

The Seed Spider Metering System is the world's first electronic seed metering system. It is a revolutionary device that accurately meters seed from a bulk hopper to multiple outlets.

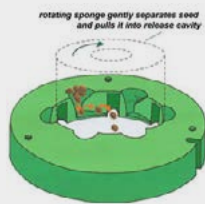
It is noticeably more accurate over a wider range of seed types than virtually all of the existing equipment on the world market.

It is best suited to seeds ranging in size from 10 to 4000 seeds per gram (for example, raw carrot or lettuce seed up to seed the size of a pea).



HOW DOES IT WORK?

A 12 volt DC geared motor drives a sponge rotor within a vertical cylindrical metering plate. This metering plate has multiple channels in its internal wall, along which seeds are gently separated by the rotating sponge and carried to individual outlets.



The gentle nature of the sponge ensures seeds are never damaged, and a wide range of seeds can be accurately metered; raw, coated or pelleted.

The speed of the drive motor is controlled electronically. International Patent Number: PCT/NZ/9500059

key features of the seed metering system:

METERED SEED OUTLETS

The standard metering system has 6 outlets. Interchangeable metering plates provide options from 1-6 outlets.



SPONGE ROTOR

The unique patented rotating sponge pad gently separates and meters the seed without damaging it.



SEED HOPPER

The 7 litre (1.8 gallon) seed hopper is ideal for most seeding applications and is transparent for convenient seed level monitoring. The seed hoppers have a quick release fitting to allow them to be lifted off for easy emptying. A 50 litre (13 gallon) version is also available.



QUICK SEED CHANGE

Change from one seed type to another in less than 60 seconds.



HIGH QUALITY

Manufactured to uncompromising standards, Seed Spider Metering Systems are constructed from stainless steel and plastic to eliminate corrosion and ensure long term reliability.

encoder control system:

ELECTRONIC CONTROL

All machines are sold with the encoder control system. The system consists of an Encoder Controller and Encoder Motor Driver with integrated GPS receiver. The Encoder Controller is mounted in the tractor cab for easy adjustment and monitoring of the system and communicates wirelessly with the Encoder Motor Driver mounted on the seeder.



The Encoder Controller has a membrane keypad for easy parameter adjustment and an LCD display for user feedback of system status.



The Encoder Motor Driver maintains a constant sponge speed which provides a more accurate seeding rate. An encoder, internal to the seed metering unit, is used to measure the speed of the sponge and the motor driver then maintains the desired speed. This unit has an integrated GPS receiver which maintains a constant seeding rate irrespective of tractor speed.

KEY FEATURES OF THE ENCODER CONTROL SYSTEM:

- Low minimum rpm settings, as low as 0.6rpm for ultra low seeding rates.
- Each metering unit is individually controlled, meaning there is greater consistency between metering units.
- The controller recognises and compensates for loading variations on each individual motor, keeping each motor consistent with the set seeding rate.
- Fewer components. Junction boxes and motor monitor boxes of old have been replaced with the one unit.
- The EMF controllers are compatible with a power supply booster that will raise the top end speed of the metering unit to approximately 40rpm.

Like all Seed Spider equipment the EMF controllers have been designed for simple operation. On the EMF Standard Controller a single dial is used to set the seeding rate. On the EMF Speed Sensor Controller there are only two dials, one to set the seeding rate and the other to set the speed used in calibration. On both controllers the EMF feedback control is done automatically behind the scenes by the controller. Harvesters are constructed of stainless steel, meeting all food hygiene requirements and ensuring a long life with minimal wear.

METERING SYSTEM