



LOGIC
Forest Solutions Ltd



EAST COAST Forest Management Unit Public Summary 2026

Business Details

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Logic Forest Solutions Ltd, Forest Manager - Introduction

Logic Forest Solutions Ltd - Ownership, History and Location

Logic Forest Solutions Ltd (LFSL) is a 100% New Zealand owned, Gisborne based, Forest management company providing a range of services to both small woodlot and corporate Forest owners primarily in the East Coast region, and more broadly throughout New Zealand. The company was established in 2000 principally for the provision of harvest planning, road engineering and pre-harvest inventory services to the East Coast region. Logic has since become involved in the due diligence, consulting, planning, and management of large new Forest establishment programmes including Pinus radiata and Manuka, and other species. By combining our technical expertise throughout the supply chain from Forest establishment and management, to harvest planning, engineering, and marketing we can provide the sound and sustainable management service.

Logic has a strong focus on Health and Safety (H&S) and Environmental management. We are a small hard-working team with the necessary skills and experience to deliver a safe, environmentally sound, productive, and cost-effective operation.

People working in the business have a statutory obligation for the promotion and maintenance of safe working conditions and sustainable land practices by working together on our approach to improving safety attitudes and stewardship in what is potentially a high-risk industry for both.

Logic strongly believes success is gauged by the quality of our contractors, and as such, we have developed strong long-term relationships with highly skilled, professional contractors in all levels of our business.

Logic FSL has been engaged as Forest Manager by Ingka Investment Management NZ Limited, and Harvest Manager in the East Coast FMU consisting of Huiarua, Matanui, Glen Alva and Ormond Forests.

Ingka Investment Management NZ Limited estate will be managed to meet the Forest Certification standards of good Forest management.

Logic Forest Solutions Ltd - Company Vision

“To lead the way in innovative Forest management, growing a sustainable future, in Forest, together”

Forest Manager - Commitment to Forest Certification Logic Forest Ltd

Logic Forest Solutions Ltd commit to adhere to the Certification Scheme Principles and Criteria in the management unit and to related Certification Scheme Policies and Standards.

Logic Forest Solutions Ltd considers the Forest Certification system an essential tool for promoting responsible Forest management for the Forest s managed by us.

Logic Forest Solutions Ltd also considers that, by complying with the Forest Certification Principles and Criteria, Forest s are properly managed from an ecological point of view, generate social benefits and are economically viable.

We want that through the procedures and measures taken in order to implement the requirements of the Forest Certification standard, we ensure the continuity of the use of wood resources, accessory products and environmental services not only for the present generations but also for those that will follow.

We have become aware of, and undertake to adhere to, the Forest Certification Principles and Criteria in the Management Unit, and to the related Forest Certification Policies and Standards.

We undertake to respect and make every effort to fulfil the requirements of the Forest Certification standard for Forest management in order to contribute to the responsible management of Forest s.

We agree to provide the certification body, subject to confidentiality, with the requested documents and to ensure its access to the managed Forests that are included in the scope of the certificate.

Based on the above, we undertake to:

- Respect the national and international legislation (CITES, ILO, ITTO, CBD, etc.) to which New Zealand is a signatory party and to fulfil the requirements of the 10 Principles and Criteria of the Forest Certification Standard for Forest management.
- Respect property rights and do not harm the integrity of the property of the members of the Forest Certification certified Management Unit(s)
- Implement legal measures to prevent and combat illegal cutting, poaching, violations of the Forest fund and other illegal or unauthorized activities.
- Respect the national anti-corruption legislation and the acts assimilated to it, respectively the commitments assumed by the anti-corruption policy.
- Develop procedures for the expression of complaints and complaints and to ensure mechanisms to resolve them and implicitly the damages caused.
- Respect the general principle of equal opportunities and treatment with the aim of eliminating any discrimination based on race, sex, religion, political opinions, national or social origin, marital status, parental status or sexual orientation.
- Support the socio-economic development objectives of local communities, including by facilitating access to wood for local operators, encouraging the purchase of local goods and services, providing firewood for members of local communities.
- Offer employment and training opportunities to local communities in the area.
- Ensure the fulfilment of all the requirements related to Labor Protection and to monitor compliance with the requirements related to Labor Protection also by the exploitation companies or contractors.
- Ensure that Forest management operations will aim at the efficient use of the multiple functions of the Forest to ensure economic viability and a wide range of environmental and social advantages.
- Identify and take measures to protect rare, threatened or endangered species.
- Designate/maintain a network of conservation areas of at least 10% of the certified surface, as representative areas of natural ecosystems that will have biodiversity conservation as a priority objective.
- Ensure the preservation within the necessary ecological limits of the dead wood on the ground and on the feet/trees for biodiversity.
- Respect the technical norms of exploitation and to ensure the protection of the soil, watercourses and neighbouring ecosystems.
- Avoid the use of chemical substances as much as possible and to exclude from total use substances prohibited by a Forest Certification scheme. In case of use, this will be done only in extreme cases and in compliance with the rules in force.
- Monitor the Forest so that we have permanent and accurate data about the current state of the Forest, the Forest production, the chain of custody, the management of activities and their social and environmental impact.
- Properly identify, through a participatory, transparent process, the High Conservation Values (HCV), and to implement appropriate management strategies to ensure their maintenance and/or improvement in the Management Unit by applying the precautionary principle.

Compliance with the New Zealand Standard (FSC-STD-NZL-02.1-2023 Plantations).

Very High Erosion Areas

In 2025 Logic Forest Solutions Limited sought the inclusion of the East Coast Forest Estate of Ingka Investments NZ Ltd into the Forest Stewardship Certification Scheme.

The audit in 2025 did not take place due to the requirement for further interpretation of an Indicator within the New Zealand Standard (FSC-STD-NZL-02.1-2023 Plantations).

Indicator 6.7.20 states, Afforestation in very high-risk erosion areas is not conducted with species that requires clear felling.

This standard applies to areas planted in 2024 and 2025 as the effective date of the standard was 15 April 2023, with a Transition period allowed of 12 months.

Since that consultation, interpretation has been carried out by the Standards Development Group (SDG), which concluded that Pinus Radiata is seen as a “species that requires clear felling”.

Ingka Investments NZ Ltd and Logic Forest Solutions welcomes the interpretation and is in planning stages to remedy any areas afforested in 2024 and 2025, in Pinus Radiata, on Very High Erosion Areas.

The identification of Very High Erosion Areas (which would also be classified as FSC HCV 4 areas) was as follows.

LFSL identified that the NESCF Erosion Susceptibility Class of Very High, (Red Zone), equates to the FSC Standard reference to Very High Erosion Areas.

We also identified that some areas (Class 4&7) identified within a land classification of Landslide Susceptibility and Connectivity, within the Gisborne and Hawkes Bay Districts, may be classified as Very High Erosion Areas.

This connectivity zone is now called the **Indicative Transition Zone (ITZ)** and is seen as a guide towards retirement from production activities (Forestry and Farming).

This Management Plan is prepared to apply FSC Management practices to the entire FMU regardless of their eligibility for Certification.

However certification will be for the land areas that are not classified as Very High Erosion Zones and were no planted in Pinus Radiata in 2024 and 2025.

Due to Criteria 6.7.20 those areas are ineligible for inclusion until they meet the criteria.

It is the goal of Ingka Investments NZ Ltd to have as many of its Forest areas certified under the Forest Stewardship Council's Forest Management Scheme to reflect the high standard of management expected from the company and the scheme.

While there are areas that currently do not meet eligibility criteria, the certification, through audit, of the majority of the areas can continue to meet that goal.

Where to then for the Very High Erosion Areas?

Large parts of the Indicative Transition Zone (ITZ) had been retired from production before the ITZ was proposed, and many have had active planting of natives or long-term, non-clearfell species already, so they do not need transition.

Those areas are proposed for certification.

For areas in the larger ESC Very High Erosion (Red Zone) that have been afforested in Radiata Pine in 2024 or 2025 Ingka will prepare management plans to **transition out of clearfell species progressively**, and at each annual audit, will propose any areas that (at that stage) meet criteria 6.7.20 to be assessed for certification.

Areas of Pinus radiata planted in 2024 and 2025 will not ever be clear-felled within those Very High Erosion zones.

This approach gives Ingka and Logic Forest Solutions a unique opportunity to design transition programs and introduce species and regimes, potentially not previously considered in New Zealand.

As earlier stated, Ingka Investments NZ Ltd's goal is to have all its forested area eligible for Certification by meeting all criteria, and is committed to the progressive transition of those areas that do not.

Forest Owner Reasons for certification - Ingka Investment Management NZ Limited

Ingka Investments Forest Assets NZ Limited and Ingka Investments Management NZ Limited are part of the Ingka Group of companies, whose ultimate parent is Stichting Ingka Foundation, which is registered in the Netherlands and is part of the Ingka Group (Ingka Holding B.V and its controlled entities) which is the largest franchisee of IKEA stores internationally operating in over 30 countries.

Ingka Investments is the investment arm of Ingka Group. To secure its long-term growth, Ingka makes responsible investments in people and businesses that make a positive difference to people and the planet, including in Forest ry. Ingka Group currently owns around 280,000 hectares of responsibly managed Forest s in the United States, Romania, Estonia, Latvia, Lithuania and New Zealand. Its firm commitment is to be a responsible Forest manager, balancing the environmental, economic, and social aspects. Its Forest management view is for long term, and it works every day to preserve and increase the Forest quality for generations to come. Ingka Investments follows a buy-and-hold strategy for its Forest investments.

Ingka Investment Management NZ Limited commit to manage all their Forest s in a sustainable way, with proper care for people and environment while also meeting our business objectives. We take an integrated, long-term approach, balancing interests of all stakeholders and securing the Forest s and their biodiversity for the future.

As a responsible Forest owner, we employ methods that will allow us to preserve and even increase the quality of the Forest land over time.

Ingka Investment Management NZ Limited are investing in New Zealand with acquisitions to create a Forest resource for a long-term future and wood supply.

Ingka has a very strong focus in its approach to lead in environmental, economic and social outcomes. Ingka is undertaking Forest Certification stewardship for all management areas as a certification to ensure that this focus is sustained for a long time. One of the key visions of Ingka is creating a better everyday life for the many people. This gives us both a unique opportunity and an important responsibility to make a positive contribution to people and the planet through our investments.

Ingka Investment Management NZ Limited endeavour to undertake all activities to meet the best outcomes to meet this vision.

Ingka are committed to Forest Certification across our entire portfolio and all the Forest Managers must be working towards this goal.

Social Context of the Forest Management Unit Region

Social, economic and cultural resources and condition, as identified in Principle 2 to 6 and Principle 9; results of assessments

Major social and environmental risks in the area, as identified in Principle 2, 3, 4, 5, 6 and 9. results of assessments.

Social Context of Gisborne

The Gisborne Region (also known as Tairāwhiti) is made up of the Gisborne District. The total current population is 53,300 across urban, coastal, and rural areas.

Population Growth is 1.3 % compared to the rest of NZ at 1.8%

Māori Population 29,680 which is a 0.8% growth and is 56% of the region's total population.

Pacific Population is 2,830 which is a 3.7% growth and 5% of the region's total population.

Mean Income is \$67,560 which is 5.5% growth in 2024.

Mean Māori Income is \$62,371 which is 5.2% growth in 2024.

Mean House Value in Tairāwhiti is \$625,923 vs. \$925,343 New Zealand

Māori in Gisborne

In 2024 among the 4 broad skill levels employment of Māori in Tairāwhiti was highest in low skilled occupations with 49% which is higher than New Zealand being 45.6%. The next largest broad skill category was highly skilled which accounted for 28.7% which was lower than in New Zealand 28.9%.

Māori make up just over half (56%) of Gisborne's population.

This is significantly higher than for New Zealand (17%) as a whole. The largest cohort of Māori in Gisborne is aged 10-14 years.

The Māori population is more youthful than the total population. Currently 10.3% of people are aged 65+ years and 27% are 14 and under with the remaining 62.7% being of working age (15-64). This means that the demand for services and facilities by Māori is likely to be different to the rest of the population of Tairāwhiti.

Social Problems of the Gisborne Region

The wellbeing framework for Gisborne noted that in 2024 Civic Engagement and Governance, Housing, and Safety were identified as key issues. The overview is that Tairāwhiti underperformed New Zealand across all domains.

Principle sources of employment in the region.

Gisborne provides employment in the following key sectors:

- Agriculture, forestry and fishing
- Health care and social assistance
- Education and training
- Construction.

In the wider Gisborne Region, the unemployment rate is 5% compared to the rest of NZ at 4% Employment Growth is 1.3% compared to the rest of NZ at 2.2%

Source: <https://rep.infometrics.co.nz/tairāwhiti>

Health and Safety

Commitment

Logic Forest Ltd (LFSL) is committed to providing, so far as is reasonably practicable, a working environment that is safe and without risk to the health and wellbeing of its employees, contractors, clients, and other key stakeholders. Every person working at or alongside LFSL must take reasonable care of his or her own safety and the safety of others.

The Health and Safety at Work Act (2015) can be accessed by staff online via the NZ Legislation website, a link to the act is provided below:

<https://www.legislation.govt.nz/act/public/2015/0070/latest/DLM5976660.html>

Health and safety policy for employees and contractors is available for Staff and Contractors. Auditing is scheduled as per the Monitoring Plan and is covered on every Site Visit and observation by LFSL Staff. Twice monthly full audits by the harvesting supervisor to ensure that contractors have up to date health, safety and wellbeing systems and to observe these systems in action.

Harvesting operations, health, safety and wellbeing policies and procedures can be found in the **Contractor Induction Booklet** as outlined under general and critical rules. These rules and the contents of the booklet are the minimum standard alongside the Approved Code of

Practice for Safety and Health in Forest Operations (ACoP) and national current best practice guides for contractors. The induction booklet is reviewed and updated annually to ensure that it is current and covers all content that is required. Contractors are required to have their own health and safety plan, which should at minimum meet and ideally exceed the LFSL policies.

Incident Reporting

Every contractor maintains an incident and near miss register. All near-misses, incident and accidents must be reported to the health and safety manager to go to the accident register.

LFSL review property damage, near-misses, incidents, and accidents to stop or reduce the chances of the same or similar incidents happening again.

LFSL prides itself on its safety culture and actively endeavour to **“Stand in the Gap”**.

Corrective Actions

Corrective Actions will be issued on the appropriate forms for any non-compliance including but not limited to the following:

- Safety breach or breach of a critical rule.
- Environmental breach.
- Property damage
- Deficiencies or improvements that can be made following an accident investigation.

The severity of the non-conformance will determine the corrective action given.

Health and safety on site

Employees, sub-contractors, and service providers are made aware of site-specific hazards during their site induction. All visitors to forests must sign in and state their intentions at the entry point. This allows LFSL employees to monitor individuals who are on the worksite and respond if someone does not check out at the end of the day.

Health Checks

All employees will be provided with the opportunity to complete an annual health check. All contractors should provide the same opportunity to their employees.

Training

LOGIC FSL maintains a record of contractors that hold qualifications for high-risk jobs, to ensure that contractors are capable of completing the job they are being hired to do.

Contractor employee’s training records can be accessed through the Competenz Training Portal.

The trainers have access to LOGIC FSL employee’s records of learning, and a separate record of courses and competencies is kept that covers first aid, traffic control/STMS, general requirements etc.

Employment

Contracts for employees and contractors are legal, satisfying the needs of New Zealand legislation.

At this stage all contracts are individual, with no collective negotiation undertaken with a union. Union membership is not discouraged, and access is not denied if requested. See below.

Employees (Staff) have individual employment Contracts.

LOGIC FSL policy on unions

Employees of LOGIC FSL and employees of contractors that LOGIC FSL hires are entitled to and welcome to join a union if they wish. LOGIC FSL and its staff will not discriminate against any worker that is represented by a union. Where workers are union members, wage bargaining can occur through a collective process. LOGIC FSL will enter negotiations with a union for wage bargaining or dispute resolution in good faith.

Unions must liaise and arrange access with the Managing Director.

Dispute resolution procedure/process

Logic Forest Solutions Ltd dispute resolution processes for employees, clients, and stakeholders. Please refer to the Logic FSL Disputes Resolution Policy for more detail.

Chemical Use Policy

Under current conditions in NZ the use of agrichemicals is an essential tool in the establishment and protection of plantation Forest s. However, Logic will seek to minimise chemical use as far as practical and use the least hazardous formulations available whilst maintaining Forest health and productivity.

Further detail can be found in the full LogicFSL Chemical Use Policy

Logic Forest Solutions Ltd promotes the reduction of chemical use in its Forests through:

- feedback on current operations from managers and field staff.
- research into the effectiveness of non-chemical alternatives, integrated pest management control, and reduction in chemical use and toxicity.
- continuous review of the Chemical register and usage.

Logic Forest Solutions Ltd will manage the use of Agrichemicals in accordance with:

- Forest Certification systems Principles and Criteria
- Relevant Legislation – Hazardous Substances and New Organisms Act, and the Health and Safety at Work Act, and any attendant regulations.
- Regional and District plans.
- NZ Standard for the management of Agrichemicals *NZS 8409:2021*
- Industry Best Practice Guidelines.

Fuel, Oil, and Hazardous Waste Management

The East Coast FMU Contractors manage Fuel and Oil on site by the following means;

The Afforestation and Silviculture contractors, sources Oil and fuel through local outlets and stores in trailer tanks at the Forest base when required.

The Earthworks contractors source Oil and fuel through local outlets and stores in trailer tanks bought to and from the site when working. Waste oil is removed from site in 20L drums by if maintenance is required. These drums are then returned to the oil supplier to be recycled.

The Tree Cartage contractors source Fuel and Oils from suppliers outside of the Forest and refuelling or maintenance is not carried out within the Forest

Policies and Objectives of the Forest Management Unit

The key objective of the Forest is to optimize the long-term value of the asset for our clients in accordance with the Forest's main functions: bio-productivity and conservation of environmental values

Logic Forest Solutions will provide a professional service which maximises return on investment for our clients and achieves a reputation for innovation, honesty, reliability and integrity. LFSL will engage professional contractors and technology to improve knowledge and value to our stakeholders.

Economic Objectives

- To ensure our clients Forests are Commercially and Economically viable.
- To ensure our business is Commercially and Economically viable.
- To maintain and add value to Forest assets
- Sustainable supply of Forest Products [Site productivity - Yield of all Forest products harvested]
- Appropriate sustainable land use

Compliance Objectives

- Compliance with all applicable Laws and Regulations.

Social & Cultural Objectives

- Restore our Social Licence to Operate
- Respect for our stakeholders, & rights of indigenous people
- Good employer to staff, and Contracted businesses
- Accountable in the community in which we operate
- Assist Stakeholder Social Programs where possible

Health & Safety Objectives

- Culture of care for the Health Safety and Wellbeing of all who participate in, or visit, the enterprise
- All home safe every day
- Drug and alcohol-free workplace

Environment Objectives

- Maintain or Enhance Growth Rates of Regeneration areas
- Protection and Enhancement of Rare Threatened and Endangered Species within the Forest
- Composition (and observed changes) in the flora and fauna shows no decline in values
- Maintain Soil Productivity, Minimise erosion
- Responsible chemical use
- Water Quality (and Quantity) is aligned with National Targets
- Soil erosion, compaction, fertility and carbon content is not negatively affected by Forest Management Practices

Stakeholders of the FMU

The largest Stakeholders within the FMU are;

Huiarua Matanui Forests:

- Te Runanga o Ngati Porou
- Popoti Ahuwhenua - Matahiia A1B Hapu Group
- Nga Hapu o Tokomaru Akau

- Waiapu Catchment Restoration Group
- Gisborne District Council Integrated Catchments Team
- Te Kura o Mata (Mata School)
- Puketoro/Mc Neil Farming
- Ernslaw One Ltd

Glen Alva:

- Tatau Tatau o Te Wairoa
- Forwood Forest Pariroa Forest Consortium

Ormond Forest

- Neighbours

East Coast FMU Summary

Forest Name	Location	Total Area (ha)	FMU Name	Driving Distances/Times
Huiarua Forest	Huiarua Road, Mata District. NZTM Map Reference:1 952 425 (N) - 5 785 377	4922	EAST COAST FMU	Gisborne to Huiarua 2.45 Hrs Via Tuakau Rd Or SH35 to Mata up Mata across River with no bridge to Huiarua (2.15 Hrs)
Matanui Forest	Accessed off Fernside Road, Tauwhareparae. Mata District. NZTM: 2035300mE, 5770000mN	1197	EAST COAST FMU	Gisborne to Huiarua 2.5 Hrs Via Tuakau Rd
Glen Alva Forest	3837 Tiniroto Rd, Tiniroto, Gisborne. NZTM: 1999656 5702792 E	954	EAST COAST FMU	40 Mins West of Gisborne on Tiniroto Rd
Ormond Forest	497 Ormond Valley Road, Gisborne, New Zealand	81	EAST COAST FMU	20 Minutes North of Gisborne on Ormond Valley Road

Huiarua and Matanui Forests

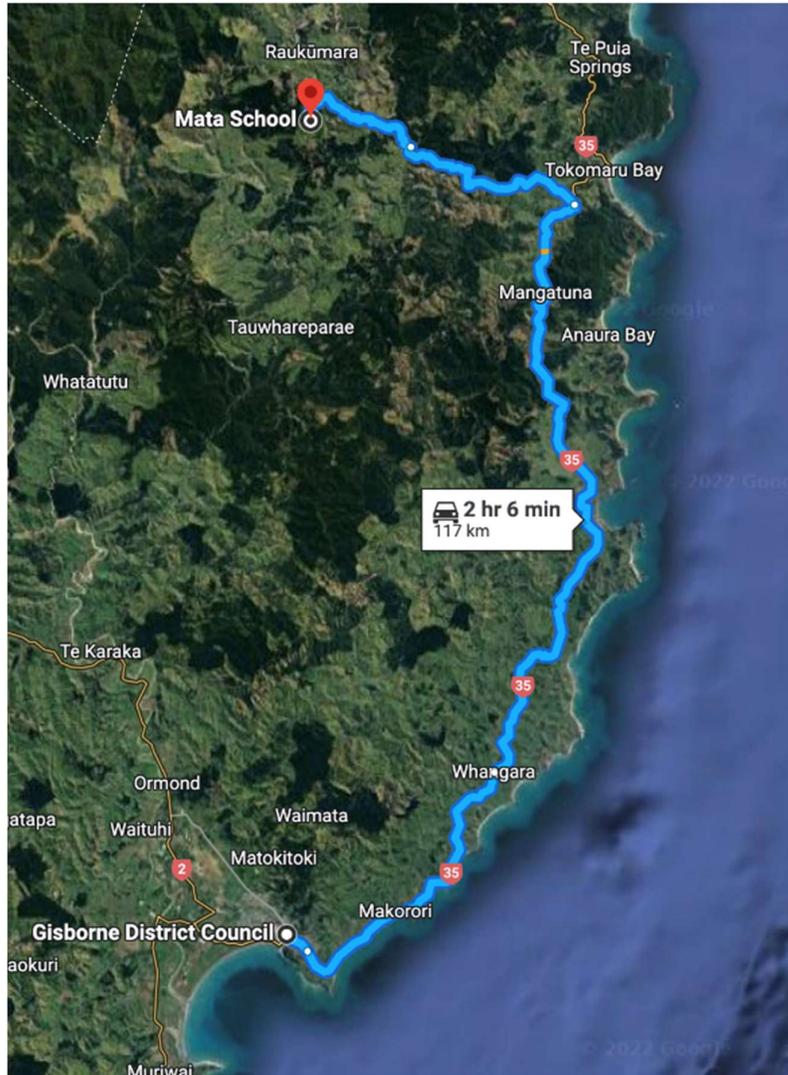


Figure 1 Huiarua Matanui Forest Location in the District

Huiarua Matanui Forestland is accessed by Mata Rd onto Huiarua Station Rd, approximately 117 Kilometres north of Gisborne off SH35

Introduction

Huiarua and Matanui Forests are a former Pastoral Farm and plantation Forest in development located in the Mata Region of the Gisborne District.

The closest town is Gisborne, approximately 117kms South.

The current Huiarua Matanui Forest is bounded on all sides except the Southeast by existing Exotic Forest. To the Southeast and a small part North, by Pastoral farming Logic Forest Ltd (LogicFSL) has been engaged as Forest Manager by Ingka Investment Management NZ Limited.

Ingka Investment Management NZ Limited is a New Zealand Registered Company with its parent Company based in the Netherlands.

LogicFSL is a 100% New Zealand owned, Gisborne based Forest management company providing a range of services to both small woodlot and corporate Forest owners primarily in the East Coast region, and more broadly throughout New Zealand.

The Huiarua and Matanui Forests are located in the Waiapu Catchment and the Waiapu (East Coast Ecological District)

Huiarua and Matanui Forests Characteristics.

Legal Framework of the Forest Management Unit

Forest Name	Location	Total Area (ha)	forest Description
Huiarua Forest	Huiarua Road, Mata District.	4922.0849	Huiarua Matanui Forest Management Unit Lot 5 Deposited Plan 7690 and Lot 1 Deposited Plan 9828 GS5C/245 GS6D/207 NZTM Map Reference:1 952 425 (N) - 5 785 377 (E)
Matanui Forest	Accessed off Fernside Road, Tauwhareparae. Mata District.	1197	Part Tauwahreparae 2B Block

The legal description of the land subject to this Management Plan is described below:

Legal Description	Land Area(ha)	title	Valuation Number	Occupier:
Matanui Forest Part Tauwahreparae 2B Block NZTM: 2035300mE, 5770000mN	1197	GS6A/814	0787002301	Ingka Investments Management NZ Ltd
Huiarua Forest Lot 5 Deposited Plan 7690 and Lot 1 Deposited Plan 9828	4922.0849	GS5C/245 GS6D/207	0786002700	Ingka Investments Management NZ Ltd

Forest Areas Included in Forestry Certification Assessment Scope

Forest Name	Location	Total Area (ha)	Forest Description
Huiarua Forest	Huiarua Road Mata District, Tokomaru Bay	4922.0849	Huiarua Matanui Forest Management Unit Huiarua Forest Lot 5 Deposited Plan 7690 and Lot 1 Deposited Plan 9828
Matanui	Accessed off Fernside Road, Tauwhareparae.	1197	Huiarua Matanui Forest Management Unit Matanui Forest Part Tauwahreparae 2B Block NZTM: 2035300mE, 5770000mN NZTM: 2035300mE, 5770000mN

Description of the Forest

Description of FOREST	Area (ha)	Ownership	Nationality	Status	Corporate Structure & History
Management Unit	4922.0849	Ingka Investment	Ingka Investment	Active	Logic Forest Ltd (LogicFSL) is a

Description of FOREST	Area (ha)	Ownership	Nationality	Status	Corporate Structure & History
Lot 5 Deposited Plan 7690 and Lot 1 Deposited Plan 9828 GS5C/245 GS6D/207 NZTM Map Reference: 2035300mE, 5770000mN		Management NZ Limited	Management NZ Limited is a New Zealand Registered Company with its parent		100% New Zealand owned, Gisborne based Forest management company providing a range of
Matanui Forest Matanui Forest Part Tauwahrepara 2B Block NZTM: 2035300mE, 5770000mN NZTM: 2035300mE, 5770000mN	1197	Ingka Investment Management NZ Limited	Company based in the Netherlands. Logic Forest Ltd, as the Certificate applicant and Forest Manager, is based in Gisborne, New Zealand.	Active	services to both small woodlot and corporate Forest owners primarily in the East Coast region, and more broadly throughout New Zealand. Logic FSL has been engaged as Forest Manager by Ingka Investment Management NZ Limited.

