



AMAZONE

ED



ED precision air seeder

Ultra-modern
ISOBUS
communication

Micro plus
pneumatic micro-granular
applicator

**Hydraulic
singling drive**

on ED Super

Large **60 l**
seed hoppers

Individual row shut-off via
GPS-Switch



Model overview	ED 3000-C rigid	ED 4500-C rigid	ED 4500-2C folding	ED 6000-2C folding	ED 6000-2FC folding
Working width (m)	2.80–3.20	4.20–4.80	4.20–4.80	5.40–6.40	5.40–6.40
Number of sowing units	4, 5, 6	6, 7	6	8	8, 12
Possible row spacings (cm)	45–80	45–80	60–80	60–80	45–80

For any application, the right machine and the right specification can be individually assembled from the extensive programme. The combination of either front hopper, or rear fertiliser hoppers for mineral fertiliser make for efficient

units designed for professional operation. All supplied from the one source. Both the optimum component matching and service, therefore, is always ensured.

Electric fertiliser drive

on the ED Super

Large fertiliser hopper up to **1100 l**



New **Super-V** press rollers

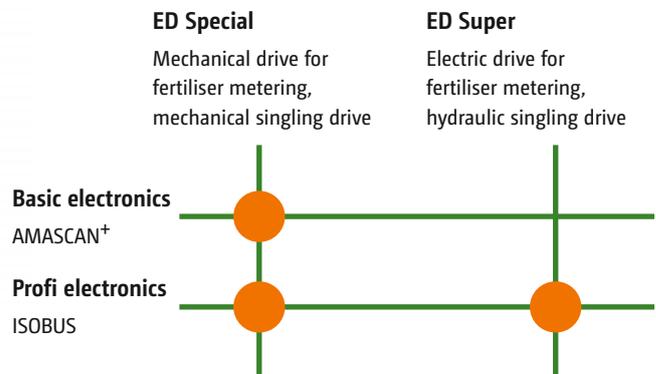
State of the art technology for a better working performance

The ED precision air seeder scores with its precise seed placement and the very accurate singling system. When equipped with the appropriate singling disc it can be matched to almost any seed type. In addition the 60 l seed hoppers reduce the fill times.

Mechanical fertiliser and singling drive on the ED Special. The ED Super, however, is equipped with electric drive for the fertiliser metering as well as hydraulic singling drive.

Apart from the rigid 3 m and 4 m machines, AMAZONE also offers the folding 4.5 m and 6 m versions. In addition, a front tank can be utilised as a fertiliser hopper.

The ED is ISOBUS compatible and can comfortably be operated with the Profi electronics via AMATRON 3, CCI 100 or other ISOBUS terminals. In its basic electronic equipment level, the ED Special is controlled via the machine specific AMASCAN⁺.



See it on TV:
www.amazone.tv



Classic and Contour sowing units

For the optimum accuracy of work and exact placement

Contour sowing unit

The AMAZONE Contour sowing unit is ideally suited to both mulch sowing and when working after the plough. The outstanding feature of the AMAZONE Contour sowing unit is the low singling disc position with a drop height of only 140 mm. The sophisticated coulter technology creates a seed furrow, virtually free from any organic matter. The sowing coulter undercuts the clearing disc, resulting in a well re-consolidated wedge shaped groove.

These are the optimum pre-conditions but, under very light and sandy soils, the additional carrying wheel can be fitted on to the Contour sowing coulter to prevent it sinking too deeply into the soil. In this way the placement depth can be maintained significantly better.

Classic sowing unit

AMAZONE sowing units have been uncompromisingly designed for high precision yet low maintenance. The easy handling saves start up times and increases the work rate. The sowing units are individually equipped with 60 l seed hoppers. For machines with Profi electronics, a fill level check is available.

The Classic sowing unit is ideally suited for sowing maize, sunflowers, beans, peas and cotton, etc., following the plough. The minimum row spacing of just 30 cm allows for up to 10 rows on a 3 m working width. On the Classic sowing unit the drop height is just 100 mm! These are the best pre-conditions for a high accuracy of work, for good placement and an enhanced field emergence!



