

John Deere Precision Ag Technology



Innovative solutions.
Exceptional support.

John Deere Precision Ag

A profitable investment all year long

From planning to harvest, only John Deere seamlessly connects machines, people, technology, and insights to give you an advantage. And while other manufacturers bolt on equipment that may or may not work throughout your production cycle, John Deere develops precision technology specifically for the tractors, combines, sprayers, planters, hay and tillage products you own... all supported by a single trusted source: your John Deere dealer.

Start with automatic guidance. AutoTrac[™] unlocks more efficiency and more profits throughout the year. In fact, studies show that AutoTrac guidance can pay for itself in two years or less, thanks to reduced input use.*

Next, vary the application rate of seed, fertilizer, and fungicides/herbicides where they're most effective, reducing waste — doing it automatically, based on a prescription that you or your trusted advisors create and send wirelessly to your machines.

Stay on top of your equipment, your operators, and your agronomic data from your laptop, smartphone or tablet. And use the **Operations Center** to collect all this valuable information quickly and easily, so you can analyze it to make better decisions, or share it with your trusted advisors.

The promise behind our plan is simple — to help you make more money, year after year. It's easy. It's profitable. And it's all from John Deere.



FIELD PREPARATION

Control input costs, reduce waste, increase yield potential.

- Section Master Pro[™] Plus
- iTEC[™] Pro
- iGrade[™]
- Implement Detection
- Post Pro
- AutoTrac
- Documentation

1

See pages 16-17

PLANTING AND SEEDING

Control input costs, reduce waste, increase yield potential.

- Section Control
- iTEC[™] Pro
- Section Master[™]
- Active Implement Guidance
- Rate Controllers
- Implement Detection
- Post Pro
- AutoTrac
- Machine Sync

2

See pages 18-21



CROP CARE

Take application operations to a new level of productivity.

- Section Control
- Rate Controller
- Implement Detection
- AgLogic™
- Mobile Weather
- Boom Prep
- AutoTrac
- Field Connect
- Machine Sync

3

See pages 22-29



HARVESTING

Harvest more acres with less effort.

- AutoTrac™ RowSense™
- Harvest Doc
- HarvestLab™ Sensor
- Constituent Sensing
- Machine Sync
- Harvest ID, Cotton
- Harvest Mobile
- Active Fill Control

4

See pages 30-39

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CROP CARE

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John Deere Operations Center

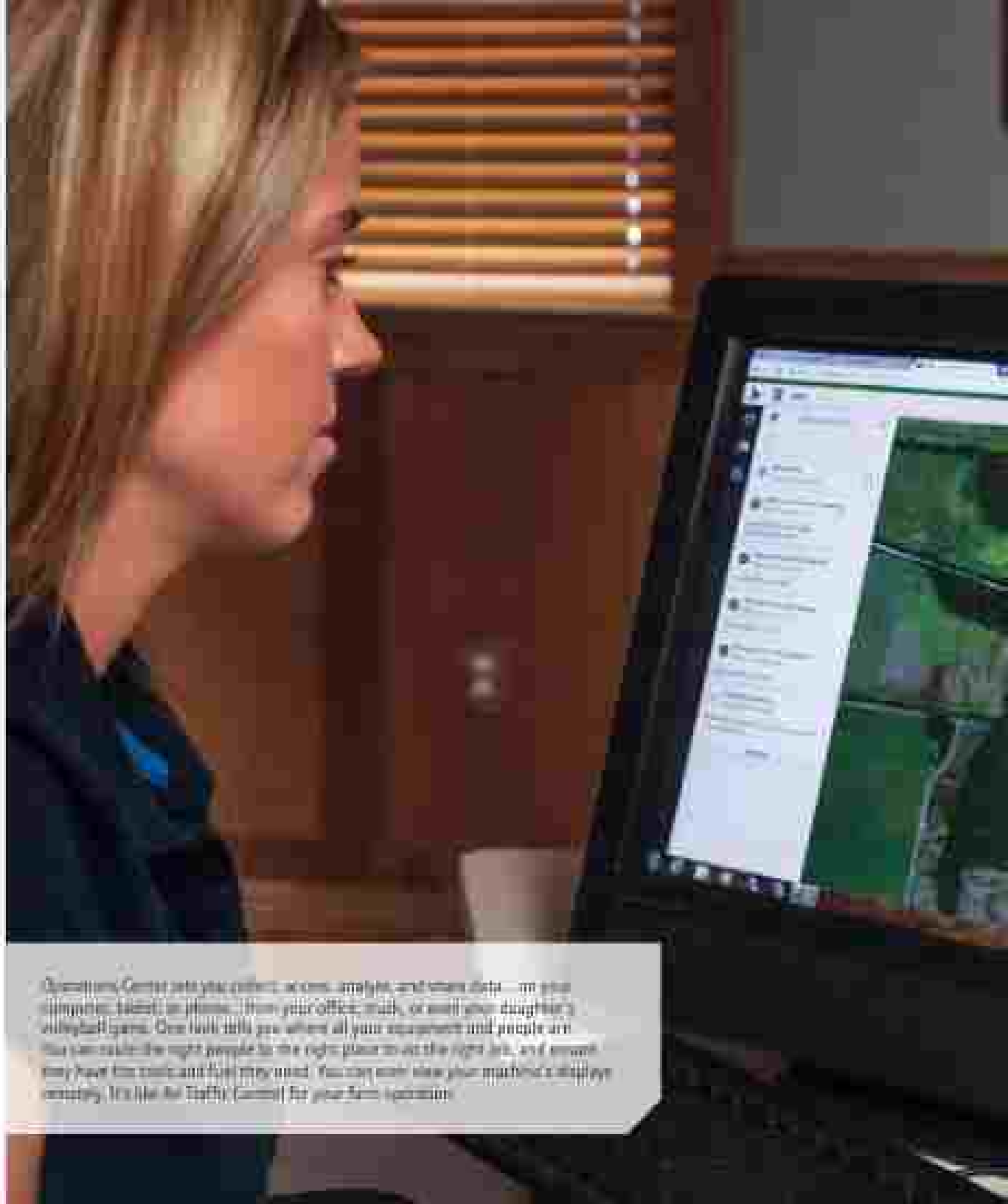
Collecting data on your operation is something you're probably already doing. But that data is of little use to you if it's difficult to access or view. John Deere Operations Center changes all that. It's a centralized online portal that lets you access, view, archive, manage, and share your operation's information.

You can see average yield, total yield, average moisture, seeding variety and rates, machine location and more. The Field Analyzer tool lets you compare these layers side by side. And you can easily share planning, application and yield data with trusted advisors and receive variable rate prescriptions from those advisors.

You can effortlessly send those to your machines in the field. Once you're done with an operation, all that information is waiting for you in the Operations Center to analyze to make improvements for next time.

John Deere gives you multiple ways to transfer data to the Operations Center. JDLink Connect is the easiest and most powerful (see page 16-17); you can also use onboard apps such as SeedStar Mobile (page 19) or Harvest Mobile (page 31). You can manually transfer data with a USB drive, or use Mobile Data Transfer (with iOS or Android) to move data from older or non-John Deere equipment.

