

## Plan Now For Better Soybean Yields

For the past several years, corn and soybean genetics have greatly improved in yield potential, disease tolerance, SCN protection, and stronger emergence. Soybean yields in 2015 varied throughout the SCI selling area. There was too much water in the northern sales area, resulting in poor stand establishment with less yield. In the central and southern SCI sales area soybean yields varied from 50 to 65 bushel. Soybean genetics are better than five years ago. Soybean growers are adapting newer planting practices and managing the crop through the different growth stages however maintaining consistent yields of 70 bushel plus are still lagging. Research has shown maximum yield potential in soybeans is genetically set. Actual yield potential varies with environmental conditions and management decisions. Ideally, keeping the plant healthy under stress conditions will have a positive impact on yield. Items to consider for building high yields of soybeans:

continued on page 2



Seed Consultants, Inc. 800-708-2676 www.seedconsultants.com

Simply, the Best Value in the Seed Industry™



**HIGHER CORN YIELDS REQUIRE BETTER BALANCE** Fertility is the foundation



WINTER MAINTENANCE Work now can pay off in the spring



**USE PLOT DATA** TO MAKE SOUND **DECISIONS** Data can make a difference in 2016



**2016 WINTER MEETINGS** Plan on ioining us in January for updates and info

### Plan Now For Better Soybean Yields... continued from page 1

### Maintaining a Healthy Root Zone

Keeping roots healthy will improve water retention needed by the plants during periods of stress and allow the plant to maximize photosynthesis during the vegetative stage, which is critical to high yields. Growers need to select varieties with SCN protection. Premium seed treatments, like Seed Consultants Turbo Treatment, with expanded fungicide and insecticide components, will protect the seed against soil borne diseases and insects more so than a standard fungicide treatment. Reduce soil compaction, a problem early on that restricts root development. Improve soil fertility levels to maintain plant health during vegetative and reproductive growth stages.

### **Variety Selection**

Select high-yielding varieties with good agronomic traits that match stresses will maximize yield potential in the different growing environments. We do this practice in corn, soybeans should be no different.

# Maintain and correct soil fertility issues prior to planting

Potassium levels in the soil need to be good to very good. Soybeans are a legume and yield better when soil ph is balanced. If lime is needed to correct soil ph, plan for the application in previous fall or over the winter to alleviate potential compaction issues in the spring, prior to planting.

### **Plant Early and Plant Right**

Delayed planting can reduce up to .7 bushel per acre per day yield loss after May 10. Start right and end right.

### **Row Spacing**

Yield advantage will vary with different row widths. Don't overplant, plant proven seeding rates for the different row widths.

### **Plant Population**

From several research studies having a final stand of 125,000 plants per acre has the best return. Depending on field conditions at planting time, rates can vary. Higher than normal seeding rates can increase disease pressure, minimize light interception, increase cost per acre and lower yield potential.

### **Manage Weeds Early**

Weeds compete in soybeans for water, nutrients, and sunlight. Plan for a pre-emerge application followed by post application to clean up whatever weeds are present.

### **Nutrient Deficiencies**

Should Potassium, Manganese, Calcium, or any nutrient deficiencies appear on plant leaves early, treat with a foliar application.

### **Fungicide Protection**

In areas with high stress or disease pressure, plan for a fungicide application to keep the plant healthy and protect yield.

In past, we have fine tuned management practices in corn and yields have risen. Soybean yields of 70 to 80 bushel are realistic however we need to keep in mind what the plant needs to maximize yield. We can't control the environmental conditions however we can change some of our management practices and build healthier plants for higher yields. Considering tips, like the above, will help push soybean yields better than we have seen in past years.

By Bill Mullen, CCA, SCI Director of Agronomic Services Phone:740-505-2022 bmullen@seedconsultants.com





# Higher Corn Yields Require Better Nutrient Balance

Crop fertility is just one part when trying to attain higher yields. Genetics, crop rotation, drainage, weather, weed and insect control are all factors important for that corn plant to respond to making higher yields. When crop prices are high applying more nutrients is easier to justify but when these crop prices decline there is the tendency to cut back on nutrients except for nitrogen. University research is showing crop yield decline, especially in corn, when we cut out applications of phosphorous and potassium to lower cost of production. Research is showing higher yields with very good soil test levels compared to those fields where growers have backed off from applying phosphorous and potassium to fields that are needing it. When it comes to raising corn, some growers will only apply the nitrogen needed. Everyone knows nitrogen makes corn grow and that it is an important nutrient at grain filling time. This is true, however, university research over the past several years is showing phosphorous, potassium, and nitrogen need to be in balance

along with other nutrients a corn plant requires to maximize yield potential. Newer corn genetics with higher yield potential, are showing more uptake of all nutrients as compared to older corn genetics.

