

PRECISION SMALL SEED DRILLS





A dedicated single line row unit offering a more economical solution for those growers who do not require multi-line performance. Every aspect of the row is designed for easy and precise adjustment to give uniformity of seed depth and seed soil contact, ensuring regular and even germination in all soil conditions. Choice of hoppers capacities - here shown with a narrower hopper and extension. Choice of 4 interchangable final drive sprockets to acheive different seeding rates on different rows: -25% / +6% / +17%.

Optional rear wheel rake to prevent smooth surface being left behind to reduce chances of capping. Tines can be adjusted in height and angle to suit conditions. Can be easily folded over to be 'out of work' or for transport.

Manually operated row unit clutch in an easily accessible location to disengage rows in seconds.

> Weight of row spread evenly over front and rear wheels.

Single arm coverer with adjustable lower half to set distance between the arm and the line of seed. The working depth of the arm and the downforce of the arm can all be adjusted. The arm can also be latched out of work if not required. Large 190mm diameter rubber tyred single line press wheel for optimum rolling in a range of conditions, also includes sprung rubber scraper. Depth can be set or the wheel latched out of work via the chain adjustment system.

Latest version of the Stanhay metering unit optimised for single line work featuring a 'knife edge' seed ejection system. The metering unit can be opened easily without the need for tools. Sharp edged opener disc (150mm) to cut through trash and hard ground before the coulter eliminating potential row unit bounce from obstructions in the row. Three fixed depth positions relative to the coutler are available (-10mm, 0mm, +10mm). Weight take off spring allows up to 60kg of reduced downforce on the row.



Row unit latch up via simple mechanism that can be operated by single person.

'Long' parallel link for precise ground following.

Reliable 2 stage chain drive.

Infinitely adjustable depth control over a 90mm range.



Choice of rubber, stainless or cage wheels all complete with sprung scrapers. Clod Deflector (not shown) - an optional floating clod deflector in front of the front wheel is available to move larger clods or stones out of the row prior to the front wheel and is available in two width options 150mm or 190mm.



A multiline row unit capable of seeding 1-4 lines of seed from each row. Every aspect of the row is designed for easy and precise adjustment to give uniformity of seed depth and seed soil contact, ensuring regular and even germination in all soil conditions. Choice of 4 interchangable final drive sprockets to acheive different seeding rates on different rows: -25% / +6% / +17%.

Choice of hoppers capacities - here shown with a standard 2 litre hopper.

Optional rear wheel rake to prevent smooth surface being left behind to reduce chances of capping. Tines can be adjusted in height and angle to suit conditions. Can be easily folded over to be 'out of work' or for transport.

row unit clutch in an easily accessible location to disengage rows in seconds.

Manually operated

Weight of row spread evenly over front and rear wheels.

A choice of drag, single or double arm coverers with adjustable lower half to set distance between the arm and the line of seed. The working depth of the arm and the downforce of the arm can all be adjusted. The arm can also be latched out of work if not required. Choice of 145mm diameter seed press wheels in solid stainless or with a rubber tyre complete with sprung scrapers. Available to match all multiline setups where depth can be set or wheels latched up out of work via the chain adjustment system

Latest version of the Stanhay metering unit optimised for multiline line work featuring a 'knife edge' seed ejection system. The metering unit can be opened easily without the need for tools. Weight take off spring allows up to 60kg of reduced downforce on the row.