Land Use

The predominant Land Use is intended to be Plantation Forest of approximately 5400 hectares. There were existing forests at purchase of 762 Hectares Radiata. Between 2022 and 2024 1932 Hectares further of Radiata has been planted along with Riparian and Erosion Control species of Beech, Manuka, Redwood and Totara of 547 Hectares has been planted with more planned for 2026.

Table 1. Land use Huiarau Matanui Forest Management Unit

Current Land Use (and estimates February 2026)	Huiarau	Matanui
Plantation Forest		
Radiata Pine 1988-1999	13.8	23.1
Radiata Pine 2013	563	
Radiata Pine 2017-2021	81.5	89.4
Radiata Pine 2022-2025	2686.1	204.9
<i>Planned Radiata Pine 2026</i>		<i>533.4</i>
Beech 2023-2025	7.2	
Totara 2023-2025	60.5	
<i>Planned Totara 2026</i>		<i>10</i>
Manuka 2019-2023	530.4	
<i>Planned Manuka 2026</i>		<i>64.1</i>
Redwood 2023-2025	239.1	

	<i>Planned Redwood 2026</i>		<i>80.7</i>
	Rewarewa 2025	12.6	
Subdivision for Sale		28.9	25
Permanent Natural Forest		272.7	66.5
Non- Productive (incl Erosion, Infrastructure, Roads, Landings and Skids,		126.4	35.6
Riparian		234.6	30.4
Fallow to be afforested 2026		0	777.4

Geology

The underlying geology of this Forest is (predominantly): Neogene and Quaternary mudstone and sandstones over Crushed argillite, crushed greywacke.

Name	Matawai Group (lower)
Description	Sandstone and mudstone with minor conglomerate and breccia; locally, basal, variably deformed rocks may include chert, basalt and limestone.
Geologic history	Early Cretaceous
Simple name	Zealandia Megasequence Mainly Marine Sedimentary Rocks (Paleogene to cretaceous)

(Source GNS Science)

Erosion Susceptibility of Huiarua Matanui Forest

06/07/23

NES-PF Erosion Susceptibility Classification Report

Ohiva Forest

Erosion Susceptibility Class	Land Use Capability unit	NZLRI Legend	LUC Class &e land	SquareMetres
Moderate	6e 6	04	No	1756.88
Moderate	6e 6	04	No	7232.24
High	7e 5	04	No	1496109.65
Moderate	6e 6	04	No	4387235.41
Low	2s 2	04	No	7266.8

Figure 2 Erosion Susceptibility of the Legal Parcel of which the Huiarua and Matanui Forest is part.

Matanui	LUC	NSA Area (ha)	PPA (Ha)	Unplantable	Title Area (ha)
	4	33.7	3.5	1.2	38.4
	6	226.6	476.0	121.5	824.1
	7	95.1	171.4	88.5	355.0
	Totals	355.4	650.9	211.2	1,217.5
Huiarua	LUC	NSA Area (ha)	PPA (Ha)	Unplantable	Title Area (ha)
	2		2.9	19.1	22
	3	151.4	114.1	25.8	291.3
	4	0.2	192.2	62.7	255.1
	6	963.3	1126.7	204.2	2,294.2
	7	689	662.6	685.2	2,036.8
	8	12.8	0	5.5	18.3

	No class	0	0	2.3	2.3
	Totals	1,816.7	2,098.5	1,004.7	4,919.9

Climate, likelihood of high intensity rainfall & flooding

The weather of the Gisborne district is greatly influenced by the topography of the area. When winds are from the westerly quarter, sheltering by the Raukumara Range causes high temperatures and limited rainfall in the district. Conversely in easterly situations, the uplift caused by the mountains serves to enhance the rainfall and high intensities are recorded at all altitudes.

Tropical cyclones that reach Gisborne and still retain very low pressures and hurricane force winds are very rare. However, other storms of tropical origin (which may never have been fully developed tropical cyclones) affect New Zealand about once or twice each year, mainly between the months of December and April. They usually bring heavy rain and strong easterly winds.

Rainfall data indicates an annual rainfall of approximately 1800mm (P.R. Chappell, 2016) unevenly distributed throughout the year with a prominent winter maximum.

The Forest owner is aware that the area has been subject to unseasonable prolonged heavy rain and cyclonic events in the 2022-23 Spring and Summer and recent rainfall events though 2024-2025 have not followed predictable patterns, and therefore precautions will be taken at all times in preparation for these events.

The Project area is located entirely within the Waiapu Catchment, with sub-catchments leading to the Mata Catchment, then the Waiapu.

There are several heavily eroded large gullies throughout the property. These lead to the Mata River. The largest on-property catchments being Puniatara and Hansen's. Both Puniatara and Hansen's have Erosion Control Funding Program Grants and have sections that are at risk or affected by erosion. Significant plantings of non-production, and indigenous species have been planted in these areas.

Heritage and Māori Interests of Huiarua Matanui Forest Management Unit

Logic Forest commissioned a Desktop Assessment from In Situ Heritage Archaeology in January 2025

ARCHAEOLOGICAL ADVICE –PROPOSED AFFORESTATION HUIARUA & MATANUI STATIONS, GISBORNE DISTRICT January 20th 2025 found the following

Recorded Sites: No recorded archaeological sites exist within the proposed afforestation areas. The closest site is an inland pā (Y16/1—Te Hamahama), 5km north of Huiarua Station. Most archaeological sites in Tairāwhiti are within 10km of the coast or along navigable waterways like the Waitahaia and Mata Rivers.

Desk-based Review:

- **Huiarua and Matanui Stations:** Limited pre-1900 development. Land disputes delayed European settlement.
- **Survey Maps:** No evidence of unrecorded sites.
- **Aerial Photographs:** Earliest from 1945, showing land cleared for farming. No potential sites identified.
- **LiDAR Data:** No surface remains identified. Farming activities in the 20th century likely modified or destroyed potential sites.

The report gave the following summary and recommendations:

No previously recorded sites in proposed areas. LiDAR, historic maps, and aerial photos show no potential for unrecorded features. Historical land disputes and farming have likely erased any potential archaeological features.

It is recommended that afforestation works are carried out with an Archaeological Site Discovery Protocol in place.

Logic Forest operate under an Accidental Discovery Protocol

This advice relates to physical evidence of past human activity. Advice about Māori cultural values can only be appropriately obtained from iwi/hapū representatives.

Consultation was undertaken in applications for Afforestation Resource Consents and no sites were raised. Further Consultation was be undertaken with a stakeholder's group while determining HCV 6 Cultural Values and will continue.

The planting planning process includes scrutiny of ridges, terraces and trying to identify any evidence of Māori pa sites, banks, ditches, loose stones, levelled terraces, pits or remains of shells. Nothing has been identified in planning to date.

This is very unusual for a property of this scale, and an area with a long history of pre-European settlement and such spiritual importance.

To that point Logic Forest have been vigilant in taking a precautionary approach to any assumption of lack of specialness on the property.

Logic Forest (as Forest Managers for Ingka Group) has an Accidental discovery policy in place, and operators and supervisors follow this during all operations.

In summary

- Iwi will be notified
- Heritage NZ will be notified.
- Operations will cease for that area until identification can be undertaken. They can continue in other areas.
- Afforestation operations will not enter the buffer area around the site but can continue in other areas

The area is within Ngati Porou area of interest.

Several Hapu have actively involved themselves in consultation and the consenting process.

Statutory acknowledgement areas have been noted in the addendum to the Tairāwhiti Resource Management Plan (Ngā Whakaaetanga ā Ture mō Te Tairāwhiti).

If any sites are found through any means, Logic Forest will work with Ngati Porou and Hapu, and InSitu Heritage to investigate these sites further through the following steps:

- Site visit with Logic Forest Staff and Ngati Porou representatives to conduct a visual and spiritual inspection of the potential sites.
- If confirmed as having attributes of a Māori Site, or values, InSitu Heritage will be arranged to conduct a site visit for confirmation and recording.
- Confirmed Sites will be Registered by InSitu Heritage after consultation with Ngati Porou
- Sites will have appropriate buffers applied from Afforestation activities
- Sites will be identified on the ground by methods agreed between Ngati Porou and InSitu Heritage

A Cultural Values Assessment is being prepared by Popoti Ahuwhenua - Matahiia A1B Hapu Group to further enable understanding of the non-physical aspects indigenous peoples may attribute to the area.

This will ensure that the potential sites are confirmed, or otherwise, and if the site exhibits signs of occupation, or spiritual significance to Ngati Porou this can be protected appropriately.

Social Context of the Forest

Forest History

The land was previously owned by Riminui Farms Ltd and has never been a certified forest. Ingka Investment Management NZ Limited purchased the farms in 2022. Logic Forest Solutions Ltd was appointed the Forest Manager in 2022.

Current Social Profile

The predominant land uses surrounding the forests are plantation forest, with small rural towns servicing the predominantly rural communities.

The forests contribute to the social profile of the area. They are privately owned. There is a modest contribution to the local economy by way of added incremental employment.

Social Programs underway in the Forest

The Huiarua Forest area is part of several unique Social Programs all aligned with the term Mahi Wairua.

Under the guidance of a local couple, who live on site and carry out many functions on behalf of the forest owners, the forest contributes to efforts to ease social problems for the Ngati Porou community on the East Coast and into urban areas of nearby Gisborne.

In a first of its kind program the land, pests, and assets of the forest are used for;

- A programme of meat recovery from forest pests where the meat is directed to a Ngati Porou affiliated Gisborne school and distributed on a need's basis, after processing by families and an accredited butcher.
- Other social functions are carried out by the residents and visitors that are confidential to their work..
- The on-site Mata School runs a pest trapline in nearby recovering native bush.
- These programs align with Principle 5 Benefits from the Forest

These programs are resulting in a reconnection with the land for many Ngati Porou families who never would have had the opportunity, who are receiving the experiences and direct resources in the way of food from land in their wider Rohe.

Geological Sites

There are no known geological sites within the Huiarua Forest area.

Catchments and Waterbodies

Catchment Summary

The Project area is located entirely within the Waiapu Catchment, with sub-catchments leading to the Mata Catchment, then the Waiapu.

In October 2011, the Ministry for Primary Industries, in consultation with the Steering Committee, commissioned SCION to undertake a study of the erosion issues in the Waiapu catchment. In June 2012 SCION submitted the final report. The study investigated the geophysical, social, cultural, and economic dimensions of the erosion problem in the Waiapu River catchment.

The study assessed the scope (size and scale) of the erosion problem in the catchment and evaluated the effectiveness of erosion mitigation measures. It also included possible options for addressing the erosion problem.

In 2015 the Gisborne District Council signed a Joint Management Agreement with TE RUNANGANUI O NGĀTI POROU TRUSTEE LIMITED as a trustee of TE RUNANGANUI O NGĀTI POROU ("Te Runanganui") on behalf of ngā hapū o Ngāti Porou

Excerpts taken from the MPI Report Summary of the Waiapu River Catchment Study Final Report MPI Information Paper No: 2012/09 November 2012 show the history and importance of the Catchment to the region.

Catchment Land-use history

Taken from MPI Report Summary of the Waiapu River Catchment Study Final Report MPI Information Paper No: 2012/09 November 2012

In 1840 the Waiapu catchment was largely covered in native forest (~80%), with a small area east of the main river covered in scrub and coastal forest as a result of partial clearance and burning.

There was extensive cultivation by Maori around the river, and the mature indigenous forest inland was rich in natural flora and fauna.

Between 1890 and 1930 the catchment was extensively developed for pastoralism, starting with large-scale forest clearance, felling and burning (Rau 1993). This was an adverse turning point for a catchment prone to high intensity rainstorms and flooding. Since then a succession of storms and floods have caused widespread erosion and sedimentation throughout the catchment, transforming the landscape.

The land-use pattern has progressed from native forest and marae cultivation to reduced native forest, extensive pastoralism with sheep and beef, to dairying on lowland areas, to a return to sheep and beef, extensive planting of exotic forests and limited cultivation on the flats.

These land-use changes have resulted in a highly eroded catchment under pasture, increased flooding risk, and sediment-filled streams and rivers.

Land-use planning and resource management have been largely driven by non-Maori groups, and the community has complained of government interference with many of these land-use schemes.

Planting of exotic forest for erosion control began in the late 1960s. In the headwaters of the most highly eroded sub-catchment, the Tapuaeroa, conversion of eroded pasture to exotic forest began in 1969.

Social Cultural and Economic Aspects of the Waiapu Catchment

Taken from MPI Report Summary of the Waiapu River Catchment Study Final Report MPI Information Paper No: 2012/09 November 2012

The Waiapu catchment is of great spiritual, cultural, and economic significance to Ngāti Porou. The health of the catchment extends much further than the physical elements of the landscape.

Many Ngāti Porou consider that erosion is not an isolated problem and that integrated approaches are required to tackle the many problems the catchment faces. Future strategies should embrace Ngāti Porou values and aspirations fully.

Flood, sediment, and erosion damage to stocks and flows of critical natural capital compromises the ability of local people to meet their needs, especially with respect to abundant good quality seasonal food, fresh clean water, and other resources.

A lack of engagement in catchment management, decision making, and planning is perceived to be preventing the community from pursuing its own vision of the desired state for the Waiapu catchment and hindering community engagement in the resolution of the problem. The present value of lost pasture productivity due to slip erosion is estimated at \$415,000 per annum in the Waiapu catchment. The value of lost pasture productivity due to surface erosion in the Waiapu catchment is estimated at \$440,000 per annum.

The Waiapu catchment faces many other costs as a result of soil erosion, through damage to infrastructure, insurance costs, recreational loss, and biological degradation. Some can be estimated but further research is needed to determine the full economic impact from soil erosion in the Waiapu.

The East Coast Forestry Project (ECFP), initiated in 1992, provides grants to landowners for erosion treatment. It has helped bring approximately 37,000 hectares under sustainable land management since its inception. The Gisborne District Council has a regulatory requirement to treat all erosion areas identified as LO3A.

The ECFP and LO3A do not have explicit social, economic, and cultural objectives. The number of indicators developed by the Report suggests that the challenges facing the catchment and its people are many and only a very small number of these are being addressed by current efforts.

The Report also finds that the uptake of ECFP grants has been slow though the scheme has achieved significant areas of afforestation, reversion, or wide-spaced tree planting. Logic Forest Solutions will engage with representatives of Ngati Porou in communicating plans and progress within the Forests within the Waiapu Catchment.

Physical characteristics

The western side of the catchment is bound by the Raukumara ranges; with relief ranging from 1500 to 500 m, while the middle to lower part of the catchment is typically hilly, from 500 to 100 m, and then decreases in the east to lower flights of terraces and the floodplains near sea level.

Average annual rainfall is 1600 mm/yr at the coast to >4000 mm/yr in the headwaters. The present highly degraded nature of the catchment can be attributed to a combination of factors: extensive forest clearance between 1890 and 1930; repeated high intensity storm and flood events; and a catchment with a high proportion of unstable rock types, such as crushed and sheared mudstones and argillites.

Rocktypes are geologically complex and reflect a turbulent tectonic history with a number of associated earthquakes. High rates of natural erosion are evident on these unstable rocktypes, even under native forest.

Present vegetative cover of the Waipaoa Catchment is:

- Exotic forest (*Pinus radiata*) 26%,
- pasture 37%,
- native forest 21%,
- and about 12% in kanuka and manuka (scrub).

Current state of the wai of the Waiapu Catchment

- Most water use in the catchment is for drinking water, swimming and stock water.

- There are 2 consents to take water within the catchment and 2 expired consents to take geothermal water at Te Puia Springs.
- There are many puna/springs, and many whanau source their domestic water from springs and awa as permitted takes.
- There is a large amount of gravel extracted from a range of rivers in the catchment, but particularly from the Mata, Waiapu and Tapuaeroa Rivers.
- As of February 2020, rates of consented gravel extraction from the catchment are in the order of 450,000m³/year, with 150,000m³/year from the mainstem Waiapu River. This is considerably more than the amount of net bedload transfer for the mainstem which is assessed as being around 35,000 – 45,000m³/year.
- Water quality across the catchment is impacted mainly by sediment and E.coli (bacteria).
- Water quality and stream health is generally good in the headwaters but deteriorates once the rivers flow through the catchment.
- Many of the monitoring sites are below national bottom lines for visual clarity (sediment), E.coli (bacteria), deposited sediment (on the river bed) and ecosystem health (macroinvertebrates).

Freshwater Fisheries and Monitoring.

There are no entries into the *MPI Fish Spawning Indication tool* for the waterbodies within the forest.

LFSL has carried out Stream observations on six (6) separate stream sites throughout the Huiarua property.

These observations revealed no fish sightings.

Two hours of stream analysis at the main Puniatara stream catchment also revealed no signs of fish. The habitat conditions and macro invertebrate results in this catchment were poor and unlikely to be able support fish life.

Until such conditions improve, specific fish sampling methods are not deemed justifiable.

On-site staff of the forest have an interest in fish life within the streams and will continue ad hoc sampling and will report improvements in biodiversity within these streams as transition from an intensively grazed area to retired and buffered riparian's continues.

No records of previous freshwater surveys have been provided by the previous owner. DOC and other organisations have no records of any existing data.

Baseline testing of the Stream Health and eDNA of several waterways is underway and will continue and extend these over time to build up a picture of the freshwater ecology of the property and record the improvement likely in this as Stock are removed from the waterways and tree cover occurs within the catchment returning the waterways to their prior state under a Forest canopy.

The forest owner will continue this monitoring throughout the lifecycle of the Forest which included pre, during, and post-harvest.

The forest owner has been working through a Monitoring regime and communications with interested parties.

They state;

We support involvement at both Iwi and hapu level and to be open and transparent with water monitoring process, data collection, and overall long-term relationship building with mana whenua.

The Forest Manager has provided to Fish and Game, Department of Conservation, and the Waiapu Awa Catchment Restoration Group, as part of Consultation on this application, the report *Huiarua Afforestation Resource Consent Consultation - Freshwater Fish and Waterways*.

Key Environmental Issues of the Waiapu have been identified as

- Managing gravel extraction within sustainable limits.
- Ongoing erosion and instability generating large amounts of sediment.
- Stock access to rivers causing high levels of E.coli.
- Poor ecosystem health in many rivers and streams

The forest Manager believes that the plans put in place to restore effective tree cover and remove stock from the land go a long way to addressing some of these key environmental issues.

The Forest Owner and Manager will include in its long-term planning and management the findings and recommendations of the reports and information that may come out of the Waiapu Restoration Group as part of its commitment to doing its part in restoring effective tree cover to the Catchment.

Coastal Marine Area

This Forest is outside the coastal marine area.

Public Access

Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site.

Stakeholders will be consulted with in developing a Public Access Policy (early 2026).

<https://www.logicfsl.co.nz/contact-and-careers>

If you would like to enquire about access please phone +64 (0)6 863 2447
office@logicfsl.co.nz

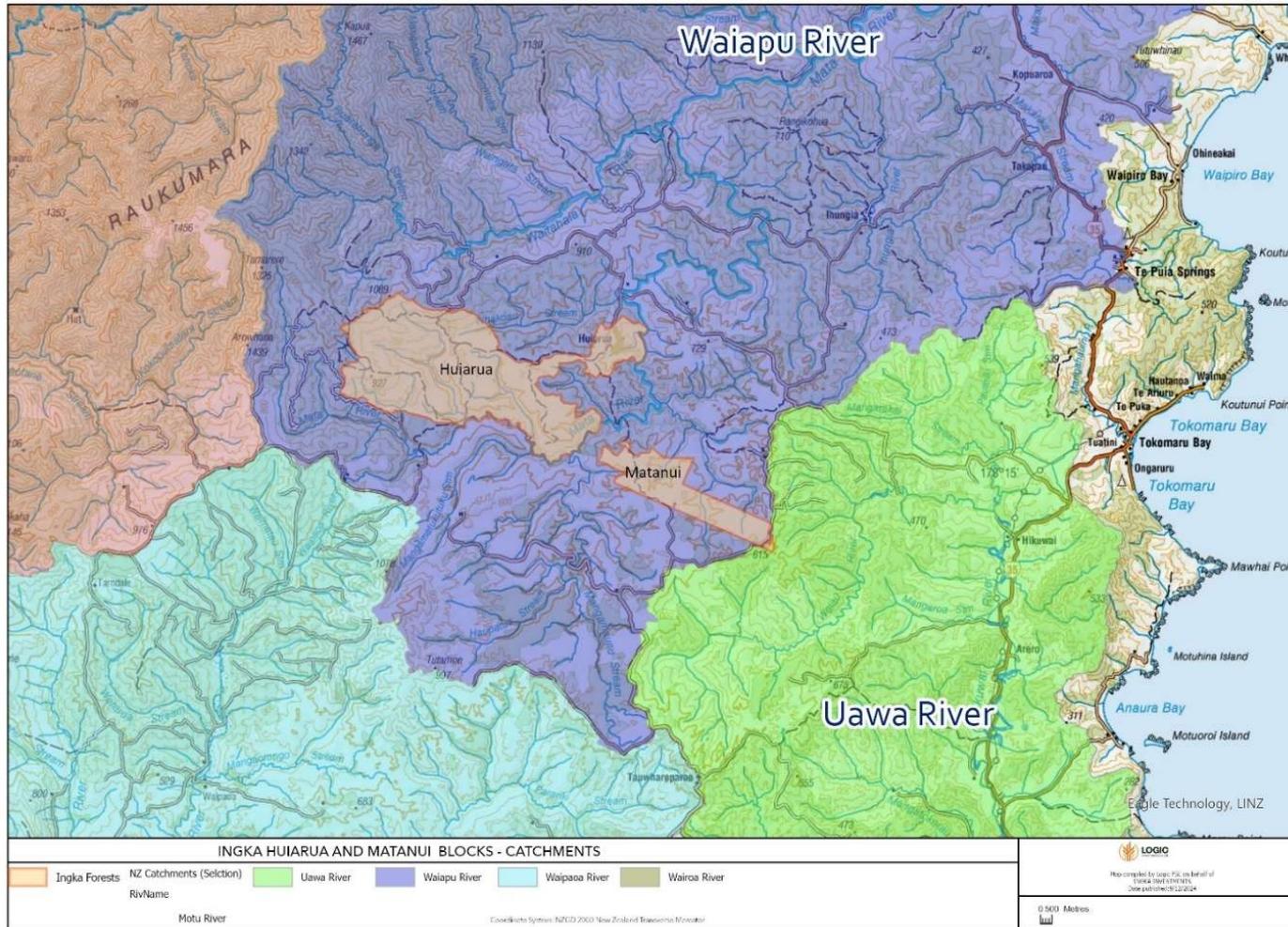


Figure 3 Huiarua Matanui Forests Location within the Main Waiapu River Catchment

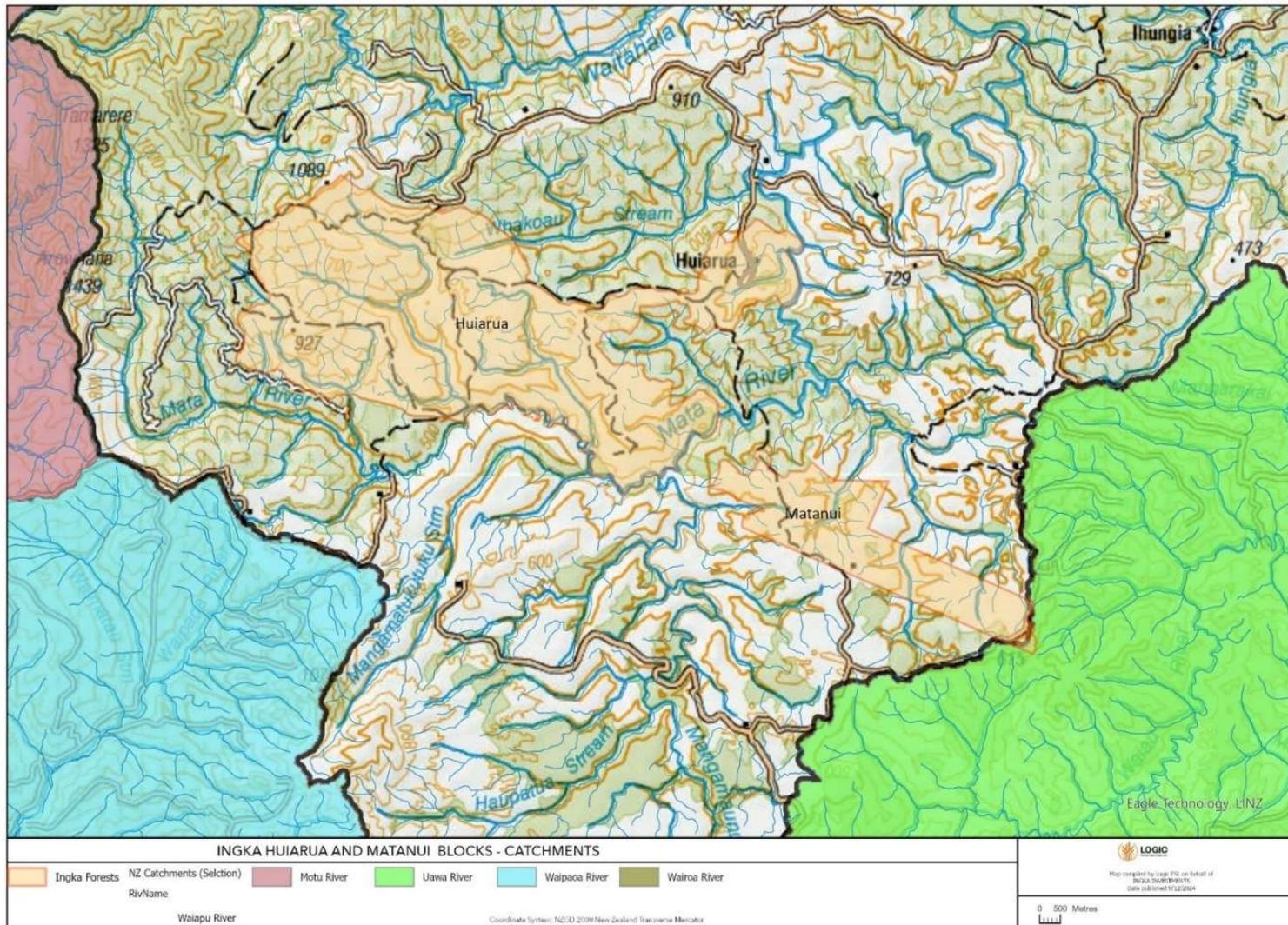


Figure 4 Huiarua Matanui Forests within the Mata Sub Catchment

On-Property Catchments

The largest on-property catchments are Puniatara and Hansen's in the Huiarua Forest. Both Puniatara and Hansen's have Erosion Control Funding Program Grants and have sections that are at risk or affected by erosion and have been identified in GDC and Landcare research Gully Erosion studies.