The sooner you start using the Operations Center, the faster you can begin enjoying the benefits of the data you're already collecting. It's simple, it's user-friendly and it just makes sense. See your dealer for details or visit MyJohnDeere.com today.



Operations Center lets you collect, access, analyze, and store data—in your clincher, tablet, or phone, from your office, truck, or even your daughter's wedding party. One look tells you where all your equipment and people are. You can call the right people to the right place at the right job, and ensure they have the tools and fuel they need. You can even view your machine's display remotely. It's like Mr. Tuffy (smile) for your farm operation.

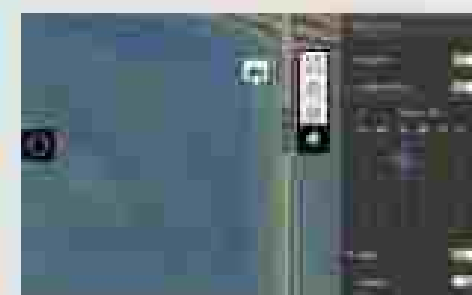
JDLink™ Connect*

JDLink Connect Features & Benefits

That uses satellite communications and a GPS antenna. Machine cost and location data are collected by the computer and wirelessly transferred to a server so you can use the JDLink Center to manage your fleet from the comfort of the cab. See pages 6-7.

Create ever-ready files. Instantly creating files and sending to the machine via wireless data transfer or manually on a USB stick.

Location History lets you view the performance of a machine over a 24-hour period for up to 90 days. Monitor location, ground speed, heading, and machine state information for every machine.



Remote Display Access lets you add your trusted partner to remotely view an operator's screen, so you're always aware of what's going on within walking distance of the field. Your dealer can also receive alerts from the machine's display screen, as well as monitoring performance and location. See pages 14-15.

Field Analysis makes it easy to compare all the data for your operation. Lay the map side-by-side to evaluate yield impact. For example, then send location information, including the field's name, to the field's log. If you need help with analysis, you can send your data files and let the dealer's partner help you.

John Deere lets you connect to all the information with built-in the JDLink Center that syncs with the JDLink app on your mobile device, which keeps your operators on track and you informed.

*An additional download is required for machine-to-machine communication. See dealer for details. All data is subject to change without notice. See dealer for details. © 2014 John Deere. All rights reserved.

JDLink™ Connect

The next-best thing to being in the cab.

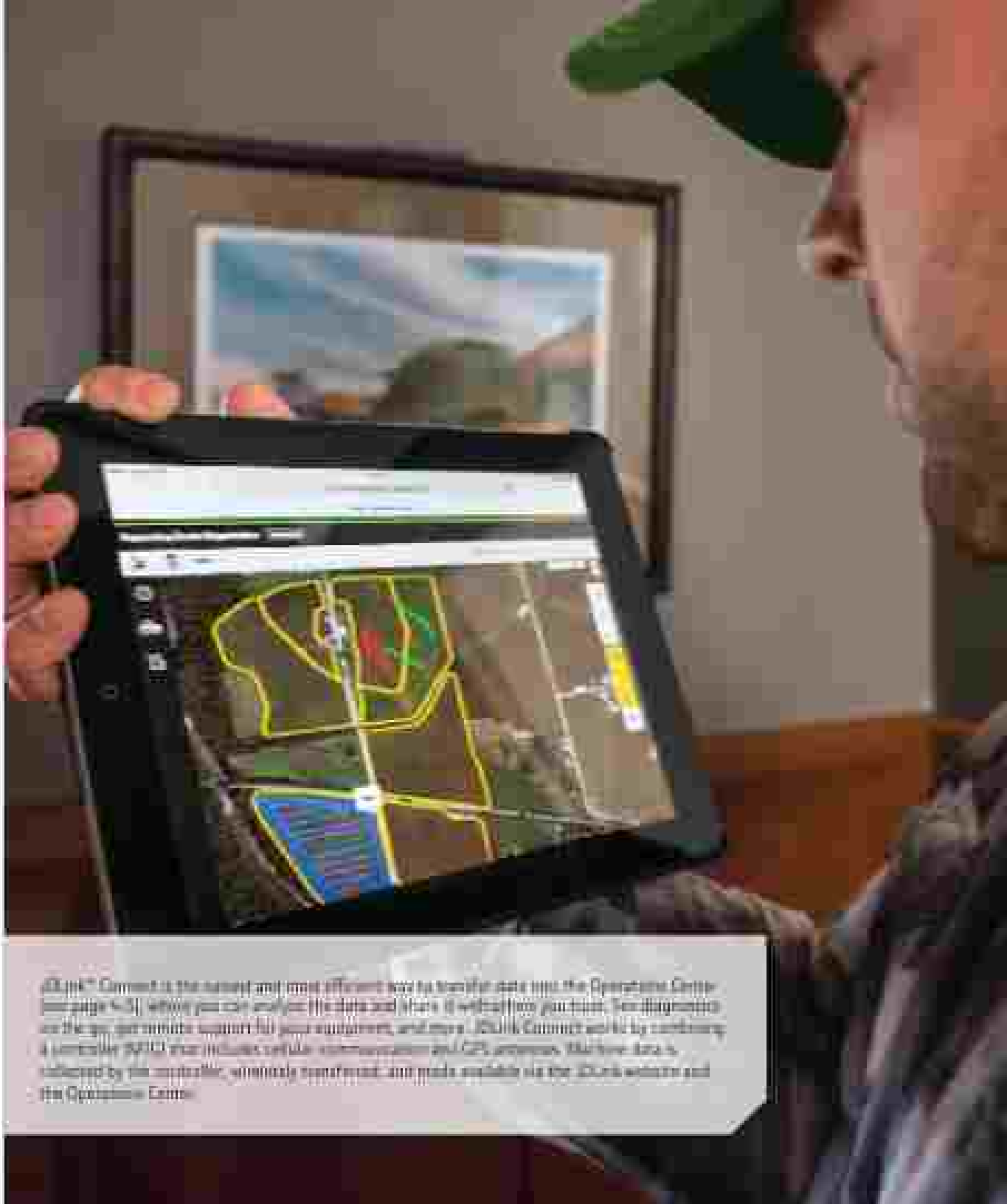
Now, you can manage your operation in real-time without being in the cab. Or, take your operation to the next level of productivity and efficiency without leaving the office.

Simply put, JDLink Connect is a connection between you and your machines. You can view what they're doing and where, including fuel usage. Protect your machines with geofence and curfew alerts. Monitor diagnostic codes remotely to identify small problems before they become big problems. Send setup files, prescriptions, and documentation files to your operators in the field. Share data with your trusted advisors.

An optional satellite modem is available for areas where cellular signals are not available or reliable. JDLink will still connect via cellular connection unless a connection cannot be established. Then JDLink will switch over to satellite mode.

