

## **Submission to NSW Dept of Planning and Environment**

**Re: State Environmental Planning Policy (Coastal Management) 2016**

**From: Duranbah Swamp Drainage Union (DSDU)**

**Date: 16 January, 2017**

The Duranbah Swamp Drainage Union (DSDU) wishes to submit to the Honourable, Minister for Planning and Environment our serious concerns regarding the proposed classifications of the two coastal management areas contained within the boundaries of the DSDU.

1. Coastal Environment Area (blue shaded area on map)
2. Coastal Use Area (brown shaded area on map)

The area of land that the DSDU is responsible for managing is almost entirely intensive agriculture, ie Sugar cane, soy beans and other legumes, with some urban lifestyle properties around the DSDU perimeter.

Intensive agriculture is only viable in the Tweed Valley flood plain because of the extensive drainage infrastructure that has been developed over the last one hundred and twenty odd years. The very fertile alluvial and peat loam soils are highly productive. Tweed Valley sugar production is more than double the world average for non-irrigated cane land. However, an effective and well-maintained drainage system is essential to that production.

The Tweed flood plain is low lying and subject to frequent inundation from heavy rainfall and or flooding from the river system. The management of the drainage systems is the responsibility of several Private Drainage Boards (formally known as drainage unions), some private land owners and the Tweed Shire Council which maintains the flood gates (tidal gates) situated along the river.

It is apparent to us that much of the blue and brown shaded areas on the map are inappropriately placed and don't meet the criteria of the plan. The blue area, Coastal Environment Area, is to be mapped to one kilometre beyond the highest astronomical tide of the estuary. However, this one kilometre limit seems to have been exceeded in "McLeods Creek".

Even if the one kilometre limit has not been exceeded on the map, we question the logic of a one kilometre extension of the tidal limit. We ask, on what criteria was this decision based?

The brown shaded area, Coastal Use Area, covers a huge area of prime agricultural land. For what purpose? The three stated objectives of the Coastal Use Area are irrelevant in an agricultural area.

The drainage canal known as McLeods Creek is not a natural water course but is entirely a man-made canal. The original McLeods Creek was filled by the NSW Main Roads Department, many decades ago. (Refer to old Parish Map). It did not drain the area now known as McLeods Creek.

For the 30 plus years the DSDU has been the centre of acid sulphate soil (ASS) research in Australia and is the first area to be extensively studied in order to develop best practice protocols for the management of ASS in an agricultural area.

The land owners have been proactively engaged in this work, with the scientific community, various State Government Departments, Tweed Shire Council and the NSW Sugar Industry, throughout this thirty year period. Substantial outcomes from this work have benefited the sugar industry, the environment and the local community. Practices developed at McLeods Creek are accepted as world best practice for growing sugar cane in ASS landscape and the NSW Sugar Industry is now recognised as a world leader in ASS management. Tweed Shire Council has also been proactive in ASS management of land, water quality and including fish habitat, achieving outcomes that are recognised internationally.

DSDU questions the need for any of the river front land upstream from Chinderah to be zoned either Coastal Environment Area or Coastal Use Area. It is likely to significantly impact the highly effective systems in place that ensure sustainability of the environment and the agricultural industry.

The economic, social and environmental character of this upstream area is distinctly different from the truly coastal area of Chinderah and down-stream from Chinderah to the river mouth. Although the upstream area is estuarine it should not be considered coastal.

The proposed new Act is designed to manage coastal areas sustainably and to protect and enhance the natural environment, which is commendable. The agricultural industry is highly scrutinised by the public and media and extensively regulated by State and local government agencies. Further regulation as proposed in the Act is unnecessary and seems contrary to the NSW Government's commitment to reduce red and green tape for the rural sector.