In the past, corn growers would apply the fertilizer needed based on what the soil sample shows to attain those higher yields. With these yields, research results are showing an uptake of nitrogen to potassium ratio of 1 to 1 at maturity. Corn takes up more potassium earlier than nitrogen, more is needed earlier than later. The corn plant needs nitrogen for vegetative growth as well as at the reproductive stage, grain fill. In 2015, especially in those areas where excessive amounts of rain fell in June and July, nitrogen was lost and not available to the corn plant when it was needed to maximize yield.

At physiological maturity of corn, the greatest phosphorous accumulation is in the kernels. The corn plant is retaining phosphorous all season long. A typical Nitrogen to Phosphorous ratio for these newer

corn genetics would be a ratio of 5 to 1. Even though crop prices have dropped several dollars and fertilizer costs have dropped slightly, to maintain these higher corn yields, the need to fertilize for higher yields, is just as important as when crop prices were better.

The 2015 growing season is over for most crops. After harvest, prior to recent rains, tillage was done to break up compaction issues and get fields ready for 2016 planting. Many are reviewing their results as well as planning for next year's crop budget. Fertility is the foundation for plant health and food needed to grow big corn yields. Don't just spend the money for nitrogen, go back and review current soil samples and apply the right amount of all nutrients needed to maximizing corn vield potential in 2016. It is more important to have nutrient balance in corn plants, having all nutrients available throughout the growing season, and not limit nutrients that are needed for those higher yields.

### Winter Maintenance is Worth the Effort

Have you ever heard someone say, "What do farmers do in the winter?" As you are aware, there are a lot of answers to this question. Winter is a great time to get ready for spring planting, which will be here before we know it. One of the most important parts of the growing season is planting. It's crucial that your crops get off to a good start and it's important to make sure that your planter is fieldready when the time comes. Planting seed into the best possible growing conditions is a one of the most important tasks of spring field work. A planter in need of some adjustment can result in varied seed placement. uneven emergence, and ultimately a reduction in yield potential.

Check for and replace any parts of your planter that are excessively worn. No-till coulters or disk openers that are worn out will not create the proper seed furrow and may cause poor seed placement. Good seed-to-soil contact is critical in ensuring seed germination and uniform emergence. Emergence that is uneven can cause a loss in yield potential. No-till coulters should be adjusted to operate at the same depth or slightly shallower than disk openers. Seed firmers in

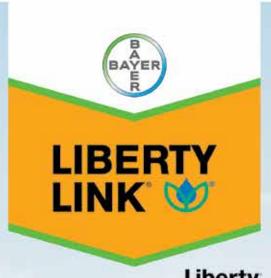
good condition will also promote adequate seed-to-soil contact. Check the chains and sprockets on your planter. Make sure chains are operated at the correct tension and replace any sprockets that are worn as well as chains that are stiff, rusty, or excessively worn. Smooth chain operation is a critical component of proper planter operation and seed spacing. Any hesitation or jerk in the system will result in seed spacing that is not uniform.

One of the most important aspects of planter maintenance is calibration of your planter. Make the necessary adjustments to your planter to make certain it will plant at the population you desire. Broken or worn parts on planter units should be replaced and units should be periodically calibrated. Along with performing maintenance on planter units make sure seed tubes are clean and are not damaged such that they will prevent even seed spacing. Calibration of your planter and units will reduce skips, doubles, and triples in seed placement. Research has shown that skips, doubles, and triples can cause a reduction in yield potential. In the recent publication Corn

Stand Establishment and Planter Maintenance, Purdue Extension Agronomist Bob Nielsen states "Yield data from our small-plot research and from replicated strip trials indicate that about 2.5 bushels per acre are lost for every 1 inch increase in the standard deviation of the plant-to-plant spacings." Uniform seed spacing minimizes competition between plants for water and nutrients and promotes efficient use of sunlight.