See your John Deere dealers for the long list of John Deere self-propelled machines available with JDLink Connect, including:

- 5M, 6030, 6R, 7030, 7R, 8030, 8R/RT, 9030, and 9R/RT Tractors
- T760, CP690, and C5690 Critical Pickers and Shoppers
- 8000 Series Self-Propelled Harvesters
- S, T, and W Series Combines
- 4630, 4730, 4830, 4940, 54030, 54038, and 54045 Sprayers
- Sugar Cane Harvesters



JDLink™ Connect is the easiest and most efficient way to transfer data into the Operations Center (see page 5-3), where you can analyze the data and view it with maps you trust. See diagnostics on the go, get remote support for your equipment, and more. JDLink Connect works by combining a compatible P250 that includes cellular communication and GPS services. Machine data is collected by the controller, wirelessly transferred, and made available via the JDLink website and the Operations Center.



JDLink helps get the right machine and location power to the right location in the operation. That can mean the difference of getting more work done before the same piece of equipment. JDLink's ability to connect to a better location about availability. JDLink helps your support vehicle location, used and located by showing you the location of the machine.



By connecting with your device and using JDLink, remote diagnostics for your equipment is a reality. Your dealer can use JDLink to receive diagnostic trouble codes and performance data to identify problems or maintenance needs before the machine leaves the dealership. The benefits: better efficiency and improved uptime. See page 34-35.



Locate location of the power the JDLink can provide to your device. No need to put up your device. Just plug in your device and you're done.



For more information on how you can get the most out of your JDLink, visit www.jdlink.com. You can also visit and monitor a broad array of data with the JDLink's monitoring of all of the data and the JDLink system.

3 WAYS TO SUBSCRIBE TO JDLINK™

1

JDLink CONNECT

JDLink Connect provides the most information to enhance management: funding documentation from the GreenStar™ 3 2650 Display, Location History, remote diagnostics, machine performance, and efficiency metrics can only be found with this offering.

2

JDLink EXPRESS

JDLink Express focuses on some of the key information that is required for daily operation like location, engine hour usage, and alerts for unexpected movement of powered equipment or asset outside of normal working hours and boundaries. JDLink Express also allows you to proactively manage equipment maintenance and repair.

3

JDLink LOCATE

JDLink Locate allows the user to keep an eye on assets or equipment both powered and non-powered that could be easily misplaced during daily operation. A battery-powered device reports location of the equipment or asset twice a day.

AutoTrac™ Precision Guidance

Take guidance to the next level

Add up everything you spent last year on inputs. Now divide by 10. That's what you could save each year with GPS-based guidance. That's right – university research* shows an average of **10% reduction of inputs** in planting and fertilizing. Add automated section control and save 20% or more. Have irregularly shaped fields? You'll save even more.

In fact, these studies show that automatic guidance can pay for itself in two years. Or fewer. Factor in how relaxed you'll be at the end of a long but hands-free day in the cab, and only one question remains: Why aren't you using AutoTrac?

10% LESS INPUTS

in planting and fertilizing with GPS-based guidance

AutoTrac Guidance can save you time and money during harvest operations. Or tillage. Or seeding. Or spraying, or haying, or chopping, on your new John Deere machines, older John Deere machines, or even some other brands. It's easy to set up and operate, and it's supported by a single trusted source: your John Deere dealer.



Combine starts with a Starfire Receiver. This can deliver the accuracy you need, ranging from plus or minus 5 inches (recommended for many latest crop applications) down to just-inches accuracy with RTK.



John Deere Martin Sync allows a combine operator to automatically control the location of a header and grain cart while harvesting. In the go, which is not only a time saver, it lets you put more grain in the cart, with less spillage.



With the addition of Cover Age Mapping, with John Deere AutoTrac, Martin Sync allows you to run multiple machines in the same field at the same time with precision accuracy.



Take advantage of AutoTrac in older machines and some competitive machines with AutoTrac Universal and AutoTrac Controller. See your John Deere dealer for details and the long list of compatible machines.

Add a Universal™ 2630 display, which allows you to run AutoTrac, as well as a host of other precision farming applications. Free software, and let AutoTrac take over the driving. Over the wheel at any time to secure control. It's easier than any. You can also run AutoTrac from the new CommandCenter Display (M2630 and new M2630 and M2630) or from the new M2630 (M2630).



AutoTrac™ RowSense™

Reach the new world of a hands-free harvest

AutoTrac RowSense is the next step to pinpoint accuracy in corn harvesting. Using satellite correction data from the Starfire™ receiver with feeler data gathered from row sensors enables you to operate hands-free in corn, even in windy conditions, curved passes, and downed corn.

AutoTrac RowSense is available on a long list of combines and new and older John Deere and non-John Deere corn heads, as well as on select John Deere cotton pickers, cotton strippers, and self-propelled forage harvesters. See your dealer for compatibility details.

Pivot Pro

Pivot Pro allows automatic guidance in defined concentric circles in fields with center-pivot irrigation systems. Pivot Pro brings the value of AutoTrac™ to producers using center-pivot irrigation, which includes reducing overlap and operator fatigue while increasing productivity and profitability.

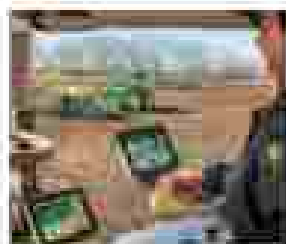
John Deere Machine Sync

Increase efficiency by showing multiple machines in the field at the same time. John Deere Machine Sync allows coverage map sharing and guidance line sharing to improve planting, seeding, spraying, harvest, and nutrient application. This increases efficiency in the field, because two machines can work simultaneously with each operator having immediate access to coverage maps and guidance lines to ensure complete field coverage.

It's simple to set up and use, even for inexperienced operators. And the full-color C53 26.0" Display provides all machines in the network visibility to real-time logistics and coverage data for every machine in the network.



John Deere Machine Sync provides operators of combines and tractors logistical information never before available. From a single map view on the UserView™ 3.0 26.0" Display, operators are able to view up to ten machines operating within a single network.



When you pair Farmer Command with Machine Sync, you can run multiple people in the same field and save time and cost. Synced tractors automatically turn sectors off and on based on another machine's coverage so you have peace of mind knowing that you didn't waste seed or herbicide in overlapping zones.



Here's how Machine Sync works during harvest:

From the combine cab, a single glance at the display shows you where all the combines and tractors are in your network. As the combine operator, you can send a "ready-to-harvest signal" and the software populates the combine location and bin fill status to the cart operator, who can determine how quickly the combine will need to unload, prioritize which combine to go to first (when multiple combines are in the field), or call in additional carts as necessary. This can reduce wait time, fuel consumption, and over-ground compaction.

When the tractor and grain cart pull alongside your combine, Machine Sync lets you control the tractor's speed and location from the combine cab to move the movements of the combine as it unloads. This reduces spillage and operator stress, and ensures maximum harvesting uptime for the combine.

When used in a harvest operation, coverage map sharing allows a machine to more accurately calculate harvested area by using another machine's coverage to enable overlap control. Machines can share coverage using an NTR or modular telematics gateway (MTC) 3G solution.

iTEC™ Pro

How do you make AutoTrac™ even better? With Intelligent Total Equipment Control. iTEC Pro is an innovation that coordinates tractor and implement functions with and turns. Plus, this system positions the tractor and implement correctly for the next pass, which increases both accuracy and efficiency.