Yours sincerely



RH Hawken  
President Duranbah Swamp Drainage Union  
Mobile [REDACTED]



R G Quirk  
Director Duranbah Swamp Drainage Union



H G Grippo  
Secretary Duranbah Swamp Drainage Union  
E: [REDACTED]

[REDACTED]

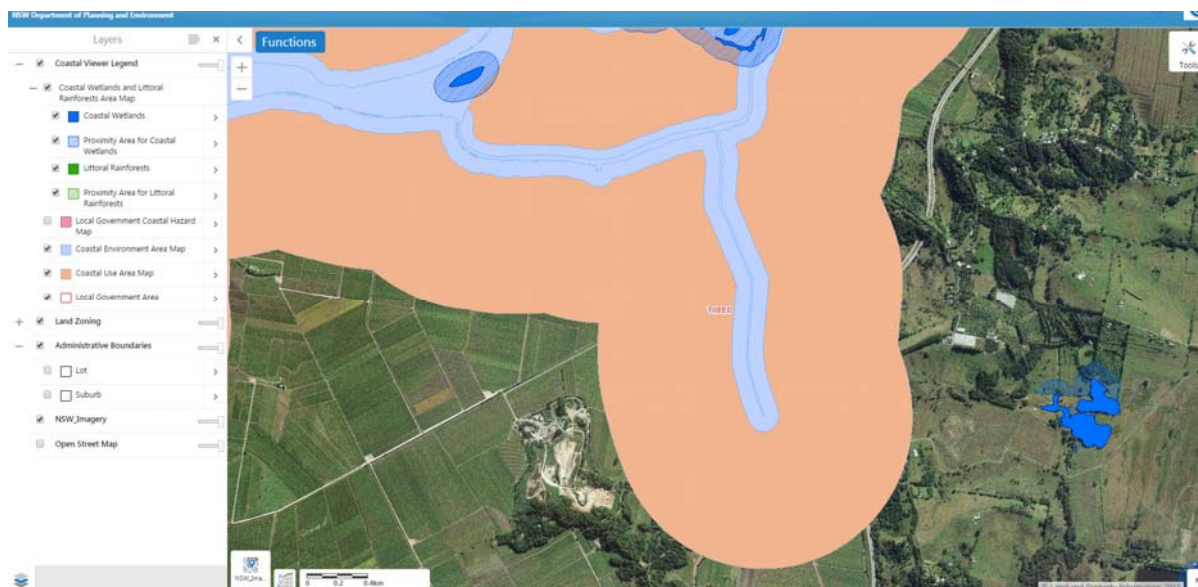
[REDACTED] CONDONG NSW 2484

The land has been mapped in part on the exhibited map under Draft State Environmental Planning Policy (Coastal Management) 2016 as part Coastal Environmental Area and Coastal Use Area. This submission is in respect to the land mapped Coastal Environmental Area and Coastal Use Area of the predominantly privately owned man made drain known as McLeods Creek.

### Coastal Environmental Area Map



### Coastal Use Area Map



McLeods Creek is flood gated at Tweed Valley Way. These flood gates restrict/prevent tidal water movement. See aerial photo below of flood gate location and a photo of the flood gates.