Discussions with GDC and MPI as stakeholders in the Program have, and continue to, taken place on the afforestation of these catchments to ensure committed funding and species selection for these areas works towards the best outcomes following retirement from Farming stock.

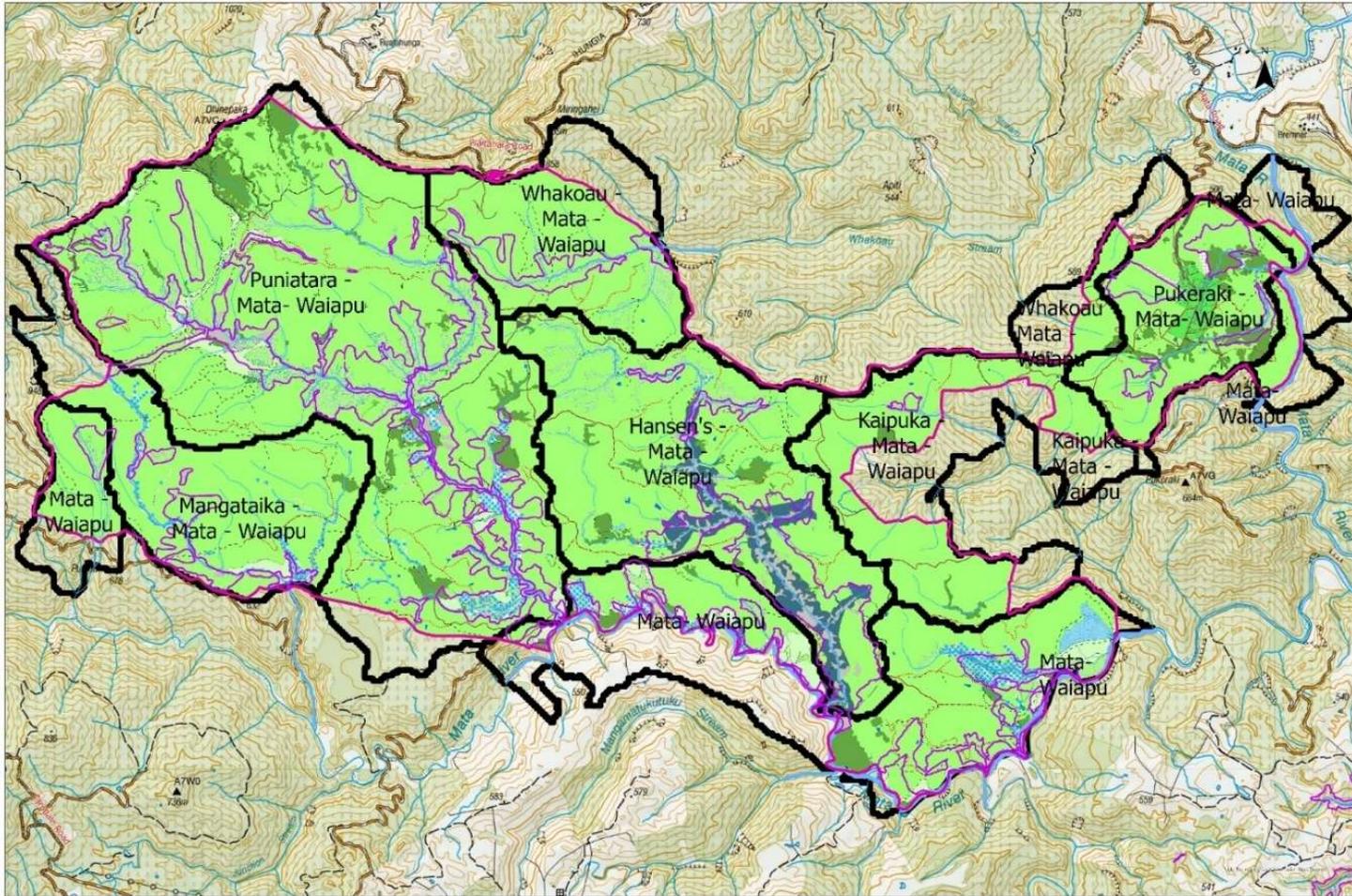


Figure 5 Catchments within the Huiarau Forest.

Waterbodies

There are many small streams that run within the forest area.

The Huiarua site is adjacent to the Mata River.

There are multiple headwaters of Protected Watercourses listed in Schedule 21 of the GDC TRMP that enter the Forest area due to Harvesting Consents in the adjacent Forest areas, which is listed in the TRMP as Schedule G15A

Protected Watercourses (Schedule G21) adjacent to the Planned Forest

Name	Consent	Description	Effects likely
Mata River (Tributaries)	LV-2012-105314-00	Headwater of Protected Watercourses originating from Harvesting Consents for the adjacent Tokomaru Crown Forest License (Ernslaw One Ltd)	No adverse effects are likely with Afforestation and Ancillary activities within this consent area.
Mata River (Tributaries)	LV-2014-106155-00		
Mata River	LV-2012-105314-00		
Mata River	LV-2014-106363-00		
Whakoau Stream	LV-2014-106363-00		
Mangawhero Stream	LV-2014-106470-00		
Mangawhero Stream (Tributaries)	LV-2014-106470-00		
Waitahaia River (Tributaries)	LV-2013-105750-00		
Mangahaweone Stream (Tributaries)	LV-2013-105754-00		

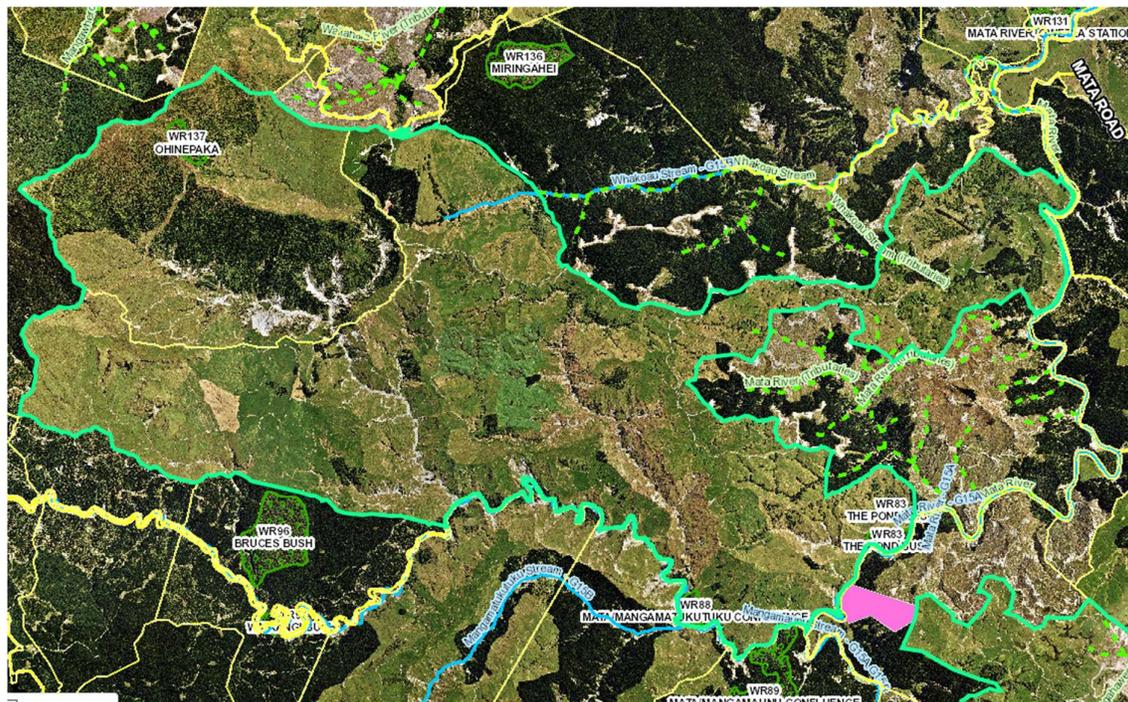


Figure 6 TRMP Schedule 15 Protected Streams due to adjacent harvesting operations

Setbacks from Waterbodies

Production forests will be set back a minimum 10 metres from the boundary of all watercourses.

In areas identified as being at risk of slash mobilisation to waterbodies, or slope failure the setback has been extended, and a buffer species (where practical) will be planted between the production Forest and the waterway.

The goal being to occupy these sites as soon as possible with effective tree cover suitable for the soil depth, stability and adjacency to waterways.

Exotic Forest Operations

Rationale for species selection and regime

Radiata pine (*Pinus radiata*)

Radiata pine (*Pinus radiata*) accounts for 90% of New Zealand's planted forest estate. Radiata pine is a fast growing and versatile softwood with a wide range of uses and applications. NZ radiata pine is plantation grown, renewable and sustainable, was planted as a primary timber crop to provide an alternative to New Zealand Indigenous Forest timbers and the import of threatened tropical timbers.

It is a medium-density softwood, straight grained with an even texture. It is treated to H3.2 for durability and works well with hand and machine tools. Heartwood is light brown in colour and is non-durable to perishable in regard to decay resistance. Sapwood is pale yellowish-white colour treated with preservatives to be used in external applications.

New Zealand pine is a versatile softwood and well suited for a range of structural and appearance applications. The light consistent colour of radiata pine readily accepts stains and its general properties make it ideal for painting.

The pruned butt log can be used to make knot-free veneer or appearance grade timber
The unpruned logs can be used for structural timber, for veneer for plywood, and stock for finger jointing

Pulp type logs and those with defects and excessive knots can be used for pulp and paper.
Pinus radiata has been proven to grow successfully at the property.

There is a growing domestic market for Radiata Pine in the FMU Region, with a dominant export market.

The local sawmills process only Pinus radiata logs, and there is a strong and proven export market for the logs that the local mills don't use.

Redwood (*Sequoia Sempervirens*)

The forest owner chose to afforest some areas of the forest with Redwood recognising that these areas required a longer rotation species, or permanent species.

New Zealand has limited domestic sawmilling capability for other exotic species however interest in Redwood is growing along with the plantation size.

Redwoods has been planted as a buffer to some riparian's above the eroded bank area, and often above areas buffered by Manuka

Totara (*Podocarpus totara*)

In areas where there are significant Indigenous remnants and where areas are deemed not suitable for rotational forestry a large-scale trial of Indigenous Totara has taken place.

Beech.

High Country Beech has been planted as a test trial on exposed sites where rotational forestry is unsuitable.

Beech occupied some of these lands prior to deforestation for pastoral farming.

Manuka

In areas where production forests will not be planted Manuka has been chosen as a first occupying species to give effective tree cover faster than relying on local seed sources, which may not be present after over a century of grazing and fertiliser applications, Establishing manuka as an effective tree cover protects the vulnerable soils where land classes indicate that rotational forestry is unsuitable and also provides a nurse crop for shade tolerant natives to emerge and fully protect these areas.

Some areas of the forest have very thin soil cover over erodible sand and mudstones and will not take a heavy woody species.

Upon completion of each year's harvest, replant decisions will be made each December and the Forest Owner and Manager will consider the portion of the commercial plantation which will be restocked with *Pinus radiata*.

No genetically modified species will be grown at this property.

Sustainable Harvest

The Forest Owner has prepared analysis of sustainable harvest from preparation for these Greenfields forest projects.

Productive capacity strategy

Forest management will ensure the productive capacity of the forests is not compromised. This includes:

- Monitoring and control of pests and weeds and forest health
- Inventory – inputs into growth estimation, a core step in timing silviculture and formulating the cutting strategy
- Silviculture - to enhance the value of the resource
- Harvesting - achieving a successful harvest in terms of the forest owner's health and safety, environmental and commercial objectives

Management objectives for the next five years

The main Operational management objectives for the next five years are:

- Construction of tracks for the continued Afforestation
- Continuation of Afforestation with Exotic Production species and Indigenous Permanent Species
- Pest Control for control programs.
- Continue Ecological Management programs as developed.
- Woodlot Harvest planning for remaining woodlots on the property
- Woodlot Harvesting and Earthworks
- Woodlot Replant

Alternative Products

As the Forests are a Greenfields Forest development there is currently a transition period where the pastoral farm grazing is being progressively replaced with Afforestation each winter.

Final year of significant afforestation for Huiarua will be 2025.

Final year of significant afforestation for Matanui will be 2026.

There are Social Initiatives underway within the forests which meet Principle 5 Benefits from the Forest and are explained with the social sections of this Plan.

Forest Product Waste Minimisation Strategy

No Harvest waste is generated from the Forest

Financial Plan for the next five years

Please refer to the Forest budget.

Operational Plan for the next five years

Below is a list of all operations that are or will be undertaken in the forest in sequence, following the purchase in 2023.

Operations are completed by contractors under the direction and supervision of LOGIC FSL.

Afforestation Phase

Establishment

As the Forests are a Greenfields Forest development there is currently a transition period where the pastoral farm grazing is being progressively replaced with Afforestation each winter.

Final year of significant afforestation for Huiarua will be 2025.

Final year of significant afforestation for Matanui will be 2026.

Harvest Planning

Draft Harvest Planning of the Forest was completed for planning purposes in 2022.

Building Roads and Landings

Forest Road and Farm road Maintenance continues

Presently no Harvest Roads are being constructed. Some may be required when Woodlot harvesting becomes viable

Harvesting

Presently no Harvesting is taking place. Some may be required when Woodlot harvesting becomes viable

Replanting

No replanting is planned

Re-planting considerations (when required)

Prior to re-establishment of the tree crop, a review will be conducted to identify and incorporate:

- Boundary changes
- Species choice
- Retirement from productive forest
- Riparian and reserve protection which would provide better outcomes for the plantation forest and the environment.

Wilding spread

A requirement of the NES-CF is that Afforestation of a new species, or any change in species must be evaluated using the 'wilding spread calculator' to ensure that the threshold for spread will not be exceeded. If it is exceeded a Resource Consent must be sought for the establishment of that species.

Logic Forest Solutions use an in-house Wilding Risk Calculator for estimation of Wilding Risk. Based on the following <https://www.mpi.govt.nz/growing-and-harvesting/forestry/national-environmental-standards-for-plantationforestry/wilding-tree-risk-calculator/>

Aerial desiccation (pre-plant) Spray

When required Cutover will be desiccated prior to replanting. This is to ensure that weed species will not out-compete the radiata seedlings.

Release spraying (Aerial and 'spot-spraying')

Pre and post-plant sprays are detailed in the Forest Operations Prescriptions. Cutover that has been replanted may require a release spray due to the vigorous emergent weed species present in the FMU (such as Inkweed). This is to ensure that weed species will not out-compete the radiata seedlings. See the Integrated Pest Management Strategy (IPMS) for more detail.

Pesticide and chemical usage, storage and disposal

Herbicides are used in pre-plant land preparation and post plant releasing for removal of competition species, and for weed pest.

The intent is always to use herbicides as efficiently as possible.

Presently no pesticides or toxins targeting insects or mammals are being used.

Logic FSL investigates alternative methods before committing to a chemical solution.

Storage of Chemical meets the requirements of HSNO and NZS 8409:2021

Chemical Usage is calculated post plant June each year.

Silvicultural regime description and justification

The majority of stands will be managed as a Clearwood regime. This process will involve pruning and thinning to waste.

Clearwood is processed by domestic mills and is a popular product for export.

The main product is high value timber used in decoration and furniture. While pruning yields a higher value product, it also requires more investment.

Structural Logs grown under the clearwood/framing regime can also be processed locally, presently in small volumes, and sold for export under existing supply contracts.

Tree nutrition

Foliar samples will be taken if nutrient deficiency symptoms are observed or expected.

Fertiliser* will only be applied if the health and the growth of the trees are significantly affected, or where economic analysis demonstrates a benefit.

Site productivity and tree nutrition are the subject of industry research programmes. Logic

*Note Fertiliser use is rare in the North Island and not required in the Eastern Bay of Plenty or East Coast.

No fertiliser has been used in the Forest at the time of writing of this Management Plan.

Logic FSL has a *LFSL Fertiliser Use Policy* in place if there is a requirement to Fertilise.

Pruning

Pruning will be undertaken in two (2) lifts to 6.5 metres at approximately age 5 and 7. Target Stems per hectare will be from 320-350 sph.

Thinning

Thinning will be undertaken in all regimes. A clear wood stand would have one final thin to 330 sph at age 8 years after the final 2nd lift. There is one thin/final crop selection undertaken on a framing timber stand when trees reach full canopy cover and a height of between 10m -12 m. The target stocking in the framing stands is 450 sph.

All thinning is by way of chainsaw and qualified operator. This is cost effective and provides employment for local contractors.

Local processors are used where possible

At present no harvest is undertaken in the forest.

Exotic Forest Monitoring programme,

All Monitoring is summarised in Appendix A Monitoring Summary

Pest Monitoring and Management

(For more detail see LFSL Pest Monitoring and Control Plan East Coast Forests)

Logic Forest Ltd manage Pest Control around and within the forest.

Currently Production Pests are being managed on a monthly schedule and also on as-needed basis with a Contract Pest Controller and an on-site caretaker.

A social Program uses meat from Pest Operations within Huiarua and Matanui.

Records of Control are recorded through a Survey App.

Hunting

Recreational (if any) hunting is being managed via Logic's permit access system and issued as required. We would also advise:

- No camping or fires to be permitted within the forest.
- No Forest access will be issued in times of High Fire Risk.
- No Forest access will be granted whilst Forest operations are undertaken in the forest.

Natural Hazards and Risks

Natural Hazards Management Plan

LFSL has a **Natural Hazards Management Plan** in place to prepare for effects of the Natural Hazards prevalent in the forest Region including

- Prolonged or intense rainfall e.g. flooding, landslide. Notable examples within our management area in the region include the Cyclones Bola 1988, Cyclone Cook 2018, and Cyclones Hale and Gabrielle 2023 two weeks apart.
- The East Coast is prone to mass landsliding and slips.

- Volcanoes and earthquakes e.g. ground shaking, landslide, liquefaction, tsunami.
- A copy of an Emergency Plan for Huiarua and Matanui Forest is kept with the crews onsite and is also contained in the contractor pack that all contractors should have with them when working on-site. The plan outlines: emergency procedures, Logic FSL staff contact details, maps of the property and escape routes.

Biodiversity values

The Huiarua–Matanui FMU features a diverse range of indigenous forest remnants, with primary podocarp/broadleaf remnants and tawa-dominated stands to regenerating secondary vegetation present.

Recognised Significant Indigenous Vegetation and Habitat records

The Protected Management areas within the forest are based on the Department of Conservation PNAP Programme and share original names and boundaries.

Biodiversity values

Logic Forest Solutions engaged an independent Ecologist to field survey samples sites of indigenous vegetation and habitats in February 2025.

Site Survey

Huiarua Blocks

- The Pond Bush (16.5ha): Mature podocarp forest with an oxbow wetland. Contains emergent mataī, with an understory of coprosmas and māhoe. The wetland area has raupō and patches of open water. Identified as PMA WR83, it supports extensive riparian native forest with mature podocarps and tanekaha, though the understory is degraded by browsing pressure.
- Mata/Mangamatukutuku Confluence (13.5ha): Features riparian podocarp forest, with an oxbow that was inundated during Cyclone Gabrielle. Notable for diverse tree species, including black beech, tanekaha, and pokaka. Identified as PMA WR88, it forms a key riparian corridor, though browsers have impacted understory development.
- Ohinepaka (20ha): The highest-altitude block in the FMU, regenerating after the burning of the beech forest that would have been present ~100 years ago. It contains a distinct suite of species compared to the other blocks, primarily low-growing and dense vegetation dominated by horopito, with occasional beech trees. Identified as PMA WR137.
- Wayne’s Bush (4ha): Degraded treeland with limited understory due to prolonged stock and deer browsing.
- Bush Paddock (5.5ha): South- and west-facing block with a strong subcanopy, suggesting past recovery due to stock exclusion, before deer numbers increased.
- Waimana Bush (5ha): Dense canopy dominated by kāmahī, mataī, and rewarewa, but with severe stock damage preventing understory growth. No viable understory remains due to recent or ongoing stock grazing.
- Homestead Bush (6.5ha): Contains a gully with emergent mataī and tōtara, though browsing pressure has left much of the understory bare.

Matanui Blocks

- Farmhouse Bush (8.5ha): Primary broadleaf forest with a tawa-dominated canopy and occasional emergent hīnau. The understory is present mainly in steeper areas where browsing pressure is lower.
- Roadside (14.5ha): Kanuka-dominated catchment with high light availability, supporting a diverse understory despite localized browsing pressure. Occasional emergent rewarewa are present. *Jovellana sinclairii* (At Risk – Declining) was found growing near a small creek running under the road.
-

In general, the blocks of a lower ecological value (blocks of secondary vegetation - Roadside, and Ohinepaka) were in the best condition. This is due to the increased light

levels that enter a regeneration forest. The more mature primary blocks were negatively impacted to varying degrees by browsers.

While stock grazing and ongoing browsing by deer, possums, and goats have led to some degradation—particularly in the understory—the removal of livestock and effective browser control has already led to small signs of recovery.

- Both Huiarua and Matanui support several RTE (Rare, Threatened, and Endangered) species. RTE plant species including *Jovellana sinclairii* and *Lophomyrtus obcordata* have been recorded in Huiarua, with a North Island Robin also noted in a remnant patch.
- Due to the range of forest types, aspect, and varied histories, collectively the blocks of indigenous vegetation across the Huiarua–Matanui FMU contain a large proportion of the expected plant diversity of the ecological district. The 9 blocks surveyed are small, and other than a few exceptions, are very isolated ecologically, in a quite degraded state.

Logic Forest Management commenced **Stream Health Monitoring** within the Forest in May 2023.

Summary

Both Huiarua and Matanui support several RTE (Rare, Threatened, and Endangered) species. RTE plant species including *Jovellana sinclairii* and *Lophomyrtus obcordata* have been recorded in Huiarua, with a North Island Robin also noted in a remnant patch.

Due to the range of forest types, aspect, and varied histories, collectively the blocks of indigenous vegetation across the Huiarua–Matanui Forests contain a large proportion of the expected plant diversity of the ecological district. The 9 blocks surveyed are small, and other than a few exceptions, are very isolated ecologically, in a quite degraded state.

Recognised Significant Indigenous Vegetation and Habitat records

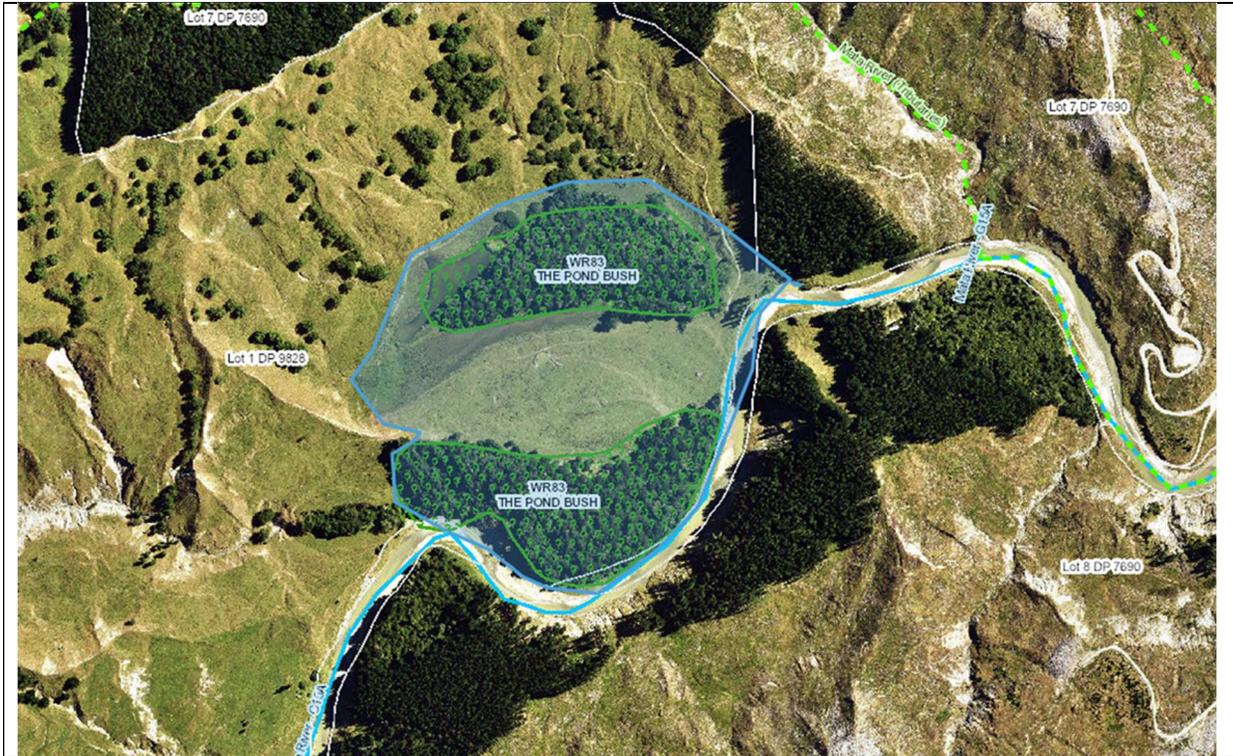
The Protected Management areas within the forest are based on the Department of Conservation PNAP Programme and share original names and boundaries.