Here's how it works:

1

As you approach your field, iTEC Pro works with IntelliSteer guidance through your GreenStar 3 display to automatically...



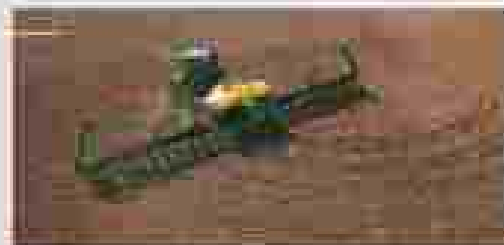
2

Now the system raises the implement and turns the tractor...



3

Next, engage the implement, and resume planting speed at half the time.



iTEC Pro is used with the John Deere 8000 Receiver and GreenStar 32100 Display.

Active Implement Guidance

Precision counts – especially when planting or working potato fields, strip-till corn or cotton, or specialty crops. That's why you need Active Implement Guidance. It's an active implement guidance system that keeps your tractor and implement on the same A-B line. So not only do you get increased accuracy for input placement, but also unmatched repeatability at the implement. The benefits are clear: Reduced input costs, less disturbance of post-emerged crops, and easier operation, especially on guess rows. Active Implement Guidance works with Shared Signal when using a Scalfire 3000 Receiver.



Active Fill Control

Available on 8000 Series Self-Propelled Forage Harvesters, Active Fill Control uses cameras to automatically detect the crop transport truck or trailer and fill it evenly without spillage. See page 32 for details.

The do-more display: The GreenStar™ 3 2630 Display

Get more capability, more reliability, and more visibility.

The GreenStar 3 2630 Display offers a long list of high-value features, including a color touch-screen with lightning-fast operating speeds, video capabilities, operator lockouts, and improved field locator functionality. In a highly reliable package... all supported by your trusted John Deere dealer. Just take a look at the many features the GS3 2630 Display boasts:

GREENSTAR 3 2630 FEATURES

- Wireless Data Transfer
- Remote Display Access
- Improved touch-screen display
- Access Manager (operator lock-out)
- Video capability
- USB data port
- Stand-by mode
- Documentation
- On-screen mapping
- AEP (EAS) capability
- Run singular or multiple applications at once
- Customizable home page

DOCUMENTATION FEATURES

- As-applied maps
- Color coverage maps
- Prescription coverage layout
- Visual flag indicators
- On-screen keyboard
- Dual cameras
- Variable rate prescriptions

STANDARD GUIDANCE FEATURES

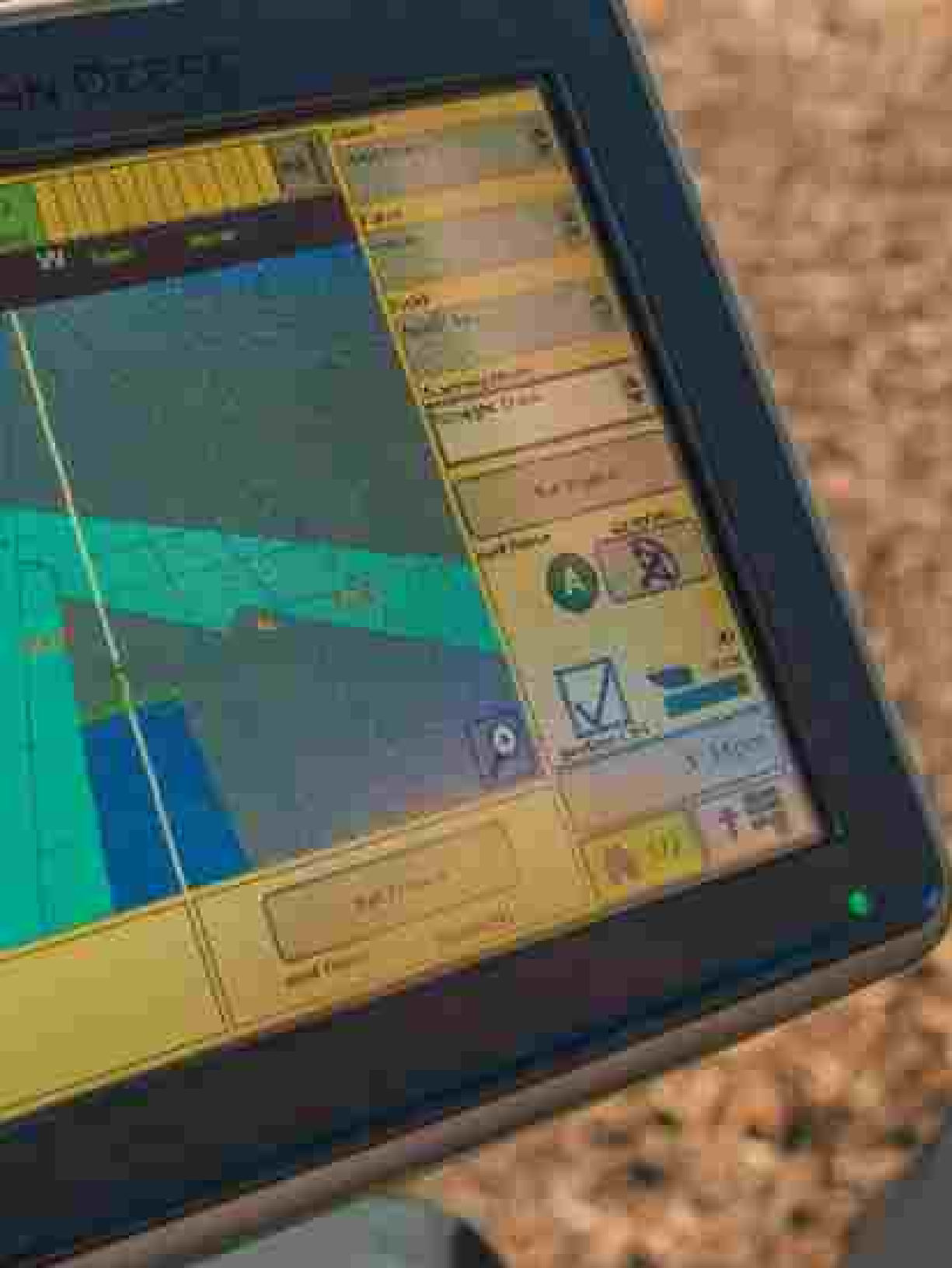
- Yieldable headland functions
- Boundary proximity indicator
- Perspective and overhead views
- Multiple A-B lines per field, including straight track, swap track, circle track, A-B curves, adaptive curves, and cut-finder
- Custom path accuracy indicator
- Parallel Tracking

Remote support & more. Just take a phone call along with your GS3 2630 Display and iClone Connect. Your dealer can remotely access your display and quickly determine the problem. See pages 24-25 for details.

