

# Mossman River Catchment

## Catchment Information

### Description

<b>Area (km<sup>2</sup>)</b>	466
<b>% Gauged</b>	12
<b>Mean Discharge Yr (km<sup>3</sup>)</b>	0.6
<b>Rainfall (mm)</b>	2208
<b>Runoff (mm/m<sup>2</sup>)</b>	1265
<b>Runoff/Rainfall Ratio</b>	57

### Land Use

<b>Population</b>	17177
<b>Clearing (km<sup>2</sup>)</b>	19
<b>% Cleared</b>	4
<b>Area under Grazing (km<sup>2</sup>)</b>	15*
<b>Area under Sugar (km<sup>2</sup>)</b>	57*
<b>Area under Horticulture (km<sup>2</sup>)</b>	<1

### Pesticide Application

(Kg Active Ingredient/Yr)

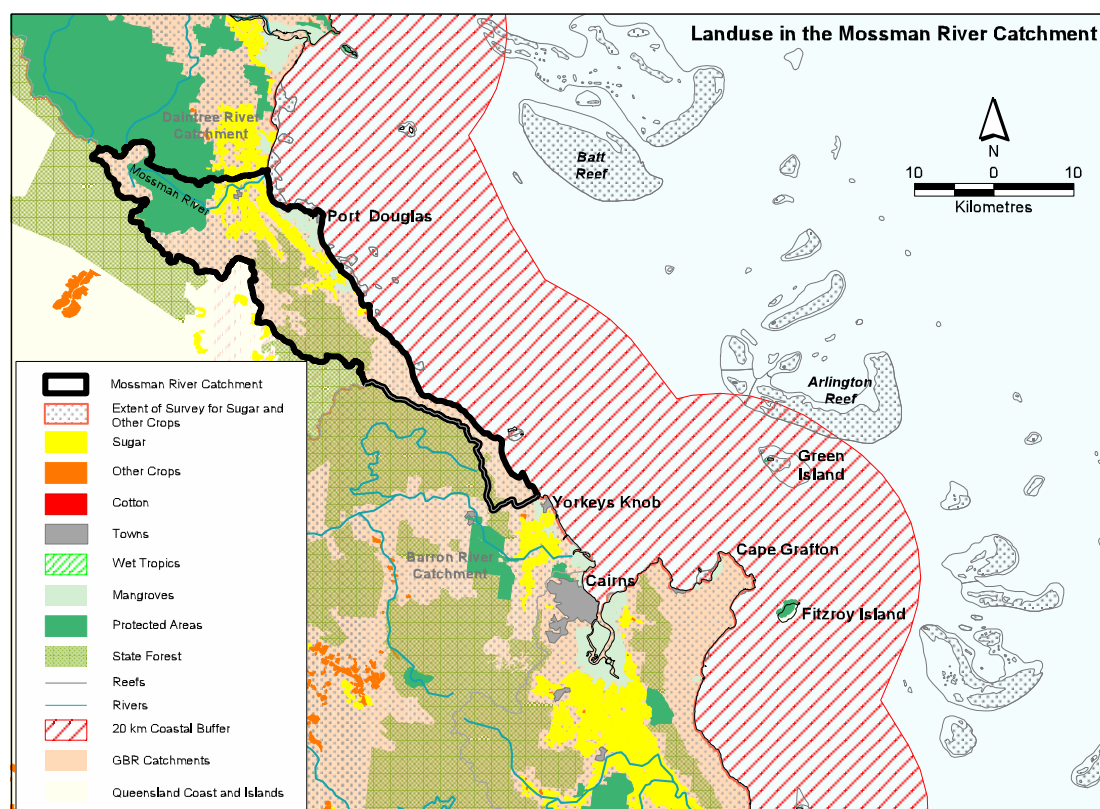
<b>Atrazine</b>	5241
<b>Diuron</b>	3278
<b>2-4D</b>	2737
<b>Chlorpyrifos</b>	1978
<b>MEMC</b>	31

Source: \* Russell et al., 1998

## Catchment Targets

	1850 T/yr	Current T/yr	Current T/ km <sup>3</sup>	ratio	2011 % Red'n	2011 T/yr Target	2011 T/ km <sup>3</sup> Target
<b>Sediment Export</b>	3000	15131	25424	5	0	15131	25424
<b>Total N Export</b>	79	231	396	2.9	50	117	198
<b>Total P Export</b>	4	25	42	6.3	33	17	28

Data Confidence Index = 1



## Mossman River Catchment

The Mossman River catchment covers an area of 466 km<sup>2</sup>. Approximately 285 km<sup>2</sup> of the catchment is in the Wet Tropics World Heritage Area. State forests and timber reserves occupy 126 km<sup>2</sup>. Grazing occupies 15 km<sup>2</sup>. Other land uses include sugarcane 57 km<sup>2</sup> with less than <1 km<sup>2</sup> of horticultural land. Sediment export is classified as low risk, whilst total phosphorus export is classified as medium risk and total nitrogen export is classified as high risk in the Mossman River catchment.

### *Issues in the catchment:*

- Use of agricultural chemicals in the production of crops is a concern for discharge of runoff to the Mossman River.
- Sugar production dominates cultivated cropping in the catchment.
- The area is becoming a significant tourist destination with urban facilities developing in agricultural land and undisturbed forests.
- Approximately 61% of the catchment is within protected areas.
- Close proximity to inshore reefal areas.
- Some fauna species are threatened.
- Commercial and recreational fishery.
- Land based and marine tourism.

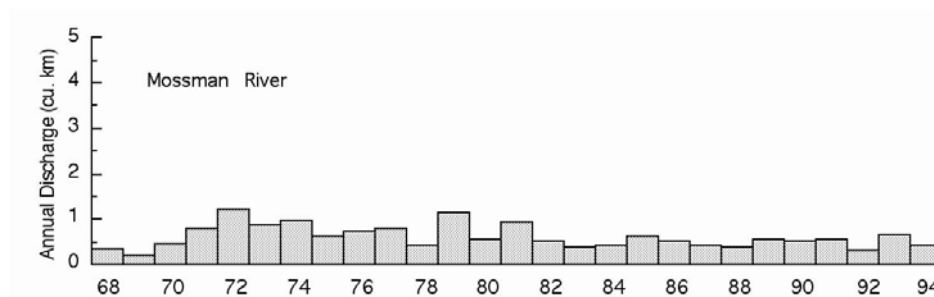


Figure 9. Water discharge patterns in the Mossman River.