Protected Management Areas (PMAs)

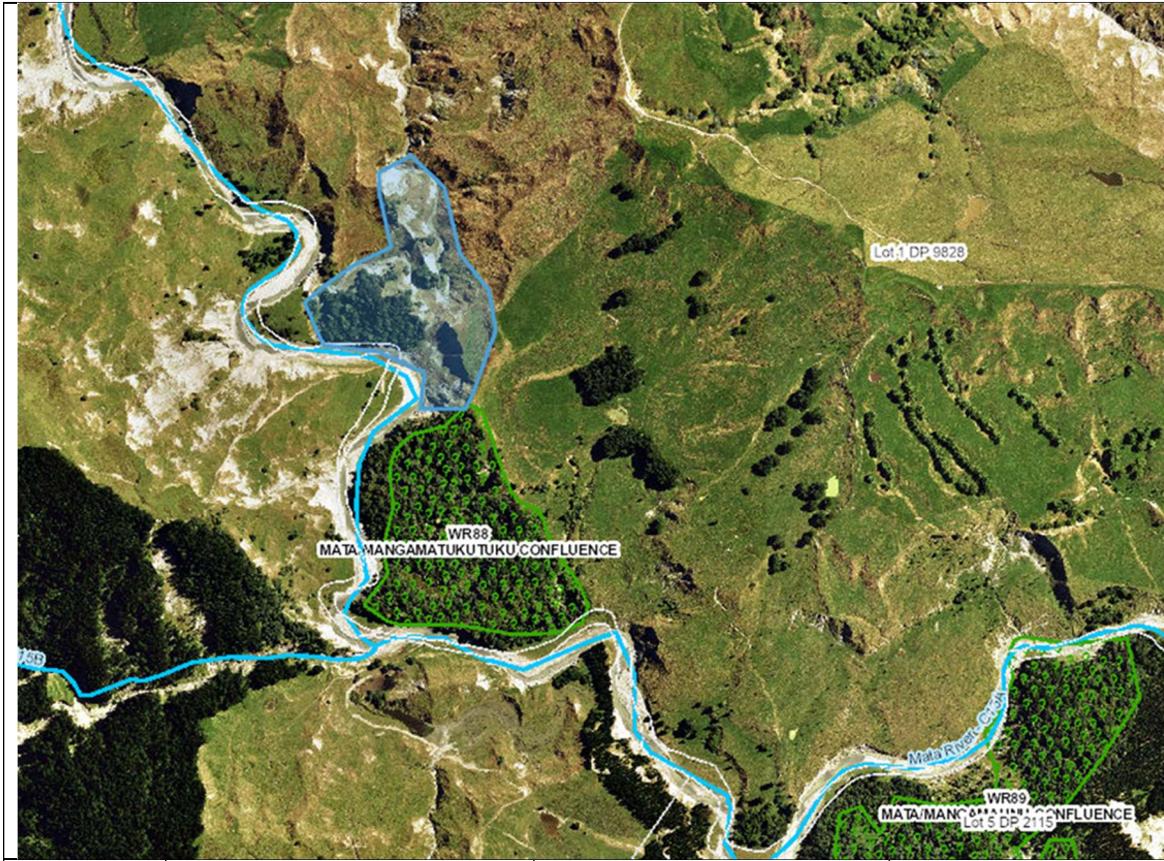
The Huiarua Forest contains the Protected Management Area's and records are taken from the GDC TRMP, these sites were visited in the Field Assessment February 2025.



PMA Number:	WR137	<p>Details; A 17 ha area containing secondary Forest where silver and red beech dominate the canopy. Also, horopito, heketara, putaputaweta, broadleaf, lancewood, Hall's totara, tawari, pate, and kamahi.</p>	<p>Assessment of Effects; Outside of the new afforestation area the PMA is within a stand of trees planted in 2012.</p>
PMA Name:	OHINEPAKA		
Area (Ha):	17ha consisting of 1 part(s).		
NZMS Ref	Y16 427332 R39		



PMA Number:	WR83	Details A 17 ha area consisting of two units. Totara is most widespread with kahikatea, matai, and black beech.	The highlighted area shows the extent of planned non-production planting undertaken with Totara.
PMA Name	THE POND BUSH		
Area (Ha)	17ha consisting of <u>2</u> part(s).		
Subclass:	RS 106		
NZMS Ref	Y16 516288 R39		



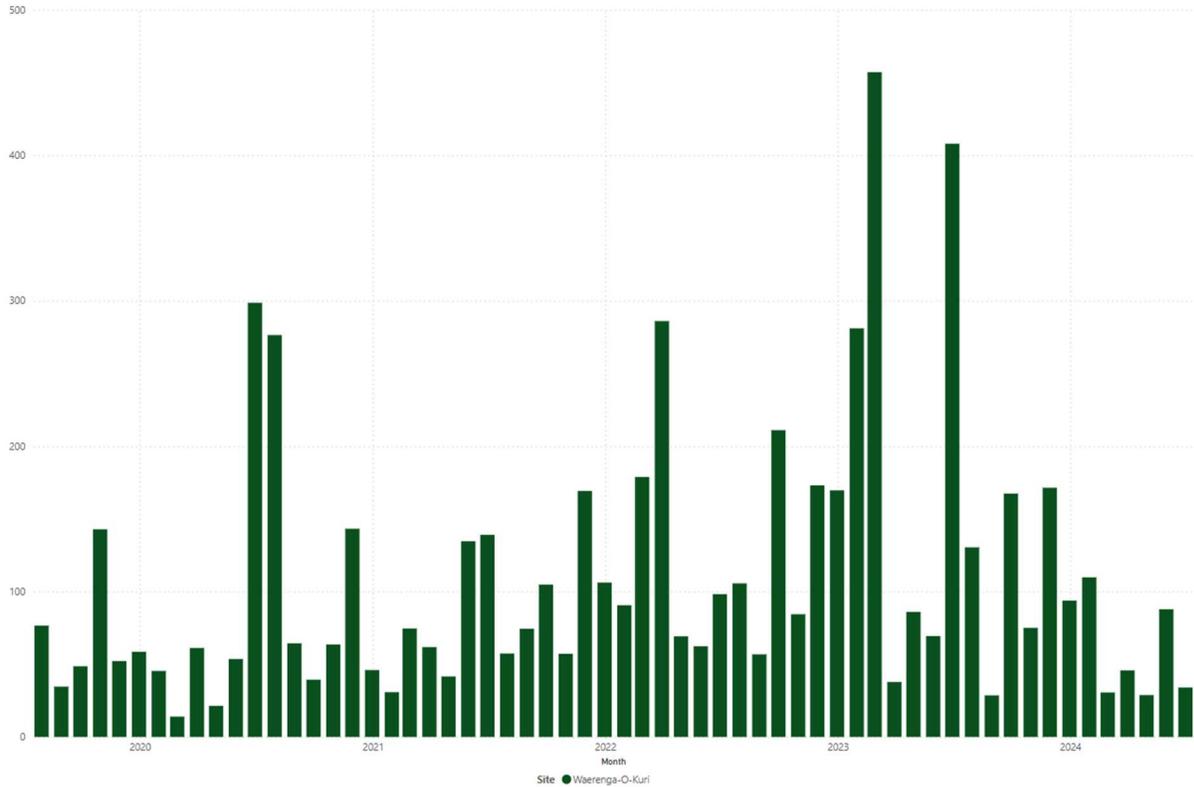
PMA Number:	WR88	Details A 12 ha area of high significance. Matai, black beech, kahikatea, tawa, and totara are all dominant within different areas	Assessment of Effects The PMA is adjacent to the Mata River and will be retired from production and stock access. An area (highlighted) directly north of the PMA will be planted in non-harvestable species to stabilise and improve the biodiversity of the area and will improve the protection of the PMA.
PMA Name:	MATA/MANGAMATUKUTU CONFLUENCE		
Area (Ha):	12ha consisting of 1 part(s).		
Subclass:	RS 109		
NZMS Ref	Y16 504264 R48		

Setbacks from Significant areas

The applicant will set back 10 metres from the boundary of all PMA and where the PMA has spread outside the boundary of the PMA the applicant will setback at least 10 metres from the area of growth.

Climate

GDC Rainfall data collected at the nearest rainfall data collection site (Warenga-O-Kuri) by month over the past 5 years is shown below:



The Forest Manager is aware that the area has been subject to unseasonable prolonged heavy rain and cyclonic events in the 2022-23 Spring and Summer, and recent rainfall events, have not followed predictable patterns, and therefore precautions will be taken at all times in preparation for these events.

Afforestation of this area is an improved land use which will enable this land to withstand weather events significantly better than current pastoral farming use.

Afforestation will reduce the volume and intensity of storm event water flows and regulate water flows in the lower catchment.

Geological Sites

There are no known geological sites within the Huiarua Matanui Forests management area.

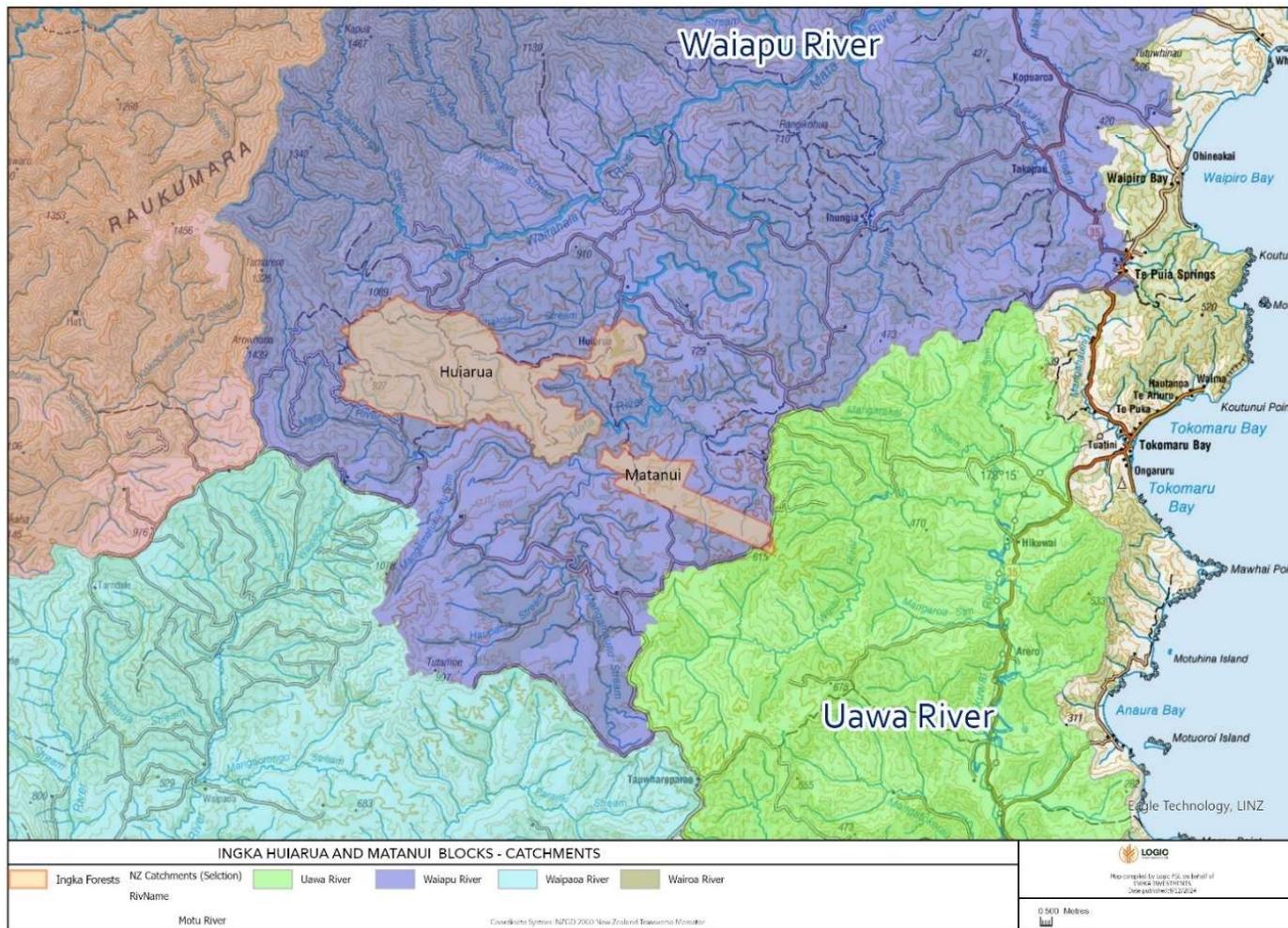


Figure 7 Huiarua Matanui Forests Location within the Main Waiapu River Catchment

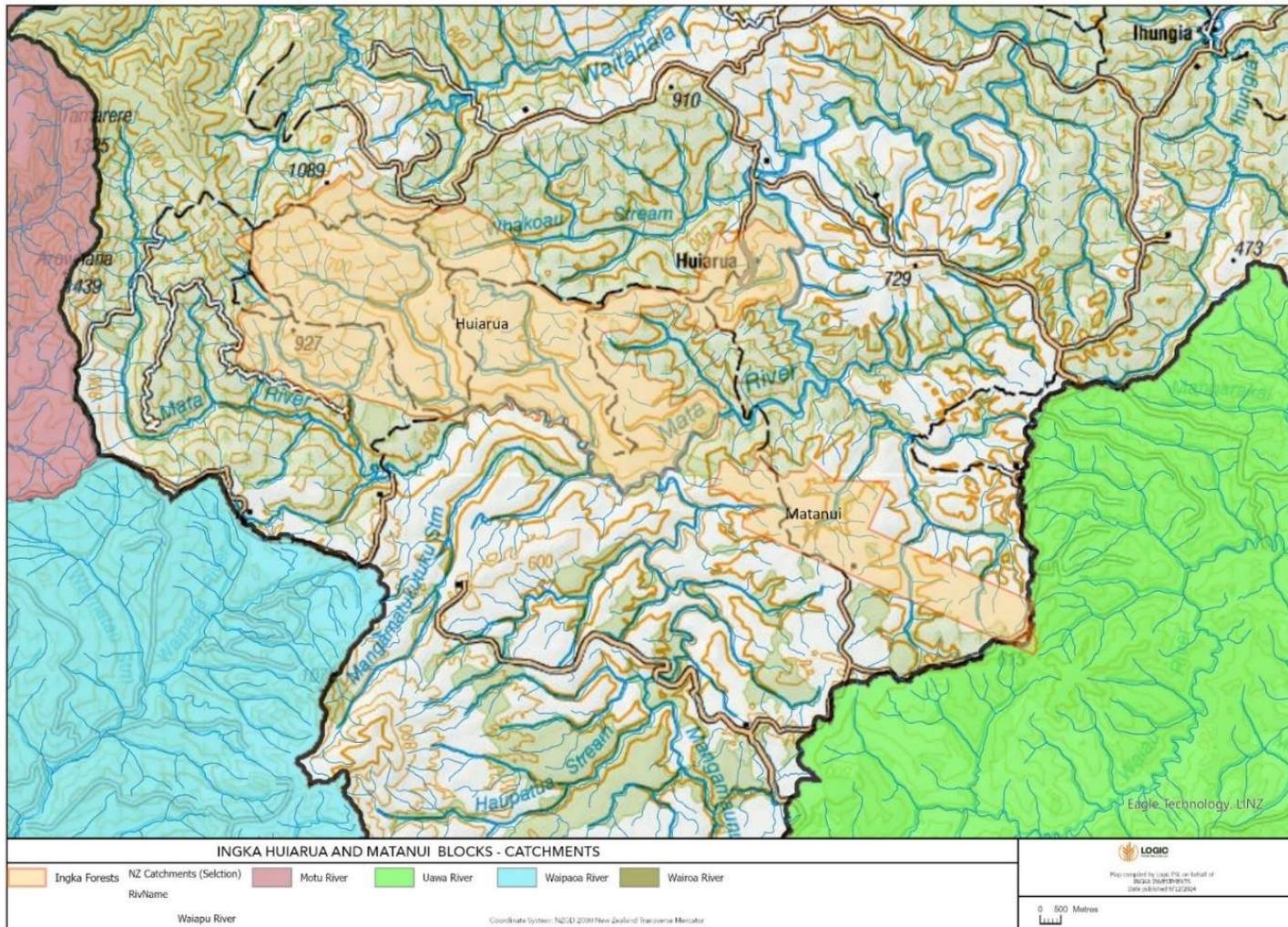


Figure 8 Huiarua Matanui Forests within the Mata Sub Catchment

Assessment of High Conservation Values (HCV) Summary

Consultation was undertaken with parties representing hapu of Te Runanga o Ngati Porou, Members of the Waiapu Catchment Restoration Group, Interested Stakeholders, Gisborne District Council (Biodiversity, Integrated Catchment Teams), Department of Conservation.

Assessment and recording the areas.

The following is our current assessment of the areas within the, with specific regard to whether they can be considered High Conservation Value Areas within the terms of the definitions.

This assessment follows the use of “best available information” and Principle 9 and Annex H: HCV framework Guidance FSC-STD-NZL-02-2023 Plantations EN

Initial Assessment for High Conservation Values

Criterion 9.1 States The Organisation, through engagement with affected stakeholders, interested stakeholders and other means and sources, shall assess and record the presence and status of high conservation values in the management unit, proportionate to the scale, intensity, and risk of impacts of management activities, and likelihood of the occurrence of the high conservation values (HCV).

An assessment is completed using Best Available Information that records the location and status of High conservation value Categories 1-6, as defined in Criterion 9.1; the high conservation value areas they rely upon (Annex H), and their condition.		
FSC ID	FSC Criteria	Assessment Summary
Identify: HCV 1 – Species diversity. Concentrations of biological diversity including endemic species, and rare, threatened or endangered species, that are significant at global, regional or national levels.	9.1.1	<p>When considering the range of biodiversity across the surveyed sites, two of the 135 plant species found were RTE species, and three RTE bird species were recorded.</p> <p>If considered together, the nine surveyed blocks encompass a significant portion of the region's plant diversity and forest types, potentially qualifying as HCVF1.</p> <p>However, they are fragmented and degraded. For example, the Bush Paddock is not a key habitat for the North Island Robin, as only one bird was observed, and the block is too small to support a viable population.</p> <p>Similarly, only a few <i>Jovellana sinclairii</i> were found in the blocks where they occur, whereas key populations elsewhere contain hundreds of plants.</p> <p>The presence of just one or two individuals of a rare, threatened, or endangered species does not constitute a significant concentration.</p> <p>Based on the current information and findings from the field visit this does not represent a “Concentration of biological diversity including endemic species, and rare, threatened or endangered species, that are significant at global, regional or national levels.”</p> <p>None of the areas surveyed meet the criteria for HCVF 1.</p> <p>With good management including increased connectivity, some of these areas may meet the criteria for HCVF 1 in the future.</p>

		Review within 3 years
Identify: HCV 2 – Landscape -level ecosystems and mosaics. Intact Forest landscapes and large landscape -level ecosystems and ecosystem mosaics that are significant at global, regional or national levels, and that contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance	9.1.1	<p>The blocks in the Matanui-Huiarua FMU do not meet the criteria for HCV 2 as it does not “contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance”</p> <p>None of the areas surveyed qualify for HCV 2</p> <p>Review within 3 years</p>
Identify: HCV 3 – Ecosystems and habitats. Rare, threatened, or endangered ecosystems , habitats or refugia .	9.1.1	<p>Mata/Mangamatukutuku Confluence and The Pond Bush were the two blocks of the highest ecological value in the FMU, based on their designation as RAP/PMA and their classification as being in the “10-20% indigenous cover left” category.</p> <p>This was backed up by the field visit, where despite their degraded condition, they contained a broad range of species, with both blocks combined having 71 plant species recorded, and 2 of these being RTE plant species.</p> <p>NZ Dabchick was also present in the oxbow.</p> <p>The emergent podocarp trees in the Mata block were some of the tallest the surveyor has seen in the region, with a rough estimate of height of the tallest Kahikatea being 48m.</p> <p>The Two blocks, Mata/Mangamatukutuku Confluence and The Pond Bush may qualify as a HCVF under HVC 3</p> <p>Await further Stakeholder feedback.</p> <p>Review within 3 years</p>
Identify: HCV 4 – Critical ecosystem services . Basic ecosystem services in critical situations, including protection of water catchments and control of erosion of vulnerable soils and slopes.	9.1.1	<p>The land area as a farm and new forest area is not currently providing all the services, however it is not to say the area will provide a more significant contribution to future ecosystem services.</p> <p>The forest management unit (FMU) provides meat from pests controlled on the land to a social programme. Infrastructure associated with the FMU is also used for this purpose.</p> <p>There are internal occupant and functional water sources, but no external community water sources.</p> <p>The scale of afforestation will not be sufficient to regulate floods, drought, or air quality.</p> <p>Carbon grown in the FMU will be measured and contribute to climate targets, however, will not be traded on the carbon market.</p>

	<p>Land degradation will be slowed by the removal of stock, retirement of some areas from any form of production, and the reforestation of the significant properties in the upper Waiapu catchment.</p> <p>The land area as a farm and new forest area is not providing or supporting the services (LFSL) for soil formation and nutrient cycling.</p> <p>The land area as a farm and new forest area do not have identified physical sites or cultural services. We will address the wider cultural environment in HCV 6 discussion (LFSL). Information is being sought with Stakeholders as to the non-physical and spiritual context of the site with regard to the Ngati Porou and Hapu stories and journeys.</p> <p>Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site, such as the privacy critical to the social programs, and specialness of the site. Stakeholders will be consulted with in developing a Public Access Policy (mid 2025).</p> <p>Removal of the services it currently provides as a new forest and existing pastoral farm, will not result in disruption or severe negative impacts.</p> <p>As the forest and new ecosystem of effective tree cover and stock exclusion evolves the services may contribute more to the wider catchment. A reasonable period of review should be instigated for this.</p> <p>There is no legal community water supply within or downstream of the land area which the activity of the MU is likely to cause, or poses a threat of, severe negative impacts.</p> <p>LFSL believes that these areas do not currently qualify for HCV4 for the <u>above factors</u>.</p> <p>In the criteria of Very high-risk erosion* areas or areas identified during pre-harvest* planning as having very high risk of erosion.</p> <p>The Forest contains areas identified as having very high risk of erosion by information provided by the Gisborne District Council Landslide Susceptibility Analysis in work carried out by LandCare Research. This work has been combined with long-term work by Mike Marden of Landcare Research on Gully Erosion on the East Coast The high-risk categories within this analysis are likely to contribute to a land class where production land use on all land types will be restricted in a Transitions Layer, and potentially in a future District Plan Change.</p> <p>The Forest contains areas of Very High Risk of Erosion by the Erosion Susceptibility Classification within the National Environmental Standards for Commercial Forestry Regulations.</p>
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	<p>The forest contained areas identified in recent analysis by GDC and Landcare Research Scientists as having two categories of “High Landslide Susceptibility and High Connectivity with waterways”, and “Moderate Landslide Susceptibility and High Connectivity to water”</p> <p>Disruption due to future harvesting of areas identified as Very High Risk Erosion have been, or are planned to be, minimised by the following steps.</p> <ul style="list-style-type: none"> • Planting of Riparian buffer areas or fallow areas of Landslide Susceptible zones with non-production species (where trees are viable), or retirement • A Draft Harvest Plan has been prepared for Very high-risk erosion areas. Afforestation Plans have been matched to this plan. • Consent attained for these areas after a lengthy process, then the consent was reviewed under s128 of the RMA due to the new information provided by Landslide Susceptibility Mapping, resulting in no changes being needed to the Afforestation Plan. This strengthened the confidence in our consented plan. • FSC Criteria exclude Very high-risk erosion areas from Clearfell Harvest. The Certificate holder will research, adopt and develop alternative methods from widescale clearfell (such as coupe logging or selective harvest. • When Resource Consent for Harvest is sought for these areas the Applicant and GDC will ensure that the Co-management party is consulted with in proposed plans where sequencing of harvest and appropriate methods are outlined. <p><u>LFSL believes that these Very High ESC Zones do qualify for HCV4</u></p> <p>The Forest contains areas identified as having very high risk of erosion by information provided by the Gisborne District Council Landslide Susceptibility Analysis in work carried out by LandCare Research. This work has been combined with long-term work by Mike Marden of Landcare Research on Gully Erosion on the East Coast</p> <p>The high-risk categories within this analysis are likely to contribute to a land class where production land use on all land types will be restricted in a Transitions Layer, and potentially in a future District Plan Change.</p> <p><u>LFSL believes that these Landslide Susceptible and Gully Erosion Zones do qualify for HCV4</u> [LFSL]</p> <p>LFSL in Afforestation Planning by methods of a draft Harvest Plan also identified areas which may have during or following harvest, or they were too difficult to harvest requiring excessive earthworks.</p> <p>These areas were planned for planting with native or alternative species.</p> <p><u>LFSL believes that these voluntary harvest restriction areas do not qualify for HCV4 but are useful buffers to areas below. In leaving these areas within the area identified as HCV 4 it is not expected further buffers are</u></p>
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		<p>required to protect these non-productive HCV 4 areas as the existing buffers suffice</p> <p>HCV 4 Areas are shown on the Map Figure 1 and 2 below, and sent separately</p>
<p>Identify: HCV 5 – Community needs. Sites and resources fundamental for satisfying the basic necessities of local communities or Indigenous Peoples (for livelihoods, health, nutrition, water, etc.), identified through engagement with these communities or Indigenous Peoples .</p>	<p>9.1.1</p>	<p>Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site, such as the privacy critical to the social programs, and specialness of the site.</p> <p>While it is aspirational for the Forest Owners to encourage access, including supporting re-emerging practices such as food collecting and medicinal plant collecting, this is at a small scale and can be handled through the existing Permitting System that is in place rather than a declaration of the area into an HCV Status. Using the Permit System will enable the frequency and popularity of the activity to be monitored and a wider understanding of the practices to be gained.</p> <p>LFSL believes that these areas do not currently qualify for HCV5</p> <p>Review within 3 years</p> <p>Stakeholders will be consulted with in developing a Public Access Policy (mid 2025). [LFSL]</p> <p>Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site, such as the privacy critical to the social programs, and specialness of the site.</p> <p>LFSL believes that these areas do not currently qualify for HCV5</p> <p>Review within 3 years</p> <p>Stakeholders will be consulted with in developing a Public Access Policy (mid 2025). [LFSL]</p> <p>Given the guidance and advice noted around subsistence living and recreational scale we don't believe the site would qualify as HCV 5</p> <p>LFSL believes that these areas do not currently qualify for HCV5</p> <p>Review within 3 years</p>
<p>Identify: HCV 6 – Cultural values. Sites, resources, habitats and landscapes of global or national cultural, archaeological or historical significance, and/or of critical cultural, ecological, economic or religious/sacred importance for the traditional cultures of local communities or Indigenous Peoples , identified through engagement with these local communities or Indigenous Peoples .</p>	<p>9.1.1</p>	<p>No UNESCO WH sites in the area. Not deemed HCV 6</p> <p>Desktop assessment identified no physical sites</p> <p>LFSL believe that deadlines are not conducive to a considered approach to consultation on such an important issue.</p> <p>LFSL request that parties consider the information provided above, and what further information they can offer this consultation <u>at this point</u>.</p> <p>If nothing new is forthcoming the site is not identified as HCV 6 <u>at this point</u>.</p> <p>This does not mean protection is lessened as we must follow the Heritage New Zealand Pouhere Taonga Act 2014, and our internal protocols (including our Accidental Discovery Protocol)</p> <p>From that point;</p>

		<p>All parties agree to gather information, learn stories (especially of Non-physical sites, sites of journeys, and possible waahi tapu) and Revise decision regularly taking into account the gathered and new information. Prepare a Cultural Values Assessment/</p> <p>If at any point in this revision process the sites warrant reclassification as HCV 6 we can do that immediately.</p> <p>Review open at all times as information comes to hand but always within 3 years</p>
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Strategy Development Discussion

HCV1 Management Strategy Development discussion

No Strategy Development is required as identified blocks do not yet meet the threshold for HCV Classification.

