

Collecting and using brush-harvested seed

The brush harvester collects seed but does not cut the grass, so the hay can be cut afterwards.

Some loss of hay quality may occur, if the normal hay-cut is delayed. Landowners are normally paid a premium to compensate for this.

The meadow to be harvested (the “donor site”) will normally be ready in mid-July (southern-central England) or late July-early August (upland Britain). This is when the main grasses, such as Crested Dog’s-tail and Meadow Foxtail hold ripe seed, and the Hay Rattle seed is still on the plants.

The seed mixture that is collected will only include seed of plants which hold ripe seed at the time of harvesting. “Missed” species will usually include Ladies Bedstraw, Devil’s-bit Scabious and Meadowsweet as well as some early-flowering plants.

Brush-harvesting is a fair-weather operation that must be carried out in dry weather, and once the morning dew has evaporated.

Three types of brush harvester are available: PTO, trailed (standard tow ball joint) and pedestrian.

Work rates

Emorsgate (PTO): 3.2 ha per day (sufficient to sow 8 ha)

Eyre (trailed): 2 ha per day (sufficient to sow 5 ha)

Rekord (pedestrian)*: up to 1 ha per day

*this is a lightweight machine that has not been widely tested on lush hay meadows



Emorsgate Brush Harvester (Photo: Sue Everett)

Method of working

The harvester is towed across the site and seed is brushed into a hopper; the seed is emptied on to tarpaulins when the hopper is full (about every 20 minutes).

If it is not to be down directly, the seed is spread out to dry and raked through during the day to help it to dry. Long stalks are also raked out. The seed can be dried outside if the weather is fine, but may need to be taken inside and dried in well-ventilated barns if rain is threatened. It can take between two and seven days to dry, and must be regularly raked through to prevent it becoming mouldy. If the seed from a day's harvesting has to be transported any distance, it should not be kept "en masse" for more than a few hours until it is dry, as it will heat up and the seed will become unviable.

Seed yield

The seed yield will vary from site to site, from field to field and within fields. It can also vary from year to year on the same site. A yield of between 10kg- 25kg per acre is considered a low-average yield.

Processing and sowing

Once dry it can be stored, then cleaned using a combine or seed cleaner to remove most of the stalky material and husks. It is best broadcast using a spinner (Zircon or Vicon type). If the seed is well-cleaned it may be possible to drill it, e.g. using a corn drill with the spouts removed. Seed of wild flora should always be drilled or broadcast on the soil surface and never buried at any depth.



Unprocessed seed can be directly sown by bagging it up straight from the hopper or tarpaulin and taking it across to the receptor site, where it can be broadcast by hand from the back of a trailer or pickup. (It will not pass through a spinner.) Due care should be taken for health and safety.

This note was produced by Sue Everett, as a contribution to the *Flora locale* Local Seeds for Local Needs Initiative and the Thames Valley Meadows Action Plan Project. October 2004.

Eyre Brush Harvester. (Photo: Sue Everett)