Flood gate location on Tweed Valley Way



Flood gates at Tweed Valley Way

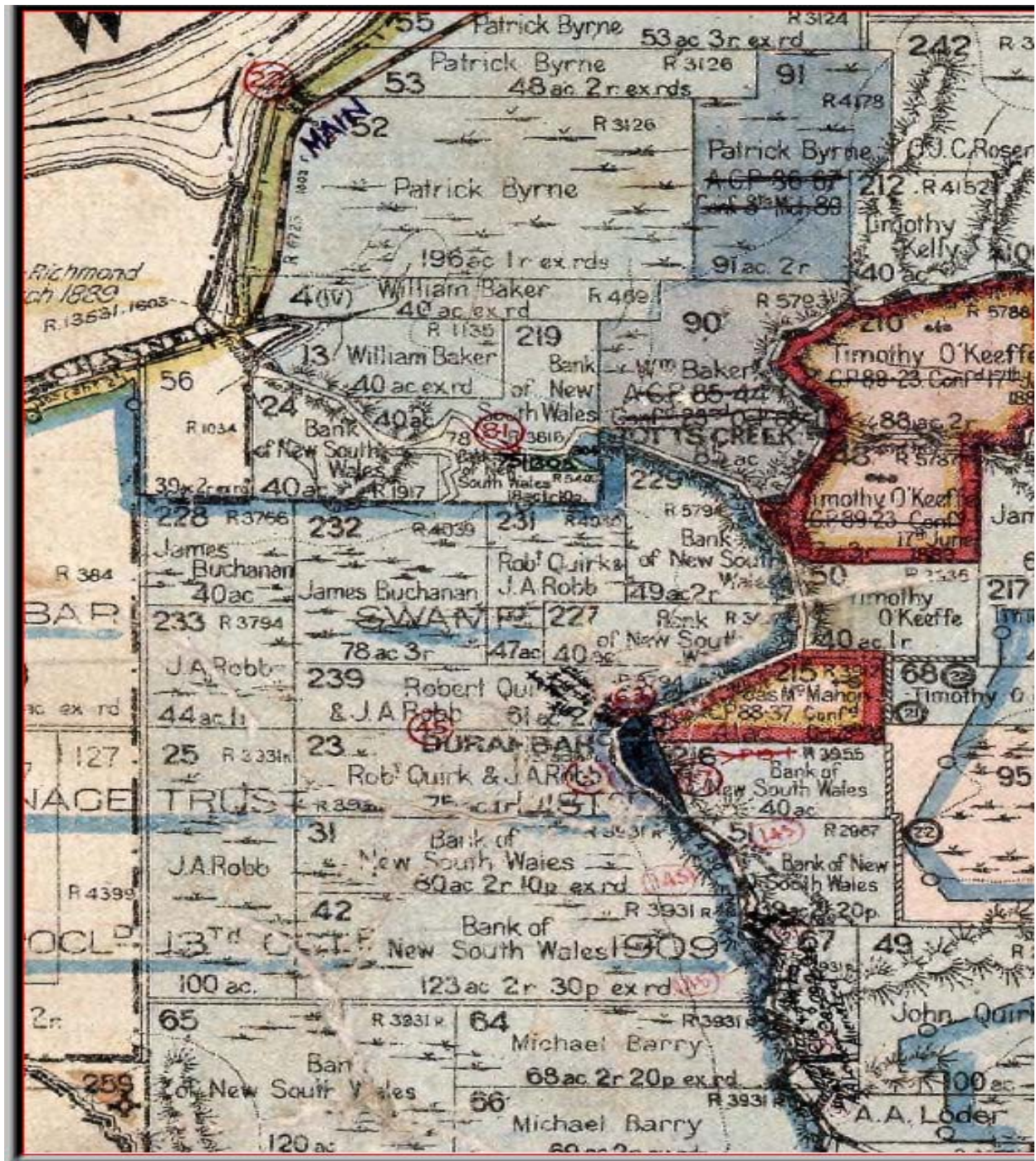




### Flood gate locations on McLeods Creek

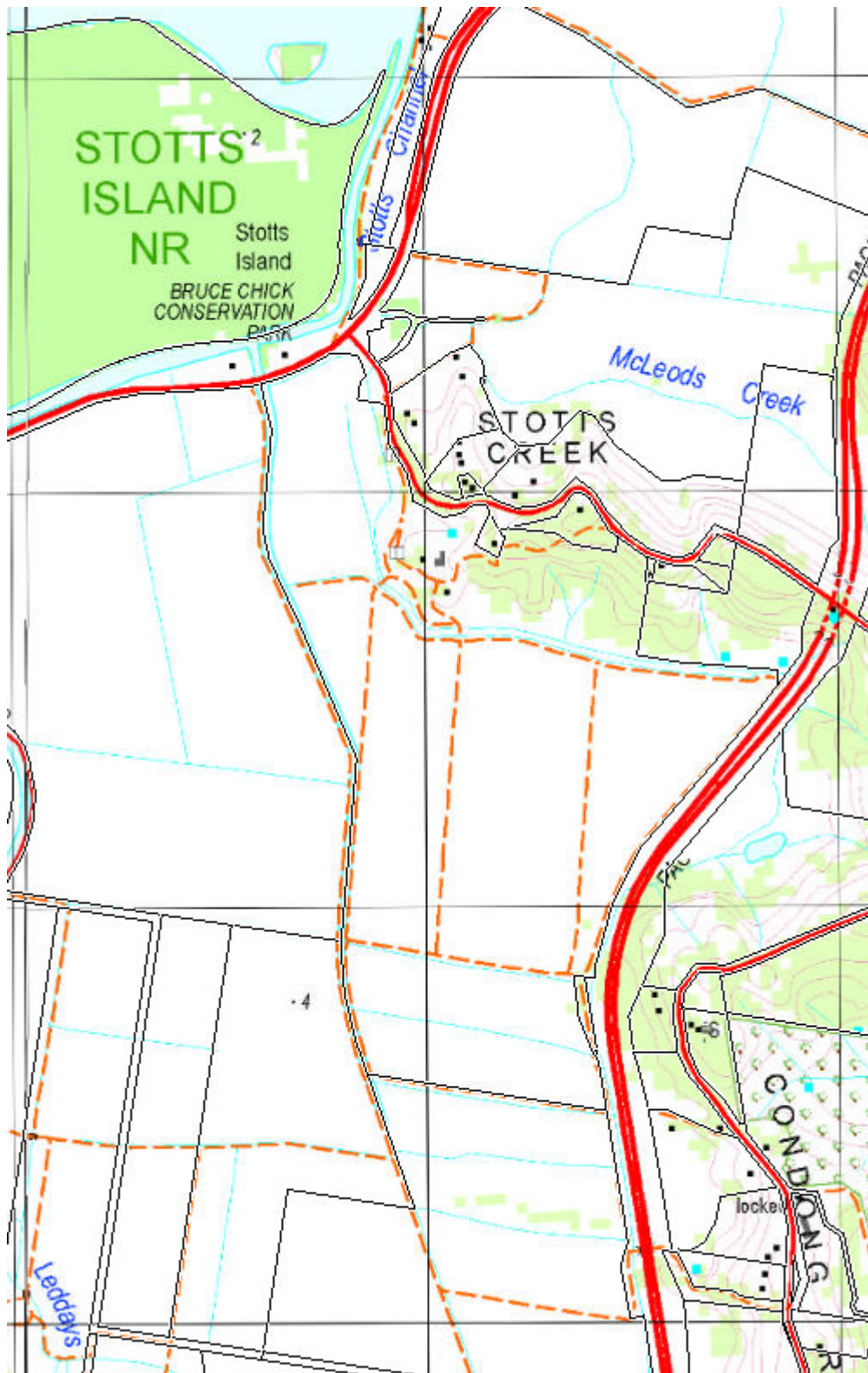


McLeods Creek was constructed in various parts through from about the 1930's to the 1960's. See part of the 1929 Parish of Cudgen plan that demonstrates that McLeods Creek was not mapped as a topographical feature.



The NSW Topographic Map below (Source : SIX MAPS) indicates that the cane drain is not McLeods Creek and is in fact not labelled at all.





The NSW Department of Natural Resources publication “Survey of Tidal Limits and Mangrove Limits in NSW estuaries 1996 to 2005” which is held on the Office of Environment & Heritage website under Coastal Management Toolkit Table 4.1 of the Tweed River is listed below. McLeods Creek is not listed in this table which further confirms that it is not fully tidal.

