HiSpec Xcel 1250 muck spreader:

# **Xcel spreads sheet**

Straightforward, robust and easy-to-maintain hardware would be a quick synopsis of the Xcel muck spreader from Irish manufacturer HiSpec



ide on, the Xcel looks much the same as any other rear-discharge spreader.
But under the galvanised hood there's a big difference, with the usual beater set-up replaced by a chained rotor, similar to what the Irish firm installs in its side slingers that it's been building for decades. Although in saying that, the Xcel is no spring chicken either, the first units leaving the Bagenalstown factory back in 2006. Given its novel design, it's a wonder we haven't caught up with this machine sooner – time to right that wrong.

### Drawbar suspension

In usual profi form we start at the front. The drawbar can be fitted with a bolt-on swivel eye or K80 spoon. The latter might be more appealing given the 4t tongue load if you want to utilise the 14t gross weight. On paper the 7.3t spreader can be loaded with 12.5t of muck.

The Xcel's sprung drawbar is hydraulically adjustable. A double-acting spool is used to set the height but can be isolated via a ball valve located on the right side once this job

is done. Suspension damping is provided by two sizeable accumulators.

There is the option of a hydraulic parking stand, which also needs a double-acting spool. Taps are fitted here as a back-up in case the tractor doesn't have the required four spools. Only two double-acting spools are needed to operate the spreader: one for the chain-and-slat floor and another for the slurry door. All of the hoses are marked with a colour that corresponds to a colour-coded and labelled holder on the hose rack — neat.



# THE SHORT VERSION

- ► The Xcel spreader has been in production for around 15 years.
- A horizontal rotor feeds material onto the spreading discs.
- The Xcel looks to be robust and easy to maintain.

## Getting the power out

Minimum power requirement is 112kW/150hp with a 1,000rpm pto. The spreader is actually approved for up to 257kW/350hp. The power flows in a straight line through a T gearbox and on to a right-angle 'box to the spreading discs and via two chains to the rotor. As mentioned, the chain-and-slat floor is powered hydraulically off the spool valve. The speed is set using the dial on the in-cab control box.

The large laser-cut scale shows the position of the slurry door.

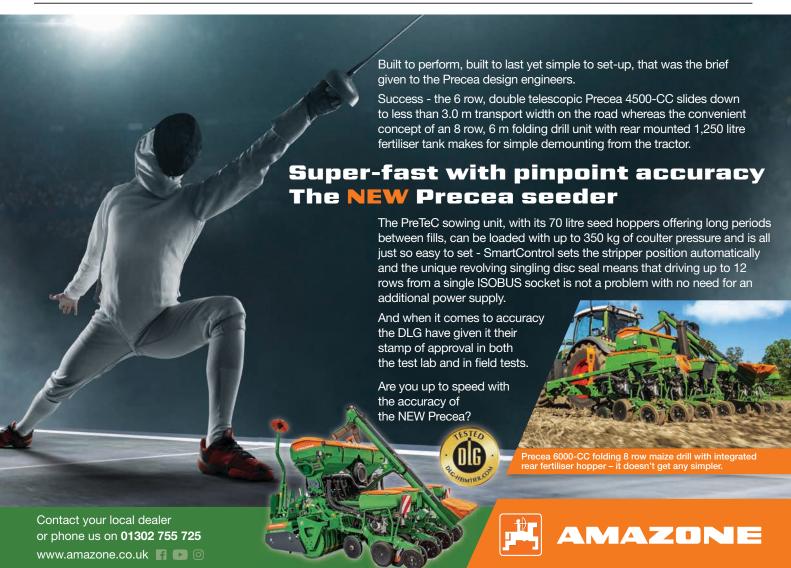
The rotor unit is protected from overload with shear bolts on the main drive and on the spreading discs. In addition, a spring-loaded door forms the lower part of the rear hood to increase the space above the spreading discs for coping with foreign objects.

## The side slinger bit

Now we reach the unique bit on the Xcel, the chain rotor. Mounted horizontally, it has four rows of 50cm long chains with a hammer flail made of Hardox on the end. These spin at up to 230rpm, milling the material down to the spinning discs.

According to the maker, the spreader can deal with material from your everyday farmyard manure to digestate and even lime. The rear galvanised hood is also made of Hardox. Each of the two 1.10m diameter discs sports four vanes bolted in place, again made from the durable Hardox steel, as are the deflector plates positioned behind the discs. Claimed spreading width is up to 24m.

During our visit, the spread pattern made a decent visual impression despite the high application rate, the 10cm wide flails breaking the pig muck into a similar size. However, we





You can access the tensioner for the moving floor under the flap at the front.

The driveline runs under the bed to the rear T gearbox that powers the rotor and spreading discs.

