CAPE YORK REGION

Normanby catchment water quality targets

Catchment profile

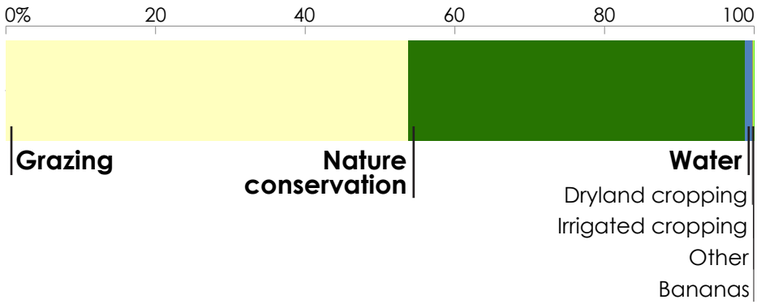
Under the Reef 2050 Water Quality Improvement Plan, water quality targets have been set for each catchment that drains to the Great Barrier Reef. These targets (given over the page) consider land use and pollutant loads from each catchment.

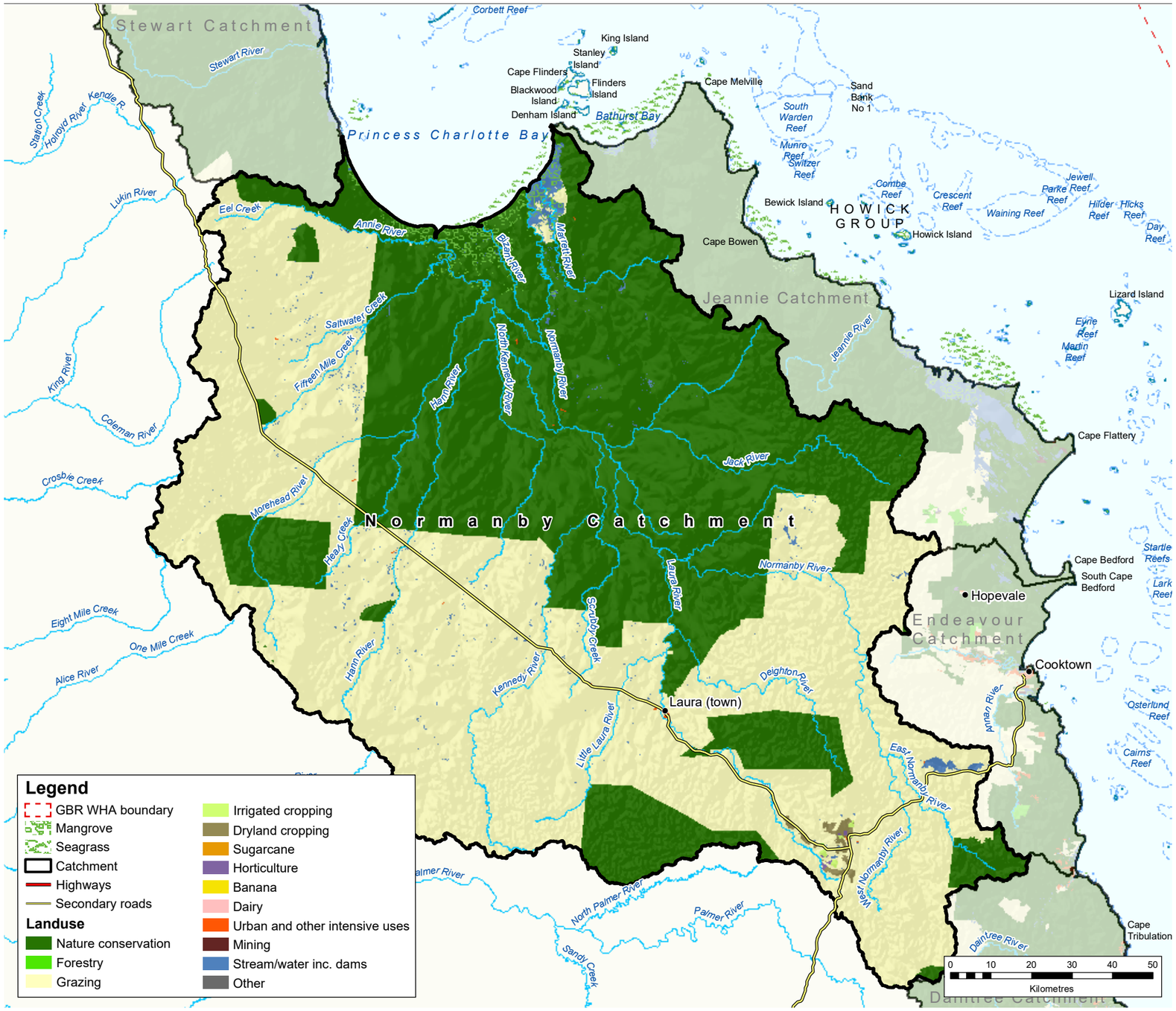
The Normanby catchment covers 24,399 km^2 (57% of the Cape York region). Rainfall averages 1104 mm a year, which results in river discharges to the coast of about 3707 GL each year.