However, these areas will be included in the Conservation Area Network (CAN) for the forests and enhancement activities, stock removal and ongoing Pest Control will likely improve the state of the sites.

Monitoring will be put in place.

Formal reassessment of HCV Status will be undertaken in **3 years February 2028**

HCV 2 Management Strategy Development discussion

No Strategy Development is required as identified blocks do not yet meet the threshold for HCV Classification.

However, these areas will be included in the Conservation Area Network (CAN) for the forests and enhancement activities, stock removal and ongoing Pest Control will likely improve the state of the sites.

Monitoring will be put in place.

Formal reassessment of HCV Status will be undertaken in **3 years February 2028**

HCV 3 Management Strategy Development discussion

Consultation with DOC and GDC has been undertaken to determine if those parties believe these areas qualify for HCV 3

These areas will be included in the Conservation Area Network (CAN) for the forests and enhancement activities, stock removal and ongoing Pest Control will likely improve the state of the sites.

Monitoring will be put in place.

Reassessment of HCV Status will be undertaken in 3 years February 2028

HCV 4 Management Strategy Development discussion

HCV 4 – Strategies to protect* any water catchments of importance to local communities* located within or downstream of the management unit*, and upstream and upslope areas within the unit that are particularly unstable or susceptible to erosion.	For areas identified as HCV for this Category, the following strategies will be taken
<i>Examples to protect* water catchments and upstream and upslope areas. may include</i>	
protection zones*,	In place
harvest prescriptions,	Will be site and method specific, and put in place prior to harvest
Chemical use restrictions,	In place
prescriptions for road construction and maintenance*,	Will be site and method specific and put in place prior to new earthworks. Maintenance monitoring of erosion and sediment control is in place
<i>Examples where enhancement is identified as the objective*,</i>	
measures to restore* water quality and quantity.	Stock exclusion
	Stream Health Monitoring has been underway for 3 years
	Biodiversity planting is in place
	Active and ongoing Pest control
<i>Where identified HCV 4 ecosystem services* include climate regulation</i>	
strategies to maintain or enhance carbon sequestration and storage.	Stock exclusion
	Ingka assess and record carbon growth however do not participate in Carbon Credit trading as they do not believe in offsetting of liabilities for emitters.
	Biodiversity planting is in place to enhance tree cover rather than relying on natural reversion of degraded ex-farmland sites with poor seed source.
	Active and ongoing Pest control

Review within 3 years

HCV 5 Management Strategy Development discussion

Review within 3 years

HCV 6 Management Strategy Development discussion

Review open at all times as information comes to hand but always within 3 years

MONITORING HCV4

Establish a monitoring program that assesses: The implementation and effectiveness of activities carried out to maintain and/or improve HCV 4, so that compliance with the established objectives can be confirmed.

Namely, that harvesting practices do not affect water bodies, and that barriers have been established and are maintained to control fires.	Underway. Ongoing. Draft Harvest plan prepared to minimise settings that could lead to negative effects on adjacent waterway. Buffer areas planted. Long term species considered. Alternative methods to clearfell harvest will be put in place. Emergency
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	Plans in place and Fire Control will be in conjunction with FENZ.
The quality and quantity of water for large plantation forest companies and MU.	Stream Health Monitoring has been underway since purchase of the property (2023)
The incidence of landslides or gullies in the MU, affected areas, their control and status.	Post event monitoring will be undertaken. At all remapping stages landslides will be remapped also. Any developing Landslides or gullies will be monitored as case studies.
Incidence and control of forest fire and incipient fires in the MU, affected areas, control and status.	Underway. Ongoing. Emergency Plans in place and Fire Control will be in conjunction with FENZ.

Biodiversity values

The Huiarua–Matanui FMU features a diverse range of indigenous forest remnants, with primary podocarp/broadleaf remnants and tawa-dominated stands to regenerating secondary vegetation present.

Site Survey

Huiarua Blocks

- The Pond Bush (16.5ha): Mature podocarp forest with an oxbow wetland. Contains emergent mataī, with an understory of coprosmas and māhoe. The wetland area has raupō and patches of open water. Identified as PMA WR83, it supports extensive riparian native forest with mature podocarps and tanekaha, though the understory is degraded by browsing pressure.
- Mata/Mangamatukutuku Confluence (13.5ha): Features riparian podocarp forest, with an oxbow that was inundated during Cyclone Gabrielle. Notable for diverse tree species, including black beech, tanekaha, and pokaka. Identified as PMA WR88, it forms a key riparian corridor, though browsers have impacted understory development.
- Ohinepaka (20ha): The highest-altitude block in the FMU, regenerating after the burning of the beech forest that would have been present ~100 years ago. It contains a distinct suite of species compared to the other blocks, primarily low-growing and dense vegetation dominated by horopito, with occasional beech trees. Identified as PMA WR137.
- Wayne’s Bush (4ha): Degraded treeland with limited understory due to prolonged stock and deer browsing.
- Bush Paddock (5.5ha): South- and west-facing block with a strong subcanopy, suggesting past recovery due to stock exclusion, before deer numbers increased.
- Waimana Bush (5ha): Dense canopy dominated by kāmahi, mataī, and rewarewa, but with severe stock damage preventing understory growth. No viable understory remains due to recent or ongoing stock grazing.
- Homestead Bush (6.5ha): Contains a gully with emergent mataī and tōtara, though browsing pressure has left much of the understory bare.

Matanui Blocks

- Farmhouse Bush (8.5ha): Primary broadleaf forest with a tawa-dominated canopy and occasional emergent hīnau. The understory is present mainly in steeper areas where browsing pressure is lower.
- Roadside (14.5ha): Kanuka-dominated catchment with high light availability, supporting a diverse understory despite localized browsing pressure. Occasional emergent rewarewa are present. *Jovellana sinclairii* (At Risk – Declining) was found growing near a small creek running under the road.

- In general, the blocks of a lower ecological value (blocks of secondary vegetation - Roadside, and Ohinepaka) were in the best condition. This is due to the increased light levels that enter a regeneration forest. The more mature primary blocks were negatively impacted to varying degrees by browsers.

While stock grazing and ongoing browsing by deer, possums, and goats have led to some degradation—particularly in the understory—the removal of livestock and effective browser control has already led to small signs of recovery.

- Both Huiarua and Matanui support several RTE (Rare, Threatened, and Endangered) species. RTE plant species including *Jovellana sinclairii* and *Lophomyrtus obcordata* have been recorded in Huiarua, with a North Island Robin also noted in a remnant patch.
- Due to the range of forest types, aspect, and varied histories, collectively the blocks of indigenous vegetation across the Huiarua–Matanui FMU contain a large proportion of the expected plant diversity of the ecological district. The 9 blocks surveyed are small, and other than a few exceptions, are very isolated ecologically, in a quite degraded state.

HCV 1 Species Diversity

Identify: HCV 1 – Species diversity. Concentrations of biological diversity including endemic species, and rare, threatened or endangered species (RTE), that are significant at global, regional or national levels.

All available information (from DOC, GDC, online sources, and locals who know the area) was used to find records of RTE species in the FMU. In addition, site surveys were carried out. The following are the RTE species recorded in the FMU.

Bats

- A bat survey has not been conducted for this FMU, but given the presence of mature podocarp forest, large tree hollows, and relatively intact wetland areas, **long tailed bats** (*Chalinolobus tuberculatus* - *Vulnerable* - *Population decreasing*) are presumed to be present.

Plants

- *Lophomyrtus obcordata* (*At Risk – Declining*) was recorded in **The Pond Bush** and **Mata/Mangamatukutuku Confluence**.
- *Jovellana sinclairii* (*At Risk – Declining*) was found in **Mata/Mangamatukutuku Confluence** and along the **Roadside** in Matanui.

Birds

- **New Zealand Dabchick** (*Threatened – Nationally Increasing*) was observed in **The Pond Bush**.
- **New Zealand Pipit** (*At Risk – Declining*) was seen across open farm tracks.
- **North Island Robin** (*At Risk – Declining*) was recorded in **Bush Paddock**, likely isolated due to habitat fragmentation.
- **New Zealand Falcon** (*Threatened – Nationally Vulnerable*) was not seen on the site visit, but has been seen recently within the FMU.
- **Weka** (*At Risk-Relict*) are not currently present but have been recorded 13km to the northeast and are expected to expand into the area in the future.
- **Kereru** were recorded in 7 of the 9 blocks surveyed and were listed in 2017 in the GDC TRMP as being in regional decline.

Fish

- **Longfin eel**. (*At Risk- Declining*) recorded in an eDNA samples from in and around the FMU. No other RTE fish species were recorded

PMA/RAP

The Protected Natural Areas Program (Whaley *et. al*/2002) identified the ecological importance of multiple areas within the FMU. These are also identified by the Gisborne District Council as a PMA (Protected Management Area)

The criteria for a PMA and RAP are Representativeness, Diversity and Pattern, Rarity and special features, Naturalness, Long Term Viability, Size and Shape, and Buffering.

These align with the criteria for FSC HVC1.

- Huiarua PMA/RAP Areas
- Whare Beat – PMA WR83 (RAP83) – *The Pond Bush*
- Mata – PMA WR88 (RAP 88) – Mata/Mangamatukutuku Confluence
- Waimatai Trees – PMA WR137 (RAP 137) – *Ohinepaka*

HCV 1 – Summary and Assessment

When considering the range of biodiversity across the surveyed sites, two of the 135 plant species found were RTE species, and three RTE bird species were recorded.

If considered together, the nine surveyed blocks encompass a significant portion of the region's plant diversity and forest types, potentially qualifying as HCVF1.

However, they are fragmented and degraded. For example, the Bush Paddock is not a key habitat for the North Island Robin, as only one bird was observed, and the block is too small to support a viable population.

Similarly, only a few *Jovellana sinclairii* were found in the blocks where they occur, whereas key populations elsewhere contain hundreds of plants.

The presence of just one or two individuals of a rare, threatened, or endangered species does not constitute a significant concentration.

Based on the current information and findings from the field visit this **does not represent a "Concentration of biological diversity including endemic species, and rare, threatened or endangered species, that are significant at global, regional or national levels."**

None of the areas surveyed meet the criteria for HCVF 1.

With good management including increased connectivity, some of these areas may meet the criteria for HCVF 1 in the future.

HCV 2 -Landscape

Identify: HCV 2 – **Landscape -level ecosystems and mosaics. Intact Forest landscapes and large landscape -level ecosystems and ecosystem mosaics that are significant at global, regional or national levels, and that contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance**

Intact Forest Landscapes

The IFL map that FSC uses to determine intact Forest Landscapes shows the site is not Intact Forest Landscape (<https://intactforests.org/world.map.html>)

The Matanui-Huiarua FMU consists of nine small, fragmented blocks rather than a single, continuous forested landscape. While some gullies contain scrub and scattered riparian vegetation, offering limited corridor value, the area remains highly fragmented.

Past disturbances, stock browsing, and lack of connectivity have further degraded the ecological function of each block.

As is the case with many remnant bush fragments, these blocks **do not include “the great majority of the naturally occurring species in natural patterns of distribution and abundance”**.

A block meeting this description would have birds such as rifleman, kākā, kiwi present etc.

HCV 2– Summary and Assessment

The blocks in the Matanui-Huiarua FMU **do not meet the criteria for HCV 2 as it does not “contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance”**

None of the areas surveyed qualify for HCV 2

HCV 3 - Endangered ecosystems

Identify: HCV 3 – **Ecosystems and habitats. Rare, threatened, or endangered ecosystems , habitats or refugia .**

No naturally uncommon ecosystems are present in the Matanui-Huiarua FMU (<https://www.landcareresearch.co.nz/publications/naturally-uncommon-ecosystems/>)

LENZ

The Threatened Environments Classification shows how much native (indigenous) vegetation remains within land environments, and how past vegetation loss and legal protection are distributed across New Zealand's landscape.

According to this classification the land within the Matanui-Huiarua FMU is predominantly in the “10-20% indigenous cover left”, and “>30% left and 10-20% protected” categories

Potential HCV 3

Mata/Mangamatukutuku Confluence and **The Pond Bush** were the two blocks of the highest ecological value in the FMU, based on their designation as RAP/PMA and their classification as being in the “10-20% indigenous cover left” category.

This was backed up by the field visit, where despite their degraded condition, they contained a

broad range of species, with both blocks combined having 71 plant species recorded, and 2 of these being RTE plant species.

NZ Dabchick was also present in the oxbow.

The emergent podocarp trees in the Mata block were some of the tallest the surveyor has seen in the region, with a rough estimate of height of the tallest Kahikatea being 48m.

HCV 3– Summary and Assessment

The Two blocks, Mata/Mangamatukutuku Confluence and The Pond Bush may qualify as a HCVF under HCV

For the purposes of the process these are assumed and will be managed as HCV

STRATEGIES FOR MAINTAINING HCV4

- 1) Strategies to protect any water catchments of importance to local communities located within or downstream of the management unit, and areas within the unit that are particularly unstable or susceptible to erosion.
- 2) Examples may include protection zones, harvest area limitations or requirement to ensure a permanent forest cover, chemical use restrictions, and/or prescriptions for road construction and maintenance, to protect water catchments and upstream and upslope areas.
- 3) Where enhancement is identified as the objective, measures to restore water quality and quantity are in place and avoid future degradation.
- 4) Where identified HCV4 ecosystem services include climate regulation, strategies to maintain or enhance carbon sequestration and storage are in place.

HCV 4 – Strategies to protect* any water catchments of importance to local communities* located within or downstream of the management unit*, and upstream and upslope areas within the unit that are particularly unstable or susceptible to erosion.	If identified as HCV for this Category, the following strategies will be taken
<i>Examples to protect* water catchments and upstream and upslope areas. may include</i>	Discussion
protection zones*,	In place
harvest prescriptions,	Will be site and method specific, and put in place prior to harvest
Chemical use restrictions,	In place
prescriptions for road construction and maintenance*,	Will be site and method specific and put in place prior to new earthworks. Maintenance monitoring of erosion and sediment control is in place
<i>Examples where enhancement is identified as the objective*,</i>	
measures to restore* water quality and quantity.	Stock exclusion Stream Health Monitoring has been underway for 3 years Biodiversity planting is in place Active and ongoing Pest control
<i>Where identified HCV 4 ecosystem services* include climate regulation</i>	
strategies to maintain or enhance carbon sequestration and storage.	Stock exclusion Ingka assess and record carbon growth however do not participate in Carbon Credit trading as they do not believe in offsetting of liabilities for emitters. Biodiversity planting is in place to enhance tree cover rather than relying on natural reversion of degraded ex-farmland sites with poor seed source. Active and ongoing Pest control

MONITORING HCV4

Establish a monitoring program that assesses: The implementation and effectiveness of activities carried out to maintain and/or improve HCV 4, so that compliance with the established objectives can be confirmed.

<p>Namely, that harvesting practices do not affect water bodies, and that barriers have been established and are maintained to control fires.</p>	<p>Underway. Ongoing. Draft Harvest plan prepared to minimise settings that could lead to negative effects on adjacent waterway. Buffer areas planted. Long term species considered. Alternative methods to clearfell harvest will be put in place. Emergency Plans in place and Fire Control will be in conjunction with FENZ.</p>
<p>The quality and quantity of water for large plantation forest companies and MU.</p>	<p>Stream Health Monitoring has been underway since purchase of the property (2022)</p>
<p>The incidence of landslides or gullies in the MU, affected areas, their control and status.</p>	<p>Post event monitoring will be undertaken. At all remapping stages landslides will be remapped also. Significant sites such as Puniatere and Hansens Gully will be monitored as case studies.</p>
<p>Incidence and control of forest fire and incipient fires in the MU, affected areas, control and status.</p>	<p>Underway. Ongoing. Emergency Plans in place and Fire Control will be in conjunction with FENZ.</p>

The monitoring program must have defined the appropriate scope, scale and frequency to detect changes in the HCV, in relation to the initial assessment.

HCV5 – Community needs. Sites and resources fundamental for satisfying the basic necessities of local communities* or Indigenous Peoples* (for livelihoods, health, nutrition, water, etc.), identified through engagement* with these communities or Indigenous Peoples*.

STRATEGIES FOR MAINTAINING HCV5

1) Strategies to protect the community’s and/or Indigenous Peoples’ needs in relation to the management unit are developed in cooperation with representatives and members of local communities and Indigenous Peoples.

HCV 5 – Strategies to protect* the community’s and/or Indigenous Peoples*’ needs in relation to the forest* management unit* developed in cooperation with representatives and members of local communities* and Indigenous Peoples*.	
???	

MONITORING HCV5

Establish a monitoring program that assesses:

- The implementation of the strategies established to maintain and/or enhance the HCV; allowing to confirm if the objectives were achieved.
- Whether the management is affecting the identified HCV 5.
- Permanent access to HCV 5 used by local communities, Indigenous Peoples or iwi*.
- Type of resource and volume used by local communities, Indigenous Peoples or iwi* to cover their basic needs.

The monitoring programme must have defined the appropriate scope, scale and frequency to detect changes in the HCV, in relation to the initial assessment.

HCV 6 – Cultural values. Sites, resources, habitats and landscapes of global or national cultural, archaeological or historical significance, and/or of critical cultural, ecological, economic or religious/sacred importance for the traditional cultures of local communities or Indigenous Peoples*, identified through engagement* with these local communities or Indigenous Peoples.

IDENTIFICATION OF HCV 6

National significance heritage sites under HNZ -archaeological sites only- and under local authorities' administration.

Damage can be caused to both archaeological sites and national heritage sites during harvesting, extraction and replanting.

Potential threats to such sites from forest management is the restriction of access for Māori communities to hunt, fish, extract plants, and maintain contact with resources for traditional use and sacred places.

MONITORING HCV6

Establish a monitoring program that assesses:

- The implementation of the strategies established to maintain and/or enhance HCV 6; allowing to confirm if the objectives were achieved.
- Whether the management is affecting the identified HCV 6.
- Permanent access to HCV 6, with which local communities, Indigenous Peoples or iwi* have a religious/cultural/economic linkage with the area or the forest.
- Changes in the status of the HCV 6 with indicators accepted and credible by local communities, Indigenous Peoples or iwi* who have a religious/cultural/economic linkage with the area or the forest.

The monitoring programme must have defined the appropriate scope, scale and frequency to detect changes in HCV 6, in relation to the initial assessment

GLEN ALVA FOREST

Introduction

Glen Alva Forest is a plantation forest located in the East Coast of New Zealand, Tiniroto District of Gisborne.

The closest town is Gisborne, approximately 49km or a 1 hour drive located on Tiniroto Rd.

The current Glen Alva Forest is surrounded to the East and North by existing Exotic Forest and to the west and south by Pastoral Hill Country Farming.

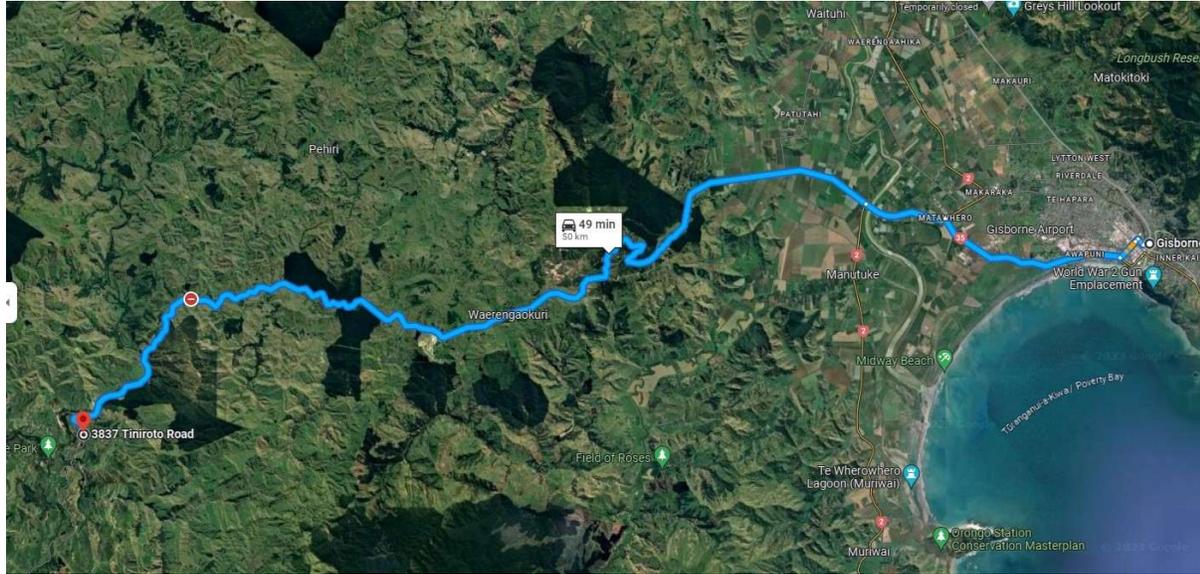


Figure 9: Location of Glen Alva Station within the region

The site is currently (early 2025) part farmland and new forest some older woodlots, with existing farm tracking and old crossings in place although the property is in the process of being afforested with a wider tracking upgrade programme partly completed.

Afforestation of Glen Alva Station commenced in 2024 with ESC zone areas which did not require resource consent being planted first with the plan of seeking consent for the afforestation of the remaining ESC Red zone areas of the property in 2025.

The current net stocked area comprises:

Species	Area (Ha)
Manuka 2024-2025	102.3
Radiata Pine	621.3
1992-1996	24.5
2019	8.0
2024-2025	588.8
Redwood 2024-2025	105.4
Non-Production/Indigenous/Waterways	126.3
Total	955.3

Glen Alva Forests Characteristics.

Legal Framework of the Forest Management Unit

Forest Name	Location	Total Area (ha)	Forest Description
Glen Alva Forest	3387 Tiniroto Rd	4922.0849	<p>Section 4 & 5 Block XII Hangaroa Survey District GS5A/114 &GS4A/1028 0832002201 At or about NZTM: 1999656 – 5702792</p> <p>Glen Alva Forest is a first and second rotation Forest consisting of (approx.) 25 ha of 1992-96 YOE P. radiata, 8 ha 2019 P Radiata and 2024 and 2025 Planting of 100 Ha Manuka, 105 Ha Redwood, and 623 Ha P Radiata.</p>

The legal description of the land subject is described below:

Legal Description	Land Area(ha)	title	Valuation Number	Occupier:
Section 4, Block XII Hangaroa SD	413 Ha	GS5A/114	0832002201	Ingka Investments Management NZ Ltd
Section 5, Block XII Hangaroa SD	541 Ha	GS4A/1028	0832002201	

Forest Areas Included in Forestry Certification Assessment Scope

Forest Name	Location	Total Area (ha)	Forest Description
Glen Alva Forest	3387 Tiniroto Rd	954	<p>Section 4 & 5 Block XII Hangaroa Survey District GS5A/114 &GS4A/1028 0832002201 At or about NZTM: 1999656 – 5702792</p>

Description of the Forest

Description of FOREST	Area (ha)	Ownership	Nationality	Status	Corporate Structure & History
Glen Alva Forest Section 4 & 5 Block XII Hangaroa Survey District GS5A/114 &GS4A/1028 0832002201 At or about NZTM: 1999656 – 5702792	954	Ingka Investment Management NZ Limited	Ingka Investment Management NZ Limited is a New Zealand Registered Company with its parent Company based in the Netherlands.	Active	Logic Forest Ltd (LogicFSL) is a 100% New Zealand owned, Gisborne based Forest management company providing a range of services to both small woodlot and corporate Forest owners primarily in the East

Description of FOREST	Area (ha)	Ownership	Nationality	Status	Corporate Structure & History
			Logic Forest Ltd, as the Certificate applicant and Forest Manager, is based in Gisborne, New Zealand.		Coast region, and more broadly throughout New Zealand. Logic FSL has been engaged as Forest Manager by Ingka Investment Management NZ Limited.

Land Use

Afforestation to date

Species	Area (Ha)
Manuka 2024-2025	102.3
Radiata Pine	621.3
	1992-1996 24.5
	2019 8.0
	2024-2025 588.8
Redwood 2024-2025	105.4
Non-Production/Indigenous/Waterways	126.3
Total	955.3

Public Access

Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site. Stakeholders will be consulted with in developing a Public Access Policy (mid 2026).

If you would like to enquire about access please phone +64 (0)6 863 2447 office@logicfsl.co.nz

Geology

The underlying geology of the afforestation area is (predominantly): Early Pliocene sandstone and siltstone.

Name	Mangaheia Group
Description	Calcareous sandstone, mudstone, pebbly limestone and conglomerate.
Geologic history	Early Pliocene
Simple name	Neogene sedimentary rocks

(Source GNS Science)

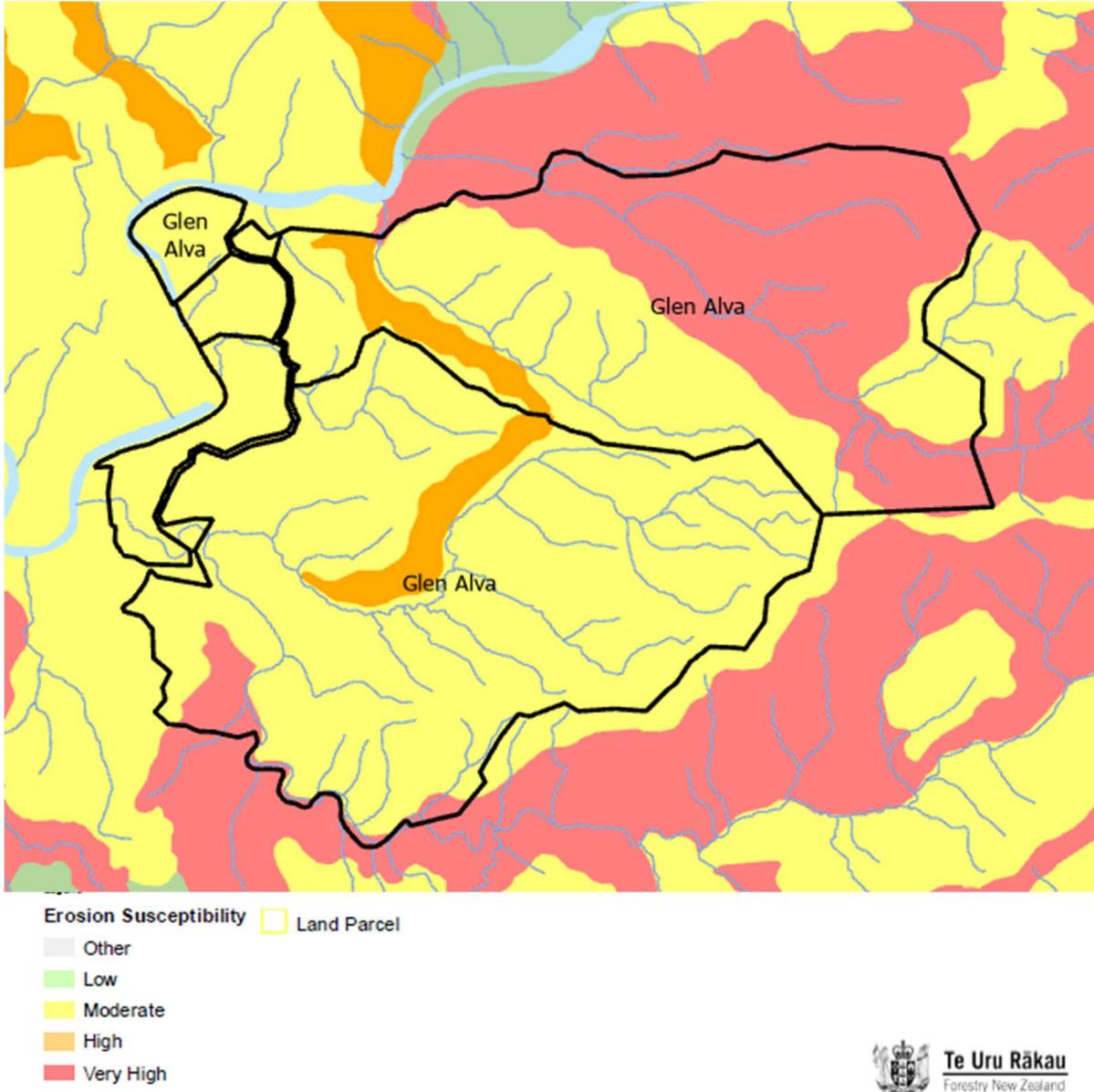


Figure 10 Figure 16 Glen Alva ESC Classification

Glen Alva ESC Classes (Land area)

ESC Class	Sum of Area (Ha)
Very High	223.8
High	44.1
Moderate	685.4
water	1.3
Total	955.2

Figure 11 Erosion Susceptibility of the Legal Parcel of which the Glen Alva Forest is part.