Contour sowing unit with seed press roller and Super-V press roller



Contour sowing unit – smooth running for precise placement

The Contour sowing unit is guided via a longitudinal tandem, supported at the front by a one-sided press roller and at the rear by a V-press roller or Farmflex tyres. In this way the influence of the ground contours on the smooth ride of the unit is significantly reduced. Clods do not make the unit jump but it smoothly runs over them. So, any change in placement depth due to an uneven soil surface is minimised.

The front press roller has been deliberately mounted just on the one side so that the soil, thrown up by the fertiliser coulters, does not create additional movement on the unit.

Thanks to the suspension in the longitudinal tandem, the unit can, on the one hand, optimally match the field contours and on the other hand it maintains a very smooth run at high forward speeds and on rough ground. Both factors result in an optimum accuracy of work with a precise placement depth. The weight distribution on the two press rollers in the longitudinal tandem can be adjusted. Depending on the soil conditions, always the right operating settings can be found.

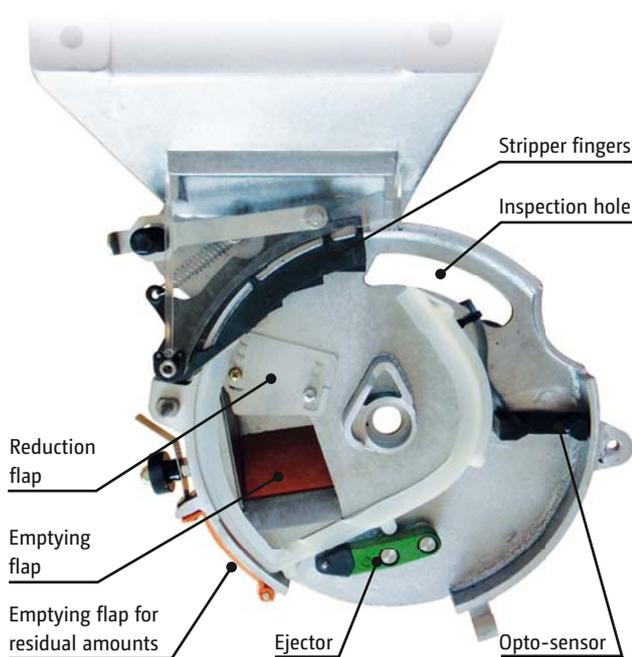


+ EnviroSafe Airkit

The sowing of dressed maize seed using the well-known and widely used pneumatic vacuum sowing technology is, since 2009, in numerous regions of the world only approved for use when equipped with a suitable exhaust air guide system. In this way it is then ensured that waves of seed dressing laden air are not released into the atmosphere to protect both people and the environment. The AMAZONE Airkit has been certified by the Julius-Kühn Institute (JKI) and fulfils all regulations and is approved as an effective method of protection.