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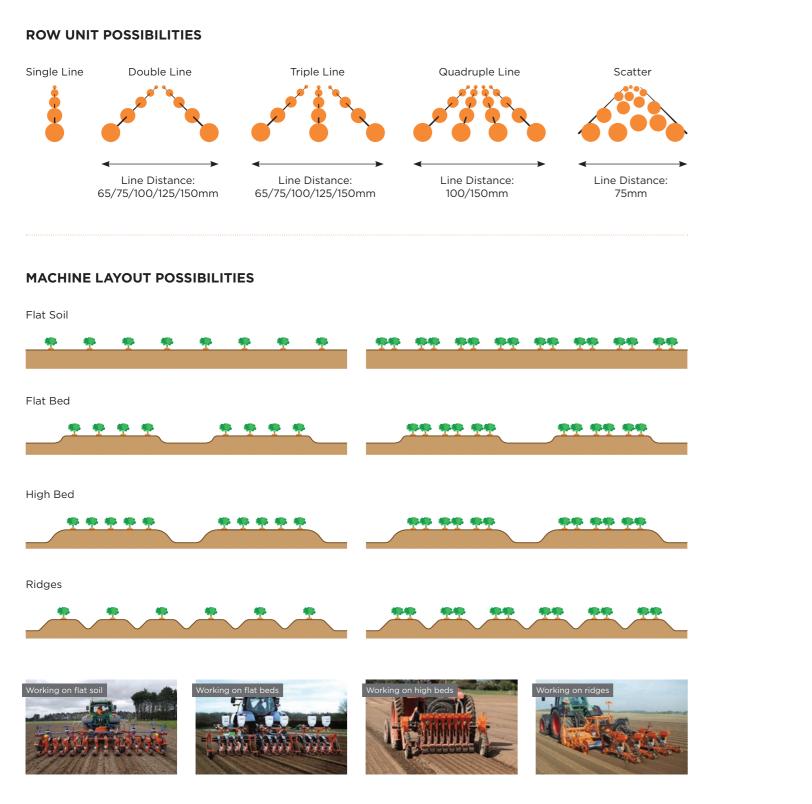
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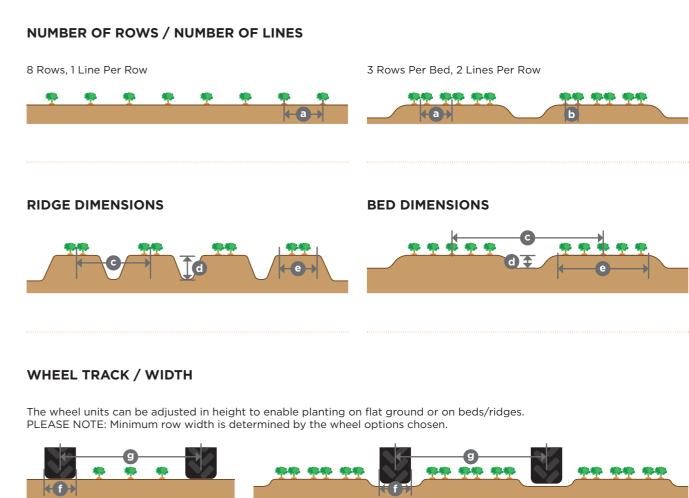
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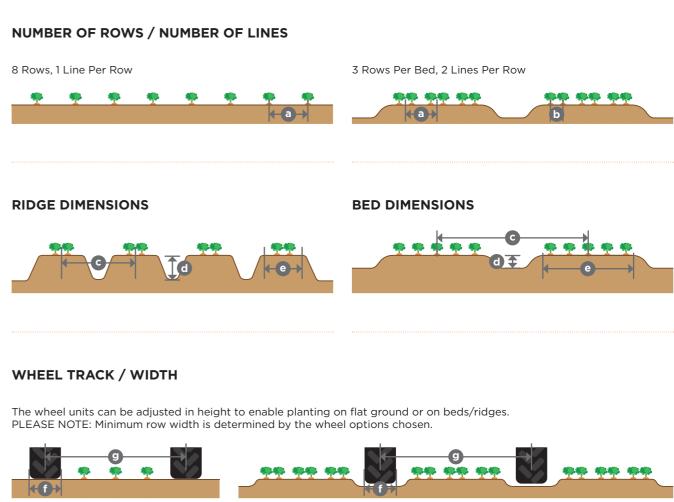
PLANTING LAYOUTS

The machines can be specified for any number of different types of planting either in flat field conditions or on ridges and beds. Each row can be specified to achieve a wide variety of different planting patterns.



KEY LAYOUT TERMINOLOGY









KE.	v
a	• Row Distance
b	Line Distance
С	Bed/Ridge Distance
d	Bed/Ridge Height
e	Bed/Ridge Top Width
f	Tyre Width
g	Track Width

THE METERING UNIT AND OPTIONS

The industry leading Stanhay small seed vacuum metering unit has been continually developed and improved over the last 30 years to give unmatched versatility and performance in the field.

The X Series metering unit features further advancements to improve performance.

