

Soft mulga



Landform	Flat to gently undulating plains (slopes <1%).
Woody vegetation	Mulga low open woodlands to tall woodlands; often associated with poplar box, ironwood, Clarkson's bloodwood and false sandalwood east of the Grey Range, and with western bloodwood and beefwood to the west. Patches with a spinifex understorey are found throughout on very acidic soils.
Expected pasture composition	<p>* Denotes non-native "Expected Pasture Composition" species.</p>
Preferred	Silky umbrella grass, cotton panic, mulga oats, hairy panic, kangaroo grass, mulga Mitchell.
Intermediate	Silky heads, bottlewasher grasses, woollybutt, purple lovegrass, woollybutt wanderrie grass, mountain wanderrie grass, five-minute grass, cane panic.
Non-preferred	Greybeard grass, wiregrasses (e.g. Jericho, dark).
Annual grasses	Hairy armgrass, three-awn wanderrie grass, comb chloris, button grass, comet grass, small burr grass, annual digit grass. Bunched kerosene (non-preferred).
Common forbs	Green pussytail, silvertail, longtails, small purple foxtail, daisy burrs, silky bluebush, galvanised burr, goathead burr, copperburrs (tangled, woolly), black roly poly, tropical speedwell, green crumbweed, <i>Muelleranthus trifoliolatus</i> , smooth goodenia, smooth velleia, mulga nettle, hill hibiscus, sidas (e.g. fine, lifesaver, ridge, shrub), tarvine, parakeelyas, caustic weed, mulga fern, weir vine, potato bushes.
Suitable sown pastures	Buffel grass, old man saltbush, mulga Mitchell, mulga oats.
Introduced weeds	Mesquite to west, saffron thistle to the east, parkinsonia and African boxthorn around water points.

Soil

Description

Shallow to moderately deep (50–150 cm) sandy to loamy red earths.

Features

Surface: Loamy hard or moderately hard surfaces; **Surface texture:** Light sandy loam to clay loams; **Subsoil texture:** Clay content increasing down profile to light to medium clays. Layers of ironshot and charcoal pieces common at depth.

Water availability

Hard-setting, hardpans may occur at depth.

Rooting depth

Low to moderate.

Fertility

Can be limited by hardpans (>70 cm).

Salinity

Very low to fair (phosphorus, carbon, nitrogen).

Sodicity

Very low.

pH

Non-sodic, except when associated with hardpans.

Usually acid to slightly acid throughout profile of red loams; tending towards neutral at depth or alkaline values with occurrence of hardpans.

Long-term carrying capacity information (A condition)

Based on fully watered area for 1AE = 450 kg animal consuming 8kg DM/day

Median annual rainfall 282 – 531 mm

Pasture type	Median tree cover (TBA m ² /ha) (FPC %)	Median annual pasture growth (DM kg/ha)	Safe annual utilisation pasture growth (%)	LTCC (ha/AE)
Native species	0 TBA/FPC	720 - 1370	15%	14 - 27
	4 TBA 10 FPC	380 - 910	15%	21 – 52

Enterprise

Breeding ewes and cows.

Land use and management recommendations

- Mulga fodder provides drought protein reserves.
- Stock lightly during dry periods and post drought to maintain ground cover and to minimise water and wind erosion and maximise rainfall capture.
- Use fire opportunistically as management tool to control woody weeds and dense mulga.

Land use limitations

- Fragile grazing lands.
- Wiregrasses often predominate in areas cleared of mulga and sandier soils.
- Mulga density and/or butter bush, fire bush, green turkey bush, false sandalwood and hopbush invasion commonly limits pasture growth.
- Strip clearing is preferable to clearing of large areas to minimise erosion, degradation and widespread whipstick mulga regeneration.
- Soil nutrient deficiencies (phosphorus, sulphur, calcium, magnesium), acidity and poor surface structure.

