LOCAL NAMES
Arabic (kulkul,kharoub); Fula (nammare); Hausa (matsagi,jirga,jiga); Wolof (randa)

BOTANIC DESCRIPTION
Bauhinia rufescens is a shrub or small tree usually 1-3 m high, sometimes reaching 8 m; bark ash-grey, smooth, very fibrous and scaly when old; slash pink; twigs arranged in 1 plane like a fishbone, with thornlike, lignified, lateral shoots, 10 cm long.

Leaves very small, bilobate almost to the base, with semi-circular lobes, glabrous, with long petioles, greyish-green, less than 3 cm long.

Flowers greenish-yellow to white and pale pink, in few-flowered racemes; petals 5, spathulate, 15-20 mm long; stamens 10, filaments hairy at the base.

Fruits aggregated, long, narrow pods, twisted, up to 10 cm long, glabrous, obliquely constricted, shining dark red-brown, with 4-10 seeds each. Pods remain on the shrub for a long time.

The generic name commemorates Swiss botanists Jean (1541-1613) and Gaspard (1560-1624) Bauhin. The 2 lobes of the leaf exemplify the 2 brothers; ‘rufescens’ means ‘becoming reddish’.

ECOLOGY
B. rufescens is deciduous in drier areas and is an evergreen in wetter areas. It is often found in dry savannah, especially near stream banks. It is found in the entire Sahel and adjacent Sudan zone, from Senegal and Mauritania across North Ghana and Niger to central Sudan and Ethiopia.

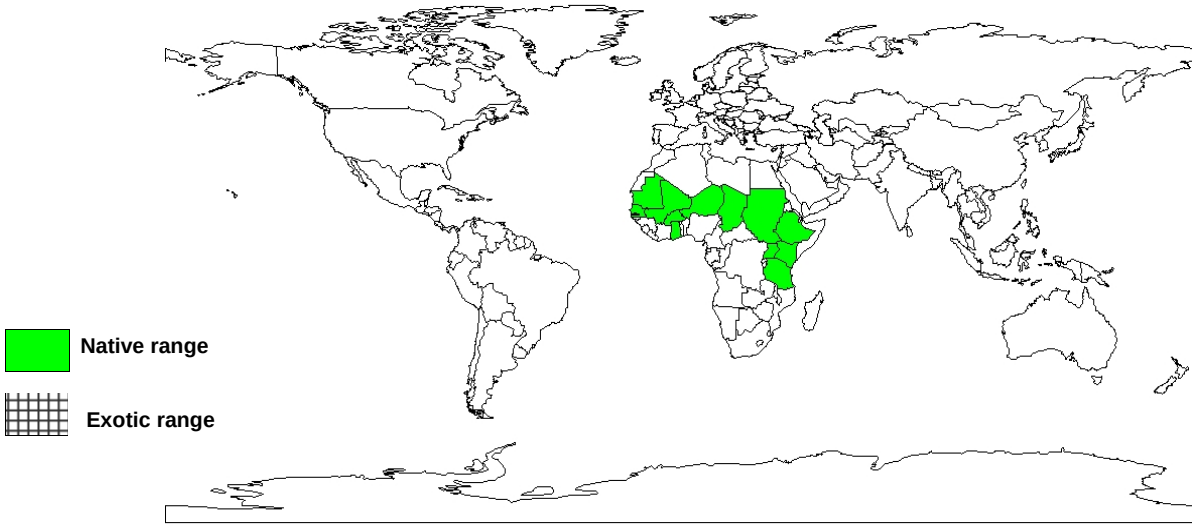
BIOPHYSICAL LIMITS
Altitude: 200-800 m, Mean annual temperature: Over 40 deg. C, Mean annual rainfall: 400-1000 mm

Soil type: B. rufescens is found on poor, arid, sandy, stony soils, as well as on deep clays.

DOCUMENTED SPECIES DISTRIBUTION

Native: Burkina Faso, Chad, Ethiopia, Ghana, Kenya, Mali, Mauritania, Niger, Senegal, Sudan, Tanzania, Uganda

Exotic:



The map above shows countries where the species has been planted. It does neither suggest that the species can be planted in every ecological zone within that country, nor that the species can not be planted in other countries than those depicted. Since some tree species are invasive, you need to follow biosafety procedures that apply to your planting site.

PRODUCTS
Food: In Ghana, farmers, hunters and field workers eat the wild fruits.

Fodder: The green and dried fruit and the leaves and shoots are valuable forage, favoured by many species of wild and domestic animals, which may cause the extinction of B. rufescens in regions overstocked with livestock. In Sudan, the pods are said to be the most valuable forage for camels. The nutritive value of the pods is characterized by crude protein 13.5% dry matter (DM), net energy 5.4 mJ/kg of DM, digestible protein/FU 0.19, and digestible DM (leaves) 51%.

Fuel: The wood makes acceptable firewood and good charcoal.

Fibre: The crude bark is used for binding. The bast fibre serves as a plaiting and binding material, and in Sudan the fibre is extracted for cordage.

Timber: The light-brown, fine-grained wood can be used for carpentry, joinery and wood-carving if sizes sufficiently large are available; otherwise it is used as stakes and fence poles.

Tannin or dyestuff: The bark contains tannin and is locally used for tanning hides.

Medicine: An extract of the root is used as an astringent or antipyretic in local medicine. Leaves and fruit are applied for the treatment of diarrhoea, dysentery and ophthalmic diseases. The bark of the roots and trunk is used to cure chest complaints, syphilis and other venereal diseases, leprosy, diarrhoea and dysentery and to reduce fever.

SERVICES
Erosion control: Planting B. rufescens in dunes can help stabilize and control them.

Ornamental: The tree is sometimes planted as an ornamental. It is suitable for roadsides, and it may easily be grown indoors provided the conditions are warm and brightly lit.

Boundary or barrier or support: B. rufescens provides a good, impenetrable, browse-resistant live fence; useful for protecting gardens, fields and compounds.

TREE MANAGEMENT
Seedlings are fairly hardy but need to be protected from browsing animals for at least 1 season. Growth is fairly slow, with a height of 1 m expected after 2 years where annual rainfall is 500 mm. If the tree is to be established in clay soils, some form of micro-catchment is recommended. There is not much experience in managing this species as yet, but it should be researched regarding production of forage. Bauhinia regenerates quickly and abundantly after browsing.

GERMPLASM MANAGEMENT
Seed storage behaviour is orthodox; no loss in viability during 1 year in hermetic storage at 4 deg. C. There are approximately 9000-10 000 seeds/kg.

FURTHER READNG

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SUGGESTED CITATION

Orwa C, Mutua A , Kindt R , Jamnadass R, Simons A. 2009. Agroforestree Database:a tree reference and selection guide version 4.0 (http://www.worldagroforestry.org/af/treedb/)