

# Managing cattle movement of prickly acacia for spread prevention

Managing prickly acacia (*Vachellia nilotica*) seed movement is critical to limiting the spread of prickly acacia and maintaining prickly acacia free areas. Cattle containing prickly acacia in their gut is the primary short and long distance means of dispersal of prickly acacia seed via manure (Image 1). To reduce seed movement by cattle, a defined period of spelling before movement is needed to allow cattle to naturally remove all seed from their gut.



**Image 1: Seed recovered from cattle faeces and seed in dry cow manure**

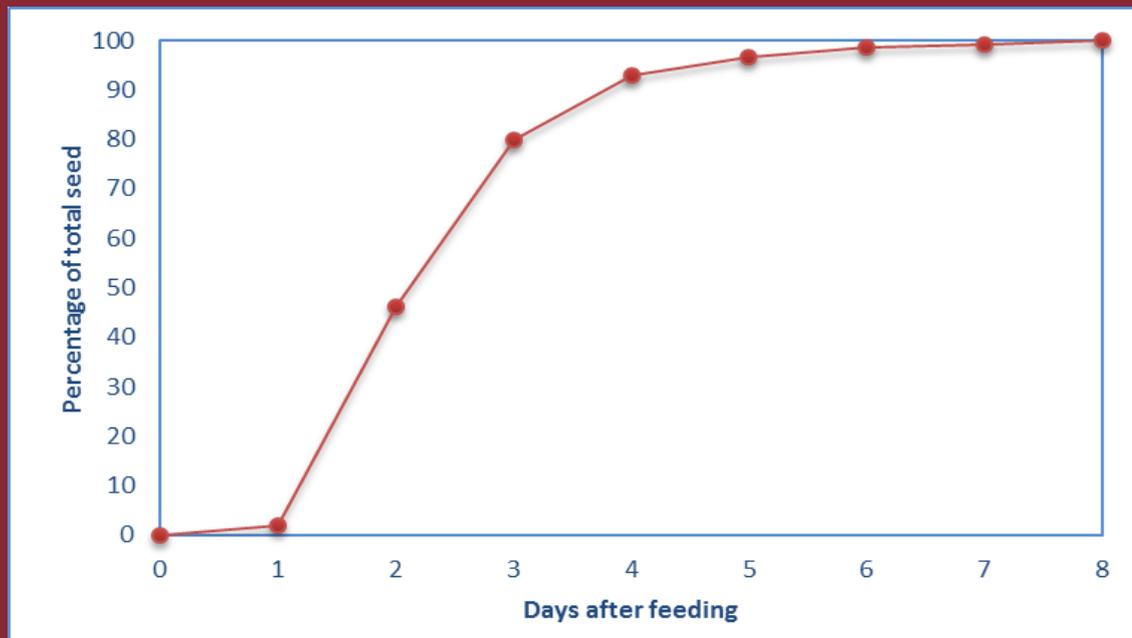
## Seed passage through cattle - field trials

Department of Agriculture and Fisheries staff investigated the timeframe which prickly acacia seed takes to travel through the digestive system of cattle. The trial was completed under field conditions at Julia Creek where 45 head of cattle were fed prickly acacia pods and sorghum stubble hay. Faeces were collected and sieved until no prickly acacia seed was found for three consecutive days (Image 2).



**Image 2: Cattle feeding on sorghum hay and faeces collection**

By the second day after consuming pods, cattle had passed 46% of seed with 93% passed by the fourth day post pod consumption. By day six 99% of seed had passed with no seed found in faeces eight days after ingestion (Image 3). Of the seed that was recovered from faeces, 14% were found to be viable, however this figure can reach up to 50% depending on whether seed is dormant when ingested. This result is consistent with a number of overseas and Australian trials conducted on prickly acacia and other species which found all seed passed after seven to eight days from cattle fed a range of feeds including Lucerne hay, native grass and browse and oaten chaff.



**Image 3: Percentage of seed recovered from cattle faeces each day after feeding prickly acacia seed**

## Considerations when cattle have had access to prickly acacia pods

- A weed seed spread risk occurs when cattle have access to prickly acacia pods, whether the pods are visually mature or otherwise.
- Movement of cattle containing seed will facilitate the spread of prickly acacia, whether on property (around a paddock or between paddocks), between properties, to your property via sale yards and along stock routes, highways, roads and railways.
- To prevent seed spread, cattle movements must be carefully managed, including holding cattle in an area free of prickly acacia pods for a period of at least six and up to eight days before or after transport or moving cattle.
- Holding areas must be monitored for emerging prickly acacia seedlings with control undertaken as necessary.

## Further information

Further information is available by contacting SG NRM (call 1800 676 242) or Biosecurity Queensland (call 13 25 23 or visit [www.biosecurity.qld.gov.au](http://www.biosecurity.qld.gov.au))