Singling

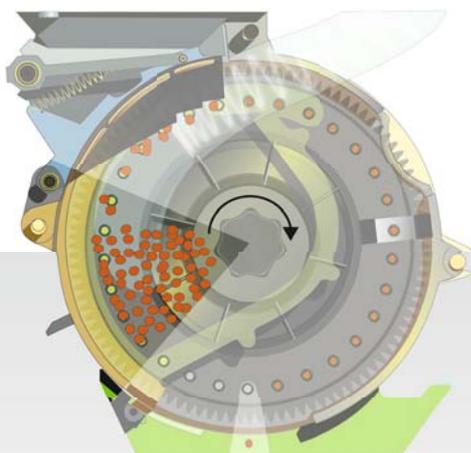
Precise, safe, simplest adjustment



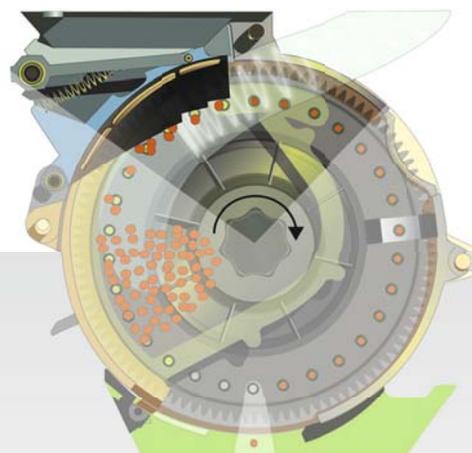
Vacuum principle of the singling system

AMAZONE precision air seeders function according to the vacuum principle. The mechanically (ED Special) or hydraulically (ED Super) driven singling of the grains is carried out via a stripper finger which offers considerable advantages as it is virtually independent of forward speed and seed shape. The unique feature of the AMAZONE precision sowing units is the singling disc. The seeds are drawn by vacuum on to the raised holes and are delivered to the stripper. These raised holes function also as an agitator as the protrusions on the surface of the disc stir the seed and, as the holes are tapered, even broken seeds will be drawn through thus preventing any potential of blockage. These raised holes on the singling disc ensure that the seed leaves the disc in free fall so that it is not influenced by the disc as it turns. This is of special importance for the placement accuracy.

1. Filling



2. Singling via the stripper fingers

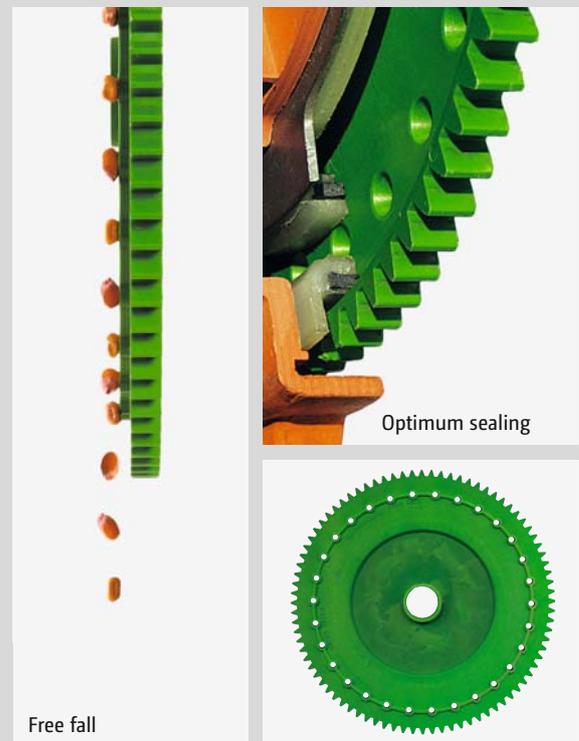


The AMAZONE stripper finger design is of particular advantage because it can easily be adjusted. Only 5 steps are quite sufficient to achieve the optimum position. The stripper finger adjustment has been proven to be insensitive to seed shape and speed with 85% of all maize varieties available on the market being singled at the same stripper finger setting.

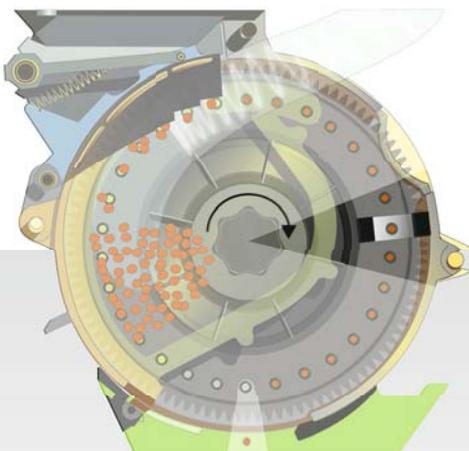
A large inspection window allows for checking or, as an option, there is an opto-sensor positioned in the housing. This serves as a seed detection system for the singling disc. In case, due to an error, the deviation is higher than 10%, an error message is sent and displayed on the terminal.

