

MEMORANDUM

Job 10684

To: Darren de Klerk (Central Hawke’s Bay District Council)
From: Sam Morris (Lowe Environmental Impact)
Date: 26th of May 2021
Subject: P:B.13 – Existing Farming System

This memo provides an overview of the existing farming system for land owned by the Stoddart family, located between the Porangahau and Te Paerahi communities. A summary of nutrient losses for the existing farm system, alongside the future system for each wastewater irrigation stage done in OverseerFM is provided in a subsequent memo (‘LEI, 2021:P:C.14a *Existing/Future Farming System and OverseerFM Analysis*’)¹. This memo presents background information for which OverseerFM modelling is based on.

BACKGROUND

The Stoddarts own and operate four land parcels used for sheep and beef farming with low intensity rotational cropping between the Porangahau & Te Paerahi communities, Central Hawke’s Bay. These properties are located along Beach and Hunter Roads and have a collective area of 164.1 ha. Of these four parcels, only two (green) are proposed to receive wastewater equating to 114.3 ha. Figure 1 shows the location of this land, with Table 1 showing parcel details. Each parcel contains the same property address so numbers 1-4 distinguish between blocks as shown in Table 1.



Figure 1: Distribution of Stoddart Owned Land

¹ LEI. (2021:P:C.14a). *Existing/Future Farming System and OverseerFM Analysis*.



Table 1: Property Details for Stoddart Owned Land

Block	Address	Area (ha)	Legal Description	Land Use
1.	474 Beach Road	33.1	Lot 3 DP 2741	Pasture & Rotational Cropping
2.	474 Beach Road	81.2	Lot 2 DP 3877	Pasture & Rotational Cropping
3.	474 Beach Road	20.0	Lot 1 DP 3877	Pasture
4.	474 Beach Road	29.8	Lot 1 DP 2741	Pasture

*Green represents land to receive wastewater.

These parcels are located within the Porangahau River catchment and are subject to the Hawke's Bay Regional Resource Management Plan (RRMP)², as well as the Regional Coastal Environment Plan (RCEP)³ requirements.

Across much of the Central Hawke's Bay District is the need to comply with nitrogen leaching losses by Land Use Capability (LUC) class for farming land uses outlined in Plan Change 6 (PC6)⁴. PC6 relates specifically to the Tukituki River catchment, which although land in Figure 1 falls outside of this, nitrogen losses for the property can be compared with PC6 guidelines, although there is no requirement to comply. Table 5.9.1D of PC6 provides limits for a land use to be considered a permitted activity (PA). If leaching is 30 % above the PA limit, then the activity is considered a restricted discretionary activity (RDA) and requires resource consent. Above this limit, then the activity is non-complying and also requires a resource consent, although this is harder to be granted.

Properties within the Porangahau River catchment are currently not subject to have a Farm Environmental Management Plan (FEMP) by Hawke's Bay Regional Council (HBRC), thus no OverseerFM modelling of the existing farming system has been done to date. However, to determine the volume of nitrogen leaching under the existing farm system an OverseerFM assessment has been produced with information provided by the Stoddarts. A summary of the OverseerFM model for the existing farm is provided within (LEI, 2021:P:C.14a)¹ following this memo.

In addition to the four parcels in Figure 1, the farm is run in partnership with another farm north of Porangahau. Currently animals are regularly transported between the two properties resulting in seasonal variations, farm management and animal number changes over each property.

² HBRC. (2006). *Hawke's Bay Regional Resource Management Plan*.

³ HBRC. (2014). *Hawke's Bay Regional Coastal Environment Plan*.

⁴ HBRC. (2015). *Plan Change 6 to Hawke's Bay Regional Resource Management Plan: Tukituki River Catchment*.



Information around existing farm practices for the two parcels to receive wastewater was provided by Gordon Stoddart. The Stoddart's primary land use across this farm is the raising and finishing of ewes and steers, with lower intensity rotational cropping of crops such as chicory, raphno, hunter and oats occurring. Cropping is common on lower elevation alluvial soils to the northeast of the property (blocks 1 & 2 from Figure 1), with the central sand dunes and southern alluvial soil paddocks being predominantly for pasture. Due to growth limitations of the sand dunes, ryegrass is grown on alluvial soils, with cocksfoot pasture grown on sand dunes. Winter grazing of oats by beef stock is common on the central sand dunes. Cultivation and grazing across these sand dunes is very carefully managed due to their vulnerability of wind erosion with no conventional cultivation occurring.

With the land use across the property being predominantly raising and finishing of ewes and steers, the number of stock present can vary throughout and between years depending on the season. On average, approximately 600 sheep and 70 steers graze across the property with these numbers varying on an annual basis. Typically, all animals are carried over the winter period and sent to the works in late spring, with replacements coming from the second farm north of Porangahau.

The report by LEI (2021:P:B.15)⁵ provides a detailed summary of the land parcels highlighted in green proposed to receive wastewater on the corner of Beach and Hunter Roads. This wastewater application and effects on nutrient losses will be discussed further within a separate memorandum, LEI 2021:P:C.14a¹.

If you have any questions, please do not hesitate to get in contact.

Yours sincerely,

Low Environmental Impact

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⁵ LEI. (2021:P:B.15). *Evaluation of Soils to Receive Porangahau and Te Paerahi Wastewater.*