The Normanby catchment is located in the central section of the Cape York region and is the Cape York's largest catchment. The catchment area is divided by two main waterways, the smaller Hann River in the north-western corner and the extensive reaches of the Normanby River that drain the rest of the catchment area. The headwaters of the Normanby River begin south-west of Cooktown in mountain ranges that form part of the Great Dividing Range. The Normanby River is fed by a network of smaller tributaries and sub-catchments as it travels north through seasonally flooded savanna grassland and Lakefield National Park before forming a large delta at the coast of Princess Charlotte Bay. The catchment area is dominated by grazing lands in the west and south-west, with the north-east principally for conservation. Intensive agricultural land uses of bananas and irrigated and dryland cropping are also found in Lakeland, in the upper reaches of the Laura River.

Land uses in the Normanby catchment

The main land uses are grazing (53%), nature conservation (45%), and water (1%).





2025 water quality targets and priorities

End-of-catchment anthropogenic load reductions required from 2013 baseline				Pesticides
Dissolved inorganic nitrogen (DIN)	Fine sediment	Particulate phosphorus (PP)	Particulate nitrogen (PN)	
maintain current load	**10%** 15 kilotonnes	**10%** 5 tonnes	**10%** 15 tonnes	To protect at least **99%** of aquatic species at the end of catchment

The 2025 targets aim to reduce the amounts of fine sediments, nutrients (nitrogen and phosphorus) and pesticides flowing to the reef. Where there are minimal anthropogenic pollutant loads, the aim is to maintain current water quality so there are no increases in loads. Each target for sediment and nutrients is expressed as: (a) the percentage load reduction required compared with the 2013 estimated load of each pollutant from the catchment; and (b) the load reductions required in tonnes. Progress made since 2013 will count towards these targets. Previously reported progress between 2009 and 2013 has already been accounted for when setting the targets. The pesticide target aims to ensure that concentrations of pesticides at the end of each catchment are low enough that 99% of aquatic species are protected. The targets are ecologically relevant for the Great Barrier Reef, and are necessary to ensure that broadscale land uses have no detrimental effect on the reef's health and resilience.

A high percentage reduction target may not necessarily mean it is the highest priority. The priorities (ranked by colour) reflect the relative risk assessment priorities for water quality improvement, based on an independent report, the 2017 Scientific Consensus Statement. The priorities reflect scientific assessment of the likely risks of pollutants damaging coastal and marine ecosystems.

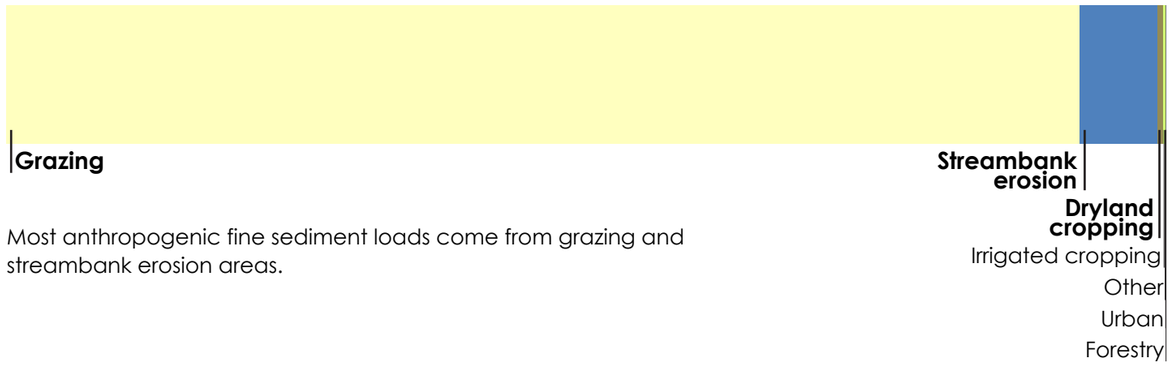
Water quality relative priority

- Very high
- High
- Moderate
- Low
- Minimal
- Not assessed

Modelled water quality pollutant loads

Of the Cape York catchments, the Normanby contributes the largest loads of fine sediment, mostly from gully erosion in grazing areas.

Fine sediment



Most anthropogenic fine sediment loads come from grazing and streambank erosion areas.

Types of sediment erosion

Most sediment erosion comes from gullies and hillslopes in the Normanby catchment.