

91733R



Mana Tohu Mātauranga o Aotearoa  
New Zealand Qualifications Authority

## Level 2 Education for Sustainability 2025

### 91733 Demonstrate understanding of initiatives that contribute to a sustainable future

Credits: Four

#### RESOURCE BOOKLET

Refer to this booklet to answer the questions for Education for Sustainability 91733.

Check that this booklet has pages 2–6 in the correct order and that none of these pages is blank.

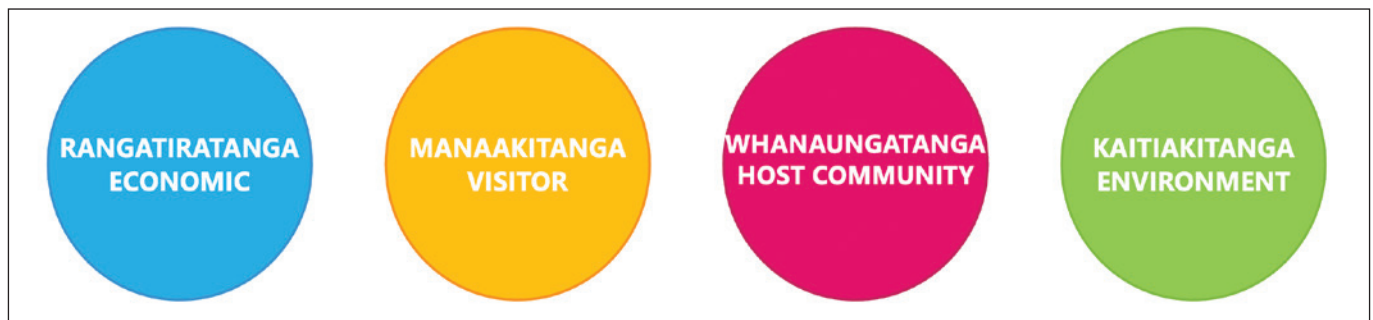
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## INITIATIVE A: New Zealand's Tourism Sustainability Commitment

Tourism is a very important part of Aotearoa New Zealand's economy, with tourists spending \$37.7 billion in the year ending March 2023. However, it also creates many environmental challenges. Over 50% of New Zealanders believe tourism increases pollution in the air, water, and land, and that overcrowding strains natural resources and infrastructure (systems that support communities, such as roads, electricity, and waterworks). For New Zealanders, infrastructure damage could mean additional damage to roads, wear and tear on tramping trails, and even pressure on digital networks. Popular destinations like Queenstown and Milford Sound have seen increased waste and habitat destruction due to large numbers of visitors.

### The Tourism Sustainability Commitment

Sustainable tourism offers a solution to these challenges. Developed by Tourism Industry Aotearoa (TIA) in 2017, the Tourism Sustainability Commitment (TSC) aimed for all tourism businesses to adopt sustainable practices by 2025. It focuses on four key areas: economic, visitor, host community, and environmental goals. Through these goals, the TSC strives to reduce tourism's negative impact on the environment, while simultaneously supporting local communities and preserving cultural heritage.



**Figure 1:** The four key areas of commitment for the TSC

One major success of the TSC is the carbon offset programme. This programme encourages tourists to pay extra fees for things like flights, to offset their carbon emissions. These extra funds are used to support environmental projects, like tree planting, which help to reduce the environmental impact of tourism. In 2023, over 60% of global travellers said they were willing to pay more for eco-friendly travel options, showing strong support for this kind of initiative.

Another key part of the TSC is the International Visitor Conservation and Tourism Levy (a tax to raise funds for a specific purpose), which was increased from NZ\$35 to NZ\$100 in 2024. This levy helps fund conservation projects and improve infrastructure across New Zealand.

The Akiaki programme, managed by TIA, supports tourism businesses in adopting sustainable practices. It provides resources, guidelines, and training to help businesses reduce their environmental impact and contribute to local communities. The Akiaki programme helps ensure that the TSC's sustainability goals are met by encouraging businesses to improve their operations.

## Kohutapu Lodge – the TSC in action

*Kohutapu Lodge and Tribal Tours*, located in Murupara (Bay of Plenty), offers visitors authentic Māori cultural experiences, including guided tours, community visits, traditional meals, and interactive workshops. These activities provide insight into the heritage and daily life of the local iwi, Ngāti Manawa.



**Figure 2:** A view from Kohutapu Lodge

Kohutapu Lodge supports the TSC through community engagement, cultural preservation, and environmental stewardship. Located in Murupara, a town impacted by economic decline, the lodge helps revitalise the local community.

A staff member describes their approach as “real people tourism”, welcoming visitors to experience Māori life beyond staged performances. The lodge promotes eco-friendly practices, such as waste reduction and low-impact travel, educating visitors on sustainability, and encouraging long-term environmental responsibility.

Despite challenges, Kohutapu Lodge demonstrates how sustainable tourism can benefit both the environment and local communities.

## Challenges still exist

While the TSC has made progress, it faces several challenges in achieving its goals. One of the biggest challenges is the cost of implementing sustainable practices, particularly for smaller tourism operators. These businesses may struggle to afford the changes needed, while larger businesses have more resources. However, smaller businesses are often more flexible and can adapt at a faster pace.