[1] SEED DISCS

Thin seed discs flex to give a perfect air tight seal and consistent seed pickup while reducing the chance of seeds sticking in seed holes (see pages 10 & 11 for more).

[3] SINGULATORS

Simple design to enable precise singulation of up to 4 lines of seed with one cam adjustment, they also feature a simple calibration adjustment. They ensure all metering units perform the same on the same singulation setting. Various versions are available for different seed types.



2 GALLERY BLOCK

A hard wearing plastic moulding that directs vacuum and pressure to exactly where they are needed for high quality seed pickup and disc cleanout after the seed release. Easily replaced when required with a simple paper gasket system to seal the gallery block into the metering unit.



X10 Gallery Block



X30 Gallery Block





CLUTCH

An easily accesible manually operated clutch on the metering unit makes it possible to enagage and disengage rows within seconds.

TOOLLESS ENTRY

Splitting the metering unit via the hand turn conical nut makes setup and maintence even faster and ensures a perfect connection of the two meteirng unit halves.

Easily adjustable agitator system to

[4] AGITATORS

ensure seed keeps flowing and does not bridge. They are easily replaced and adjustable to suit any seed type.





Raw parsnip

Large pellet

5 SPLITTERS

Sprung loaded splitters keep contact with the face of the disc at all times and feature a knife edge ejection system to ensure consistent seed drop from the disc.



1 line



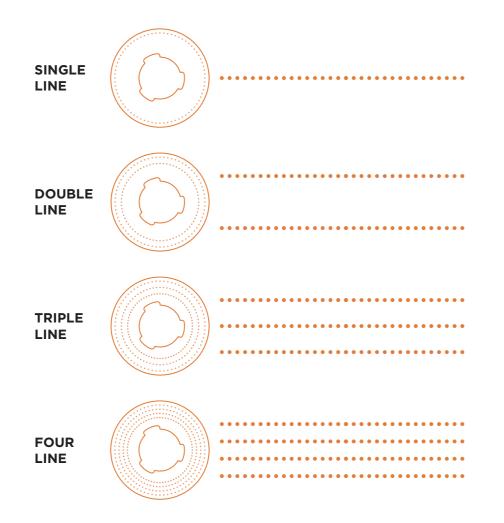
3 line

The selection of the correct seed disc is vital to ensure hole size matches the seed type and size; the number of holes in the disc and the number of lines planted per row.

> An example of disc terminology is: 0.6x96x3L or 0.8x96/96/96

THE METERING UNIT **SEED DISCS**

Newly developed Stainless Steel seed discs offer improved life and corrosion resistance while maintaining the benefits of thin disc technology. Thin discs can flex to maintain a perfect seal within the metering unit while the flow dynamics of air through a thin aperture in the seed disc offer optimum pickup performance of small seeds. This effect also improves consistency of seed drop and reduces chance of blockages. The discs can also be run on either side which can further improve the lifetime of the disc, a feature unique to thin disc technology.

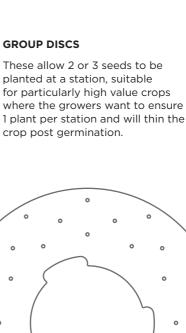


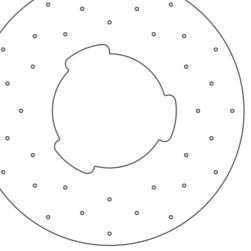
Just some of the seeds you can handle are listed below:

NON-STANDARD SEED DISCS

Nigella Black Pod

Red Beet



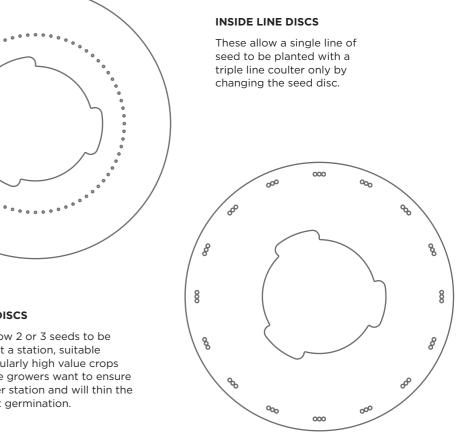


VARIABLE RATE DISCS

Allows a different rate of seed to be applied in each line of seed from the metering unit, commonly used by root crop growers to apply a lower rate of seed on the middle line of a 3 line setup.

