

DEVELOPMENT OF THE CENTRE FOR SUSTAINABLE PRACTICE AT OTAGO POLYTECHNIC

Steve Henry and Alexa Forbes

EXECUTIVE SUMMARY

The Centre was established in 2009 with the aim of being a centre of excellence around horticulture, viticulture and tourism. It was set up following a meeting with 35 stakeholders in Central Otago in 2007. The original working brief was to establish a centre that would support the development of authentic, sustainable tourism, worker housing efficiency, and also to recognise the importance of water and the need for water research. The centre of excellence didn't establish for several reasons; (Singularity Hub, n.d.). Otago Polytechnic decided it wanted to put its own house in order first, (United Nations, n.d.). The Otago Regional Council decided it would take on the required work around water (Ministry for the Environment, n.d.). Funding for the Sustainable Tourism in the Regions programme, which financed early work, was discontinued by the government. At this point, the vision of the Centre shifted. It came to envisage itself as an organisation that could mainstream sustainable practice by supporting people's work on personal or professional projects with a suite of well-facilitated frameworks and tools.

Despite taking a different direction from the one initially envisaged, demand for the skills contained within the Centre was evident and a programme portfolio was developed covering research, consultancy and qualifications. In 2016 there was another shift. Centre staff believed the world had moved on from sustainability as an aspirational goal and, while there were successes to celebrate, a Centre for Sustainable Practice by definition could not be in a leadership position – sustainability is simply the pivot point between degeneration and regeneration. From the Centre's perspective, regeneration rather than sustainability would be the leadership space.

By this time, the Centre had quietly built itself into a leadership position in transformational education, bridging gaps between online and contact learning, and between personal and professional spaces. Deep learning was happening and the Graduate Diploma programme had forged a strong community of people working on transformation of first themselves, then their organisations towards impacting whole systems. Centre work around collaboration has shown glimpses of a potential to be a New Zealand hub for solving complex problems by aligning interests and encouraging deep reflection. In Queenstown, graduate applied research learning has implemented a commercial biodiesel operation and facilitated community-led, future-focused solution planning.

The Centre has been largely invisible in its work to date both at Otago Polytechnic and in the wider community. The next 'evolution' desired is towards developing a deeper purpose that can attract others towards a transformation that will support regeneration of every aspect of our lives, society and environment - in line with the world's Global Grand Challenges as articulated by Singularity University and/or the United Nations Sustainable Development Goals. We would like the Centre to facilitate capacity building within the whole Otago Polytechnic system and its communities – modelling regenerative work and providing education for regenerative practitioners.

INTRODUCTION

New Zealand is at a crossroads, facing two major sources of disruption. 1. Core earners - dairy and tourism - rely on a clean, green image for continued success yet each have intensified beyond environmental and community capacity. Reports such as Pure Advantage's *The Green Race* (Pure Advantage, n.d.) outline the opportunity and the concern that risks are accelerating as opportunities are missed. 2. Rapid technological advancement is affecting many sectors, including education. As *Forbes* commentator Todd Hixon put it in 2014, "Education is Now Ground Zero for Disruption." (Forbes, n.d.)

At the Centre we have embraced this disruption and made fundamental shifts as we see learning move from fully campus based to include on-line offerings, and watch as the value of tertiary education moves from providing knowledge to providing experience. In response we have experimented with integrating on-line and experiential learning while maintaining academic standards within our graduate programme. This has largely been successful as evidenced by completion numbers and student satisfaction. The Centre is now operating almost entirely independent of campus-based delivery with staff and learner location becoming practically immaterial.

This success has been largely limited to a graduate programme (individuals) and we would like to extend this into our other areas of desired influence (organisational and systems). Our programmes in those areas have had some success, but not as much as we'd like so we have spent much of this year identifying what the issues have been and how we might rebuild these areas.

The glimpses of potential referred to above could be regarded as seeds of redevelopment ready to grow when resources are specifically allocated.

OUR ROLE/PURPOSE

Our purpose was **to mainstream sustainable practice**. We now find this statement restrictive and not coming from a position of leadership. We now see sustainability as the pivotal point between degenerating and regenerating, and we are interested in enabling the willing to work towards common, regenerative goals. Our new purpose needs to acknowledge our commitment to the transformational at all our touch points, our commitment to partnership and leadership, and our desire to bring these commitments to the discussion and eventual solution of wicked problems.

