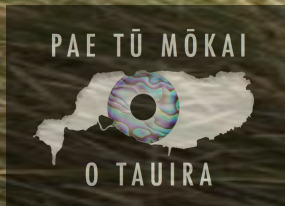


Lake Domain Entrance Hugelkultur Project



Lake Domain Entrance

2 x failed public plantings



March 2020



Control sites

C1 and C2 outside the hugel

H1 and H2 within the hugel



Hügelkultur Project Begins

Hugelkultur is a technique that builds fertility, retains moisture and encourages the growth of mycelium, which is a fungi present in natural ecosystems

The swales (trenches) are approx 152cm (5ft) deep x 152cm (5ft) wide



October 2020 Planting





Does the Hugelkultur technique help young plants establish in a high stress environment?



July 2021
9 Months since planting



Non-indigenous mammal Attack!!



Reporting on comparative plant size based on biggest samples

In-dept scientific reporting on plant survival rate will be covered in thesis study by Victoria University student Brennan Panzarella.



Main Hugel
Manuka
Height 73cm



Control site C1
No Hugel / with mulch
Manuka
Height 56cm



Control site C1
No Hugel / no mulch
No surviving Manuka



Main Hugel
tī Kōuka
Height 113cm



Control site C1
No Hugel / with mulch
tī Kōuka
Height 73cm



Control site C1
No Hugel / no mulch
tī Kōuka (sole survivor)
Height 36cm



Main Hugel
Harakeke
Height 80cm



Control site C1
No Hugel / with mulch
Harakeke
Height 55cm



Control site C1
No Hugel / no mulch
Harakeke
Height 30 cm



Main Hugel
Toetoe
Height 130cm
Width 170cm



Control site C1
No Hugel / with mulch
Toetoe
Height 80cm / Width 120cm



Control site C1
No Hugel / no mulch
Toetoe



Main Hugel
Ngaio
Height 100cm



Control site C1
No Hugel / with mulch
Ngaio
Height 54cm



Control site C1
No Hugel / no mulch
No surviving Ngaio



Observations - After 9 Months Growth

- Plants in Hugel growing faster with high success rate
- Plants in C1 control site (mulch only / no hugel) struggling and with less growth
- Control site with no mulch plants have mostly failed
- Plants in C2 control site (mulch only / no hugel) Performing better than C1 sheltered from north west wind by lupins



October 2020



October 2021



May 2022



June 2023



June 2023 Hugel
2 yrs, 8 months growth