Once you've gone through your planter, it's a good idea to test it out before you head to the field. It is important to evaluate a planter under conditions closely resembling those you will find in the field. Keep in mind a gravel driveway in the barnyard may work but it might not accurately resemble field conditions. Evaluate vour planter's performance at the speed you will be operating in the field. Check your planter for smooth operation, make sure seed spacing and depth is even and accurate. Making a few adjustments to your planter this winter will require some time and effort. This is time well spent and it could really pay off in the spring.





We have an excellent supply of LiberyLink® soybeans available.

Call your Area Seedsman or 800-708-CORN for more information.

Liberty



# High-performing Genetics + Excellent Weed Control Real Yield

In the real world, weeds interfere with high yields. The good news is we've got that covered with high-performing genetics coupled with better weed control than Roundup\* on tough-to-control weeds for high yields that deliver.

See the real yield story at BayerCropScience.us.



# Matt Hutcheson, CC roduct Manager hone: 937-414-6784 natt@seedconsultants.com

# **Use Plot Data to Make Sound Decisions**

As harvest is completed across the Eastern Corn Belt, seed companies, universities, and growers will have the chance to compile and analyze data from yield testing. One of the most important decisions a farmer will face all year is deciding what variety to plant and in which field to plant it. To ensure that the best possible decision is made next spring, it is important to spend some time looking at yield data. While reviewing data is critical, knowing how to determine whether it is accurate and useful is equally important. Below are some tips for using data to make sound planting decisions next spring.

### **Look for Replicated Data**

Don't rely on yield results from one strip plot on a farm or from a single plot location. Look for data from randomized tests that are repeated multiple times and across multiple locations. Replications in testing increase the reliability of the data and helps to remove variables that can skew results.

### For strip plot data, was a "tester" used?

Strip plots planted on farms can cover large areas of a field. In many fields in the Eastern Corn Belt there are several soil types. If a plot crosses several soil types how can you be sure it is accurate? By planting a "tester" variety at regular intervals within the plot, you can calculate adjusted yields based on the variability of the tester yield across the plot. The use of a tester minimizes the effect soil type variability has on the plot results to ensure more accurate data.

### Look for consistency

According to Bob Nielsen, Purdue Extension Agronomist, "Documented consistency in yield performance is still the key to success in selecting hybrids that will perform well in your farming operation." When choosing a variety based on plot data, it is important to look for consistent performance—across several plot locations and between multiple years. Choose varieties that consistently performed well in 2014 and 2015, in multiple locations, and different growing conditions.

### **Statistical Significance**

On published data look for foot notes that indicate the least statistically significant yield difference, or LSD. In many plots, the performance of the top 5 or 10 varieties may not be statistically different. Although there are small differences in yield, statistical analysis of the data indicates that all varieties within the LSD have an equal chance of winning the plot.

While plot data can be very useful in making decisions, some plot data is significantly more accurate and reliable. The key to getting the most out of yield data is having the ability to sort through the large amounts of information to identify the data that most accurately and reliably represents varietal performance.

# 2016 SCI Winter Agronomy Meetings

During January of 2016 Seed Consultants will again host several Winter Agronomy Meetings across the Eastern Corn Belt. 2015 was a challenging year that everyone can learn from and SCI's agronomy staff will have a great deal of information to discuss. In addition to a review of 2015, agronomists will address important factors that are currently affecting our customers. What is the best herbicide program to control Marestail? What do I need to know about Palmer Amaranth? Do foliar sugar applications increase corn and soybean yields? Did fungicide applications pay in 2015? Why were leaf diseases on corn so prevalent in 2015? For answers to these questions and more, make sure to attend a Winter Agronomy Meeting in your area.

# DATES AND LOCATIONS:

(All meetings will begin with lunch at 11:30 a.m.)

DATE	LOCATION	RESTAURANT
January 4	Washington C.H., OH	Rusty Keg
January 5	Warsaw, IN	Wyndam Garden
January 6	Decatur, IN	Back 40 Junction
January 6	Seymour, IN	The Pines
January 7	Ottawa, OH	Red Pig Inn
January 8	Hagerstown, IN	Willies and Reds
January 11	Richmond, KY	Golden Corral
January 12	Terra Haute, IN	Rick's Smoke House
January 13	Bellville, OH	Der Dutchman
January 13	Wooster, OH	Jakes' Steakhouse
January 14	Nashport, OH	Longaberger Golf Club
January 15	Brookville, OH	Rob's Family Restaurant
January 18	Tiffin, OH	Camden Falls
January 18	Hillsboro, OH	Ponderosa
January 19	Bunker Hill, IN	Dutch Cafe
January 19	Plain City, OH	Der Dutchman
January 20	Bowling Green, OH	Holiday Inn Express
January 20	Owensboro, KY	Moonlite BBQ