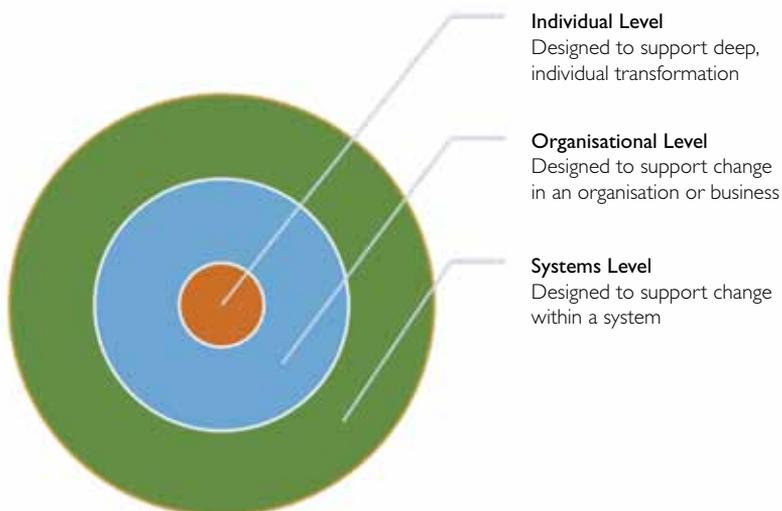


Figure 1. programmes sought to work at individual and organisational level to eventually impact the systems level.

CENTRE HISTORY

In 2006 Steve Henry was appointed to focus on enabling sustainable business practices and supporting authentic tourism in Central Otago. This extended to opening the Centre for Sustainable Practice in 2009. Initiatives, some of which still operate, are outlined in the appendix. Otago Polytechnic simultaneously built its internal capability and embedded sustainable practice as a strategic platform.

Eventually, a pattern of programmes was established, including qualifications, to address sustainability at different levels (see nested circles in Figure 1).

Three levels of programmes were established in response to perceived demand. (See appendix 1 for details and case studies).

1. **Individual level.** A blended delivery graduate diploma designed to develop deep understanding of systems thinking and critical reflection in individuals.
2. **Organisational level.** Designed to impact organisations and businesses. Promoted as Adding Sustainable Value, this is a consultancy model business programme set up as a Level 5 staff training product to attract Government funding for qualifications. (Businesses were unwilling to pay the full cost of this product).
3. **Systems level.** This fee-for-service work includes the biodiesel project, Shaping Our Future community development initiative and research into NZ's Ecological Footprint.

KEY CENTRE ACHIEVEMENTS

Individual level

- Graduate research work actively tied to partners at organisational and systems level to create a closed loop and to support hub development. Model in place and functional.
- 55 graduate completions including 9 international learners.
- Model of online and block course delivery with learners and staff around the country is a proven success.
- 21 learners enrolled in Open Education Resource universitas (OERu) micro-course pilot.

Organisational level

- 115 businesses completed Adding Sustainable Value programme (Level 5).
- Partnerships with Living Futures Institute and Ara to deliver the Creating Living Buildings short course.

Systems level

- Publication of the Centre's first four micro-courses for the Open Education Resource universitas (OERu) in 2016.
- Development of the community development programme Shaping Our Future. This programme is still in operation in Queenstown Lakes District Council and the model has been adopted at Northland District Council.
- Research and consultancy in Environmental Footprinting, Localising Food and Biodiesel.

Our story shows how the Centre has been flexible, responsive and innovative since its inception. Much has been tried, most of which has enjoyed some measure of success, lessons have been learned and we're now ready for new steps in designing our future.

WHERE ARE WE NOW?

The Centre has one full-time employee, one part-time employee, two contractors and administration support.

The Centre has three areas of work as described in Fig.1 above. At the individual level, current Full Time Equivalent (FTE) programme is the Graduate Programmes in Sustainable Practice (Level 7). At the organisational level is the Adding Sustainable Value (Level 5) programme. At the systems level, we have expertise in research and in collaborative community development but are not currently active in this space apart from providing support as invited.

The Graduate Programme returns 12 Equivalent Full Time Students (EFTS) per annum and continues to grow slowly. It grows organically, without marketing support and we don't have our own resources to look for markets. We feel there is great opportunity in this programme, but if we are really going to change our world, this programme needs to integrate and feed the organisational and systems spaces.

Adding Sustainable Value is a 3-4 month programme for organisations, which has returned up to 18 EFTS per annum. Its EFTS have relied mostly on the networking of lead facilitator Simon Harvey. Otago Polytechnic lacks a corporate brand and the dedicated business development resource to market and sell such programmes. The issue with transformation in this sector is that business exists largely for profit. Business relies on systems that support externalisation of costs (relatively cheap energy, ability to freely pollute, use water; air; no need to pay living wages. A good example of this is the production of a big Mac. This from a recent NZ Landcare Trust article. "A Big Mac is currently priced at about 7 dollars but if all the costs of producing it were internalised it would probably cost 17 dollars" (Landcare New Zealand, n.d.). We would like to add value in this environment, to support businesses as they move away from cost externalisation. Currently, there's little perceived value in being 'sustainable' because of the ability to legally externalise environmental and social costs which means we can add little value through teaching how to reduce the costs which they don't pay for anyway. Most of the businesses completing this programme have either had benefit from saving, for example energy, or perceive a marketing benefit in being 'greener' or are driven to reduce their environmental or social impacts for personal reasons. We need a new way to engage and inspire organisations in this space and ideally this would include pressure to internalise costs. This pressure can come from legislation or consumer markets.