High-quality plastic components and optimum sealing

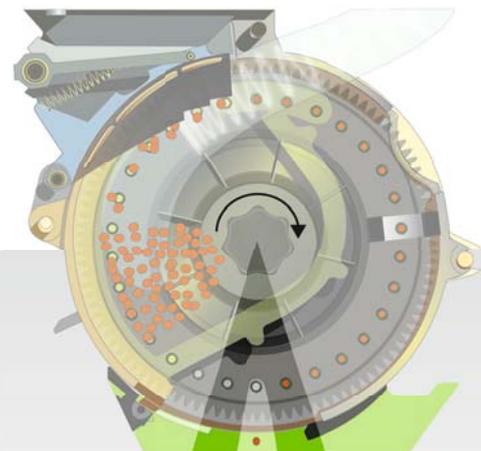
High-quality plastic components made from different materials pair together and are responsible for the superb sealing between the vacuum chamber and the singling disc. This pairing together of different materials guarantees a long service life with optimum sealing.



3. Monitoring via the opto-sensor



4. Delivery into the coulter



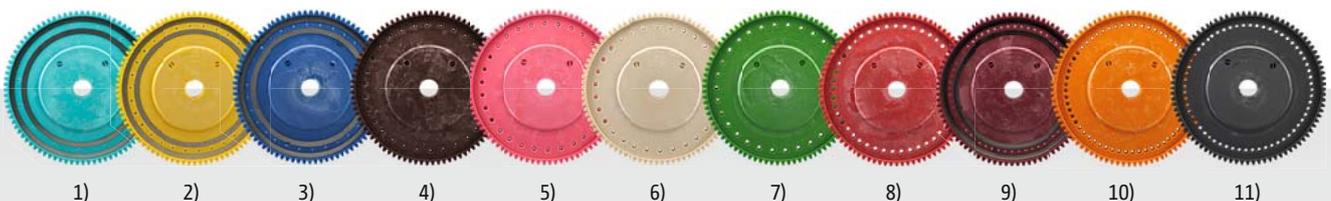
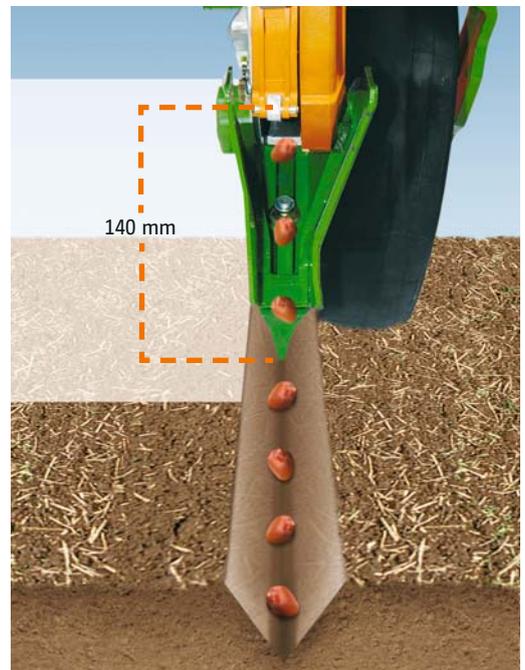
Precise placement

For the highest yields and work rates



After the contactless fall of the seed from the disc, the secondary ejector ensures that the raised holes are absolutely clear. The design of the seeding mechanism results in a low drop height of only 100 mm on the Classic and 140 mm on the Contour unit which is an important pre-condition for the precise seed placement.

A large variety of singling discs make possible the sowing of maize, sunflowers, rape, sugar beet, millet, cotton, etc. For each crop there are at least 2 singling discs with different hole sizes available for the optimum adjustment. The plastic singling discs are quickly exchangeable and offer great value for money.