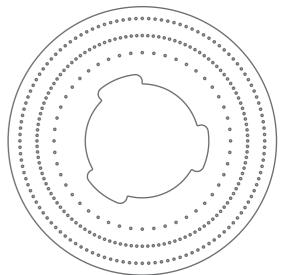


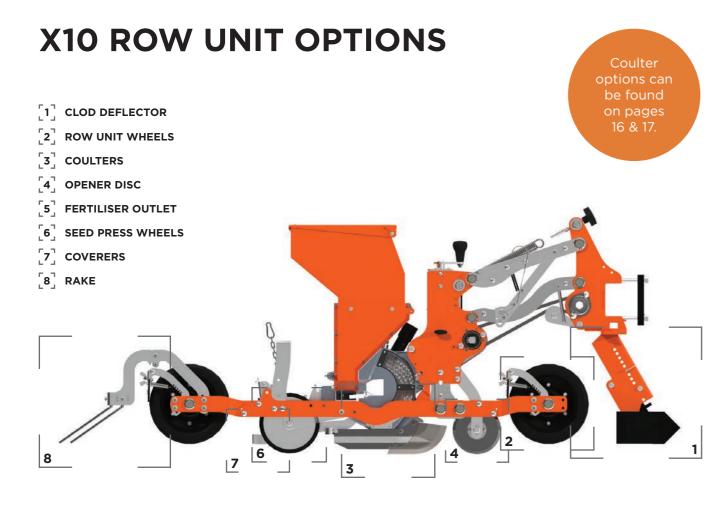


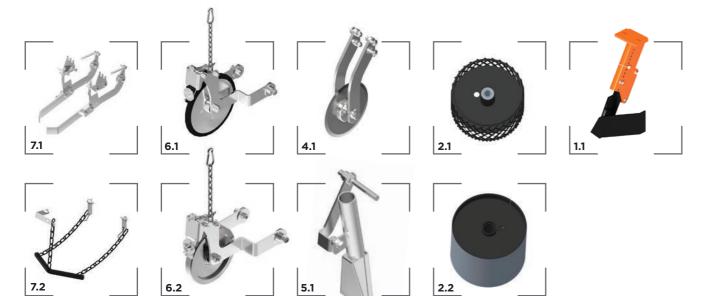


STAGGERED DISCS

Allow seeds to be placed into the ground in a staggered pattern rather than in-line











CLC	DD DEFLECTORS	Description	Width (mm)
.1	Standard	Floating clod deflector to clear row ahead of front wheel.	150 160
RO۱	W UNIT WHEELS	Description	Width (mm)
.1	Cage WheelFor use on soil prone to capping. Leaves a broken surface on the seed bed. Rubber scraper kit included.		120
2	Stainless SteelRecommended for general purpose drilling work, leaves a flat surface. Plastic scraper kit included.		120
3	FZP	Flat square edged zero pressure wheel suitable for most conditions. Rubber scraper kit included.	80 145
OPE	ENER DISC	Description	Width (mm)
.1	Single Line	Pre coulter opener disc to cut through trash/clods on surface prior to the coutler.	-
FER		Description	Width (mm)
1	Fishtail	Fistail fertilser outlet behind coulter	65 100
SEE	D PRESS WHEELS	Description	Width (mm)
1	Large diameterLarge diameter zero pressure wheel for reduced rolling resistance.Single LineIncludes rubber scraper kit.		20
2	Single Line	Small zero pressure or stainless wheel that follows the coulter furrow. Includes scraper kit on each wheel.	20
	VERER TYPES	Description	Width (mm)