Exotic Forest Operations

Rationale for species selection and regime

Radiata pine (*Pinus radiata*)

Radiata pine (*Pinus radiata*) accounts for 90% of New Zealand's planted forest estate. Radiata pine is a fast growing and versatile softwood with a wide range of uses and applications.

NZ radiata pine is plantation grown, renewable and sustainable, was planted as a primary timber crop to provide an alternative to New Zealand Indigenous Forest timbers and the import of threatened tropical timbers.

It is a medium-density softwood, straight grained with an even texture. It is treated to H3.2 for durability and works well with hand and machine tools. Heartwood is light brown in colour and is non-durable to perishable in regard to decay resistance. Sapwood is pale yellowish-white colour treated with preservatives to be used in external applications.

New Zealand pine is a versatile softwood and well suited for a range of structural and appearance applications. The light consistent colour of radiata pine readily accepts stains and its general properties make it ideal for painting.

The pruned butt log can be used to make knot-free veneer or appearance grade timber
The unpruned logs can be used for structural timber, for veneer for plywood, and stock for finger jointing

Pulp type logs and those with defects and excessive knots can be used for pulp and paper.
Pinus radiata has been proven to grow successfully at the property.

There is a growing domestic market for Radiata Pine in the FMU Region, with a dominant export market.

The local sawmills process only Pinus radiata logs, and there is a strong and proven export market for the logs that the local mills don't use.

Redwood (*Sequoia Sempervirens*)

The forest owner chose to afforest some areas of the forest with Redwood recognising that these areas required a longer rotation species, or permanent species.

New Zealand has limited domestic sawmilling capability for other exotic species however interest in Redwood is growing along with the plantation size.

Redwoods has been planted as a buffer to some riparian's above the eroded bank area, and often above areas buffered by Manuka

Manuka

In areas where production forests will not be planted Manuka has been chosen as a first occupying species to give effective tree cover faster than relying on local seed sources, which may not be present after over a century of grazing and fertiliser applications,

Establishing manuka as an effective tree cover protects the vulnerable soils where land classes indicate that rotational forestry is unsuitable and also provides a nurse crop for shade tolerant natives to emerge and fully protect these areas.

Some areas of the forest have very thin soil cover over erodible sand and mudstones and will not take a heavy woody species.

Upon completion of each year's harvest, replant decisions will be made each December and the Forest Owner and Manager will consider the portion of the commercial plantation which will be restocked with *Pinus radiata*.

No genetically modified species will be grown at this property.

Sustainable Harvest

The Forest Owner has prepared analysis of sustainable harvest from preparation for these Greenfields forest projects.

Productive capacity strategy

Forest management will ensure the productive capacity of the forests is not compromised.

This includes:

- Monitoring and control of pests and weeds and forest health
- Inventory – inputs into growth estimation, a core step in timing silviculture and formulating the cutting strategy
- Silviculture - to enhance the value of the resource
- Harvesting - achieving a successful harvest in terms of the forest owner's health and safety, environmental and commercial objectives

Operational Plan for the next five years

The main Operational management objectives for the next five years are:

- Pruning and Thinning operations on 2nd rotation Woodlots within the block
- Manage the growth phases of the forest in the first year's post plant.
- Work with Pest Control on control and eradication programs.
- Continue Ecological Management programs as developed.
- Plan and carry out Pruning and Thinning operations on 2024/25 Plantings as needed
- Woodlot Harvest planning for remaining woodlots on the property
- Woodlot Harvesting and Earthworks
- Woodlot Replant

Alternative Products

As the Forests are a Greenfields Forest development there is currently a transition period where the pastoral farm grazing is being progressively replaced with Afforestation each winter.

Final year of significant afforestation for Glen Alva was 2025.

Forest Product Waste Minimisation Strategy

No Harvest waste is generated from the Forest

Operational Plan for the next five years

Below is a list of all operations that are or will be undertaken at Glen Alva Forest in sequence, following the purchase in 2023.

Operations are completed by contractors under the direction and supervision of LOGIC FSL.

Afforestation Phase

Establishment

As the Forests are a Greenfields Forest development there is currently a transition period where the pastoral farm grazing is being progressively replaced with Afforestation each winter.

Final year of significant afforestation for Huiarua will be 2025.

Final year of significant afforestation for Matanui will be 2026.

Harvest Planning

Draft Harvest Planning of the Forest was completed for planning purposes in 2022.

Building Roads and Landings

Forest Road and Farm road Maintenance continues

Presently no Harvest Roads are being constructed. Some may be required when Woodlot harvesting becomes viable

Harvesting

Presently no Harvesting is taking place. Some may be required when Woodlot harvesting becomes viable

Replanting

No replanting is planned

Re-planting considerations (when required)

Prior to re-establishment of the tree crop, a review will be conducted to identify and incorporate:

- Boundary changes
- Species choice
- Retirement from productive forest
- Riparian and reserve protection which would provide better outcomes for the plantation forest and the environment.

Wilding spread

A requirement of the NES-CF is that Afforestation of a new species, or any change in species must be evaluated using the 'wilding spread calculator' to ensure that the threshold for spread will not be exceeded. If it is exceeded a Resource Consent must be sought for the establishment of that species.

Logic Forest Solutions use an in-house Wilding Risk Calculator for estimation of Wilding Risk.

Based on the following <https://www.mpi.govt.nz/growing-and-harvesting/forestry/national-environmental-standards-for-plantationforestry/wilding-tree-risk-calculator/>

Aerial desiccation (pre-plant) Spray

When required Cutover will be desiccated prior to replanting. This is to ensure that weed species will not out-compete the radiata seedlings.

Release spraying (Aerial and 'spot-spraying')

Pre and post-plant sprays are detailed in the Forest Operations Prescriptions. Cutover that has been replanted may require a release spray due to the vigorous emergent weed species present in the FMU (such as Inkweed). This is to ensure that weed species will not out-compete the radiata seedlings. See the Integrated Pest Management Strategy (IPMS) for Glen Alva Forest for more detail.

Pesticide and chemical usage, storage and disposal

Herbicides are used in pre-plant land preparation and post plant releasing for removal of competition species, and for weed pest.

The intent is always to use herbicides as efficiently as possible.

Presently no pesticides or toxins targeting insects or mammals are being used.

Logic FSL investigates alternative methods before committing to a chemical solution.

Storage of Chemical meets the requirements of HSNO and NZS 8409:2021

Chemical Usage is calculated post plant June each year.

Silvicultural regime description and justification

The majority of stands will be managed as a Clearwood regime. This process will involve pruning and thinning to waste.

Clearwood is processed by domestic mills and is a popular product for export.

The main product is high value timber used in decoration and furniture. While pruning yields a higher value product, it also requires more investment.

Structural Logs grown under the clearwood/framing regime can also be processed locally, presently in small volumes, and sold for export under existing supply contracts.

Pruning

Pruning will be undertaken in two (2) lifts to 6.5 metres at approximately age 5 and 7. Target Stems per hectare will be from 320-350 sph.

Thinning

Thinning will be undertaken in all regimes. A clear wood stand would have one final thin to 330 sph at age 8 years after the final 2nd lift. There is one thin/final crop selection undertaken on a framing timber stand when trees reach full canopy cover and a height of between 10m -12 m. The target stocking in the framing stands is 450 sph.

All thinning is by way of chainsaw and qualified operator. This is cost effective and provides employment for local contractors.

Local processors are used where possible

At present no harvest is undertaken in the forest.

Exotic Forest Monitoring programme,

All Monitoring is summarised in the Public Monitoring Summary

Waterbodies

The property is located within the Hangaroa River Catchment. There are several small streams that run within the property.

Tiniroto Road runs between the Glen Alva afforestation area and the Hangaroa River which is listed in the Tairāwhiti Resource Management Plan (TRMP) as Schedule G15C and G15E.

TRMP Freshwater schedules

Schedule G15 contains a list of Aquatic Ecosystem Waterbodies.

Schedule G15C contains the freshwater habitats of threatened indigenous flora and fauna. The schedule identifies: the catchment the waterbody is within; the name of the river/stream or lake/wetland/river mouth and the threatened species present in the waterbody.

Schedule G15E contains the important habitats of trout. The schedule contains the catchment, river or stream. It also outlines whether the stream is a nationally, regionally or locally significant habitat. For activities in and around waterbodies that are tributaries of scheduled waterbodies, but are not mapped or listed in the schedule, the rules for non-scheduled waterbodies apply. However, the relevant ecosystem values may be present in the unscheduled tributary and this may be considered.

Hangaroa River downstream of the Forest is listed in Schedule G15C and E is therefore considered to contain the freshwater habitats of threatened indigenous flora and fauna and important habitats for trout.

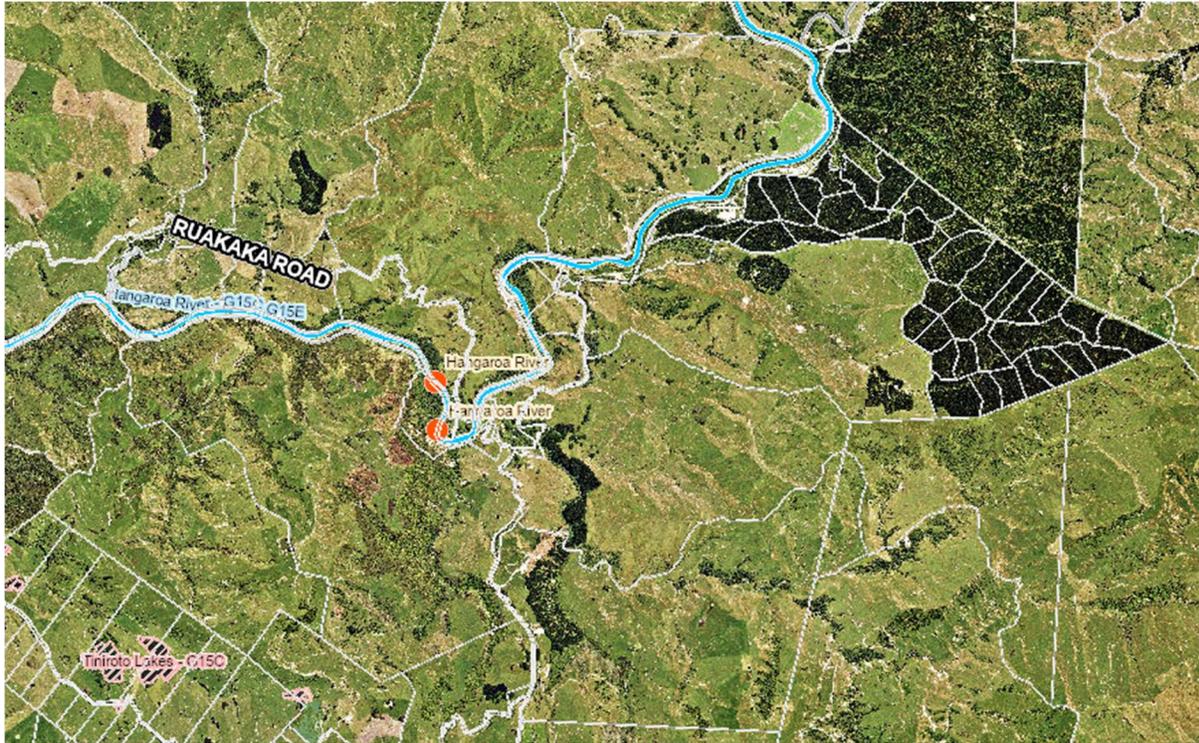


Figure 12 Hangaroa River adjacent to the property

The MPI Fish Spawning Indicator Tool shows the extent of the Hangaroa River as likely Trout Spawning habitat. This is downstream of the Afforestation Area.

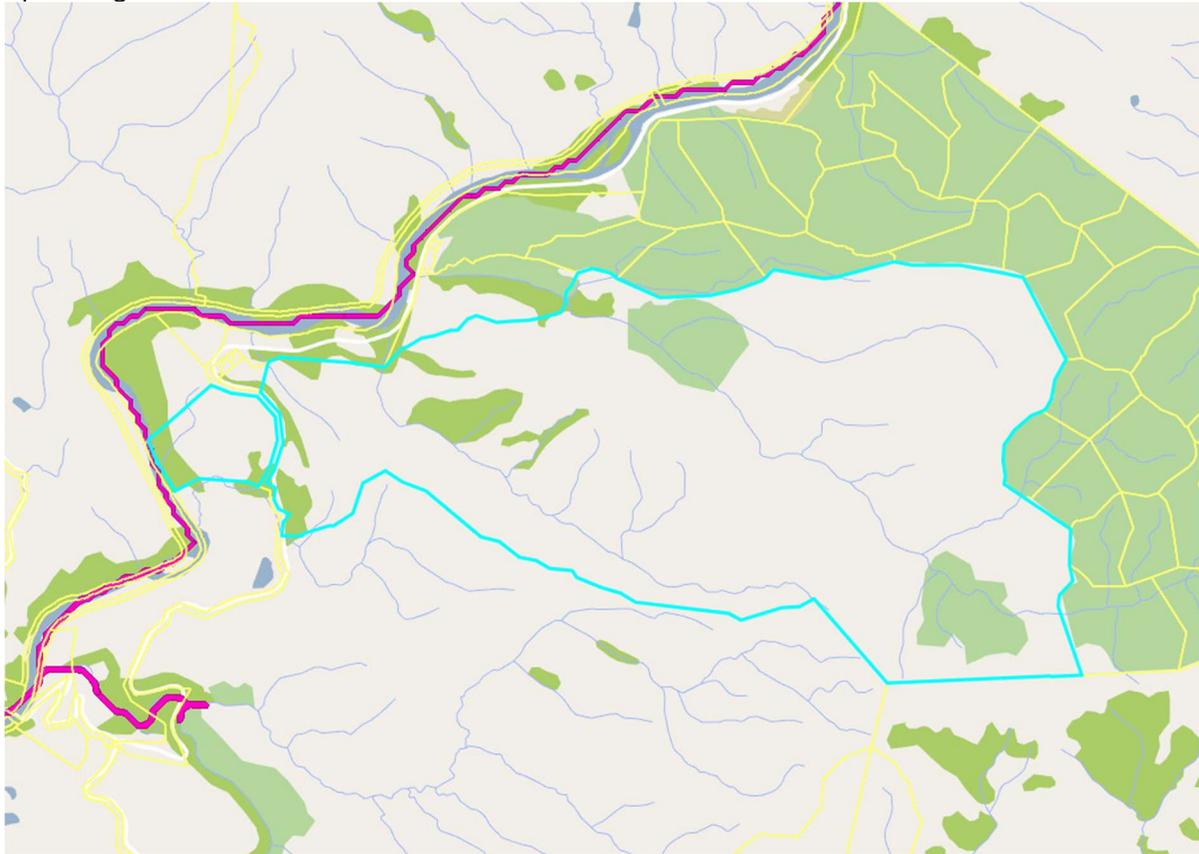


Figure 13 MPI Fish Spawning Habitats for the parcel

24/08/23

NES-PF Fish Spawning Habitats Report: NZFFD Fish Spawning Habitats

Glen Alva Station

Common Name	Species Name	Sensitivity	Database Source	NZREACH	Spawn From Date	Spawn To Date	Notes
Rainbow Trout	Oncorhynchus mykiss	Group A	NZFFD fish habitats	8003729	01 Jul	30 Nov	
Rainbow Trout	Oncorhynchus mykiss	Group A	NZFFD fish habitats	8003680	01 Jul	30 Nov	

24/09/23

NES-PF Fish Spawning Habitats Report: Modelled Probability of over 50% - Group A

Glen Alva Station

Common Name	Species Name	Sensitivity	Database Source	NZREACH	Spawn From Date	Spawn To Date	Notes
Rainbow Trout	Oncorhynchus mykiss	Group A	Modelled	8003373	01 Jul	30 Nov	

Natural Resources and Biodiversity

Malcolm Rutherford of MR Ecology has undertaken a desktop assessment, and a Coarse level field visit of the property.

Protected Areas including Protection Management Areas (PMAs)

Protection Management Areas

There are no Protection Management Areas within the production area.

TN24 (Pariroa) is located within the legal boundary of Glen Alva Forest, outside of the production area.

GDC has no monitoring data on this PMA (email from Don McLean May 15th 2024).

Protected areas (<http://ourenvironment.scinfo.org.nz>)

There are no other protected areas within the Forest Area

Heritage Values (Physical) (as currently known)

There are no recorded physical archaeological sites within the Glen Alva Forest.

The Heritage Alert Overlay does not overlay any part of the area of Glen Alva Forest.

Nothing has been identified to our knowledge throughout the previous land use as a Pastoral farm as having physical significance on the property.

The planting planning process includes scrutiny of ridges, terraces and trying to identify any evidence of Māori pa sites, banks, ditches, loose stones, levelled terraces, pits or remains of shells. Nothing has been identified in planning to date.

Logic Forest have been vigilant in taking a precautionary approach to any assumption of lack of specialness on the property.

LFSL engaged In Situ Heritage to carry out an Archaeological Assessment of Glen Alva in 2024 followed by an onsite visit in 2025 (See below)

Logic Forest (as Forest Managers for Ingka Group) has an Accidental discovery policy in place and operators and supervisors follow this during all operations.

In summary

- Iwi will be notified
- Heritage NZ will be notified.
- Operations will cease for that area until identification can be undertaken. They can continue in other areas.
- Afforestation operations will not enter the buffer area around the site but can continue in other areas

The area is within Tatau Tatau o te Wairoa area of interest.

If any sites are found through any means, Logic Forest will work with Tatau Tatau o te Wairoa and Hapu, and InSitu Heritage to investigate these sites further through the following steps:

- Site visit with Logic Forest Staff and Tatau Tatau o Te Wairoa representatives to conduct a visual and spiritual inspection of the potential sites.
- If confirmed as having attributes of a Māori Site, or values, InSitu Heritage will be arranged to conduct a site visit for confirmation and recording.

- Confirmed Sites will be Registered by InSitu Heritage after consultation with Tatau Tatau o Te Wairoa
- Sites will have appropriate buffers applied from Afforestation activities
- Sites will be identified on the ground by methods agreed between Tatau Tatau o Te Wairoa and InSitu Heritage

This will ensure that the potential sites are confirmed, or otherwise, and if the site exhibits signs of occupation, or spiritual significance to Tatau Tatau o te Wairoa this can be protected appropriately.

Heritage Assessment

InSitu Heritage carried out an Archaeological Assessment of the forest in September 2024

No known sites are on the property.

A review of LiDAR data found two possible archaeological sites related to pre-1900 Māori occupation of the landscape

As a result of the site visit with InSitu in 2025 the sites were ruled out as being human made landforms.

Cultural values

As part of consultation IFSL have, in the provision of an assessment document and consequential consultation and korero, and site visits wishing to build up a picture of the Tatau Tatau o Te Wairoa Cultural Values of the property.

The landowners engaged with Hapu of Tatau Tatau o te Wairoa to assess and identify methods for the protection of significant sites, mitigation of forestry effects on ancestral taonga and incorporate this into Forest Management Plans, and landowner policy, for minimising any adverse impacts that could occur.

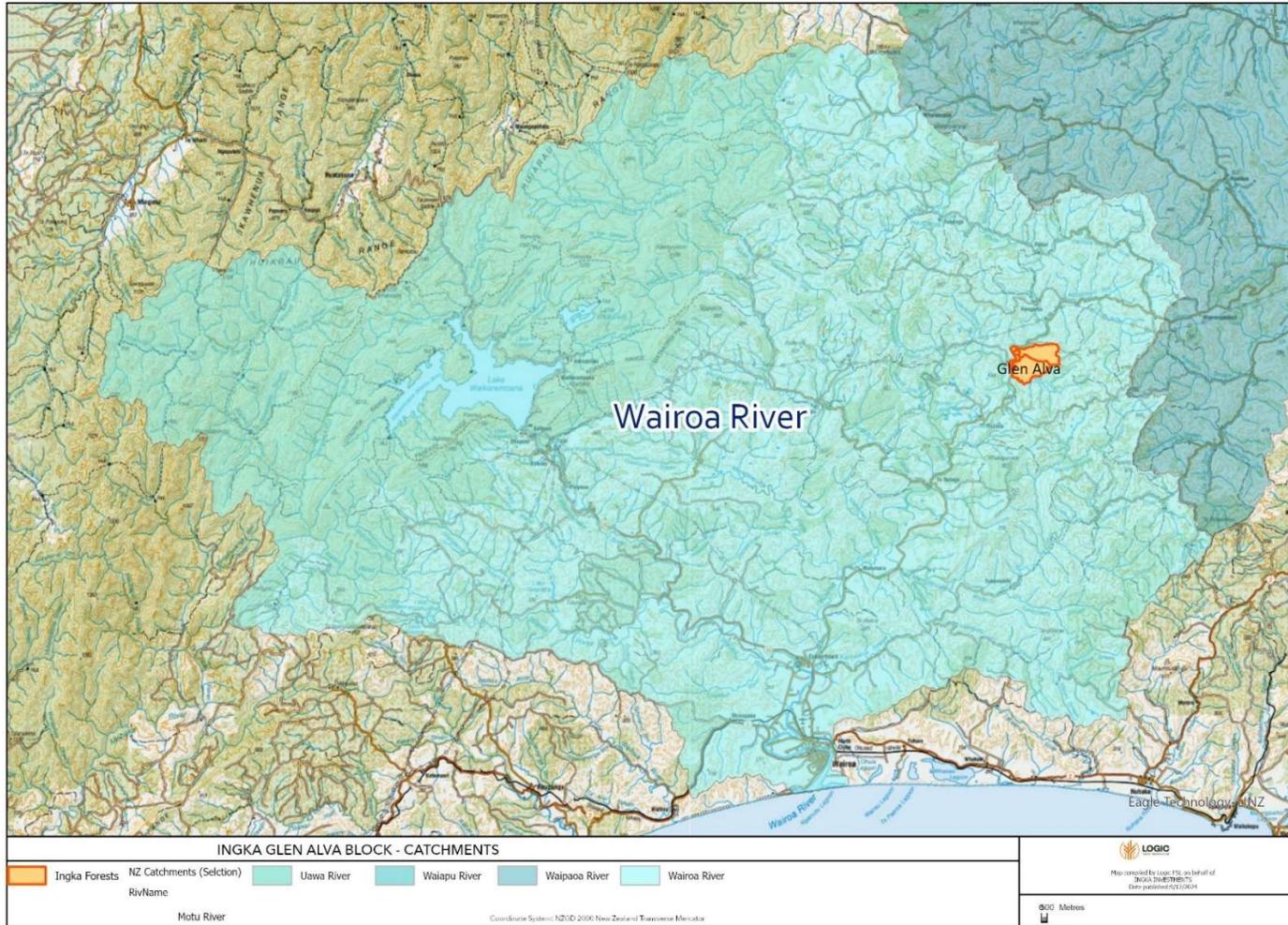


Figure 14 Glen Alva Forest location in the Wairoa Catchment

Biodiversity values

Ecology and Biodiversity Summary

There is Protected Management Area within the property area but not near the production areas.

The Forest Manager recognises the high ecological value of the river edges and bush remnants, and others. As noted above the sites will not be negatively affected by this operation.

Activities that will take place as part of this Afforestation activity will have positive effects on the Biodiversity of these areas.

Retirement from stock access, Pest control, weed pest control and recreational hunting will continue, Wet areas currently open to cattle will be retired and some of these show potentials to recover into Wetlands and the Landowner is interested in restoring and enhancing these over time.

Some wet areas have been identified in the GDC 2022 Regional Wetlands Study.

These are located within the production area. These consist of seepage or marsh areas with low to medium confidence of their value as wetlands as they were amongst improved pasture

Afforestation will be setback from these areas and if deemed practical margins may be planted to enhance recovery of these wet areas.

Afforestation will be setback from all streams with a wider than minimum setback on listed streams or in areas where slope or soil type indicate a higher risk of debris transport to waterways, or any potential land slipping while trees are on the soil.

The retirement of the land from livestock will have an immediate effect on compaction of soil, grazing of riparian's and entering waterways, , grazing of indigenous and emerging vegetation. Active pest control will minimise Deer, Goat, Rabbit, and possum damage.

There will a reduction in sediment entering the waterways, as well as a reduction of nutrients related to the cessation of fertiliser application, and reduction of animal excrement and urine. The Landowner recognises the inherent values of this river system that this activity is linked to, and is confident that the activity can be carried out in a way that provides for and protects these inherent qualities. The sediment and erosion control measures and general methods of operation are considered to be best practise. Minimal Earthworks will be required due to the existing infrastructure on site and conversion from farm to Forest has additional sediment reduction benefits.

Malcolm Rutherford of MR Ecology has undertaken a desktop assessment, and a Coarse level field visit of the property.

Survey Biodiversity values

Glen Alva contains limited indigenous vegetation, with the notable exception of riparian kahikatea forest along the Hangaroa River and in some areas of the Kaikoura Stream.

The DOC Protected Natural Areas Program identified RAP TIN 37 Pariroa as ecologically significant (also known as GDC PMA TN24). 11 ha of this RAP fall within Glen Alva's boundaries, and include podocarp-rich terrace forest and advanced secondary forest. This is part of a semi-continuous 75 km corridor of indigenous vegetation along the Hangaroa River.