DATA SHEET

#### HiSpec Xcel 1250

7.3t	Kerb weight
14.0t	Gross weight
ht <b>19.8t</b>	Technical gross weig
8.30m/3.00m/2.96m	Dimensions (L/W/H)
5.00m/1.49m/1.40m	Load area (L/W/H)
2.45m (3.05m) <sup>1)</sup>	Loading height
12.5m³ (max 16m³)¹)	Volume
2 x 14mm chains	Chain-and-slat floor
Chain rotor + wide	Spreading unit
spreading unit	
oreading discs <b>1.49m</b>	Clear space above sp
Up to 24m	Working width
From 112kW/150hp	Power requirement
1,000rpm	Pto shaft
Min of two	Spool requirement
double-acting	
From £45.000	Price (excl. VAT)

Manufacturer information. All machine data are measured with 580/70 R38 tyres, <sup>1)</sup> incl. extensions



Once two chains are connected to the slurry door, this can be used to lift the spreading hood into its service position. There are 22 chains dispersed across four rows.

Guards connected to the slurry door protect the road lights.



needed to use a larger overlap to ensure good match-ups. This, in turn, meant we couldn't exploit the full 24m working width. The load needs to be evenly distributed across the hopper to help maintain an even application and prevent one side of the rotor doing more than its fair share of the graft.

#### Low load

The 5.0m long and near 1.50m wide body that flares out to 1.70m has a volume of 12.5m³ without extensions. Booted on 580/70 R38



rubber, the top of the sides measures 2.45m from the ground, making it possible to load with a tractor loader. There is the option of wider 650/75 R32 tyres, but these push the on-road width to over 3.0m.

Ground clearance under the drawbar is 38cm rising to 45cm under the guard on the left-hand side of the machine. Many of the areas such as the mudguards, rear hood, slurry door and pto guards that are prone to collecting material are galvanised.

#### Easy service and maintenance

The spreader's moving floor is tensioned up from the outside by tightening two threaded pins at the front. The drive sprockets can also be accessed for greasing by swinging open the front guard. The slats are push-fit onto the two floor chains. To replace the slats, you need to remove the chain from its guide and pull off the slat.

Overall, maintenance is pretty simple: only the bearings in the middle of the main driveshaft are difficult to get at, as you need to crawl under the spreader. The lube points for the spreading unit are grouped in a bank on the left alongside the oil reservoir for the central lubricator for the two rotor drive chains.

Incidentally, removing the rotor from the spreading unit is easy if it needs maintenance. Just pull off the gear, the two plates and the mountings. Then you can remove it with a forklift. The rotor bearings are outside the spreading unit in special mounts — a design that protects them from contamination.

An automatic oiler ensures the chain is lubricated. The grease points are grouped.



A rubber section on the slurry door ensures no manure is thrown towards the tractor.

#### Still being refined

The running gear is rated for 40km/hr and can be equipped with hydraulic or air brakes. While braking force is currently set manually, in the future the plan is to connect this to the pressure in the spreader drawbar's hydraulic suspension. LED lighting is also part of the standard package, and the upper rear road lights are protected by metal flaps when the slurry door is opened.

#### Other details

- There is a storage box for tools and spare shear bolts.
- The slurry door slides in chamfered runners so any manure that is trapped within the runners is squeezed out.
- A boundary spreader is a £2,350 option.
- A weighing system that uses the drawbar suspension cylinders and weigh cells can be fitted. This can be connected to ISObus controls and load-sensing.



The speed of the spreader floor is controlled using the dial on the in-cab box.

 60cm side extensions bolster capacity to 16m³ when dealing with lighter material.

**Summary:** The HiSpec Xcel makes a good first impression. The side-spreader style chain beater is straightforward and the spreading pattern seemed uniform despite the solid pig manure, although we didn't fully exploit the machine's maximum working width.

Smaller tractors can handle the big spreader without an extension, provided they have a hitch capable of handling the 4.0t load. Price of the base spec Xcel 1250 is £45,000.

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\*Terms and conditions: Finance for business purposes only. Subject to acceptance and affordability checks. Applicant must be 18 or over. 5-year/3000 hour extended warranty. Promotion valid until 30th June 2022. 0% finance available with a profile of 5+55 monthly payments. Available on new equipment only with RRP 50%. The finance product offered under this promotion is Hire Purchase. First payment, full VAT and a documentation fee of £50 are due on signing. An option-to-purchase fee of £50 (plus VAT) will be collected with the final payment. You will own the machine when all payments have been made. Alternative finance options are available. Terms and Conditions apply. Images are for illustrative purposes only. Annual admin fee of £40 (plus VAT). As funder we may pay a commission, fee or other remuneration to credit brokers who introduce business to us, please contact them if you require more information. Kubota Finance is a trading style of BNP Paribas Leasing Solutions Limited. Finance provided by BNP Paribas Leasing Solutions Limited, Northern Cross, Basing View, Basingstoke RG21 4HL. Registered in England No. 901225.

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