7.1

Arm

8.1 Foldable Rake

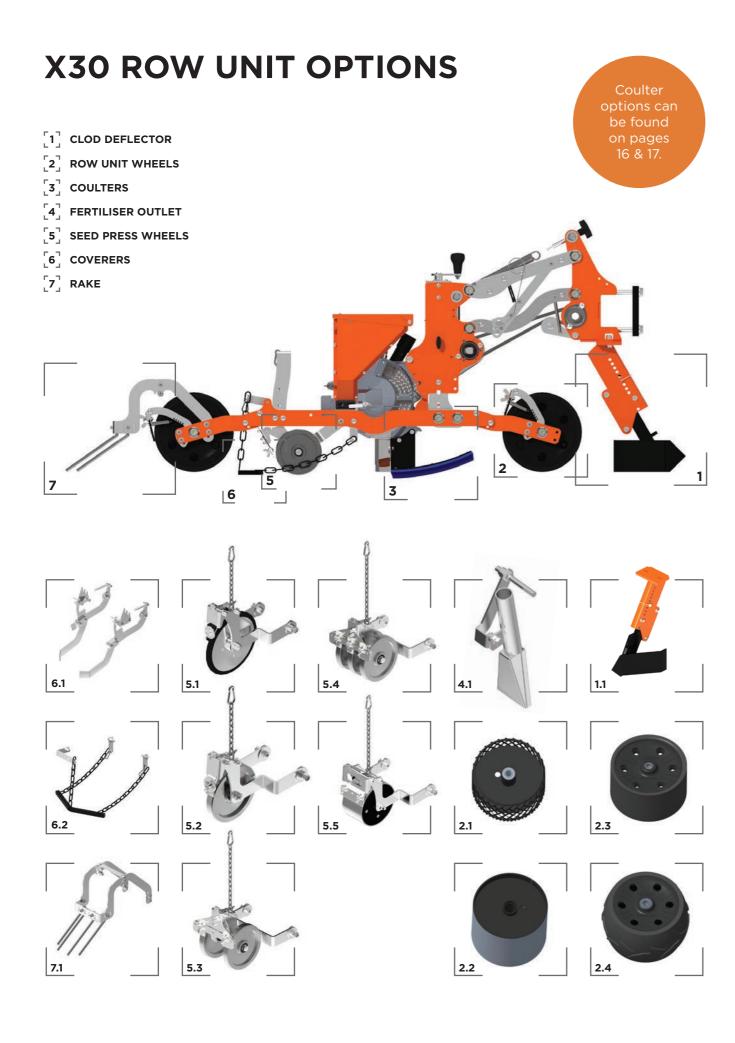
7.2 Drag

RAKES



Description	Width (mm)
1 or 2 adjustable sprung loaded arms to fill furrow.	-
Simple chain and V shaped profile to drag over soil and fill furrow.	-

Description	Width (mm)
Finger rake system to leave a broken rather than flat surface behind machine. Easily rotated out of work when not required.	-



CLC	DD DEFLECTORS	Description	Width (mm)
1.1	Standard	Floating clod deflector to clear row ahead of front wheel.	150 160
RO	W UNIT WHEELS	Description	Width (mm)
2.1	Cage Wheel	For use on soil prone to capping. Leaves a broken surface on the seed bed. Rubber scraper kit included.	120 160 200
2.2	Stainless Steel	Recommended for general purpose drilling work, leaves a flat surface. Plastic scraper kit included.	120 160 200
2.3	FZP	Flat square edged zero pressure wheel suitable for most conditions. Rubber scraper kit included.	80 145 170 200
2.4	ТZР	Treaded Zero Pressure wheel to leave tyre pattern in soil after row, self cleaning.	165
FER		Description	Width (mm)
1.1	Fishtail	Fistail fertilser outlet behind coulter.	65 100
SEE	D PRESS WHEELS	Description	Width (mm)
.1	Large diameter Single Line	Large diameter zero pressure wheel for reduced rolling resistance. Includes rubber scraper kit.	20
.2	Single Line		
.3	Double Line	Small zero pressure or stainless wheel that follows the coulter furrow. Includes a scraper kit of each individual press wheel.	20
.4	Triple Line		
.5	Wide	Single wider stainless steel press wheel with plastic scraper kit.	65 80
co	VERER TYPES	Description	Width (mm)

6.2	.2 Drag Simlle chain and V shaped profile to drag over soil and fill furrow.		-
RAI	KES	Description	Width (mm)
7.1	Foldable Rake	Finger rake system to leave a broken rather than flat surface behind machine. Easily rotated out of work when not required.	-

