

# Cyperus rotundus

## Recognize the problem

Family: Cyperaceae (sedge family).

Common names: purple nutsedge, nutgrass, nutsedge.

**Amharic:** Engicha; **Oromifa:** Kunii; **Kiswahili:** Masinde, Ndago; **Chichewa:** Dawe, Kandulu; **Luanda:** Enku.

Highly-variable, erect, perennial sedge (30-60 cm high), with extensive underground network composed of tubers, basal bulbs, rhizomes and fibrous roots, which enables the weed to survive during adverse conditions and reproduce profusely; tubers dark brown/black, irregular shaped, 1-2 cm long when mature; each tuber has an apical bud and several lateral buds.

Leaves: Linear with distinct midrib, 7 mm wide, emerging from base of plant.

Inflorescences: Flowering stems 3-sided, smooth with swollen bases (basal bulbs); erect habit, up to 60 cm tall; inflorescence with several unequal 'branches', 2-6 cm long, emerging from the tip of the stem; each topped by 3-8 purplish-brown flowerheads.

Fruit: 'Nut' dark brown/black, 3-angled and one-seeded, 1.5 mm long.

## Background

Origin: Africa and Eurasia.

Introduction: Human activity, accidentally as a contaminant, medicinal.

Habitat: Tropical and subtropical regions; grows in almost all soil types (except those with high salt content), altitude and soil moisture; shade intolerant.

Spread: Tubers spread in water and soil and on farm machinery. Seeds considered unimportant.

Invades: Cultivated fields, fallow land, neglected areas, road and rail sides, banks of irrigation canals and streams, edges of woods, sand dunes and lake shores.

Impacts: Competes effectively for nutrients and water with crops, suppresses growth of other species (allelopathic effects). Very substantial losses have been recorded when the weed is allowed to compete for much or all of the growing season. Losses can be high in both annual crops, e.g. upland rice, soybean and onion (>50%) and squash (90%), and perennial crops before the canopy closes, e.g. oil palm and sugarcane (>75%). Impact is most severe when competition is over an extended period and under high light and temperature conditions. Rhizomes and tubers can interfere with peanut harvesting. Infestations of purple nutsedge significantly raise the cost of manual weeding operations owing to the difficulty of removing the rhizomes and tubers.

Scientific name(s) > *Cyperus rotundus*

Inflorescence of purple nutsedge.  
(Photo by S.D. Sawant/CABI ISC)



Plants with underground tubers, basal bulbs, rhizomes and fibrous roots. (Photo by S.D. Sawant/CABI ISC)



The recommendations in this factsheet are relevant to: All Countries



Authors: CABI. Edited by participants from Ethiopia, Kenya, Tanzania, Malawi and Uganda at a workshop in Nairobi, February 2016.  
CABI  
tel: +254 (0)20 2271000 email: africa@cabi.org

Edited by Plantwise