

# eSet™ FAQs

**What's in the name?** eSet means Every Seed Every Time. Judging from our side-by-side tests using 21 different kinds of seeds – large, small, flat, round, treated, untreated – eSet lives up to its name!

**What are the key benefits of the eSet Vacuum System from Precision Planting?** We've all waited years for a vacuum system that allows you to set your vacuum *once* and plant! Now you can finally choose your seed based on genetics and have the confidence that your planter will plant whatever seed size and shape comes with the genetics. Simply set your vacuum at 15" for seeds under 60 lbs./bag or 18" for any larger seeds. Set it and forget it!

eSet additionally provides you with a 5-lobe, spring-loaded singulator that always floats in the right position to dislodge doubles of any seed size or shape. Aggressive agitation fins keep your seed pool fluid, and the raised platform on the eSet disk consistently delivers seed down the center of the tube every time.

**How many holes are in the eSet disk?** The eSet corn disk follows a standard 30-hole configuration.

**How does eSet work planting soybeans or other specialty crops?** All you need to do is snap your small eSet brush into the correct position, swap your manufacturer's bean or specialty disk with the eSet corn disk, close the lid, and plant! And since your planter's vacuum setting is determined by your disk selection, you are able to use the same vacuum settings across all your planter rows once you've reset the vac pressure for your specialty crop.

**What's the availability of eSet?** Production will be limited during the 2006 season, and orders will be shipped on a first-come, first-served basis. eSet disks will ship in March and early April.

**What's the difference between the Standard eSet and the Pro Series eSet?** Your planter type determines which eSet configuration is right for you. Our Standard eSet model fits all John Deere planters after 1991, except the new central-fill CCS planters. These planters have a different housing – Deere calls this a Pro Series meter. This requires the Pro Series eSet. Both styles of eSet are priced the same (\$89.00/row), and only differ in the mounting configuration of the installed components.

**Does eSet require any other modifications or updates to my planter?** If your current planter vacuum gauge only goes up to 15" of vacuum, you may want to update your gauge to a 20" capacity since the eSet requires 15" of vacuum on standard seeds (less than 60#/bag) and 18" of vacuum for larger seeds. You may order this replacement Magnehelic Gauge from Precision Planting for \$94.00.

**How difficult is it to achieve the 15” or 18” of vacuum required to run the eSet?** Most newer tractors and planters are able to achieve these higher vacuum requirements without any problem. The following chart summarizes our experience achieving eSet’s higher vacuum requirements:

No. of Rows per Blower	Age of Tractor (New = hydraulic capacity of 2700+ psi; ie. JD 7000 or 8000)	Need Vacuum Test?	Ok for eSet?
8 or less	All	No	Yes
12	Old	Yes	Test
	New	No	Yes
16	Old	--	No
	New	Yes	Test

**To test your vacuum capacity before purchasing eSet:**

**Partial Reading Vacuum Test (allows the use of your standard 15” vacuum gauge)**

- Install your John Deere celled corn disk (standard corn or small corn) in each row.
- Without seed in the hoppers, run your vacuum blower(s) at full flow. You need to achieve 16½” of vacuum (which is the needle pegging the 15” gauge) to run eSet at 18”.

**This test is conservative, so if your planter fails this test it is recommended that you perform the Full Reading Vacuum Test below.**

**Full Reading Vacuum Test (most accurate, but requires 20” vacuum gauge or SeedStar monitor)**

- Install your John Deere celled corn disk (standard corn or small corn) in each row.
- Use duct tape to tape off vacuum hoses to ¼ of the rows being sourced from each blower (3 rows on a 12 row, 4 rows on a 16 row, etc.)
- Without seed in the hoppers, run your vacuum blower(s) at full flow. The vacuum level achieved will be the maximum you can achieve with eSet. To ensure optimum performance over all seed sizes you need to achieve 18” of vacuum.

If you fail either test, you may remove the factory installed (.172” diameter, black) orifice in the hydraulic control valve (JD part #A53980) and install a larger (.182” diameter, silver) orifice (JD part #A53981). This will increase the hydraulic flow to the vacuum blower motor by approximately 15%.

- The above part numbers are for control valves on 1994 planters and after (Control valve #AA38545). Prior to 1994, the orifice is a disk instead of a plug (Control valve AA34009). Order orifice A53088.



Hydraulic Control Valve  
(1994- ) AA38545



Remove the hand valve assembly with a 1” wrench to gain access to the orifice which is removed with a 3/16” Allen wrench.

