Education for sustainability: a sample three-year plan

<table>
<tr><td colspan="4">An education for sustainability programme that encompasses the unique environmental setting, local and global issues in sustainability and builds students' competence to deal with life as the circumstances around them change.
This progression will:
• build an understanding of issues in sustainability and how these issues affect us in our local community, Aotearoa and the world;
• develop cooperative learning and collaborative decision-making skills so that young people leaving school know how to participate in a democratic process towards a sustainable future</td></tr>
<tr><td>Key competencies

NZC values in context</td><td colspan="3">The learner will develop Action Competence by ;
• Participating in a range of experiences in, about and for the environment to develop their commitment and engagement with sustainability issues. Managing self.
• reflecting on experience, action and their own learning through developing critical thinking. Thinking.
• building conceptual and practical understanding of sustainability and using knowledge to inform decisions and actions that lead to a sustainable future. Understanding language, symbols and text.
• considering their vision for a sustainable future and what changes could be made now. Thinking.
• taking effective action willingly that addresses the cause of a sustainability issue. Participating and contributing.
• understanding that they are connected to other people and the environment which is evident in their attitudes, values and behaviours. Relating to others.

http://www.tlri.org.nz/investigating-the-the-relationship-between-whole-school-approaches-to-education-for-sustainability-and-student-learning/
Links between aspects of action competence and the key competencies are just examples</td></tr>
<tr><td>Level</td><td>Level 1</td><td>Level 2</td><td>Level 3</td></tr>
<tr><td rowspan="2">Conceptual understandings
See key concepts in TLG</td><td colspan="3">Students will develop understanding of sustainability and explore ways of thinking and acting which will meet their needs without compromising the needs of others in the future using concepts of:</td></tr>
<tr><td>equity,
interdependence,
responsibility for action,
kaitiakitanga</td><td>consumerism, globalisation, respect for all life, social justice, finite resources, biodiversity, informed decision making</td><td>citizenship, community, democracy, enterprise and entrepreneurship, resilience and regeneration, action orientation</td></tr>
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Aspects of sustainability	Possible contexts: students will apply aspects of sustainability to a range of meaningful contexts		
Environmental sustainability. Making sure all forms of life (animals and plants) and their habitats are **cared for**. This will ensure that all ecosystems in both natural and man-made environments will be maintained so that all the **different forms of life can exist** together. **Social sustainability.** All **people** are considered **equal** whether they are from different cultures, ages or social groups and they all have the **same rights** to exist and grow in a supportive community within a healthy environment. Resources are distributed fairly. **Cultural sustainability.** All cultures are **valued** for their way of living in the world. Communities **respect** different cultures and allow all, the opportunity to share their attitudes and values and to participate in decision-making about their environment. **Economic sustainability.** We must consider how we **use**	• What is sustainability? Definitions/explanations/images/sustainability puzzle www.efs.tki.org.nz • Explain strong sustainable model, interdependence of environment-society-economics • Explore the local environment and identify natural, social, cultural and economic resources. Identify respectful behaviour for sustaining these resources • Experiences in the environment investigating the ecology of local ecosystem eg. forest, marine, stream, harbour • Investigate sustainability issues in the local community using media and conversations with community and local iwi • Inquiry of different perspectives around a local sustainability issue eg new wind farm, new motorway • Relate the carbon cycle to life on earth. Identify global challenges and local issues • Is our school a sustainable community? Investigate resource management -what comes in? what goes out? (waste, water, energy, paper) • Plan and carry out a personal action for sustainability • How do we know we have a made a	• Explore the interdependence of the aspects of sustainability • Identify ways in which the world is changing- challenges, eg. climate change and opportunities eg. communication • Apply aspects of sustainability to local, national and global examples eg. Sustainable sporting events, new energy sources • Participate and contribute in the local community for ecological sustainability eg riparian planting, pest eradication, waste audits • Experiences in a range of environments collecting data and identifying ecological patterns eg wetlands, marine reserves, food forests • Investigate sustainability activists and identify values and attitudes that contribute to their work • Research diverse world views that contribute to a sustainable future and reflect on personal values • Local issues/ global contexts sustainability; climate change, peak oil, food distribution • Smart consumerism- personal responsibility • Create a sustainable vision for your community in the future. Plan	• Develop understanding re criteria for a sustainable future • Experience a range of natural and built environments and take part in an local action • Explore the changing world - what does this mean for future decision makers eg. Coping with increasing population, new energy sources, food distribution, climate change, equity of resource use (soil, water, peak oil)? • Research communities, leaders, businesses and governments who have made decisions for a sustainable future and analyse the consequences for all aspects of sustainability • Green careers / new jobs for a sustainable future • Develop knowledge of and practice in gathering scientific evidence on an environmental issue • Collaboratively create a Vision for a sustainable future eg Whistler ski Field energy options .Work with an organisation to develop a strategic planwww.towards2060.org.nz • What innovations are happening now and for the future in transport, energy, food supply, governance, housing, social equity, trade,

resources from the land, sea and air, to make money, so we **don't run out or harm** the earth now and in the future.	change for a sustainable future? Develop critical thinking , analysis of data and evaluation NZC level 6 AOs ; English - speaking writing and presenting, social sciences, technological practice, science - interacting systems, ecology	backwards to identify what needs to happen to get there. • Identify an action for now that will work towards your vision and aim for excellence in implementing it and overcoming difficulties NZC level 7 AOs science - earth systems and interacting systems, ecology, PE - healthy communities and environments, geography and social studies	globalisation • Investigate Sustainable cities for the future eg. Masdar, Curitiba, Samsoe Island, transition towns • Think global act local, continue with an action or plan a new action and evaluate the outcome for a sustainable future NZC level 8 technological practice, social studies, geography, science
Possible assessments ***Many of these standards will have changed as a result of the alignment process: check before using.***	Science ; AS90156, AS90161, AS90164 Social Science; AS90218, AS90219, AS90207 The Arts; AS90021, AS90014, AS90003 Maths; AS90193 English; AS90059, AS90058, AS90060 Physical education; AS90071 Technology; AS 90045	**Efs 2.1** Plan, implement and evaluate a personal action that will contribute towards a sustainable future **Efs 2.2** Describe the consequences of human activity within a biophysical environment in relation to a sustainable future **Efs 2.3** Describe world views, their expression through practices and activities and the consequences for a sustainable future **Efs 2.4** Describe values and behaviours associated with a sustainable future **Efs. 2.5** Describe aspects of sustainability in relation to a sustainable future **Efs. 2.6** Work cooperatively to develop and present a strategy or design for sustainability in response to a future scenario	**Efs 3.1** Evaluate a planned personal action that contributes toward a sustainable future **Efs 3.2** Investigate the interrelationship between humans and a biophysical environment in relation to a sustainable future **Efs 3.3** Compare and contrast initiatives in relation to a sustainable future **Efs 3.4** Describe policies and practices, their development and contribution to a sustainable future **Efs 3.5** Develop and justify a strategy for an organisation that will contribute to a sustainable future