6.1 Arm

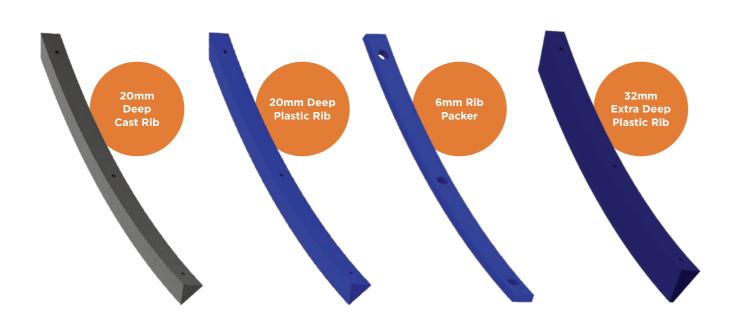


Description	Width (mm)
1 or 2 adjustable sprung loaded arms to fill furrow.	-
Simlle chain and V shaped profile to drag over soil and fill furrow.	-

ROW UNIT COULTERS

SINGLE LINE	Description		
Single L 3.1 Univers. Cast Tip	Al Replaceable cast tip. Stainle Recommended for general		00
Single L .2 Univers Ceramic	al plates. Hard wearing. Recon		00
3.3 Single L Hyline S		est suited to sticky and/or hile the cast rib is better e abrasive. Ribs are 20mm two optional 6mm packing	
3.4 Single L Loline S		est suited to sticky and/or hile the cast rib is better e abrasive. Ribs are 20mm two optional 6mm packing	· · ·

NOTE: Single line coulters can be fitted to chassis in Hyline configuration using Hyline Adaptor for single line shoes.



MULTILINE	Description		
3.5 Loline 3.5 Shallow Fi	Replaceable cast base. Recommended for fine, cloddy or stony seedbeds: (for use where hyline chassis configuration is not achievable).		
3.6 Hyline Deep Fin	Replaceable cast base. Recommended for fine clean seedbeds: (deep fin shoes produce minimum soil disturbance).		
3.7 Hyline 3.7 Shallow Fi	Replaceable cast base. Recommended for cloddy and/or stony seedbeds: in (shallow fin shoes can handle stones and clods without blocking).		
3.8 Multiline Hyline Ski	Replaceable polymer base with replaceable polymer or cast rib. Polymer rib is best suit to sticky and/or trashy non-abrasive soils while the cast rib is better suited where the soil is more abrasive. Ribs are 20mm deep standard but up to two optional 6mm pack ribs can be fitted to increase seeding dept		
3.9 Multiline Loline Ski	Replaceable polymer base with replaceable polymer or cast rib. Polymer rib is best suit to sticky and/or trashy non-abrasive soils while the cast rib is better suited where the soil is more abrasive. Ribs are 20mm deep standard but up to two optional 6mm pack ribs can be fitted to increase seeding dept		
3.10 Knife Coulter	Single furrow scatter coulter		

Many of our coulters are offered in a "Hyline" or "Loline" configuration but which is best for you?

- Loline For use in conditions in which fine soil particles do not (for the most pa become airborne and risk clogging the unit and the seed is regular and heavier.
- **Hyline** Lifts the metering unit slightly higher thereby avoiding the airborne dust. This is also the coulter for lighter seed such as carrot that require a steeper drop for accuracy.





RIGID TOOLBARS

A variety of rigid toolbar systems are available to suit machines from 2m upto 9m+ with any number of rows. Versions capable of being fitted behind other cultivation equipment are also available. All toolbars can be completed with road lighting kits as required.



COMPACT RIGID TOOLBAR

Available with a hydraulic fan drive only this frame provides the smallest possible distance between the coulters and the machine pickup point, particularly suited for mounting behind cultivation equipment.



Rigid toolbar systems are available for small, medium and large machine layouts.

STANDARD RIGID TOOLBAR

The standard rigid frame design which is highly customisable to a range of machine configurations allowing the use of both styles of fan.





A double toolbar rigid frame suitable for larger drills up to 9m in width. This frame can be customised to suit bespoke machines and is capable of being fitted with multiple fans if required.

EXTENDED HEADSTOCK

Extended headstock system suitable for use when machines are used in combination with bed forming machinery.

FOLDING TOOLBARS

Two styles of folding toolbar are available to suit machines 6m and over with any number of rows. Hydraulicly operated with mechanical locking systems for safe operation. All toolbars can be completed with road lighting kits for road transport.







width of under equipped with full

HIGH DENSITY FOLDING TOOLBAR

lighter frame. With bolt on toolbars it can be adapted to work with a number of different machine layouts. Up to 6.5m working width can be folded to within 3.5m for road transport.

