Wilbur-Ellis Finds Unique Apps for Veris Maps Across the U.S.

From the rolling fields in the Pacific NW to the flat cotton fields of west Texas to the picturesque orchards of Michigan, there is a growing trend in Wilbur-Ellis’ precision farming program—Veris soil mapping. Since acquiring their first Veris EC unit a decade ago, Wilbur-Ellis’ Agribusiness Division now offers Veris mapping in several of their 160 locations in 25 states.

Here’s a sampling of their results:
In the scenic yet highly productive valleys like the Willamette south of Portland and the Skagit near Seattle, Eric Shumaker, Field Technologies Specialist finds that Veris maps bring value to his growers. “They appreciate seeing this new technology going through their fields—they’ve worked these fields for many years and the Veris maps make sense.” Eric uses the term ‘digitizing their memory’ to describe the merging of Veris’ technology and his customers’ understanding of their fields. In addition to using Veris zones for variable-rate fertilizer applications, he’s seeing a benefit to VR herbicide applications. Adjusting soil-applied herbicide rates on sandy areas of a field can avoid carryover injury on rye grass seeded the next fall.

Jeremy Shuler from the Columbia Basin in Washington State is finding success for variable rate seeding (VRS) of corn based on EC maps. In soils that can include caliche and rocky spots, a 32-40,000 seeds/ac range has produced a .4 ton/ac increase in yield. Jeremy cautions that it’s important to know which hybrids to optimize. Ten years ago they purchased one of the first Veris pH modules and have mapped most of the pH-critical onion fields in their region.

Out on the high plains where Ryan Strong is the Regional Technology Manager, Veris maps are playing...
Deere Dealer Sees Green With Veris

“A paradigm shift is happening in Mississippi,” announces Andy Moore with Wade Inc., “Farmers recognize that Veris maps make more sense than standard grid sampling and are making the switch.” In August 2012 Andy joined a Wade, a John Deere dealer with 11 locations in Mississippi, to assist their entry into the agronomic consulting arena. Andy and Wade are affiliated with AgriTrend, an organization that Wade has joined that networks scientists, business leaders, and ag professionals to create better farming strategies.

“Veris is the most precise way to delineate where soils change,” Andy explains, “the world doesn’t change in little square blocks.” The EC maps make precise soil zones for their customers to use in variable rate application. Wade Inc. provides their customers with agronomic advice independently from their input suppliers. They set up zones, pull samples, and make fertilizer recommendation using the Veris maps and lab data; however Wade is not interested in entering the sales aspect of chemical, seed, or fertilizer. Andy emphasizes that they are a John Deere equipment dealer that is now providing agronomic advice to their customers.

Andy jokes that Mississippi might be a little behind the times, but they are catching up. “It’s kind of revolutionary; the last fifteen years has been mostly grid sampling, but once farmers see the EC zone concept they want to change to it”. In a big chunk of the Mississippi, Andy Moore and Wade Inc. are providing precise management zones and agronomic recommendations using the Veris Q2800.

I’m Farming and I Grow It
...and when I’m in the field, I raise crops to maximum yield

Several million people have heard the Peterson Brothers and their agricultural parody of the hiphop hit “I’m Sexy and I Know it”. If you haven’t seen this viral video, just search YouTube ‘Peterson Brothers I’m Farming and I Grow it’ for a song that will make you proud to be part of agriculture. Eric Lund, President of Veris Technologies has a special tie to the Peterson brothers; his first cousin is their mother, Marla Peterson.

Greg, the oldest of the Peterson brothers wrote the lyrics. He shares that “We’ve been fortunate to have the success we’ve had with these videos—we don’t want people to take their food for granted—or God for granted. We feel blessed to be able to share what’s happening on our farm and in our lives.”

With views of their videos passing the 20 million mark it’s safe to say the Peterson brother’s passion is spreading. They continue to share with the world their joy for farming in their newest video “Farmer Style” parodying the recent hit “Gangnam Style”. And the just released “A Fresh Breath of Farm Air” from the 90’s hit show theme song “Fresh Prince of Bel-Air”. In addition to their parodies they now post monthly videos title “Life of a Farmer” where they summarize the monthly work involved in farming. Clearly the Peterson brothers “Have a passion for their plants and they ain’t afraid to show it”.

The Peterson brother: Greg, Nathan, and Kendal
a role in VRS of corn, cotton, and grain sorghum. Lowering sorghum rates on the coarser- textured soil areas of a field produces stronger stalks in those spots—reducing lodging. “Veris maps have really taken hold down here,” Ryan reports, “our competitors are using imagery for their zones, but when you get right into the soil it makes a big difference.”

In northeast Kansas where Brook Mitchell directs Wilbur-Ellis’ precision ag efforts, the crops are primarily corn and soybeans. Since 2012 Brook has been using Veris EC and OM sensing for VRS of corn population and to guide soil sampling locations. Due to this area’s extreme variability in nutrients, they conduct intense soil sampling and use the Veris maps to adjust sample locations based on soil changes. Brook was initially skeptical about the need to send his OM data to Veris for processing. But after seeing the improvement in data quality that results from the feedback and processing, Brook says, “If anyone doubts the benefits of this, I can assure them of its value.”

“Precision ag used to start with grid samples; now it starts with Veris maps,” according to Chris Wilde, who heads up the precision efforts for Wilbur-Ellis in Michigan. Chris and his colleagues use a Veris 3150 EC unit for row-crop, and a Veris Q1000 for permanent/specialty crops like cherries, apples, peaches, and asparagus. Nutrients are based on 2.5 acre soil samples, but instead of a blind grid the sample sites are directed using Veris EC data. This approach provides the confidence to vary essential crop nutrients by soil test and CEC. VRS of corn and soybeans is also increasing in popularity using Veris maps.

Bill Suess, National Field Technology Manager for Wilbur-Ellis sums up their precision ag approach, “We believe a better understanding of soil variability is key to improving precision. Veris soil sensing is an important component in that effort.”

Before Veris sold the first OpticMapper we knew that data quality would be especially critical, as sensor maps of organic matter variability would be used directly to vary inputs like seed and nitrogen. Veris took a bold step in requiring that all OpticMapper data must be submitted to our Data Processing Center for quality review and calibration. Now in the 3rd year of operation, the results of Veris data processing from the DPC are outstanding. The process is easy, quick, and inexpensive—but highly valuable. As data comes in, proprietary Veris software algorithms provide quantitative assessments. Then each field gets an ‘eyes-on’ review from Veris staff with extensive soil sensor expertise. A ‘report card’ containing suggestions for improvements in data collection, calibration sampling, along with correlation and error statistics is generated based on the quantitative and qualitative analyses and returned to the customer. This feedback loop leads to continuous improvement and assurance of data quality. The DPC also calibrates the sensor readings to CEC and OM from lab samples, converting the sensor data to important soil properties. While required for the OpticMapper data, the DPC can also process EC and pH data as well. Not only does this approach provide improved customer usage of Veris equipment, the process leads to improved products and services from Veris Technologies as well.