- 1) Sugar beet 2) Beet and water melons 3) Sunflowers and sugar beet 4) Sunflowers 5) Sunflowers 6) Maize 7) Maize 8) Field beans 9) Sorghum
- 10) Soya beans 11) Beans and peas

and many more singling discs

Tailored press rollers

Safe coverage of the seed



- ① Fertiliser couler
- ② Sowing couler with cutting disc,
- ③ Furrow former with seed channel,
- ④ Seed press roller,
- ⑤ V-press roller (alternative: Farmflex tyres)

Farmflex tyres

Ball-bearing mounted Farmflex rubber tyres in various sizes are available for the sowing units. The Farmflex tyre is best suited for sowing maize following the plough in conjunction with pre-closers.



V-press rollers

V-press rollers of different sizes are available for equipping the sowing units. They are potentially used for the mulch sowing of maize and sugar beet. Via the adjustment of the press angle, the opening angle and the opening width, the V-press rollers can be optimally adapted to the prevailing soil conditions. V-press rollers allow the optimum operation with and without following closers both in ploughed or mulch conditions.



Super-V press roller
Ø 380 x 57 mm



V-press roller
Ø 500 x 50 mm

Optional seed press roller

When the seed has been placed into the pre-shaped seed furrow, it is pressed by the roller, providing optimum seed/soil contact. This ensures a quick and safe field emergence. Depending on the prevailing conditions, the press force can be changed in three positions. Under very wet conditions the roller can even be removed completely – quickly and without tools.



Equipment that fascinates!

For efficiency with comfort



Hydraulic variants

Depending on the choice made, the hydraulic system is available in three versions. There is the entry-level standard hydraulics, where every function has to be actuated from the spool valve on the tractor. On modern tractors with sufficient spool valves, this equipment level might be sufficient. For tractors with a limited number of spool valves, the Comfort hydraulics can be selected. Here the functions of wing and track marker folding can be combined via an electric changeover valve supplied by one spool valve. For those customers who intend to operate all functions via the terminal or the optional joystick, then the Profi hydraulics are available, requiring one single acting spool valve with a pressure-free return flow on the tractor or alternatively a Load Sensing hydraulic system.

Tractor wheel mark eradicators

When operating on heavy soils tractor wheel mark eradicators make sense. These loosen the compacted tracks behind the tyres. The position of the wheel mark eradicators can be adjusted horizontally and vertically.

Depending on soil type and implementation of the machine, the wheel mark eradicators can be equipped with different wear points. The overload safety device provides a maintained release force in all tine positions.





⊕ LED work lights

Good visibility after dark is offered by the optional LED work lights attached on and in the fertiliser hopper, lighting both the operating area and also the interior of the fertiliser hopper.



Micro plus micro-granular applicator

AMAZONE offers the possibility, to equip the ED with one or two Micro plus micro-granular applicators enabling the simultaneous application of up to two micro-granules along with the seed during one pass in the field, depending on the machine type. Depending on the preference, the granules can be applied at two different points. Micro plus features a central 110 l hopper and one central electric metering for all rows making filling and emptying very easy. The application rate of the granules can be very simply adjusted and changed via the terminal.

In the basic electronic equipment level for the ED Special, the Micro plus micro-granular applicator is controlled via an additional AMADRILL⁺ on-board computer.

The ISOBUS terminals AMATRON 3 and CCI 100 in conjunction with the Profi electronics enable the individual control of the micro-granular applicators.

Forward speed recording

For regulation and drive of the fertiliser metering unit, the forward speed of the ED Special is taken from the ground wheel drive. On the ED Super, this can be carried out via a GPS receiver or the signal socket of the tractor or the Super Fast radar sensor on the precision air seeder.



Calibration button

The teamwork with the AMATRON 3 terminal means that calibration tests to ascertain the exact fertiliser rates can be quickly done. The operation of the complete calibration procedure is comfortably carried out at the left hand side of the machine.



Fertilising

For that perfect plant growth



Fertiliser equipment

For metering the fertiliser, the ED Special is equipped with a mechanical drive, whereas the ED Super has an electric system. With the electric drive, the fertiliser rate can be also variably matched on the move. Via the new loading board, the fertiliser hopper is easily and safely accessible. In conjunction with the electric metering drive, the calibration button is standard at the ED Super.