ENHANCE YOUR GS3 2630 DISPLAY

- AutoTrac™: Precision guidance
- AutoTrac RowSense™: Precision guidance for harvesting
- Machine Sync Coverage Map Sharing: Automated recording on-the-go and real-time combine and grain cart location
- John Deere Section Control™: Automatically turn hydraulic and PTO sections on and off
- TEC™ Pre-Determined Headland turns for tractor and implement turns and headland turns
- Surface Water Pro™ Plus: Laser Area Index and advanced mapping capability
- Remote Display Access: Remotely access your operator's display
- Wireless Data Transfer: Easily move data on and from your machines to the Operations Center





Integration has never been easier than the Case CommandCenter™ available on MY IA and newer 2P and 3P and Tractors and MT15 and newer 4P and 5P Tractors. The redesigned user interface works like a tablet – simple to read and incredibly easy to navigate. The Case CommandCenter ActiveTrac activation includes under-truck and has the best value proposition in the industry. Ask your dealer about the best operating experience with the Case CommandCenter on new tractors.



The GreenStar® 21000 Display is a 7 inch full color display with a simple interface and smaller point of view. You can easily toggle between multiple farm pages to monitor more than one in field activity and navigate through fields with greater control and confidence.

A beacon for profit, at every level

Just as there are different agronomic practices, operators require different accuracy levels. Using our own StarFire® network we can provide you with a reliable, accurate, and repeatable signal customized to your needs, delivering the accuracy and control you demand.

If you have heavily treed fence lines or hilly ground, then you need the StarFire® 3000 Receiver. It delivers outstanding reception in shaded conditions, holding a signal longer and reacquiring it faster than any previous model. That means maximum up-time and accuracy for you.

But that's not all. The StarFire 3000 also provides improved performance in sloping terrain, as well as increased satellite availability through GLONASS, the Russian satellite constellation. Finally, the StarFire 3000 offers the ease of over-the-air receiver activation. Add it all up, and you have a receiver that's made not just for the shade, but for any conditions you can throw at it.

StarFire 3000 Receiver

With this receiver you can get within 1 cm precision guidance at the accuracy level you need at the time. From 50% to 100% with only repeatable accuracy of 3 cm. The StarFire 3000 Receiver goes with you.



SIGNAL ACCURACY LEVEL

SP1: 15-30 cm

SP2: 4-2 dm

RTK: 1-3 cm

SP1 and SP2 accuracy levels are achieved with a 100% signal lock time maximum of 10 seconds, within 10 seconds, 99.99% of the time.



Customized signal accuracy

John Deere offers its own differential corrections through the Starfire network. Developed in 1998, the Starfire network was the world's first Global Satellite-Based Augmentation System (GBAS) capable of decimeter real-time accuracy.

Everyone uses the same raw satellite signals, but differential corrections are another story. Because John Deere owns its own network of reference stations and processing hubs, users do not have to rely on Wide Area Application Services/European Geostationary Navigation Overlay Service (WAAS/EGNOS) or go to a third-party differential corrections service.

SF1. The John Deere-exclusive SF1 differential correction signal delivers ± 1.9 inch point-to-point accuracy, allowing you to take your hands off the wheel and increase performance in many farming operations. Ideal for tillage, seeding, and broadcast spraying.

SF2. If you need higher accuracy, you can upgrade to SF2, which delivers ± 1.2 inch point-to-point accuracy, to help you stay productive and focus on needed tasks while traveling down the field. Ideal for tillage, row-crop planting, seeding, self-propelled spraying, and broadcast harvesting.

RTK. Use cropping practices that require the ultimate in accuracy? Then go with RTK. It provides ± 1 inch accuracy and repeatability point-to-point. Take advantage of a John Deere dealer-owned RTK network, or set up your own. Ideal for sub-surface irrigation lines, high-value crops on beds and narrow strip-till furrows.

Two John Deere RTK Radios. The John Deere AGS RTK Radio (FCC or Industry Canada license required) improves your signal coverage and maintains RTK's one-inch accuracy, even in challenging terrain or dense foliage conditions. The John Deere S70 RTK Radio is still the ideal choice for normal conditions.



Dealer-owned RTK Networks

Hundreds of millions of acres are covered and supported by John Deere dealer-owned RTK networks. And because the networks are supported by your local dealer, you can speak with the confidence that someone you know and trust will be there to answer your call when you need help.

Prepare the soil for next year's planting season

No matter what soil conservation practice you follow, your John Deere dealer can help you be more efficient in meeting your goals to size and distribute residue, fracture the soil, and level the soil profile to achieve an optimum seedbed.

Your dealer will start by recommending tillage tools to meet your goals, but it takes more than just having the right tool. They can make sure the right tool is properly set up and leveled for operation. They can also diagnose a trouble area left behind the tool, whether that was due to the machine or operator.

Your John Deere dealer can go to the next level of support by managing machine health by proactively monitoring iLink alerts and with Remote Display Access they can remotely diagnose potential concerns by reviewing settings on the GreenStar 3 2630 display – all in an effort to keep you up and running, allowing you to be more productive at the end of the day.

If you're running a 2770 Combination Ripper, iMON² technology lets you easily dial in accuracy to 1/10th of an inch and adjust pressure up to 100 psi – all from the comfort of your cab. And as it works, you can watch that residue



before you stop, so you can ensure implements are set up exactly the same from year to year. Add Implement Detection to your equipment and your operator will no longer have to remember their set settings and efforts.

When a piece of equipment with Implement Detection is connected to a tractor using the GreenStar 3 2630 Display, you get a notification on the screen indicating the implement's name, correction type, and other settings you've made previously. You can simply accept the settings and start working...or make adjustments as necessary.

The next time you hook up your tillage equipment, the system remembers the last settings you used, saving you valuable time and letting you get to work faster.



The GreenStar 3 2630 Display makes it easy to determine if your residue practices have a major flow means you can easily compare different practices to yield maps to see which had the best results.



iGrade™ – Automated Water Management

For an advanced approach to leveling, ditching, grading, and plane generation, choose iGrade. This application automates the hydraulic commands of a scraper blade or pan, making your water management practices hassle-free. iGrade also automates Surface Water Pro™ Plus, so ditching is even easier. Talk to your John Deere dealer to learn how iGrade can create cut/fill maps for your operators, ensuring best working efficiency.

The Distance Trp feature lets you engage the tractor's hydraulics based on distance traveled – a real advantage when creating furrows in headlands.

Surface Water Pro™ Plus

Build levees and ditches easily – on lasers required. This software lets you see everything on your GreenStar™ 3,3500 Display. One person can work a field in less time, reducing fuel and labor costs.

The Surface Water Pro Plus system allows you to view the tractor left or right to keep the water consistent. The laser track is recorded so you can use AutoTrac to automatically follow the correct path the next time you're in the field.



Be ready for any kind of planting season

Whether you have a perfect window for planting or the shortest one yet, you can get it done with John Deere. Your dealer can verify that last year's data is cleared, that fields, crop varieties, and prescriptions are loaded, that seed meters and variable rate drives are calibrated, and that data is being accurately collected. Talk to your dealer about coordinating your planting setup information from your machines to the Operations Center.

If you have operators who need a refresher course on equipment operation, ask your dealer about a start-up assistance plan. With remote support, your dealer can also see what's going on in the cab.