At present the bush remnants on the property are degraded due to previous stock grazing. With

the removal of stock, and control of deer and goats, the terrace forest will improve in condition and this may lead to the emergence of some less common species.

The Niwa database lists native and endemic freshwater fish in the area, including *Anguilla dieffenbachii* (longfin eel, At Risk-Declining). eDNA surveys nearby also recorded *Echyridella menziesii* (freshwater mussel, At Risk-Declining), Black Shag (*Phalacrocorax carbo*) (Naturally uncommon, relict) Little Shag (*Microcarbo melanoleucos*) (At Risk - Relict).

Glen Alva is likely habitat for *Falco novaeseelandiae* (New Zealand falcon, At Risk-Recovering) and, *Chalinolobus tuberculatus* (long-tailed bat, Nationally Critical) which have both been recorded nearby.

Recognised Significant Indigenous Vegetation and Habitat records

Protected Areas including Protection Management Areas (PMAs)

There are no Protection Management Areas within the production area.

TN24 (Pariroa) is located adjacent to Glen Alva Station, outside of the production area.

GDC has no monitoring data on this PMA (email from Don McLean May 15th 2024).

Protected areas (<http://ourenvironment.scinfo.org.nz>)

There are no other protected areas within the forest area

Rare or Threatened species

There are no recorded or anecdotal reports of sightings of Rare or Threatened species in the FMU area or surrounding areas.

The Protected Management areas within the forest are based on the Department of Conservation PNAP Programme and share original names and boundaries.

Ecological Survey January 2025

Malcolm Rutherford of MR Ecology has undertaken a desktop assessment, and a Coarse level field visit of the property.

Protected Management Areas (PMAs)

The Glen Alva Forest contains the Protected Management Area's and records are taken from the GDC TRMP, these sites were visited in the Field Assessment January 2025.

There are no recorded or anecdotal reports of sightings of Rare or Threatened species in the FMU area or surrounding areas.

In lieu of sightings or information of Species present the Forest Manager will take the precautionary approach with regard to threatened species that may be found in the area and include actions within the Work Specifications prepared for the Afforestation Operations for those species.

There are unlikely to be any Terrestrial Species present within the forest area. Any currently there, but undetected, will not be affected by the Afforestation process.

Species with the potential of being present in the area, once pastoral farming activity ceases, listed in Schedule of the TRMP G7B (Regional or Nationally Rare or threatened species found in the Gisborne District).

The Forestry Contractor and Management staff are trained in recognition and reporting of Rare and Threatened Species.

The Forest Management Company, as part of the induction process for new contractors and staff, will provide training materials and information to ensure this continues.

Pest Control Contractors are educated and engaged in being aware of biodiversity changes within the blocks they work and have a reporting system within their tools to alert the Forest Manager of possible sightings.

Setbacks from Significant areas

The applicant will set back 10 metres from the boundary of all PMA and where the PMA has spread outside the boundary of the PMA the applicant will setback at least 10 metres from the area of growth.

Stream Health Monitoring

The Forest Manager has carried out initial Stream Health Monitoring on the property twice in 6 months and will continue to do so annually for some sites.

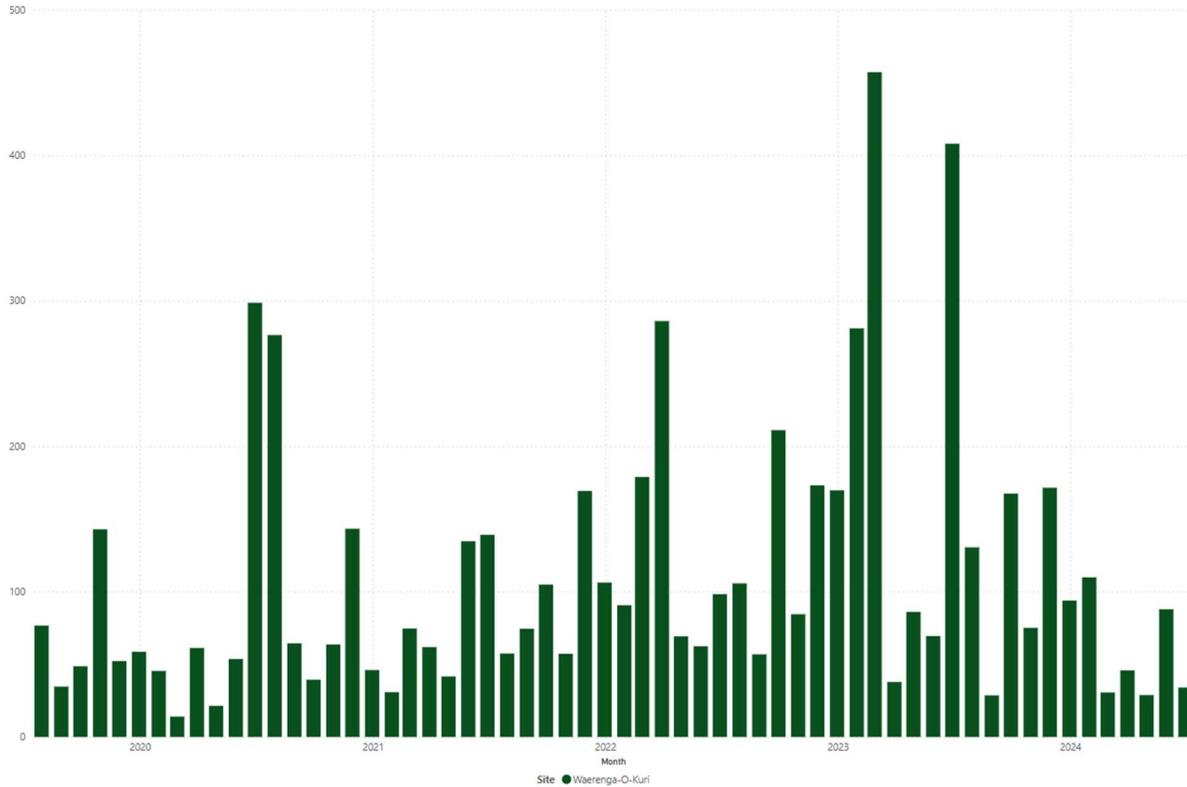
The initial survey monitored 7 sites.

Over time monitoring will settle on a smaller number of sites.

Initial data was taken while the management area was continuing as a pastoral farm prior to stock exclusion.

Climate

GDC Rainfall data collected at the nearest rainfall data collection site (Warenga-O-Kuri) by month over the past 5 years is shown below:



The Forest Manager is aware that the area has been subject to unseasonable prolonged heavy rain and cyclonic events in the 2022-23 Spring and Summer, and recent rainfall events, have not followed predictable patterns, and therefore precautions will be taken at all times in preparation for these events.

Afforestation of this area is an improved land use which will enable this land to withstand weather events significantly better than current pastoral farming use.

Afforestation will reduce the volume and intensity of storm event water flows and regulate water flows in the lower catchment.

Geological Sites

There are no known geological sites within the Glen Alva Station Forest management area

Catchments and Waterbodies

Catchment Summary

The Project area is located entirely within the Hangaroa sub catchment of the Wairoa Catchment.

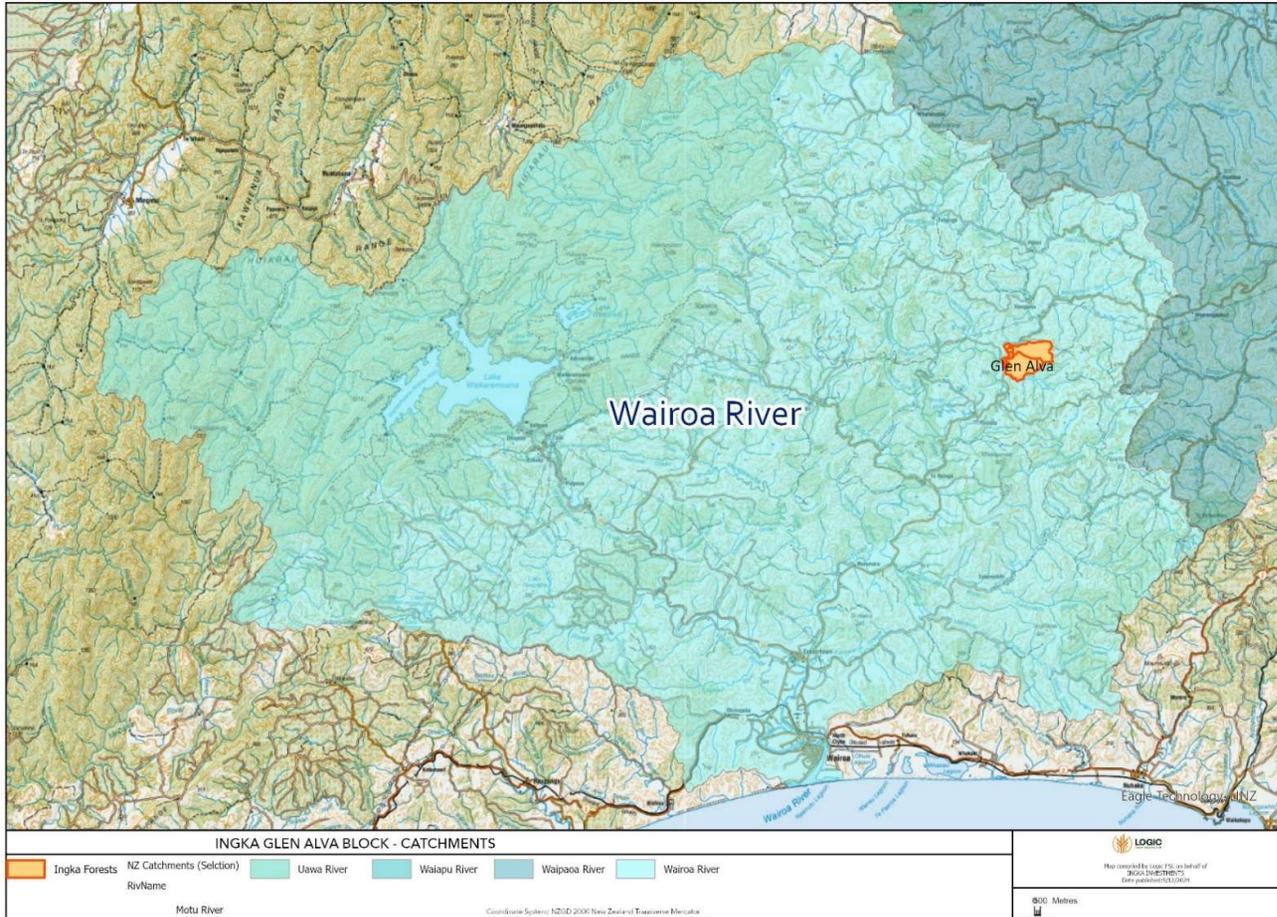


Figure 15 Glen Alva Forest Location within the Main Wairoa River Catchment

Freshwater Fisheries and Monitoring.

There are no entries into the *MPI Fish Spawning Indication tool* for the waterbodies within the forest.

LFSL has carried out Stream observations on six (6) separate stream sites throughout the property.

These observations revealed no fish sightings.

Two hours of stream analysis at the main Puniatara stream catchment.

No records of previous freshwater surveys have been provided by the previous owner.

DOC and other organisations have no records of any existing data.

Baseline testing of the Stream Health and eDNA of several waterways is underway and will continue and extend these over time to build up a picture of the freshwater ecology of the property and record the improvement likely in this as Stock are removed from the waterways and tree cover occurs within the catchment returning the waterways to their prior state under a Forest canopy.

The forest owner will continue this monitoring throughout the lifecycle of the Forest which included pre, during, and post-harvest.

Setbacks from Waterbodies

Production forests will be set back a minimum 10 metres from the boundary of all watercourses.

In areas identified as being at risk of slash mobilisation to waterbodies, or slope failure the setback has been extended, and a buffer species (where practical) will be planted between the production Forest and the waterway.

The goal being to occupy these sites as soon as possible with effective tree cover suitable for the soil depth, stability and adjacency to waterways.

Coastal Marine Area

This Forest is outside the coastal marine area.

Natural Hazards and Risks

Natural Hazards Management Plan

LFSL has a **Natural Hazards Management Plan** in place to prepare for effects of the Natural Hazards prevalent in the forest Region including

- Prolonged or intense rainfall e.g. flooding, landslide. Notable examples within our management area in the region include the Cyclones Bola 1988, Cyclone Cook 2018, and Cyclones Hale and Gabrielle 2023 two weeks apart.
- The East Coast is prone to mass landsliding and slips.
- The Tiniroti area has been subject to mass rockfall risk exacerbated by earthquakes and recent Cyclones.
- Volcanoes and earthquakes e.g. ground shaking, landslide, liquefaction, tsunami.
- A copy of an Emergency Plan for Glen Alva Forest is kept with the crews onsite and is also contained in the contractor pack that all contractors should have with them when working on-site. The plan outlines: emergency procedures, Logic FSL staff contact details, maps of the property and escape routes.

HCV Assessments Summary

Assessment of High Conservation Values (HCV) Summary

Consultation was undertaken with parties representing Tatau Tatau o Te Wairoa, Hawkes Bay Regional Council, Gisborne District Council (Biodiversity, Integrated Catchment Teams), Department of Conservation.

Assessment and recording the areas.

The following is our current assessment of the areas within the, with specific regard to whether they can be considered High Conservation Value Areas within the terms of the definitions.

This assessment follows the use of “best available information” and Principle 9 and Annex H: HCV framework Guidance FSC-STD-NZL-02-2023 Plantations EN

Initial Assessment for High Conservation Values

Criterion 9.1 States The Organisation, through engagement with affected stakeholders, interested stakeholders and other means and sources, shall assess and record the presence and status of high conservation values in the management unit, proportionate to the scale, intensity, and risk of impacts of management activities, and likelihood of the occurrence of the high conservation values (HCV).

An assessment is completed using Best Available Information that records the location and status of High conservation value Categories 1-6, as defined in Criterion 9.1; the high conservation value areas they rely upon (Annex H), and their condition.		
FSC ID	FSC Criteria	Assessment Summary
Identify: HCV 1 – Species diversity. Concentrations of biological diversity including endemic species, and rare, threatened or endangered species, that are significant at global, regional or national levels.	9.1.1	<p>None of the areas surveyed meet the criteria for HCVF 1.</p> <p>With good management including increased connectivity, some of these areas may meet the criteria for HCVF 1 in the future.</p> <p>Review within 3 years</p>
Identify: HCV 2 – Landscape -level ecosystems and mosaics. Intact Forest landscapes and large landscape -level ecosystems and ecosystem mosaics that are significant at global, regional or national levels, and that contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance	9.1.1	<p>None of the areas surveyed qualify for HCV 2</p> <p>Review within 3 years</p>
Identify: HCV 3 – Ecosystems and habitats. Rare, threatened, or	9.1.1	<p>None of the areas surveyed qualify for HCV 3</p>

<p>endangered ecosystems , habitats or refugia .</p>		<p>Review within 3 years</p>
<p>Identify: HCV 4 – Critical ecosystem services . Basic ecosystem services in critical situations, including protection of water catchments and control of erosion of vulnerable soils and slopes.</p>	<p>9.1.1</p>	<p>The land area as a farm and new forest area is not <u>currently</u> providing all the services (LFSL), however it is not to say the area will provide a more significant contribution to future ecosystem services.</p> <p>There are internal occupant and functional watersources, but no external community water sources.</p> <p>The scale of afforestation will not be sufficient to regulate floods, drought, or air quality.</p> <p>Carbon grown in the FMU will be measured and contribute to climate targets, however, will not be traded on the carbon market.</p> <p>Land degradation will be slowed by the removal of stock, retirement of some areas, and reforestation.</p> <p>The land area as a farm and new forest area is not providing or supporting the services (LFSL) soil formation and nutrient cycling.</p> <p>The land area as a farm and new forest area do not have identified physical sites or cultural services. We will address the wider cultural environment in HCV 6 discussion (LFSL). Information is being sought with Stakeholders as to the non-physical and spiritual context of the site with regard to the Iwi and Hapu stories and journeys. [see HCV 6 below]</p> <p>Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site. Stakeholders will be consulted with in developing a Public Access Policy (mid 2025).</p> <p>The land area as a farm and new forest area is not providing services.</p> <p>Removal of the services it currently provides as a new forest and existing pastoral farm, will not result in disruption or severe negative impacts. LFSL believes that these areas do not currently qualify for HCV4 for the <u>above factors</u>.</p> <p>As the forest and new ecosystem of effective tree cover and stock exclusion evolves the services may contribute more to the wider catchment. A reasonable period of review should be instigated for this. [LFSL believes that these areas <u>do not currently qualify for HCV4</u> under this factor but believe a review should take place within 3 years, as a reasonable period of review]</p> <p>There is no legal community water supply within or downstream of the land area which the activity of the MU is likely to cause, or poses a threat of, severe negative impacts.</p> <p>Removal of the services the land area currently provides as a new forest and existing pastoral farm, will not result in disruption or severe negative impacts.</p>

	<p>LFSL believes that these areas do not currently qualify for HCV4 for the <u>above factors</u>.</p> <p>In the criteria of Very high-risk erosion* areas or areas identified during pre-harvest* planning as having very high risk of erosion.</p> <p>The Forest contains areas identified as having very high risk of erosion by information provided by the Gisborne District Council Landslide Susceptibility Analysis in work carried out by LandCare Research. This work has been combined with long-term work by Mike Marden of Landcare Research on Gully Erosion on the East Coast The high-risk categories within this analysis are likely to contribute to a land class where production land use on all land types will be restricted in a Transitions Layer, and potentially in a future District Plan Change.</p> <p>The Forest contains areas of Very High Risk of Erosion by the Erosion Susceptibility Classification within the National Environmental Standards for Commercial Forestry Regulations.</p> <p>The forest contained areas identified in recent analysis by GDC and Landcare Research Scientists as having two categories of “High Landslide Susceptibility and High Connectivity with waterways”, and “Moderate Landslide Susceptibility and High Connectivity to water”</p> <p>Disruption due to future harvesting of areas identified as Very High Risk Erosion have been, or are planned to be, minimised by the following steps.</p> <ul style="list-style-type: none"> • Planting of Riparian buffer areas or fallow areas of Landslide Susceptible zones with non-production species (where trees are viable), or retirement • A Draft Harvest Plan has been prepared for Very high-risk erosion areas. Afforestation Plans have been matched to this plan. • Consent attained for these areas after a lengthy process, then the consent was reviewed under s128 of the RMA due to the new information provided by Landslide Susceptibility Mapping, resulting in no changes being needed to the Afforestation Plan. This strengthened the confidence in our consented plan. • FSC Criteria exclude Very high-risk erosion areas from Clearfell Harvest. The Certificate holder will research, adopt and develop alternative methods from widescale clearfell (such as coupe logging or selective harvest). • When Resource Consent for Harvest is sought for these areas the Applicant and GDC will ensure that the Co-management party is consulted with in proposed plans where sequencing of harvest and appropriate methods are outlined. <p>No soil conservation orders are in place</p> <p>The Forest is not protecting significant infrastructure or communities from flood events</p>
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		<p><u>LFSL believes that these Very High ESC Zones do qualify for HCV4</u></p> <p>The Forest contains areas identified as having very high risk of erosion by information provided by the Gisborne District Council Landslide Susceptibility Analysis in work carried out by LandCare Research. This work has been combined with long-term work by Mike Marden of Landcare Research on Gully Erosion on the East Coast The high-risk categories within this analysis are likely to contribute to a land class where production land use on all land types will be restricted in a Transitions Layer, and potentially in a future District Plan Change. <u>LFSL believes that these Landslide Susceptible and Gully Erosion Zones do qualify for HCV4</u></p> <p>LFSL in Afforestation Planning by methods of a draft Harvest Plan also identified areas which may have during or following harvest, or they were too difficult to harvest requiring excessive earthworks. These areas were planned for planting with native or alternative species.</p> <p><u>LFSL believes that these voluntary harvest restriction areas do not qualify for HCV4 but are useful buffers to areas below. In leaving these areas within the area identified as HCV 4 it is not expected further buffers are required to protect these non-productive HCV 4 areas as the existing buffers suffice</u></p> <p><u>HCV 4 Areas are shown on the Map Figure 1 and 2 below, and sent separately</u></p>
<p>Identify: HCV 5 – Community needs. Sites and resources fundamental for satisfying the basic necessities of local communities or Indigenous Peoples (for livelihoods, health, nutrition, water, etc.), identified through engagement with these communities or Indigenous Peoples .</p>	<p>9.1.1</p>	<p>Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site, such as the privacy critical to the social programs, and specialness of the site. While it is aspirational for the Forest Owners to encourage access, including supporting re-emerging practices such as food collecting and medicinal plant collecting, this is at a small scale and can be handled through the existing Permitting System that is in place rather than a declaration of the area into an HCV Status. Using the Permit System will enable the frequency and popularity of the activity to be monitored and a wider understanding of the practices to be gained. <u>LFSL believes that these areas do not currently qualify for HCV5</u> <u>Review within 3 years</u></p> <p>Stakeholders will be consulted with in developing a Public Access Policy (mid 2025). [LFSL]</p> <p>Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site. <u>LFSL believes that these areas do not currently qualify for HCV5</u> <u>Review within 3 years</u></p>

		<p>Stakeholders will be consulted with in developing a Public Access Policy (mid 2025). [LFSL]</p> <p>Given the guidance and advice noted around subsistence living and recreational scale we don't believe the site would qualify as HCV 5 LFSL believes that these areas do not currently qualify for HCV5 Review within 3 years</p>
<p>Identify: HCV 6 – Cultural values. Sites, resources, habitats and landscapes of global or national cultural, archaeological or historical significance, and/or of critical cultural, ecological, economic or religious/sacred importance for the traditional cultures of local communities or Indigenous Peoples , identified through engagement with these local communities or Indigenous Peoples .</p>	<p>9.1.1</p>	<p>No UNESCO WH sites in the area. Not deemed HCV 6 Desktop assessment identified no physical sites</p> <p>LFSL believe that deadlines are not conducive to a considered approach to consultation on such an important issue.</p> <p>LFSL request that parties consider the information provided above, and what further information they can offer this consultation <u>at this point</u>. If nothing new is forthcoming the site is not identified as HCV 6 <u>at this point</u>. This does not mean protection is lessened as we must follow the Heritage New Zealand Pouhere Taonga Act 2014, and our internal protocols (including our Accidental Discovery Protocol)</p> <p>From that point; All parties agree to gather information, learn stories (especially of Non-physical sites, sites of journeys, and possible waahi tapu) and Revise decision regularly taking into account the gathered and new information. Prepare a Cultural Values Assessment/</p> <p>If at any point in this revision process the sites warrant reclassification as HCV 6 we can do that immediately.</p> <p>Review open at all times as information comes to hand but always within 3 years</p>

Strategy Development Discussion

HCV1 Management Strategy Development discussion

No Strategy Development is required as identified blocks do not yet meet the threshold for HCV Classification.

However, these areas will be included in the Conservation Area Network (CAN) for the forests and enhancement activities, stock removal and ongoing Pest Control will likely improve the state of the sites.

Monitoring will be put in place.

Formal reassessment of HCV Status will be undertaken in **3 years February 2028**

HCV 2 Management Strategy Development discussion

No Strategy Development is required as identified blocks do not yet meet the threshold for HCV Classification.

However, these areas will be included in the Conservation Area Network (CAN) for the forests and enhancement activities, stock removal and ongoing Pest Control will likely improve the state of the sites.

Monitoring will be put in place.

Formal reassessment of HCV Status will be undertaken in **3 years February 2028**

HCV 3 Management Strategy Development discussion

No Strategy Development is required as identified blocks do not yet meet the threshold for HCV Classification.

However, these areas will be included in the Conservation Area Network (CAN) for the forests and enhancement activities, stock removal and ongoing Pest Control will likely improve the state of the sites.

Monitoring will be put in place.

Formal reassessment of HCV Status will be undertaken in **3 years February 2028**

HCV 4 Management Strategy Development discussion

<p>HCV 4 – Strategies to protect* any water catchments of importance to local communities* located within or downstream of the management unit*, and upstream and upslope areas within the unit that are particularly unstable or susceptible to erosion.</p>	<p>For areas identified as HCV for this Category, the following strategies will be taken</p>
<p><i>Examples to protect* water catchments and upstream and upslope areas. may include</i></p>	
<p>protection zones*,</p>	<p>In place</p>
<p>harvest prescriptions,</p>	<p>Will be site and method specific, and put in place prior to harvest</p>
<p>Chemical use restrictions,</p>	<p>In place</p>

prescriptions for road construction and maintenance*,	Will be site and method specific and put in place prior to new earthworks.
	Maintenance monitoring of erosion and sediment control is in place
<i>Examples where enhancement is identified as the objective*,</i>	
measures to restore* water quality and quantity.	Stock exclusion
	Stream Health Monitoring has been underway for 3 years
	Biodiversity planting is in place
	Active and ongoing Pest control
<i>Where identified HCV 4 ecosystem services* include climate regulation</i>	
strategies to maintain or enhance carbon sequestration and storage.	Stock exclusion
	Ingka assess and record carbon growth however do not participate in Carbon Credit trading as they do not believe in offsetting of liabilities for emitters.
	Biodiversity planting is in place to enhance tree cover rather than relying on natural reversion of degraded ex-farmland sites with poor seed source.
	Active and ongoing Pest control

Review within 3 years

HCV 5 Management Strategy Development discussion

Review within 3 years

HCV 6 Management Strategy Development discussion

Review open at all times as information comes to hand but always within 3 years

MONITORING HCV4

Establish a monitoring program that assesses: The implementation and effectiveness of activities carried out to maintain and/or improve HCV 4, so that compliance with the established objectives can be confirmed.

<p>Namely, that harvesting practices do not affect water bodies, and that barriers have been established and are maintained to control fires.</p>	<p>Underway. Ongoing. Draft Harvest plan prepared to minimise settings that could lead to negative effects on adjacent waterway. Buffer areas planted. Long term species considered. Alternative methods to clearfell harvest will be put in place. Emergency Plans in place and Fire Control will be in conjunction with FENZ.</p>
<p>The quality and quantity of water for large plantation forest companies and MU.</p>	<p>Stream Health Monitoring has been underway since purchase of the property (2023)</p>
<p>The incidence of landslides or gullies in the MU, affected areas, their control and status.</p>	<p>Post event monitoring will be undertaken. At all remapping stages landslides will be remapped also. Any developing Landslides or gullies will be monitored as case studies.</p>
<p>Incidence and control of forest fire and incipient fires in the MU, affected areas, control and status.</p>	<p>Underway. Ongoing. Emergency Plans in place and Fire Control will be in conjunction with FENZ.</p>

Biodiversity Summary

Biodiversity Values

Limited indigenous vegetation exists, with notable riparian forests and remnant forest areas (e.g., RAP TIN 37 Pariroa). Native species including longfin eel, falcon, and long-tailed bat may be present. Past land use has led to understory degradation.