Simply, the Best Value in the Seed Industry <sup>™</sup> SEED CONSULTANTS, INC. Call Today! 800-708-CORN www.seedconsultants.com



Seed Consultants Inc. P.O. Box 370 648 Miami Trace Rd. S.W. Washington Court House, OH 43160

#### **Editorial Board**

#### Stuart Yensel

director of sales and marketing 740-505-0889 - Mobile stuartyensel@seedconsultants.com

Daniel Call, CCA general manager 937-313-7421 - Mobile danielcall@seedconsultants.com

### Bill Mullen, CCA

director of agronomic services 740-505-2022 - Mobile bmullen@seedconsultants.com

### Matt Hutcheson, CCA product manager

937-414-6784 - Mobile matt@seedconsultants.com









Herculex® Insect Protection technology by Dow AgroSciences and Pioneer Hi-Bred. ® Herculex and the HX logo are registered trademarks of Dow AgroSciences LLC. Liberty®, LibertyLink® and the Water Droplet Design are trademarks of Bayer. Agrisure® is a trademark of a Syngenta Group Company. Agrisure® technology incorporated into these seeds is commercialized under a license from Syngenta Crop Protection AG. ® Supreme EX, Optimum, AcreMax, AQUAmax and TRISect are registered trademarks of Pioneer. \*Supreme EX® brand seed is distributed by Seed Consultants, Inc. Roundup WeatherMAX®, Roundup PowerMAX™, Genuity®, Roundup®, Roundup Ready 2 Yield® YieldGard® and the YieldGard corn Borer design are trademarks of Monsanto Technology LLC used under license. Poncho® and VOTIVO® are registered trademarks of Bayer. The information provided within this newsletter is not a substitute for advice concerning your specific situation. The information contained herein is general and educational in nature. Because each situation is different and each recommendation is specifically tailored for each customer, the information contained herein should never be used to determine your course of action. All products are trademarks of their manufacturers. Simply, the Best Value in the Seed Industry™ is a trademark of Seed Consultants, Inc. © 2015, Seed Consultants, Inc.





























# Between the Rows Updates from Daniel Call, general manager

I believe many of you would agree this year has tried a grower's patience clear up until harvest. I recently spoke with a customer who told me his corn yield averaged from 40 bu/ac up to 215 bu/ac. The 215 bu/ac field was his highest yield ever on that farm. 2015 will definitely be remembered as a year with some of the most dramatic swings and variability in recent memory

So what have we learned from 2015? Tile and good field drainage pays! Everything else takes a back seat. Secondly, timely planting is imperative to giving your crop the best opportunity to reach its maximum potential regardless of the growing season. The third lesson learned has been applying nitrogen in

a manner which allows it to be plant available up through grain fill will allow you the optimal chance at hitting peak yield. Fourth, hybrids with strong plant health will win in years like 2015 with saturated soils and wet conditions through grain fill. Lastly, hybrids and varieties bred for the eastern combelt and tested in the eastern cornbelt will shine in years like 2015.

We are excited about the performance from some of our newer products in 2015. These products have shown excellent performance over the past two diverse years. Newer soybean products such as: SC 3325LL™, SC 3374LL™, SCS 9256R™\*, SCS 9295RR™\*, SCS 9335RR™\*, SCS 9385RR™\* and SCS

9456SR™\* brands, 2015 has also proven we have added a lot of strong performing eastern cornbelt hybrids to our lineup in: SCS 10HR43™\*, SCS 1066YHR™\*, SCS 1085YHR™\*, SC 10AGT96™, SC 11AQ15™, SCS 1125YHR™\*, and SC 11AGT43™ brands. Performance from the previous listed hybrids and varieties gives us tremendous optimism about our lineup as we move into 2016.

The great news is each year is different. Although we know there will be a different set of obstacles next year, the lessons we learned from 2015 and then put into practice moving forward will make us all better producers.

### **DON'T MISS OUR WEEKLY EMAIL NEWSLETTER!**

The SCI free e-newsletter comes via e-mail every Monday. The newsletter is packed full of current agronomic topics. Subscribe by sending your e-mail address to matt@seedconsultants.com or by signing up on our website at www.seedconsultants.com.