Spend less time setting up your implements or trying to remember what adjustments were made last time. Implement Detection automatically populates implement and task settings from the last time the implement was used.



Get things done with John Deere plant accurately at speeds up to 7.0 mph (11.2 km/h) in this system. And transfer critical seeding data to your home office even faster with Wireless Data Transfer. The 2630 2630 Display makes it easy to download all your seeding data, including prescriptions, for later analysis. For instance, compare different rates or varieties to your map to see which had the biggest impact. And our app shows exactly where maps to use at home.



SeedStar Mobile™

Planting windows are getting shorter, and seed costs aren't going down... so it's vital to make every seed count. SeedStar Mobile makes it a whole lot easier.

One glance from your tractor seat gives you a wealth of information on a row-by-row basis. You can see skips or doubles instantly. You'll have confidence that your planter is performing at optimum levels, and if it isn't, you'll know which row unit needs attention. You can see fluctuations in seedling as they occur. And, most important, you'll have the information you need to correct things and other issues, quickly, which is a lot better than running 30 or 40 minutes and covering a big chunk of acreage before you notice something's wrong, or jumping out of the cab and digging in the row to make sure everything is well.

Customize the screen's dashboard to see the variables most important to you. You can choose from actual population, singulation, seed spacing, CO₂, applied downforce, soil quality, gauge wheel margin, variety, and more.

Get more out of your investment in seed and time. SeedStar Mobile makes it easy. See your dealer for details today.

Don't leave yield in the field

As input costs continue to increase, minimizing passes through the field and overlaps has become more important. John Deere offers tools to keep you in control of your costs.

Section Control lets you reduce input costs by turning sections on and off. Whether on sprayers or planters, by shutting off sections where product has already been applied or planted or when crossing over waterways. Section Control helps to reduce input costs and environmental impact. Paired with AutoTrac[®], you can eliminate skips and overlaps, reducing your seed or input costs and increasing yield potential.

On planters, add **RowCommand** to place seed only where you want it, saving 2-8% in seed usage.

SectionCommand, available on all tow-behind and tow-between 1910 All Cuts, controls output from all meters on the cart in up to eight sections.

John Deere makes it easy to vary seed and fertilizer rates based on field types and conditions, or to setup management zones for best rows or hybrids. Explore your planter with RowCommand[™] to optimize inputs and raise seedling costs.



Machine Tools allow precise navigation and position the driving 10 inches (flaring, seeding, spraying) to more accuracy. This means efficiency in the field. The dual 10-inch displays can easily be switched easily with each monitor flaring, seeding, spraying, the coverage map and guidance lines to ensure complete field coverage. The Machine Tools system with Section Control to ensure you're not overfertilizing, spraying, which means you'll save money!



Section Control is versatile and adaptable. It can be used to provide producers with the benefits of John Deere Section Control throughout multiple operations and seasons. In addition to letting you control planter units to deliver seed only where you want it (top left), you can also control planter down sections to reduce inputs on waterways or burn areas, and to increase depth (top right), control implement height when applying nitrogen or other inputs (bottom left), and even control planter bars (bottom right).

Take control of your input costs with John Deere Section Control and AutoTrac™. John Deere Section Control provides automatic section control for the entire width of the machine and allows individual sections on and off.

GreenStar™ Rate Controllers

Add new capabilities and better as-field performance to your GreenStar 3 2630 Display without the cab clutter. Rate Controllers allow your display to integrate with many implements, such as nutrient applicators, sprayers, herbicide applicators, liquid fertilizer applicators and planters. They also help you accomplish rate control and map-based prescriptions.

The GS Rate Controller is a component that allows the GreenStar display to integrate with many implements, such as non-John Deere pull-type sprayers, anhydrous ammonia applicators, liquid herbicide spreaders, liquid fertilizer systems, and some planters.

Rate Controller Dry is a component that allows the GreenStar 3 2630 Display to integrate with non-John Deere self-propelled and pull-type dry box spinner spreaders and multi-tank air carts.

The GS3 2630 Display lets you capture where you applied nutrients and pesticides, plus the rate, and even the time. This improved record keeping is a real plus at planning time, as well as helping you comply with regulations.





Equip your 2510D Applicator with the AccuFlow Water Control Kit and apply anhydrous and dry simultaneously. See page 21 for more information on Raven products.



Liquid or Dry: John Deere Delivers

As input costs have increased, minimizing the number of passes taken through the field has become more important. CE[™] Rate Controller helps you accomplish rate control and map-based prescriptions. Rate Controller Dry has the capability of controlling a dry box with up to four product bins and spinners.

John Deere Mobile Weather

Mobile Weather uses a sensor to display and document real-time weather on the GreenStar™ 2630 Display, including wind speed and direction, Delta T temperature, and relative humidity.

Unlike other systems, which force you to stop spraying, climb out of cab, and use a hand-held device to check prevailing weather conditions, Mobile Weather lets you make in-cab product application decisions based on location-specific data.

You can also input your own spraying parameters into the system and receive notifications when the present conditions are outside these preset parameters.

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Joining forces to bring you more precision

Sometimes, in doing business, you find an opportunity to work with another company to carry products that complement John Deere equipment. Your John Deere dealership now carries a select group of **Raven Industries** precision products to help you improve the efficiency of your nutrient and chemical application.

1

Raven AccuFlow™ Vortex or AccuFlow Single Cooler is a trusted NPS application system that delivers superior accuracy, speed of operation and reliable results. AccuFlow is an intrinsic part of the John Deere NPS system that ensures your crops get the NPS they need where they need it. AccuFlow Vortex cooler allows more application of anhydrous at faster speeds and cooler temperatures.



2

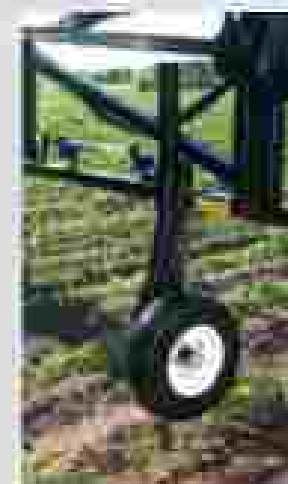
Raven Silablock™ Pro is an IS2000 direct injection system that improves efficiency when spraying chemicals or applying nitrogen stabilizers with anhydrous ammonia (NH₃). With this system, you can spend more time in the field and more time asleep per day, ultimately saving money, effort, and time.



3

4

Raven AutoBoom™ PowerGlide Plus™ and UltraGlide™ maintain height of your boom to maintain a more uniform spray coverage and still less wear and tear on the boom. PowerGlide Plus uses wheel sensors to control boom height. UltraGlide uses ultra-sonic sensors to control boom height.



Raven Industries, Inc. Raven Pro, AccuFlow, AccuFlow Vortex, Silablock Pro, and UltraGlide are trademarks of Raven Industries, Inc. and John Deere.

John Deere Field Connect™

You already know that moisture levels vary from field to field and plot to plot, but knowing when yield-robbing variances occur isn't as easy to predict. Now it is with John Deere Field Connect in-field monitoring. This straightforward solution helps you pinpoint where crops thrive, resources are protected, and profits soar.

