**Issue Title: Marvellous Mountains**

**Date: 8 November**

**Teacher:**

**Level: All Levels**

**Achievement Objectives:**

* Appreciate that water, air, rocks and soil, and lifeforms make up our planet and recognize that these are also Earth’s resources. (Science L3, Investigating in Science)

**Big Question**:

* How can we use the effect mountains have on the weather to our advantage for agriculture and tourism?
* With mountains rising, how will this affect the environment- agriculture, animals, birds

**Learning Intentions (Students will):**

* understand the effect mountains have on weather

**Success Criteria (Students can):**

* share key ideas about the effect mountains have on weather
* can explain different mountain forms
* present 3D map of Southern Alps

**Key competencies (highlight):**

Thinking, Relating to Others, Understanding Language, Symbols and Text, Managing Self, Participating and contributing

**Vocabulary:** tectonic plates, molten rock, summit, precipitation, “rain shadow”, climactic, windward side, erosion, alpine, ancestral,

**Tuning in: (How to connect with students’ current thinking, prior knowledge, misconceptions, interests and wonderings)-**

Class discussion – videos- Sir Edmund Hillary, how mountains are formed, how mountains affect climate

**Group Activity:**

* **c**reate a labelled 3D map of The Southern Alps

**Other activities/group research:**

* Make a poster to illustrate and explain different mountain types
* Write a short passage: if you could choose a mountain to climb, which one would you choose, and why?
* Choose a Maori myth related to a mountain and adapt it to a play.
* Make a timeline of when the highest mountain summits were reached. Name the mountain and who the climbers were.
* Make a presentation your choice to illustrate the effect mountains have on weather.

**Making conclusions:**

Have you come to a conclusion as to whether mountains have an effect on the weather and if we can use this to our advantage?

Can you explain to others, how different mountains are formed?

**Assessment**

***Formative***

* **Engagement with topic**
* **Collaboration**
* **Questions to investigate**

***Summative*:**

* Posters
* Maori Myth play
* Timeline
* 3D map

**Materials/Resources:**

[www.in2edu.com](http://www.in2edu.com)

<https://www.nationalgeographic.com/search>

<https://www.youtube.com/watch?v=MBUYfhv2Rp8>

<https://www.youtube.com/watch?v=r826YZVr-fQ>

<https://www.youtube.com/watch?v=Fd_XqYE2BWY>

<https://www.youtube.com/watch?v=yuvy4nLtWk4>

Journals

The battle of the mountains Yr 6 Part 04, No.1: 2000

New Zealands Weather Yr6 Connected L3 2012

What makes the weather Yr6 Connected L3 2012

More than a mountaineer Yr7 part 03 no.3 2003

A bit of a bang Yr 6 part 04 No 3 2004

Te waka a Aoraki: how the South Island was formed Yr5 Part 03 No.2 2003