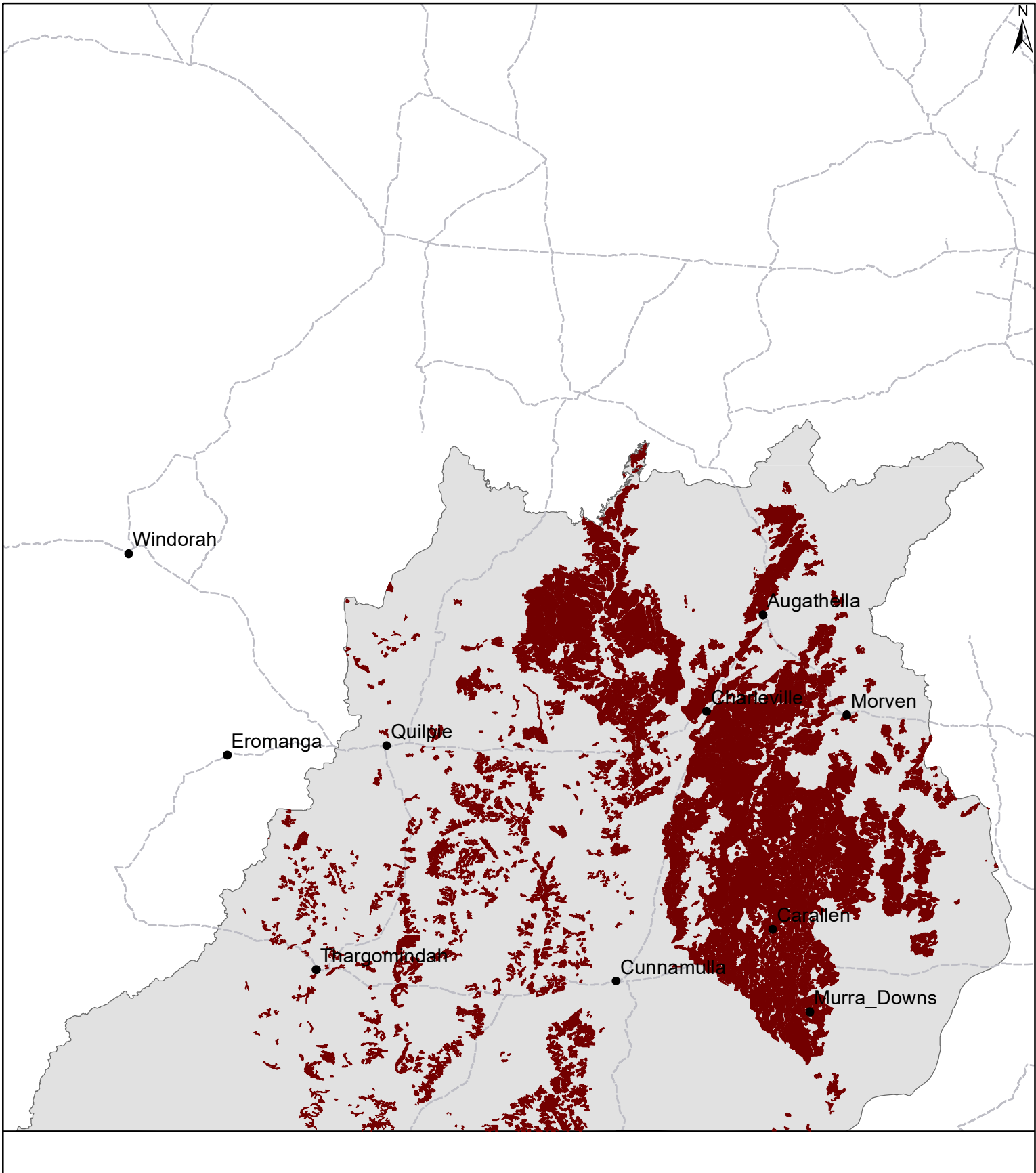
Conservation features and related management

- Mulga groves to the north and west may provide habitat for the rare and threatened fauna (pink cockatoo, painted honeyeater, yakka skink and Forest's mouse), and a diverse range of birds (Hall's babbler, thornbills, pardalotes and mallee ringneck, blue bonnet, mulga and red-winged parrots).
- Some areas to north and east are highly modified in their structural and floristic composition, and significant areas are in poor condition due to irreversible sheet erosion.
- Maintenance of ground cover is important to minimise erosion.

Regional Ecosystems

6.5.1, 6.5.6, 6.5.7, 6.5.8, 6.5.9, 6.5.10, 6.5.11, 6.5.13, 6.5.14, 6.5.16, 6.5.18.

MU09 Soft mulga



Area of land type in region: 18%
Median rainfall (region): 253 – 504 mm
Average rainfall (region): 299 – 533 mm
Area of land type with FPC: 76%
Median FPC: 10%
Median TBA: 4 m²/ha



**Queensland
Government**