Intuitive and easy to use, John Deere Field Connect comes with the full support of your John Deere dealer. Field Connect uses field-installed probes to monitor moisture levels at various depths. It then sends the information to the web-based interface where you can see the data on your computer or mobile device.

Additional environmental sensors are available to monitor temperature, humidity, wind speed and direction, and also to measure rain and leaf wetness. At the office or in the field, you and your John Deere dealer can instantly see if your soil moisture levels are balanced and decide what measures need to be taken. Without delay or guesswork, you can advise your crew to make the adjustments needed to protect your yields and reduce costs.





When they do, our customer care team is here to help. With the assistance of our specialists, you can get the John Deere Field Connect solution installed in one day or the following week. The John Deere dealer. Armed with the resources to provide any support need and backed by the expertise of a company around the world, John Deere dealers can provide local, experienced dealer support to meet the needs of their producers.



And now you can stay connected to your John Deere with Field Connect Mobile. Available on the App Store or Google Play, supported with Android, Field Connect Mobile lets you quickly monitor soil moisture levels and soil environment sensor measurements. You can also add other farm management apps, and get hardware status for your Field Connect monitoring equipment.



Wireless radio lets you install up to eight different probes in different parts of your field, tied to a single gateway. Not only does this significantly reduce cabling costs, it gives you a much clearer picture of your field, including ground conditions that may require different irrigation strategies. With 4G coverage, you can install up to eight probes within a mile of a gateway, with another coverage mile to 2 probes within a mile.

The John Deere Field Connect® solution offers optional environmental sensors to enable producers to make decisions with site-specific information pertaining to the environment.

Available sensors collect information on air temperature, soil temperature, solar radiation levels, and precipitation. This information can be used to calculate many measurements that aid in determining depletion rates of soil moisture, timing for field applications, and field preparations for various activities. One calculation is reference evapotranspiration. Calculated from environmental sensor values, reference evapotranspiration (ET) has been shown as a daily value on the landing page. This value can be viewed as a data layer on the graph, allowing for trending and historical data display.

Choose from three probe lengths. For shallow-rooted crops, the 0.5-m (1.6-ft) probe is available, offering a four-sensor configuration. Utilized for most row-crop solutions, the 1-m (3.3-ft) probe provides a five-sensor configuration. Designed for deep-rooted crop types, our 1.5-m (4.9-ft) probe can be used in orchards and vineyards and has a six-sensor configuration. The sensors are located in the probe to match the key areas of a plant's root structure.

Leaf witness sensors are also available to aid in disease modeling and prevention activities. When paired with a John Deere Field Connect Gateway and its reliable communication systems, these environmental sensors can provide key information to optimize a producer's operation.

AgLogic™

The AgLogic system is a proven software solution helping Ag Retailers deliver the right resources to the right place at the right time. Combining GPS, cellular technology and web-based software, AgLogic helps you graphically manage your fleet and improve the productivity of all your John Deere equipment, other brands of application equipment, and your tender fleet.

Work orders from select agronomic work order systems seamlessly flow into the AgLogic web application. From there you can schedule work to machines and tender equipment with a mouse click. The work order information and associated prescription application files are delivered wirelessly to the vehicle. Within the application you can easily see what work is being done by any vehicle in your fleet, how close they are to being finished with their current job, and how many scheduled jobs and acres they have left for the day.

Once the operator finishes and signs off on the application job, the completed work order flows back to the web application wirelessly and is available for billing within minutes. Optional text messages or email notifications of completion can be automatically sent to growers saving you the effort of trying to get in touch with them to let them know the work is finished.





The schedule and dispatch feature enables the operator and his assistant to enter work orders to an application and its supporting system. It shows all work orders given to a crew, using their territory information. When assigning work orders to equipment, including the application and number, determine the status for selected equipment, and increase office efficiency by interacting with a Web-based system that automatically sends work order information to the operator in the field.

The feature enables two-way file transfer between the office and the field. The operator uploads documents and a proprietary file to the remote server in the application, or directly on the USB device using Universal Data Transfer (UDT) device equipment. When the file is received, the server is prompted for a file to be pushed to the work order information. The file can then move from the mobile device to a computer or a USB device from the office computer.

Fleet Management made easy

Harvest can be a stressful time of year. There's a lot to do and only so much time. But with John Deere, you can harvest smarter than ever. For example, with an S-Series Combine and Machine Sync, you can control the location of the tractor and grain cart from the cab for on-the-go unloading. This helps reduce wait time, operator stress, spillage, fuel consumption and even soil compaction. And with JDLink Connect, you'll know the hours and location of your equipment, track fuel usage, plus receive machine health alerts.





During harvest, JDLink can also help you adjust combine settings such as how much time the operator spends turning on the headland, adjusting or warning to be utilized with a 141 grain tank. And JDLink will provide machine-specific setting information for your machinery. You can log into JDLink and view the set point of your machine to know how the operator has it set.



Harvest Mobile works directly with your iPad to deliver in-call visuals of mapping layers such as ground speed, wet yield, dry yield, and moisture. You can see exactly what's going on in the field. It also displays machine settings at a glance. Harvest Mobile simplifies the Interactive Combine Adjustment (ICA) capabilities of your combine. With ICA, machine setting adjustments can be quickly and easily made, helping the operator go from novice to know-it-all in far less time. Combines equipped with Harvest Mobile can also take advantage of Job Monitor. Data gets streamed through your tablet to the Operations Center. There, a job will be created where a manager/dealer can view the job monitor.

