

G&J East’s Mark Oster explains another benefit. “Ag Leader products are favored by farmers because they are not color specific. As dealers, we appreciate the versatility of Ag Leader equipment being compatible with every machine we sell.”

Clinton agrees, “You can take the unit out of one machine and put it straight into another with no compatibility problems at all, it doesn’t matter what color the machine.” He continues with another benefit: “The SMS software allows us to immediately send information to our agronomist via a cloud-based system to make faster decisions. AgFiniti is a cloud-based extension to SMS that allows me to access my data from any web based device.”

Clinton wrapped it up by saying, “The G&J East and Ag Leader teams are very thorough and are always on hand to help out with training and advice. They are available over the phone or face to face if needed and the Ag Leader software is very easy to use and self-explanatory. With our improved efficiencies over the years we have found the equipment basically pays for itself.”

Clinton believes that the future for Pinery Grain Growers is looking bright because the technology available from Ag Leader is helping them become more profitable.
Social media is a common way people are communicating today. Not only can Ag Leader fans interact with the company on Facebook, Twitter, LinkedIn and YouTube, but also on Ag Leader’s blog – Precision Point. These platforms allow Ag Leader to inform and educate, and also have a conversation with those interested in precision farming technology. Connect with us today!
SETTLING FOR A PRECISION FARMING PARTNER WHO THINKS SERVICE AND SUPPORT END AFTER THE SALE JUST DOESN’T CUT IT.

Experience. Innovation. Expertise. And industry leading service and support. That’s Ag Leader.

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