Another challenge is balancing sustainability with tourism growth. Stricter regulations and higher fees could discourage international tourists and slow the tourism industry’s post-pandemic recovery, impacting local economies. Many businesses also struggle to balance environmental goals with maintaining profitability. The TSC’s focus on sustainability can sometimes be seen as limiting for businesses that are already struggling financially.

The TSC is a step in the right direction, but ongoing support will be crucial to ensuring that New Zealand’s tourism industry continues to thrive in a sustainable way.

## INITIATIVE B: Tourism and artificial intelligence

Tourism is a big part of the world's economy, making up about 10% of global income and 7% of exports. However, it also harms the environment by increasing carbon emissions, using up natural resources, and damaging ecosystems. Tourism contributes around 8% of the world's carbon emissions, a number often underestimated. As the industry continues to grow, new solutions are needed to reduce its impact.

Artificial intelligence (AI) could help make tourism more sustainable. By analysing large amounts of data, AI can improve resource use, cut waste, and boost energy efficiency. It can suggest eco-friendly travel routes, promote greener transport, and direct visitors to less crowded places to reduce their environmental footprint. AI can also track tourist movement to prevent overcrowding in popular locations, helping to protect fragile environments.

Artificial intelligence also helps distribute tourists more evenly, bringing income to smaller communities and supporting local businesses. By promoting other destinations, it reduces crowding at major hotspots, protects infrastructure, and prevents costly repairs. AI-driven tourism can also strengthen cultural connections by introducing visitors to traditions and heritage sites, helping small towns avoid issues like traffic and noise.

Despite its benefits, AI-driven tourism has challenges. Tracking visitor behaviour raises privacy concerns, and inaccurate data could lead to poor decisions. Smaller communities promoted by AI may lack the infrastructure needed to handle more tourists, such as accommodation and transport. Additionally, AI systems are expensive, which may disadvantage small businesses. Careful planning is needed to address these issues effectively.

### AI and VisitScotland

Scotland's famous landscapes and historic sites face serious challenges from over-tourism. Places like Edinburgh Castle, the Isle of Skye, and the North Coast often struggle with too many visitors, which puts pressure on roads, water systems, and local services. For example, the Isle of Skye has only 10,000 residents but receives over 500,000 visitors each year. This leads to traffic jams, waste problems, and damage to natural sites, while smaller, lesser-known areas miss out on the benefits of tourism.



**Figure 3:** Scotland's Edinburgh Castle, Isle of Skye, and North Coast

VisitScotland is using AI to manage tourism and promote sustainability. AI analyses visitor data to identify travel patterns and encourage trips to quieter destinations and during off-peak times. This reduces pressure on overcrowded sites while spreading tourism benefits more

evenly across Scotland. As VisitScotland's CEO explains, "AI and data analytics help us improve visitor distribution and create better experiences for everyone."

Along with AI, VisitScotland uses digital signage and educational campaigns to promote responsible tourism. These efforts help protect Scotland's natural beauty and cultural heritage while ensuring local communities benefit from tourism. By reducing overcrowding, preserving ecosystems, and directing visitors to lesser-known areas, AI supports a more balanced and sustainable tourism industry.

VisitScotland's use of AI shows how technology can reduce tourism's environmental impact, support local economies, and preserve cultural heritage. By balancing the needs of visitors and communities, AI helps create a more sustainable tourism industry with long-term benefits for both people and the planet.

### **New Zealand tourism and AI**

As New Zealand's tourism industry continues to grow, AI technology offers innovative solutions to enhance sustainability while preserving the country's unique hospitality values. AI can help manage visitor distribution by analysing data to identify less crowded destinations and optimal travel times. This helps to ease pressure on popular spots while promoting off-the-beaten-path locations. Additionally, AI supports resource management, reduces waste, and boosts energy efficiency, enabling businesses to operate more sustainably.

However, the possible widespread integration of AI in New Zealand's tourism sector raises concerns about its impact on *manaakitanga*, and the hospitality shown to visitors. While AI-driven systems can improve operational efficiency, they must be carefully implemented to maintain the personal, human element that is central to New Zealand's tourism experience. As stated by a Franz Josef bed and breakfast operator in the South Island: "What sets us apart, though, is when a guest leaves us saying that they arrived as strangers and left as friends. So, we don't want – well, we don't think AI can really take that away from us."

Many tourism businesses have already stated that they are committed to blending AI with traditional Māori values, ensuring that technological advancements do not replace the warm, authentic experiences that visitors expect.

## Acknowledgements

Material from the following sources has been adapted for use in this booklet:

### Initiative A

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### Image

<https://www.goodtourismblog.com/2021/10/real-life-tourism-the-essence-of-regenerative-tourism/>

### Initiative B

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### Images

Edinburgh Castle image: <https://www.scotlandswild.com/edinburgh-castle>

Isle of Skye image: [https://www.tripadvisor.co.nz/Attractions-g186585-Activities-Isle\\_of\\_Skye\\_The\\_Hebrides\\_Scotland.html](https://www.tripadvisor.co.nz/Attractions-g186585-Activities-Isle_of_Skye_The_Hebrides_Scotland.html)

Scotland North Coast image: <https://www.lovefromscotland.co.uk/north-coast-500-beaches/>