Harvest Lab and Constituent Sensing

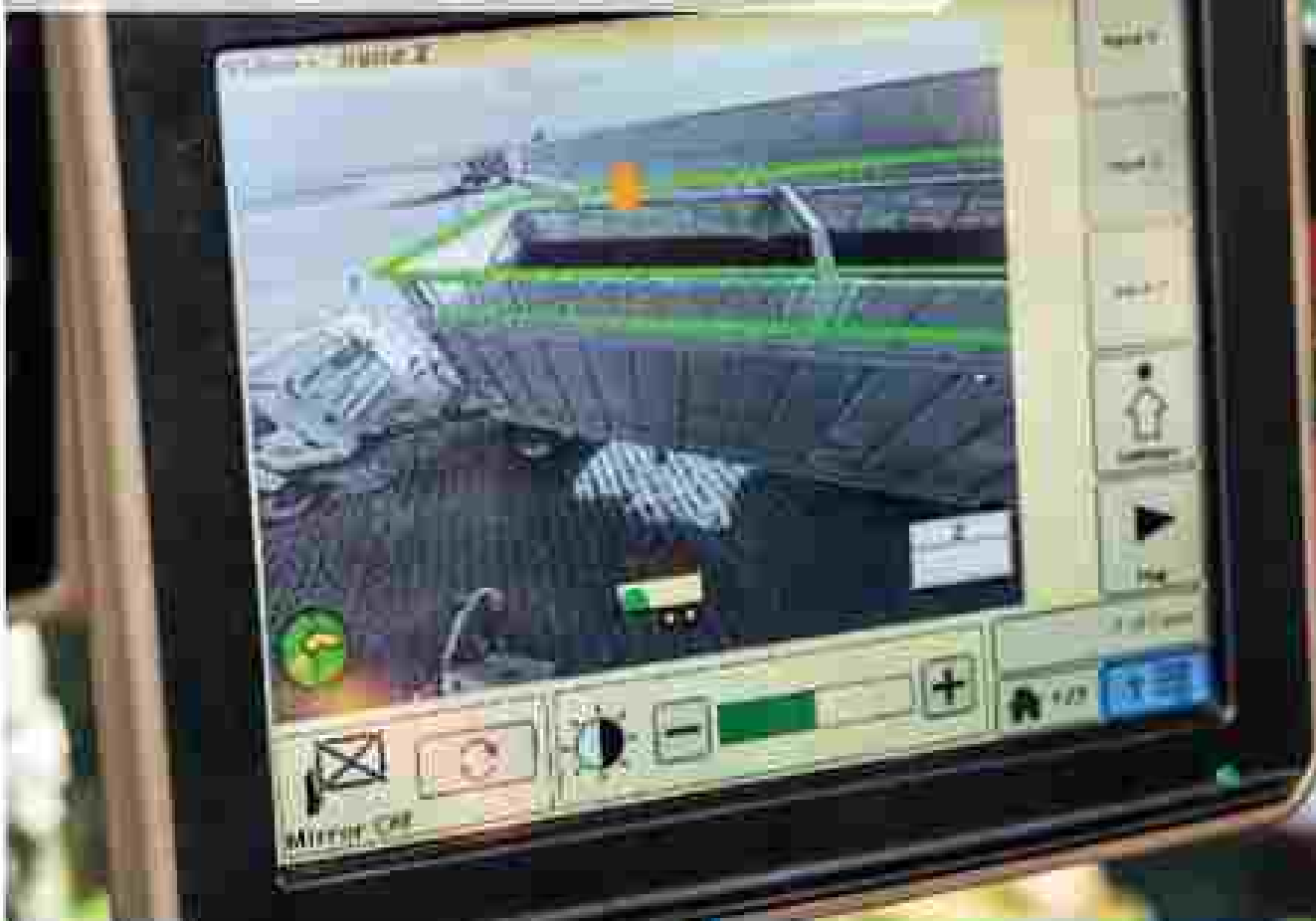
Beef and dairy producers can now determine (and improve) nutrient quality of corn, sorghum, alfalfa, and other crops using John Deere HarvestLab. In addition to dry matter content, which HarvestLab has traditionally been used to measure, the expanded Constituent Sensing capabilities will be able to predict crude protein, starch and fiber (ADF/NDF), which are important nutrient factors in livestock feed. These constituent sensing calibrations have been developed for John Deere in partnership with DairyLand Labs, a recognized expert in forage analysis.

With real-time nutrient analysis, producers and nutritionists can more easily and quickly analyze feed rations for crude protein, fiber and other factors and make adjustments on a daily basis to improve nutrition and reduce feed variability.

The Constituent Sensing enhancement for corn and alfalfa also enables more precise application of silage inoculants at harvest because rates can be adjusted according to crop and dry matter readings. The result is higher quality silage with greater feed value and less spoilage.

Active Fill Control uses cameras to automatically detect the crop transport time to bins and fill it evenly and without spillage. When combined with AutoTurn or AutoGuide[®], Active Fill Control ensures you don't have to worry about slowing the machine to empty the spout, leaving you free to focus on other tasks. Choose from four different "fill strategies" (front-to-back, back-to-front, front-back-fill, back-front-back).

Active Fill Control is available as a factory-installed option on all 7000 Series VRT[®].



The HarvestLab moisture sensor from Harvest Laboratories (HLL) measures moisture that isn't affected by standing or uneven crop conditions. You'll get instant moisture readings, as well as yield data that can be used in the field to make informed decisions during harvest. The information can also be stored for later analysis and planning.





John Deere Harvest Identification, Cotton

Module identification and manual tagging at the gin are a thing of the past... as are the extra resources needed to conduct these functions. Using the RFID reader on board the CP690 Cotton Picker or CS690 Cotton Stripper, the system reads the RFID serial numbers embedded in the module wrap, documents 18 of the most important data points during module formation to improve traceability of cotton modules as they move from the field to gin yard and through the ginning process, and sends the information to the Controller. The controller collects the information and simultaneously displays the module count and serial number, and stores the information as a .txt file on the GreenStar™ 3 2630 Display. Once the information is collected it can be easily pulled off the Display via data card or USB drive or sent to the Operations Center via Wireless Data Transfer, where it can be shared with the gin.



The new harvest ID system, Cotton makes the traceability of cotton modules easier. At the gin, the same module number goes back to the field to help understand the yield and cotton variety of each plant – especially important to grow that premium specialty cotton.



And how John Deere keeps your attention on picking. Picking cotton from efficiency, instead of stress, doesn't mean the system uses laser technology from the sensors to operate the machine, keeping you on the wheel at all times, letting you focus your attention on machine performance.

Remote, but still in control

Whether you manage employees and an entire fleet or own and operate your own equipment, your challenges are similar: keeping the equipment in prime condition, managing costs, and protecting your investment. With JOLink Connect features like Wireless Data Transfer and Remote Display Access, accomplishing these tasks is simpler than ever. No matter whether you're at home or in the office, you also can be in the field, actually seeing your operator's screen on your computer, smartphone, or tablet.

And now, by partnering with your dealer and using JOLink Connect, remote diagnostics for your equipment is a reality. Your dealer can use JOLink to retrieve diagnostic trouble codes and maintenance data to identify problems or maintenance needs before the technician leaves the dealership.

The benefits: greater efficiency and improved uptime. JOLink Connect is available for all makes, all models with a 12-volt hook-up to complement your fleet. For mixed fleets and non-powered equipment, JOLink Universal Telematics can help you track and monitor a broad array of assets with the convenience of monitoring all of them in one spot on the JOLink website and at the Operations Center.



Service ADVISOR Remote

Service ADVISOR Remote allows your dealer to make sure your equipment is running at peak performance. It saves you time and money as your dealer doesn't have to make a start-to-start out diagnosis and then a follow-up visit with the appropriate parts. Instead, they can remotely identify any issues, diagnose the problem and bring out the right parts – all in a single visit.

Remote Display Access

Remote Display Access (only available with JOLink Connect) gives you, your fleet manager or your dealer, with your permission, the ability to view an operator's screen remotely. Operator training, implement setup or troubleshooting a problem can be accomplished without waiting on a service call while at the field.



With John Deere's remote support tools, real-time information is as close as your tablet, smartphone, or laptop, putting you in control. From almost any location.



Your John Deere dealer has many services designed to make you more productive. They have pre-season, in-season, and post-season offerings for solving your challenges throughout the year.

When you're used to your John Deere making equipment recommendations, they can also help with inspections, parts management, software updates or calibrations, field mapping and data management. This allows you to be more insightful about making decisions.

Your John Deere dealer stands ready to help you reduce your risk, increase your profitability and make your job easier.