Table 4.1 NSW Tidal Limits - North to South Listing

| Estuary         | Creek/River              | Date       | Map             | Zone | Easting<br>MGA | Northing<br>MGA | Distance<br>from<br>Ocean<br>(km) | Comment  |
|-----------------|--------------------------|------------|-----------------|------|----------------|-----------------|-----------------------------------|--|
| Tweed River     | Piggabeen Creek          | 20-22/6/97 | Currumbin       | 56   | 544890         | 6882136         | 16.0                              | At rock pile in creek, 0.5km WNW of road bridge  |
|                 | Cobaki Creek             | 20-21/6/97 | Currumbin       | 56   | 545615         | 6880761         | 14.3                              | 75m downstream from road bridge  |
|                 | Bilambil Creek           | 19-20/6/97 | Currumbin       | 56   | 545540         | 6877511         | 14.3                              | At Hogans Bridge on road to Upper Duroby   |
|                 | Duroby Creek             | 19-21/6/97 | Currumbin       | 56   | 547765         | 6876816         | 11.9                              | Downstream side of rock dam, 100m from Benevis Place on Naponyah Road  |
|                 | Dulguigan Creek          | 1/6/00     | Murwillumbah    | 56   | -              | -               | -                                 | Fully tidal as creek now joined to Rous River by flood channels  |
|                 | Pipeclay Creek           | 1-2/6/00   | Murwillumbah    | 56   | 537935         | 6871196         | 31.6                              | Constriction in creek at rear of first house on left in Braemar Place 780m upstream from Dungay Creek                |
|                 | Dungay Creek             | 1-2/6/00   | Murwillumbah    | 56   | 537380         | 6871231         | 32.1                              | Upstream side of right bend in creek, 760m NW from Pipeclay Creek junction   |
|                 | Rous River               | 19-20/6/97 | Murwillumbah    | 56   | 533345         | 6867977         | 42.0                              | Ford 1.7km upstream from Boat Harbour Bridge   |
|                 | Mayal Creek              | 13/11/01   | Murwillumbah    | 56   | -              | -               | -                                 | Fully tidal creek connected to Rous and Tweed Rivers   |
|                 | Tweed River              | 19-20/6/97 | Murwillumbah    | 56   | 536755         | 6864577         | 35.5                              | Tide gets to weir, 5.3km upstream from bridge at Murwillumbah  |
|                 | Dumbille Creek           | 19-22/6/97 | Murwillumbah    | 56   | 538945         | 6861422         | 32.6                              | May get a short way upstream from this vicinity  |
|                 | Condong Creek            | 14/11/01   | Murwillumbah    | 56   | -              | -               | -                                 | Fully tidal creek connected back to Tweed River via Johnsons Creek   |
|                 | Bartlets Creek           | 25/6/02    | Murwillumbah    | 56   | -              | -               | -                                 | Fully tidal creek connected to Main Trust Canal  |
|                 | Main Trust Canal (South) | 25/6/02    | Murwillumbah    | 56   | 547980         | 6868756         | 27.0                              | Tide would get 20m upstream from culvert under Hawkens Lane  |
|                 | Main Trust Canal         | 25/6/02    | Murwillumbah    | 56   | -              | -               | -                                 | Fully tidal canal connected to Bartlets Creek and Leddays Creek  |
|                 | Leddays Creek            | 25/6/02    | Murwillumbah    | 56   | 548780         | 6872086         | 16.8                              | No apparent leakage through floodgates at Pacific Highway  |
|                 | Cudgen Creek             | 21/6/97    | Cudgen          | 56   | -              | -               | -                                 | Fully tidal all the way to Cudgen Lake   |
|                 | Cudgen Lake              | 21/6/97    | Cudgen          | 56   | -              | -               | -                                 | Fully tidal lake   |
|                 | Clothiers Creek          | 14/11/01   | Cudgen          | 56   | 551605         | 6866811         | 13.7                              | Heavy reed growth starts at this point, 2.2km upstream from Cudgen Lake  |
|                 | Reserve Creek            | 14/11/01   | Cudgen          | 56   | 551755         | 6865686         | 13.9                              | Creek would be tidal all the way to Clothiers Creek Road   |
| Cudgera Creek   | Christies Creek          | 1-2/6/00   | Cudgen          | 56   | 551980         | 6862356         | 5.8                               | 200m upstream from Kanes Road  |
|                 | Cudgera Creek (West)     | 1-2/6/00   | Pottsville      | 56   | 553700         | 6860267         | 5.3                               | Rock barrage 10m downstream of old ford, 1.2km downstream from Cudgera Creek Road                                    |
|                 | Cudgera Creek (South)    | 21-22/6/97 | Pottsville      | 56   | 554614         | 6859432         | 5.0                               | 200m upstream from Cudgera Creek Road, heavy reed growth   |
| Mooball Creek   | Burringbar Creek         | 1-2/6/00   | Pottsville      | 56   | 550555         | 6853872         | 11.1                              | Large rise in creek near old fig tree, 500m downstream from <i>Cowell Park</i> farm                                  |
|                 | Mooball Creek            | 25/4/02    | Pottsville      | 56   | 551035         | 6852277         | 10.6                              | Tide stopped by thick reed growth just upstream from old timber bridge which is 1.8km upstream from Burringbar Creek |
|                 | Crabbes Creek (West)     | 1-2/6/00   | Pottsville      | 56   | 552029         | 6852027         | 9.8                               | 470m downstream from upstream bridge on Wooyung Road   |
| Brunswick River | Crabbes Creek (South)    | 21-23/6/97 | Pottsville      | 56   | 554029         | 6852047         | 8.5                               | Reed growth would stop tide at Wooyung Road  |
|                 | Billinudgel Creek        | 1-2/6/00   | Pottsville      | 56   | 552704         | 6848677         | 2.5                               | Disperses into wetland at least 800m upstream from Kallaroo Circuit culvert  |
|                 | Marshalls Creek          | 22-23/6/97 | Brunswick Heads | 56   | 551629         | 6847112         | 9.0                               | 120m upstream from Pacific Highway bridge  |
|                 | Ocean Shores (West)      | 25/6/02    | Brunswick Heads | 56   | 552514         | 6846002         | 6.4                               | Small weir 6m upstream from culverts near end of Terrara Circuit   |