For the continual fill level check, the fertiliser hopper is equipped with large sight glasses at the front and rear. In addition, also an electronic fill level control of the rear fertiliser hopper can be chosen, reminding the driver to refill the fertiliser hopper right on time. The optional internal hopper lights and the LED working lights allow operation also at night.

Drag (suffolk) and single disc fertiliser coulters

Both the drag (suffolk) and single disc fertiliser coulters have been designed for tough operational conditions. The strong tension spring (160 kg) protects the coulters from stone damage and yet on the other hand helps maintain an even placement depth. The depth is set quickly without tools via simply resetting a pin. The special clamp arrangement allows the positioning of the fertiliser coulters where desired in relation to the sowing coulters.

Particular mention is made to the Clip-on coulters tip on the fertiliser drag coulters. By loosening a well-protected fixing

screw, the wearing tip can be removed, saving time! The back-up support prevents any unintentional blocking of the drag (suffolk) fertiliser coulters when either lowering the machine or when backing up. Due to its large diameter, the single-disc fertiliser coulters are especially well suited for mulch sowing conditions. It does not feature any scrapers and thus rotates blockage-free even in extreme situations. The Boron steel disc offers high wear resistance.



Clip-On coulters tips



Drag (suffolk) fertiliser coulters



Single disc fertiliser coulters

Filling auger

Time-saving filling of the fertiliser hopper



For filling the ED with fertiliser, AMAZONE offers a hydraulically-driven filling auger, integrated within the machine concept. In this way fill times can be reduced and the work rate of the machine further increased. The filling auger is available for all ED models.

The divided filling auger is attached to the rear of the machine. And at only 70 cm lip height on the reception hopper, the filling auger also allows filling from a simple

tipping trailer. The tipping trailer should be equipped with a slide and a tube outlet to enable the filling speed to be optimally regulated.

Drive and control of the filling auger is via the hydraulic system of the tractor. The tractor should feature a hydraulic capacity of a minimum of 50 l/min and a pressure-free return flow.

- ⊕ The large opening of the filling auger eases the filling procedure.

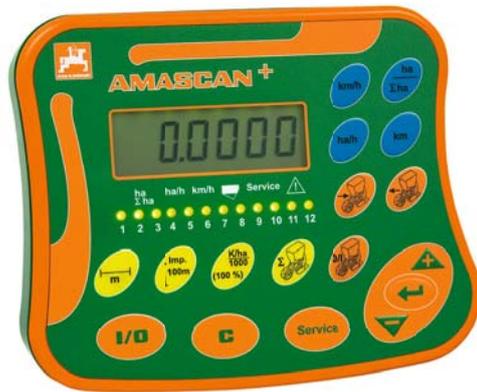


Electronics: from simple up to ISOBUS technology

Everything under control with the suitable operator terminal

Basic electronics with AMASCAN⁺

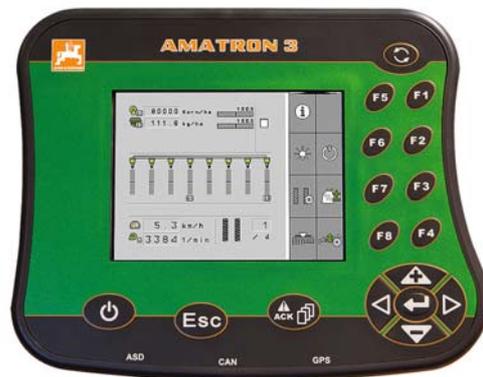
On the ED Special, the mechanical drive to both the singling and fertilising can be controlled via the basic electronic equipment level. AMASCAN⁺ monitors, in conjunction with the opto-sensors, the entire drive down to the choice of the singling discs. During operation the accurately sown number of grains per ha is displayed. In conjunction with the electric shut-off, every individual sowing unit can be switched off via AMASCAN⁺. The electronics sends an error message in less than 10 sec. The service key allows the quick function test of the opto-sensors. Additional displays: ha, Σ /ha, ha/h, t, km and km/h and many more.