**Do you recommend using graphite on the back of the eSet disks?** Each eSet disk has a light coating of graphite applied to the back to help maintain superior performance through the season. If needed, you can apply a thin coat of graphite to the back of the eSet disks before each season to ensure its smooth and efficient operation.

**Why should I still get my meters calibrated on a MeterMax® Test Stand when I'm using eSet?** Your planter meters are the single most significant part of a precision planting system. Our MeterMax representatives are trained and equipped to give you the assurance you deserve when your yields are on the line. And since we frequently email our MeterMax team with product updates, field reports, and other important information that will help you get the performance you expect, it's worth your time to tap into your local resource of Precision Planting knowledge by having your meters calibrated to your specific seed size, shape, and treatment. Your MeterMax representative will be able to double-check your eSet installation, the condition of your seals, and provide in-season support.

**Is the eSet system from Precision Planting similar to any other vacuum systems on the market?** eSet is a brand-new exclusive and patent-pending product from Precision Planting, Inc. No other company offers a vacuum solution that combines all the features of a flat elevated plate with strong seed pool agitation. This 2006 season is the first year of production on this revolutionary product that allows you to set your vacuum at one setting and plant. There may be some confusion regarding the Accu-Vac disk that has been out for three seasons or the John Deere Sweet Corn disk. The design and performance of the eSet system is completely different than the AccuVac and Deere products.

**What is the expected life of the replacement parts in the eSet vacuum system?** You will want to check your eSet brushes and seals before each season to make sure that the bristles are in good shape and the seals are soft, flexible, and providing a good tight seal, especially in the seed release section of the meter. Also check all the other parts, including the eSet™ disk, for noticeable wear or corrosion. The areas to watch are the holes on the disk and the lobes of the singulator. Replacement parts are available from Precision Planting or your local MeterMax representative. Please call for pricing and details.

**How does eSet work without a Knock-Out Wheel?** The eSet vacuum system is equipped with a seed extractor that grabs the seed (or fragments of seeds) on the front side of the disk and lifts and pulls them out of the holes after the vacuum is released. And since the eSet singulator is spring loaded—not rigid like other competitive products—seeds won't be sheared off and left plugging the holes in the disk. These engineered parts eliminate the need for a knocker, and allow eSet to live up to its name even in the most difficult of seed conditions.

**How does eSet affect the planter manufacturer's warranty of my meter housing and vacuum system?** While the installation of the eSet components requires drilling one hole in the manufacturer's housing, nothing related to the eSet vacuum system affects your manufacturer's warranty. The higher vacuum requirements are also well within manufacturer's specs for the blower and hosing system.

**Understanding that this is the first year of production for eSet, what kind of warranties are included with my eSet purchases?** Precision Planting includes a standard 1-year product warranty on all meter parts and components (excluding normal wear), and is thankful for a history of strong customer service and very high customer satisfaction ratings.

**Is it possible to update a Standard eSet to a Pro Series eSet if I'm planning to switch to the new John Deere Pro Series planter in the future?** Yes. You simply need to purchase a Pro Series Update Kit that allows your standardized singulator, disk, and short brush to work inside your new Pro Series meter. Call Precision Planting for pricing and availability.

**Is it possible to manually modify the eSet disk by adding or plugging holes for specialty uses, etc?** Due to the honeycomb mold design on the back of the eSet disk and the height of the disk, it is very difficult to manually add holes into the eSet disk and hold equal vacuum pressure around the circumference of the disk. However, this same honeycomb mold design does serve well if you want to use glue on the backside to plug holes and increase the distance between plants in the field.

**How particular is the exact vacuum settings for eSet?** eSet is less particular to exact vacuum level than JD celled disks so any problems related to vacuum consistency should be less significant with your new eSet system than before. However in variable or unstable vacuum conditions, error on the side of the higher vacuum setting, and trust the eSet singulator to eliminate extra doubles.

**What recommendations do you have for seed lubrication when using eSet?** To achieve maximum performance with your eSet system, apply ½ cup of talc per bag (80,000 kernel unit) of seed (1 cup per hopper of seed assuming 2 bags per hopper) and stir to mix as evenly as possible. Adjust this rate as necessary to prevent excessive accumulation of talc in the bottom of the meter and hopper while ensuring that all seeds are coated with talc. For seeds larger than 60 lbs / 80,000, cut the rate of application to ¼ cup per bag. Certain seed coatings or humid planting conditions may require the rate to be increased.