Designed with optimal geometry and increased load carrying capacity to allow machines with the tightest achievable row spacings to be folded from a 6.5m working width to under 3.5m for road transport. Bolt on toolbars make it easy to customise for every application and frames can be specified with or without float in the wings to allow for greater ground contour following ability.





DRILL COMPONENTS

Stanhay seed drills can be configured to suit almost any planting layout and crop. From the metering units and seed discs to the row units and frames, everything is uniquely configurable to the customers' requirements. This section details the options available for land wheels and fans together with accessories including road lighting kits and ridge wheels.

SPRING LOADED

DRIVE WHEEL

STANDARD DRIVE WHEEL

STANDARD

DRIVE WHEEL

Supports the chassis of the drill and houses a 64 speed gearbox that is used to set the spacing of the seeds. Suitable for beds up to 300mm height. Wheel scraper kit included.

The standard support wheel is used in conjunction with the drive wheel to support the chassis. It cannot be used to drive metering units. Suitable for bed heights up to 300mm. Wheel scraper kit included.

SPRING LOADED DRIVE WHEEL

Used with triple bed drill configurations or uneven ground. Spring loaded to ensure a constant downforce to reduce wheel slip. Suitable for bed heights up to 300mm. Includes wheel scraper kit.

The spring loaded support wheel is used in conjunction with the drive wheel. Suitable for bed heights up to 300mm. Wheel scraper kit included.

HYDRAULIC DRIVE

Retrofittable onto a standard fan and couples into a tractor spool valve. Oil requirement is 30 lpm @ 180 BAR.



2





Offers increased vacuum and pressure for larger drill configurations or large seed capabilities. Available in either 540 or 1000rpm.

TRACK ERADICATOR TINES

Track eradicator tines can be fitted to remove tractor wheel marks prior to the drill. 1, 2 or 3 tines can be fitted which are adjustable in height and available with a chisel point or A-share. They can easily be fixed out of work when not required.





For use when drilling on ridges. Guides the drill and ensures the row units follow the top of the ridges.

ROAD LIGHTING

LED road lighting kit can be fitted to rigid or folding toolbars. Reflective marker boards make the drill visible to other road users.

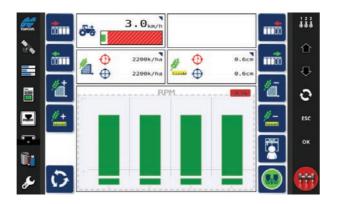




ELECTRIC DRIVE SYSTEM

Electric drive has been designed into this row unit from the outset and the motor is well protected and fitted centrally within the chassis meaning a 200mm minimum row width is still achievable. A fully ISOBUS compliant* electric drive system is available for 4-12 rows. This allows the drill to have section control and changes in seeding rate on the go.

The machine can be controlled from the ISOBUS terminal in the tractor cab where target seed rate, speed and individual row operation information will be displayed. From here the machine can be set and adjusted in minutes and combined with other implements, guidance systems and section control.



*Check with your Stanhay dealer or via the AEF website to confirm compatibility between specific implement and terminal combination

DISC EYE - CAMERA MONITORING SYSTEM

Monitor every seed disc from the tractor with optional cameras fitted to each row. The live stream is fed back to the in tractor monitor allowing you to check seeding performance without the need to leave the seat giving that extra level of confidence that the machine if performing as desired when **DISC**EYE working with valuable seed types.





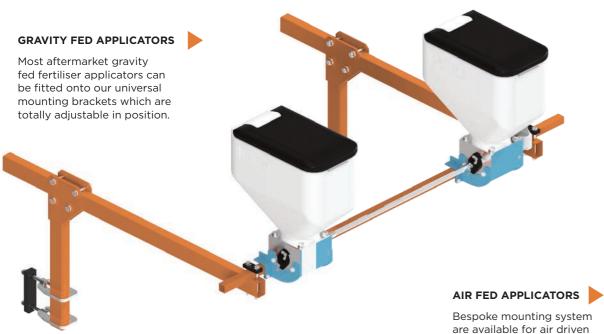






APPLICATOR SOLUTIONS

Stanhay can make provision to fit most aftermarket chemical or fertiliser applicator systems with different mounting brackets. Placement of the product can be achieved with our own fishtail or straight fertiliser outlets at the coulter or mounting systems can be added to suit most other aftermarket systems.