MHL1286 - 11

Draft State Environmental Planning Policy (Coastal Management) 2016 NSW defines

- Section 8(1)“The **coastal environment area** means the land identified by a State environmental planning policy to be the coastal environment area for the purposes of this Act, being land containing coastal features such as the coastal waters of the State, estuaries, coastal lakes, coastal lagoons and land adjoining those features, including headlands and rock platforms.”
- Section 9(1) The **coastal use area** means the land identified by a State environmental planning policy to be the coastal use area for the purposes of this Act, being land adjacent to coastal waters, estuaries, coastal lakes and lagoons where development is or may be carried out (at present or in the future”.

The Coastal Management Act 2016 No 20 defines

- **“estuary** means any part of a river, lake, lagoon or coastal creek whose level is periodically or intermittently affected by coastal tides, up to the highest astronomical tide.”

Coastal Creek is not defined in the Coastal Management Act 2016 No 20 or Draft State Environmental Planning Policy (Coastal Management) 2016.

McLeods Creek is a privately owned man made drain that is flood gated. The mapping of McLeods Creek as Coastal Environmental Area and Costal Use Area is inconsistent with the treatment of other creeks and cane drains on the NSW North Coast that have similar flood gate structures.



We respectfully request that the land mapped Coastal Environmental Area and Coastal Use Area as it relates to the man made drain known as McLeods Creek be removed from the mapping.