Profi electronics with AMATRON 3 or CCI 100

The Profi electronic equipment package consists, from choice, of AMATRON 3 or CCI 100 and is available both for the ED Special and ED Super. AMATRON 3 and CCI 100 allow the comprehensive monitoring of the machine and the comfortable handling. In addition to the quick set-up possibility, the ISOBUS terminal also provides the possibility of job management, the checking of the stripper finger position and the use as a monitor for the rear view camera.

If the season has finished, then both terminals, moreover, can be utilised also for the operation of other AMAZONE machinery.



⊕ Apart from the AMAZONE ISOBUS terminals the ED can be also operated with ISOBUS terminals of other manufacturers.

For even more precision

Aid to optimum control



GPS-Switch with individual row shut-off

In conjunction with the automated GPS-Switch or Section-Control part-width shut-off and the individual row switching, it is now possible that the individual units automatically switch on and off via GPS in wedge-shaped fields or on the headland. Via the individual row switching, tramlines and irrigation lines can be very simply and comfortably created. At narrower row spacings, tramlines are required to apply fermentation substrates or other fertilisers to the growing crop without damaging the plants. In this way, GPS-Switch relieves both the stress on the driver as well as simultaneously saving seed.



Rear-view camera available as an option

Camera systems help in enclosed situations and contribute to the safety of the machine. This applies both to road traffic and also when manoeuvring. The camera system offered by AMAZONE is characterised by its high class components. The monitor offers a clear, glare free picture in a sufficient size.



⊕ Multi-function joystick

All the functions in the operating menu can be also actuated via the AmaPilot multi-function joystick or other ISOBUS joysticks (AUX-N).

Technical data

Execution	ED 3000-C rigid		ED 4500-C rigid		ED 4500-2C folding		ED 6000-2C folding		ED 6000-2FC folding	
	Special	Super	Special	Super	Special	Super	Special	Super	Special	Super
Working width (m)	2.80–3.20		4.20–4.80		4.20–4.80		5.40–6.40		5.40–6.40	
Number of sowing units	4, 5, 6		6, 7		6		8		8, 12	
Possible row spacing (cm)	45–80		45–80		60–80		60–80		45–80	
Sowing units	Contour or Classic		Contour		Contour		Contour		Contour	
Tyre options	10.0/75-15						31x15.5/15			
Transport width (m)	3.00		4.00		3.00		3.00			
Transport length (m)	2.40		2.40		2.80		2.90			
Singling drive	mech.	hydr.	mech.	hydr.	mech.	hydr.	mech.	hydr.	mech.	hydr.
Seed spacing	3.1 cm to 86.9 cm depending on the singling disc used									
Blower fan drive	PTO shaft with over-run clutch, PTO input speed 540 rpm, 710 rpm or 1000 rpm Optional hydraulic blower fan drive									
Singling unit	Polyurethane singling discs for maize, sunflowers, sugar beet, rape, soya, sorghum, field beans, peas									
Fertiliser hopper capacity (l)	900				900/1100		1100		1500–2000	
Drive: fertiliser metering	mech.	elect.	mech.	elect.	mech.	elect.	mech.	elect.	mech.	elect.
Filling height: fertiliser hopper (m)	1.78		1.78		1.78/1.91		1.91		1.60/1.78	

Illustrations, description and technical data are not binding! The machine pictures may deviate from what is required for local road traffic regulations.

Safety in all situations

For the AMAZONE precision air seeder unit a fixed road traffic light kit is available which fulfils the road traffic regulations for transport safety.



AMAZONEN-WERKE H. DREYER GmbH & Co. KG

P. O. Box 51 · 49202 Hasbergen-Gaste/Germany

Phone +49 (0)5405 501-0 · Fax +49 (0)5405 501-193