

## Conservation of maize stovers



**Maize stovers conservation** in the field for utilisation by livestock.  
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### 1. Introduction

#### **Conservation of maize stovers**

Maize is the third most produced grain after wheat and rice but leads in crop fodder production both globally and in Africa. Annual maize have been estimated to be 1816 and 340 million tonnes in the world and Africa, respectively. Maize is largely grown and left to dry to less than 20% grain moisture content before harvesting. The dry grain is a widely used staple in tropical regions. In Africa, many communities differently prepare 'porridge' and 'cakes' from maize meal e.g. 'Ugali', 'Fofu', 'Kita' and 'Pap' which are popular in East, West, North and South Africa, respectively.

Harvesting maize at grain milk stage for human food (roasting and boiling) is also popular. Stovers harvested at grain milk are greener and more appealing to ruminants, hence generally have high palatability. More importantly, they have been shown to have

higher nutritive quality due to lower fibre content as compared to stovers harvested at later maturity stage.

Given that maize stover is potentially an important source of roughage for dairy cattle production, improvement in their utilization is expected to result into considerable positive impact on the overall productivity.

## 2. Tips for good maize stovers conservation

1. The leaf is the most nutritious component of maize stovers hence it is important to prevent loss of leaves in the process of conservation.
2. Maize stovers can be conserved in the field in pyramidal heaps that reduce chances of penetration by rainwater and direct sun heat.
3. There are high chances of pest, especially insects attack on stored maize stovers. Thus there should be regular inspection of the stored stovers and corrective measurements undertaken in case of such damages.
4. The bulkiness of maize stovers limits intake. Processing the stovers by grinding enhances the intake and prevents losses due to pests.
5. Chopped/grinded stovers should be stored safely with regular inspection to monitor any spoilage e.g. mould growth or rotting.

## 3. Information Source Links

- McDonald, P., Edwards, A.R., Greenhalgh, J.F.D., Morgan, C.A., 2002. Animal nutrition (6th Ed.). Pearson Education Ltd., Edinburgh Gate, Harlow, UK.
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- Ouda JO (2001). Feeding and care of livestock In: Managing dryland resources. A manual for Eastern and Southern Africa. International Institute for Rural Reconstruction (IIRR). ISBN 9966-9705-2-5.