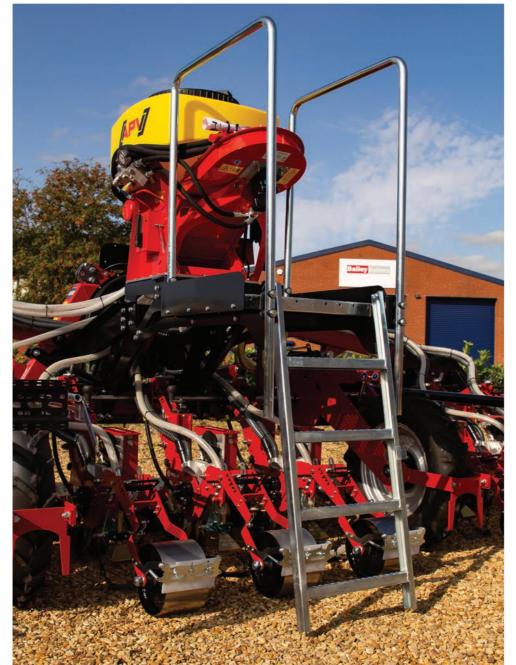


are available for air driven applicators including access platforms for safe filling.





























TECHNICAL SPECIFICATION

	x10	X10 E-DRIVE	х30	X30 E-DRIVE
PLANTER TYPE	AIR	AIR	AIR	AIR
SEED TYPE	NATURAL + PELETED	NATURAL + PELETED	NATURAL + PELETED	NATURAL + PELETED
MULTILINE CAPACITY	Single Line only	Single Line only	Upto 4 lines per row	Upto 4 lines per row
HOPPER CAPACITY (L)	1/2/6/8	1/2/6/8	1/2/6/8	1/2/6/8
MIN/MAX SEED SIZE (mm)	1–10	1-10	1-10	1-10
MIN/MAX NUMBER OF ROWS PER MACHINE	2-18+	2-18+	2-18+	2-18+
MINIMUM ROW SPACING	180	200	250	250
APPROX ROW UNIT WEIGHT (kg)	60-65	60-65	72-85	72-85
ROW UNIT LENGTH	1480	1480	1490	1490
DEPTH CONTROL RANGE	90mm	90mm	90mm	90mm
COVERER OPTIONS	Arm or Drag	Arm or Drag	Arm or Drag	Arm or Drag
SEED PRESS WHEELS AVAILABLE	YES	YES	YES	YES
ROW UNIT DOWN FORCE ADJUSTMENT	YES	YES	YES	YES
DRIVE SYSTEM	28 SPEED CHAIN DRIVE	ELECTRIC MOTOR DRIVE	28 SPEED CHAIN DRIVE	ELECTRIC MOTOR DRIVE
LANDWHEEL TYRES	6.00-16	6.00-16	6.00-16	6.00-16
PTO FAN	540RPM or 1000RPM	540RPM or 1000RPM	540RPM or 1000RPM	540RPM or 1000RPM
LINKAGE CATEGORY	CAT 2/3	CAT 2/3	CAT 2/3	CAT 2/3
сцитсн	Manual	Electric	Manual	Electric





(3) STANHAY

SPECIAL PROJECTS TEAM

-Anterior -

The X-Series has been designed to be highly modular and adaptable to suit a huge range of planting setups.

Options outside the standard offering are possible and engineers within our 'special projects team' can create bespoke modifications to suit almost any scenario. This can include different wheels, covering solutions, chemical and fertiliser application system and pre coulter clod or trash clearance. You can even use the row unit in conjunction with other applicator technology to benefit from precise depth control for application of other products and seed types.



Stanhay leads the world in the design and manufacture of precision seed drills for every kind of crop. Our reputation is built on innovation, quality and performance that delivers the results growers expect.



BCS House, Pinfold Road, Bourne, PE10 9HT, UK T: +44 (0)1778 392 303 E: info@stanhay.com **www.stanhay.com**