HCV 1 Species Diversity

Identify: HCV 1 – Species diversity. Concentrations of biological diversity including endemic species, and rare, threatened or endangered species, that are significant at global, regional or national levels.

Site Survey

The site survey of the PMA TN24 confirmed the forest remnant is tawa-kohuhu-kowhai-totara forest with pukatea and occasional groves of pole Kahikatea. The lower areas have been significantly affected by silt from Cyclone Gabrielle with some dead trees. Years of stock brows has led to a very degraded understory across much of the block.

The areas of riparian vegetation on the Kaikoura stream contain a range of broadleaf native shrub and tree species.

RTE Species

A bat survey has not been completed but bats have been recorded in this section of the Hangaroa river.

Plants

Lophomyrtus obcordata was recorded. It will not be impacted by forestry operations.

Birds

New Zealand Falcon have been recorded nearby and this is excellent habitat for them given the mix of habitat types.

While Weka have not been seen in the area but have been recorded 13km to the NE and their range is expanding. It is likely that by the time this FMU is harvested Weka will be present in the block.

Dabchick were recorded on the roadside pond in the FMU.

Fish

Records from NZFFD show sampling in the places marked on the map below



Figure 16 Figure 1 NZFFD Sites near Glen Alva Forest

Across these sites the following species were recorded
Common bully, Rainbow trout, Shortfin eel, Goldfish, Crans bully, Longfin eel

The Common Bully and Crans Bully are endemic, but not threatened.
The Shortfin Eel is native but not threatened.
The Longfin Eel is endemic currently has a conservation status of At Risk-Declining.
Rainbow Trout and Goldfish are introduced exotics. Protection of habitat and spawning sites of Rainbow Trout is a requirement under the NES-CF, and the NZ FSC regulations.

The Hangaroa and lower reaches of the Kaikoura have a modelled probability of over 50% likelihood of spawning for Rainbow Trout, (which spawn from 1st July – 30 Nov).
(<https://www.mpi.govt.nz/forestry/national-environmental-standards-commercial-forestry/fish-spawning-indicator/>)

PMA/RAP

The Protected Natural Areas Program (Whaley *et. al*/2002) identified the ecological importance of multiple areas along the Hangaroa river including a 47-hectare area known as RAP TIN 37 PARIROA. Approximately 11ha of the RAP falls within the FMU.

This area is also identified by the Gisborne District Council as a PMA (Protected Management

Area)

The criteria for a PMA and RAP are Representativeness, Diversity and Pattern, Rarity and special features, Naturalness, Long Term Viability, Size and Shape, and Buffering.

These align with the criteria for FSC HVC1.

The 11 hectares of the RAP that are in the FMU has had some damage from Cyclone Gabrielle, and has had stock grazing it for decades. This, combined with the long thin shape of the block mean that while the canopy may be ok, the understory is most likely highly degraded, and ground cover non-existent.

HCV 1 - Summary

When considering the range of biodiversity across the three surveyed sites, there is one RTE plant species, and one RTE bird species is present. There are a wide range of plant species present however the main forested area lacks emergent trees, has a degraded understory, and lacks ground cover across much of the block. The Kaikoura stream is secondary growth. Both blocks are small, and have significant edge effect.

Based on the current information and findings from the field visit this does not represent a “Concentration of biological diversity including endemic species, and rare, threatened or endangered species, that are significant at global, regional or national levels.”

None of the areas surveyed meet the criteria for HCVF 1. The RAP may have potential for future consideration if browser control are continued – however it will always be a small, long block which will limit its ability to support a full range of local species.

HCV 2 -Landscape

Identify: HCV 2 – Landscape -level ecosystems and mosaics. Intact Forest landscapes and large landscape -level ecosystems and ecosystem mosaics that are significant at global, regional or national levels, and that contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance

Intact Forest Landscapes

The IFL map that FSC uses to determine intact Forest Landscapes shows the site is not Intact Forest Landscape (<https://intactforests.org/world.map.html>)

None of the areas surveyed qualify as HCV 2

While the RAP is part of a much longer riparian corridor it does not “contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance”

Summary

The site is part of a larger area of significant vegetation, but does not meet the second part of the criteria as it does not “contain viable populations of the great majority of the naturally occurring species in natural patterns of distribution and abundance”

None of the areas surveyed qualify for HCV 2

HCV 3 - Endangered ecosystems

Identify: HCV 3 – Ecosystems and habitats . Rare, threatened , or endangered ecosystems , habitats or refugia .

LENZ

The Threatened Environments Classification shows how much native (indigenous) vegetation remains within land environments, and how past vegetation loss and legal protection are distributed across New Zealand's landscape. According to this classification all the land within the Glen Alva Forest is either “greater than 30% left and 10-20% protected” or “greater than 30% left and greater than 20% protected”. These are the two categories of least concern.

Summary

While uncommon, riparian kahikatea forest does not meet the criteria as a Rare, threatened , or endangered ecosystems” therefore

The block does not qualify as a HCVF under HVC 3

ORMOND FOREST

Introduction

Glen Alva Forest is a plantation forest located in the East Coast of New Zealand, Ormond District of Gisborne.

The closest town is Gisborne, approximately 22km or a 25-minute drive located on Ormond Valley Road.

The current Ormond Forest is surrounded by Pastoral Hill Country Farming or cropped flats.



Figure 17 Location of Ormond Forest within the region

The site is an existing forest tracking and old crossings in place.

The current net stocked area 72.6 ha of Pinus Radiata 1999 Pinus Radiata.

Ormond Forests Characteristics.

Legal Framework of the Forest

Forest Name	Location	Total Area (ha)	forest Description
Ormond Forest	497 Ormond Valley Road, Gisborne, New Zealand	80.9	<p>Lot 2 Deposited Plan 9629</p> <p>GS6C/1169 0825001403 At or about NZTM 2033 165 – 5722 766</p> <p>Ormond Forest is a first rotation Forest consisting of (approx.) 72.6 ha of 1999 YOE P. radiata approx. 8.7 Ha Non Productive</p>

The legal description of the land subject is described below:

Legal Description	Land Area(ha)	title	Valuation Number	Occupier:
Lot 2 Deposited Plan 9629	80.9 Ha	GS6C/1169	0825001403	Ingka Investments Management NZ Ltd

Forest Areas Included in Forestry Certification Assessment Scope

Forest Name	Location	Total Area (ha)	Forest Description
Ormond Forest	497 Ormond Valley Road, Gisborne, New Zealand	80.9 Ha	<p>Lot 2 Deposited Plan 9629</p> <p>GS6C/1169 0825001403 At or about NZTM 2033 165 – 5722 766</p> <p>Ormond Forest is a first rotation Forest consisting of (approx.) 72.6 ha of 1999 YOE P. radiata approx. 8.7 Ha Non-Productive</p>

Description of the Forest

Description of FOREST	Area (ha)	Ownership	Nationality	Status	Corporate Structure & History
Ormond Forest Lot 2 Deposited Plan 9629	80.9	Ingka Investment Management NZ Limited	Ingka Investment Management NZ Limited is	Active	Logic Forest Ltd (LogicFSL) is a 100% New Zealand owned, Gisborne

Description of FOREST	Area (ha)	Ownership	Nationality	Status	Corporate Structure & History
GS6C/1169 0825001403 At or about NZTM 2033 165 – 5722 766			a New Zealand Registered Company with its parent Company based in the Netherlands. Logic Forest Ltd, as the Certificate applicant and Forest Manager, is based in Gisborne, New Zealand.		based Forest management company providing a range of services to both small woodlot and corporate Forest owners primarily in the East Coast region, and more broadly throughout New Zealand. Logic FSL has been engaged as Forest Manager by Ingka Investment Management NZ Limited.

Land Use

Afforestation to date

Land Use	
P.RAD 1999	72.6
Non Productive	8.7
Total	80.9

Public Access

Currently the scale of recreational activity on the site is small however there is potential to provide wider recreational activities, but care must be taken to protect recognised values in place on the site. As Harvesting is planned to take place in 2026 the forest is likely to be closed for recreational access due to those operations for that period.

Stakeholders will be consulted with in developing a Public Access Policy (mid 2026).

<https://logicfsl.co.nz/sustainability>

If you would like to enquire about access please phone +64 (0)6 863 2447
office@logicfsl.co.nz

Geology (Source GNS Science)

The underlying geology of the afforestation area is (predominantly): Early Pliocene sandstone and siltstone.

Name	Mangaheia Group
Description	Calcareous sandstone, mudstone, pebbly limestone and conglomerate.
Geologic history	Early Pliocene
Simple name	Neogene sedimentary rocks

Ormond ESC Classes

NES-PF Erosion Susceptibility Classification Report

Ormond Valley Forest



18/02/2026

Legend

- Erosion Susceptibility
- Land Parcel
- Other
- Low
- Moderate
- High
- Very High

0 265 530 1,060 Metres



Figure 18 Ormond ESC Classes

ESC Class	Sum of Area (Ha)
Very High	47.3
Moderate	31.0
Low	3.0
Total	81.3

Exotic Forest Operations

Rationale for species selection and regime

Radiata pine (*Pinus radiata*)

Radiata pine (*Pinus radiata*) accounts for 90% of New Zealand's planted forest estate. Radiata pine is a fast growing and versatile softwood with a wide range of uses and applications.

NZ radiata pine is plantation grown, renewable and sustainable, was planted as a primary timber crop to provide an alternative to New Zealand Indigenous Forest timbers and the import of threatened tropical timbers.

It is a medium-density softwood, straight grained with an even texture. It is treated to H3.2 for durability and works well with hand and machine tools. Heartwood is light brown in colour and is non-durable to perishable in regard to decay resistance. Sapwood is pale yellowish-white colour treated with preservatives to be used in external applications.

New Zealand pine is a versatile softwood and well suited for a range of structural and appearance applications. The light consistent colour of radiata pine readily accepts stains and its general properties make it ideal for painting.

The pruned butt log can be used to make knot-free veneer or appearance grade timber. The unpruned logs can be used for structural timber, for veneer for plywood, and stock for finger jointing.

Pulp type logs and those with defects and excessive knots can be used for pulp and paper. *Pinus radiata* has been proven to grow successfully at the property.

There is a growing domestic market for Radiata Pine in the FMU Region, with a dominant export market.

The local sawmills process only *Pinus radiata* logs, and there is a strong and proven export market for the logs that the local mills don't use.

No genetically modified species will be grown at this property.

Sustainable Harvest

The Forest Owner has prepared analysis of sustainable harvest from preparation for these forest projects.

Productive capacity strategy

Forest management will ensure the productive capacity of the forests is not compromised.

This includes:

- Monitoring and control of pests and weeds and forest health

- Inventory – inputs into growth estimation, a core step in timing silviculture and formulating the cutting strategy
- Silviculture - to enhance the value of the resource
- Harvesting - achieving a successful harvest in terms of the forest owner's health and safety, environmental and commercial objectives

Management objectives for the next five years

The main Operational management objectives for the next five years are:

- Harvest planning for harvest of the property
- Harvesting and Earthworks
- Replanting

Alternative Products

As the Forest is a relatively small there are few opportunities for alternative products.

Forest Product Waste Minimisation Strategy

No Harvest waste is generated from the Forest at this stage.

Operational Plan for the next five years

Below is a list of all operations that are or will be undertaken at Ormond Forest in sequence, following the purchase in 2026.

Harvest Planning

Harvest Planning of the Forest was completed for planning purposes in 2026.

Building Roads and Landings

Harvest Roads will be constructed in 2026 to harvest the forest.

Harvesting

Harvesting is planned for 2026.

Replanting

Replanting is planned the winter following harvest.

Re-planting considerations

Prior to re-establishment of the tree crop, a review will be conducted to identify and incorporate:

- Boundary changes
- Species choice
- Retirement from productive forest

- Riparian and reserve protection which would provide better outcomes for the plantation forest and the environment.

Wilding spread

A requirement of the NES-CF is that Afforestation of a new species, or any change in species must be evaluated using the 'wilding spread calculator' to ensure that the threshold for spread will not be exceeded. If it is exceeded a Resource Consent must be sought for the establishment of that species.

Logic Forest Solutions use an in-house Wilding Risk Calculator for estimation of Wilding Risk. Based on the following <https://www.mpi.govt.nz/growing-and-harvesting/forestry/national-environmental-standards-for-plantationforestry/wilding-tree-risk-calculator/>

Aerial desiccation (pre-plant) Spray

When required Cutover will be desiccated prior to replanting. This is to ensure that weed species will not out-compete the radiata seedlings.

Release spraying (Aerial and 'spot-spraying')

Pre and post-plant sprays are detailed in the Forest Operations Prescriptions. Cutover that has been replanted may require a release spray due to the vigorous emergent weed species present in the FMU. This is to ensure that weed species will not out-compete the radiata seedlings. See the Integrated Pest Management Strategy (IPMS) for more detail.

Pesticide and chemical usage, storage and disposal

Herbicides are used in pre-plant land preparation and post plant releasing for removal of competition species, and for weed pest.

The intent is always to use herbicides as efficiently as possible.

Presently no pesticides or toxins targeting insects or mammals are being used.

Logic FSL investigates alternative methods before committing to a chemical solution.
Further detail can be found in the LogicFSL Chemical Use Policy

Storage of Chemical meets the requirements of HSNO and NZS 8409:2021

Chemical Usage is calculated post plant June each year.

Silvicultural regime description and justification

The majority of stands following harvest and replant will be managed as a Clearwood regime. This process will involve pruning and thinning to waste.

Clearwood is processed by domestic mills and is a popular product for export.

The main product is high value timber used in decoration and furniture. While pruning yields a higher value product, it also requires more investment.

Structural Logs grown under the clearwood/framing regime can also be processed locally, presently in small volumes, and sold for export under existing supply contracts.

Tree nutrition

Foliar samples will be taken if nutrient deficiency symptoms are observed or expected. Fertiliser* will only be applied if the health and the growth of the trees are significantly affected, or where economic analysis demonstrates a benefit.

Site productivity and tree nutrition are the subject of industry research programmes. Logic Forest Solutions Ltd is an active stakeholder of this. All harvesting entities are financial contributors through the Forest Research Levy Fund.

*Note Fertiliser use is rare in the North Island and not required in the Eastern Bay of Plenty or East Coast.

No fertiliser has been used in the Forest at the time of writing of this Management Plan. Logic FSL has a *LFSL Fertiliser Use Policy* in place if there is a requirement to Fertilise.

Pruning

Pruning will be undertaken in two (2) lifts to 6.5 metres at approximately age 5 and 7. Target Stems per hectare will be from 320-350 sph.

Thinning

Thinning will be undertaken in all regimes. A clear wood stand would have one final thin to 330 sph at age 8 years after the final 2nd lift. There is one thin/final crop selection undertaken on a framing timber stand when trees reach full canopy cover and a height of between 10m -12 m. The target stocking in the framing stands is 450 sph.

All thinning is by way of chainsaw and qualified operator. This is cost effective and provides employment for local contractors.

Local processors are used where possible

When harvest is undertaken local processing will be considered.

Exotic Forest Monitoring programme,

All Monitoring is summarised in Public Summary of Monitoring Results
<https://logicfsl.co.nz/sustainability>

Waterbodies

The property is located within the Lower Waipaoa River Catchment. There is one small streams that run within the property. The property does not abut any Rivers or significant streams.

TRMP Freshwater schedules

No waterways near the forest are listed in the TRMP as significant or protected.

Portions of the forest fall in the Gisborne District Council Indicative Transition Zone and during harvest LFSL will enact mitigations for these areas, and post harvest replanting plans will be modified accordingly.

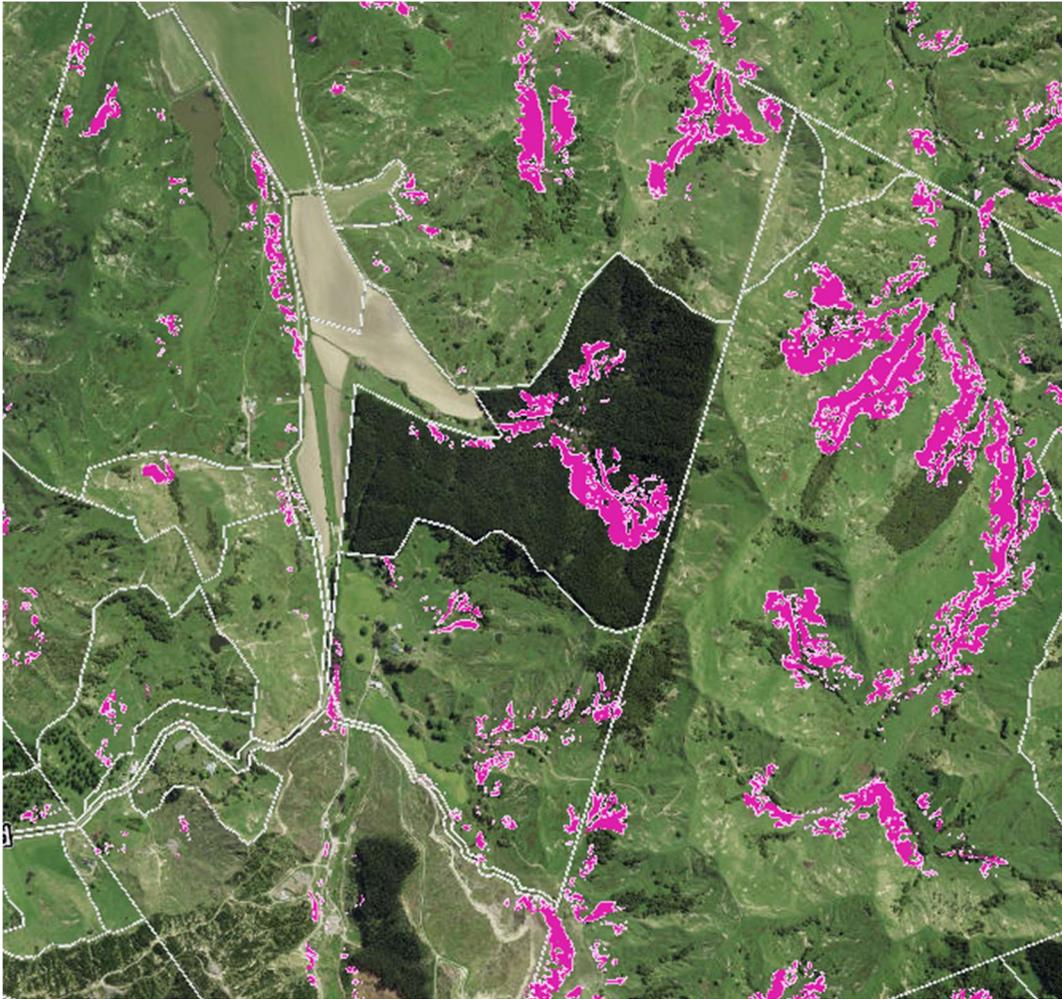


Figure 19 Ormond Forest (Indicative Transition Zone in Purple)

The MPI Fish Spawning Indicator Tool shows there are no spawning areas within the area
No Overlay 3A areas are within the forest.

Natural Resources and Biodiversity

Protected Areas including Protection Management Areas (PMAs)

Protection Management Areas

There are no Protection Management Areas within the area.

Protected areas (<http://ourenvironment.scinfo.org.nz>)

There are no other protected areas within the Forest.

Heritage Values (Physical) (as currently known)

There are no recorded physical archaeological sites within the forest.

The Heritage Alert Overlay does not overlay any part of the area of Forest.

Nothing has been identified to our knowledge throughout the current land use as a Pastoral farm as having physical significance on the property.

The planting planning process includes scrutiny of ridges, terraces and trying to identify any evidence of Māori pa sites, banks, ditches, loose stones, levelled terraces, pits or remains of shells. Nothing has been identified in planning to date.

Logic Forest have been vigilant in taking a precautionary approach to any assumption of lack of specialness on the property.

Logic Forest (as Forest Managers for Ingka Group) has an Accidental discovery policy in place and operators and supervisors follow this during all operations.

In summary

- Iwi will be notified
- Heritage NZ will be notified.
- Operations will cease for that area until identification can be undertaken. They can continue in other areas.
- Afforestation operations will not enter the buffer area around the site but can continue in other areas

The area is within Te Aitanga a Mahaki area of interest.

If any sites are found through any means, Logic Forest will work with Te Aitanga a Mahaki and Hapu, and InSitu Heritage to investigate these sites further through the following steps:

- Site visit with Logic Forest Staff and Te Aitanga a Mahaki representatives to conduct a visual and spiritual inspection of the potential sites.
- If confirmed as having attributes of a Māori Site, or values, InSitu Heritage will be arranged to conduct a site visit for confirmation and recording.
- Confirmed Sites will be Registered by InSitu Heritage after consultation with Te Aitanga a Mahaki
- Sites will have appropriate buffers applied from Afforestation activities
- Sites will be identified on the ground by methods agreed between Te Aitanga a Mahaki and InSitu Heritage (contract Archaeologist)

This will ensure that the potential sites are confirmed, or otherwise, and if the site exhibits signs of occupation, or spiritual significance to Te Aitanga a Mahaki this can be protected appropriately.

Survey Biodiversity values

Ormond Forest contains limited indigenous vegetation and is surrounded by Pastoral grasslands.

Protected Areas including Protection Management Areas (PMAs)

There are no Protection Management Areas within the forest area.

Protected areas (<http://ourenvironment.scinfo.org.nz>)

There are no other protected areas within the forest area

Rare or Threatened species

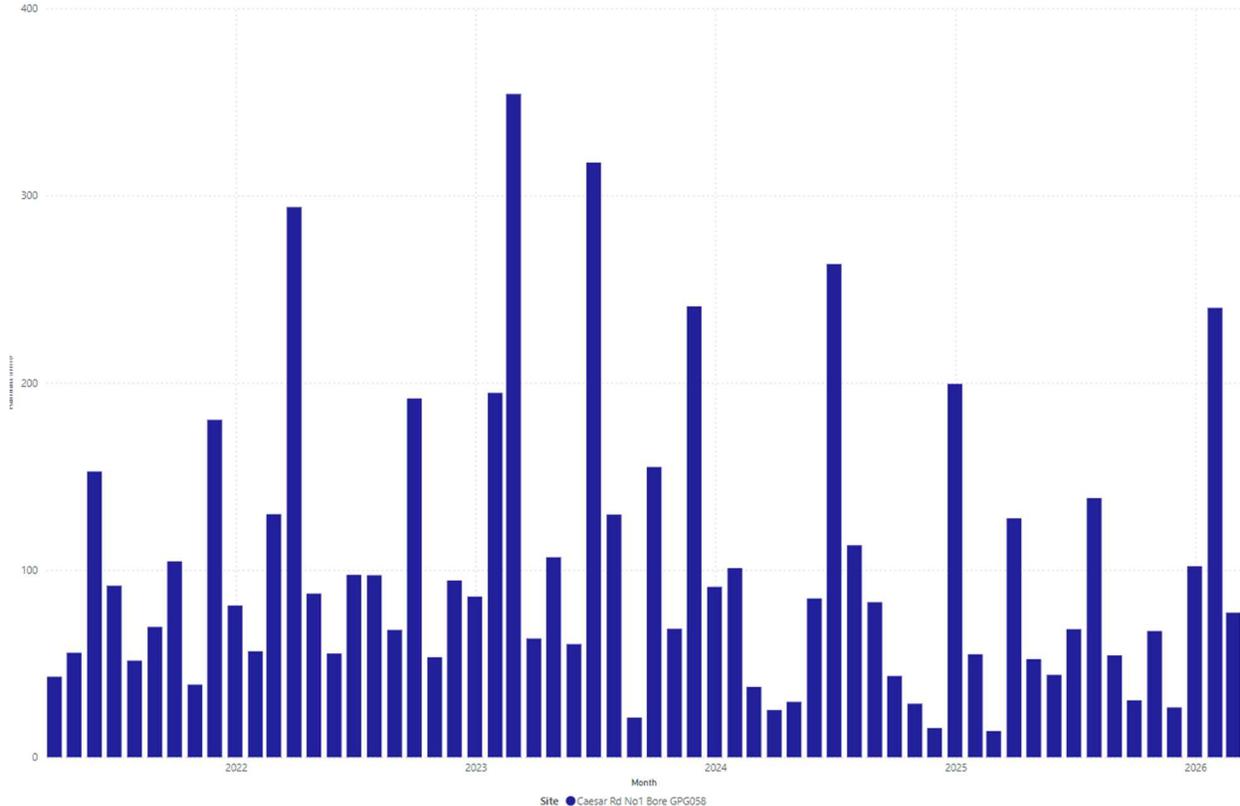
There are no recorded or anecdotal reports of sightings of Rare or Threatened species in the forest area or surrounding areas.

Stream Health Monitoring

The Forest Manager will carry out initial Stream Health Monitoring on the property prior to harvesting.

Climate

GDC Rainfall data collected at the nearest rainfall data collection site (Caesar Rd No1 Bore GPG058) by month over the past 5 years is shown below:



The Forest Manager is aware that the area has been subject to unseasonable prolonged heavy rain and cyclonic events in the 2022-23 Spring and Summer, and recent rainfall events, have not followed predictable patterns, and therefore precautions will be taken at all times in preparation for these events.

Geological Sites

There are no known geological sites within the Ormond Forest management area

Catchments and Waterbodies

Catchment Summary

The Project area is located entirely within the Lower Waipaoa Catchment.

Freshwater Fisheries and Monitoring.

There are no entries into the *MPI Fish Spawning Indication tool* for the waterbodies within the forest.

Setbacks from Waterbodies

Production forests will be set back at replanting a minimum 10 metres from the boundary of all watercourses.

In areas identified as being at risk of slash mobilisation to waterbodies, or slope failure the setback has been extended, and a buffer species (where practical) will be planted between the production Forest and the waterway.

The goal being to occupy these sites as soon as possible with effective tree cover suitable for the soil depth, stability and adjacency to waterways.

Coastal Marine Area

This Forest is outside the coastal marine area.

Natural Hazards and Risks

Natural Hazards Management Plan

LFSL has a **Natural Hazards Management Plan** in place to prepare for effects of the Natural Hazards prevalent in the forest Region including

- Prolonged or intense rainfall e.g. flooding, landslide. Notable examples within our management area in the region include the Cyclones Bola 1988, Cyclone Cook 2018, and Cyclones Hale and Gabrielle 2023 two weeks apart.
- The East Coast is prone to mass landsliding and slips.
- The East Coast area has been subject to mass rockfall risk exacerbated by earthquakes and recent Cyclones.
- Volcanoes and earthquakes e.g. ground shaking, landslide, liquefaction, tsunami.

For further details please see the LFSL Natural Hazards Management Plan, or Glen Alva Forest Emergency Plan

Monitoring

A public summary of Monitoring Results is available at <https://logicfsl.co.nz/sustainability>