At the systems level, we have had some success in research and community development and we have good capacity and networks in these spaces. Shaping Our Future, Biodiesel project, NZ Footprinting Project, Otago Foodshed are examples. These have relied on graduate (or PhD in the case of NZ Footprint) researchers. These projects close a loop for us, people who have undergone the transformational change of the graduate programme get to work in these real projects that take that learning to the systems level. We need to structure and resource correctly to bring this area back to life.

THE FUTURE

How do we go exponential? How do we do what the tech industry does and continually double our impact? Imagine how amazing the world would be if we could double/double/double regenerative, transformational change? How do we know if we're already on the trajectory of exponential change? (It's flat for a very long time and known for its troughs of disappointment before the upwards curve and resulting chaos and amazement kicks in - think 3D printing - it's been around for 30 years, and is now exponential).

Our future as envisaged through today's eyes, is that someone in 2026 would describe our centre in the following ways.

- A virtual place and a network where people from all sectors collaborate to support ways of socialising benefits of private activity and ensuring recognition of all the costs of private activity towards a stronger, more resilient society that willingly addresses big issues.
- A place where people can come to learn, transform, regenerate and work on solving complex problems - particularly contributing to the solution of the Global Grand Challenges and the UN Sustainable Development Goals.
- Known for social and environmental outcomes including models to enable warm dry housing for all New Zealanders, tourism that improves lives, and a balance in the dairy sector that can restore waterways while adding long-term economic value to what, was once only a commodity.
- Successful in bringing together diverse stakeholders for new conversations about leveraging influence for good.
- A place that curates information and thinkers so learners can quickly find the best information available and have access to the best thinkers to support learner work.
- Successful in bringing education and experience together by powering projects with 10,000 hours of research per year from the undergraduate and graduate programmes of several tertiary institutions.

WHY DOES OUR CENTRE EXIST?

The Centre exists as Otago Polytechnic's response to the recognised need to support transition towards sustainability. As it has developed, the Centre has moved into a far more transformational space and is now focused on supporting individuals to become regenerative - for themselves, others and ecosystems.

We see ourselves as existing in the space between the corporate, government (executive) and Iwi acknowledgement that change and co-creation of the future is required before disruption negatively impacts large tracts of the population⁹, and the practical 'how-to' gap of most individuals and organisations.

We would like our role as a hub to be centred around enabling transition and ensuring that a regenerative path is understood and chosen. We provide the education tools, research capability, connection, curation and support that could support an emerging willingness towards co-creation and mutualism.

OUR OFFERING

We offer the experience of participation as an essential part of the qualification or the consultancy. We promote understanding of issues and relationships to them, and support for transformation rather than the gaining of knowledge.

BARRIERS TO SUCCESS

Overall the Centre needs to examine the programmes and their utility. Does it want to be just about the Graduate Programme? No, it wants to feed into all parts of the system and develop all levels as part of a hub. Currently the Graduate Programme feeds the systems level and to a lesser degree the organisational level. We need ways for the organisational and systems level to similarly feed the individual level. We also desire a leadership position that has moved beyond sustainability into the regenerative space. We need a rebrand to express this, but need to have a strong understanding of our purpose first. We also require a system of marketing that we can access outside of our own internal resources.

Individual level

Difficult to place graduates in research (they manage it on their own, but ideally these would feed other levels.) Our Centre often has no input at all into the research host organisation. These organisations should become part of our Hub - we need ways to connect with them.

Organisational level

ASV programme needs redevelopment and rebrand. It has little to no marketing. It is consultancy dressed as education. Because of the consultancy approach, there is little connection to other levels so the critical reflection and sharing aspects of transformation are missing.

Systems level

Our work is proven, (Shaping Our Future) but we have no true sales or delivery mechanism. It requires a hub-style development that drives deep partnerships that are ongoing.

RECOMMENDATIONS

1. Decide the Centre's place, purpose and value proposition.

- Otago Polytechnic leadership considers how a deeply transformational centre fits within the strategic directions of the wider organisation.
- Work through a new purpose, set strategic goals and define a clear and easily understandable value proposition.

2. Establish a development pathway that builds the three levels of the 'hub'.

- Individual - Potential for new individual level programmes.
- Organisational - Needs review. Requires development and resource.
- Systems - Requires development and resource.
- Change needs to be aligned with Otago Polytechnic's strategic goals and to build the three level hub (articulated above in Figure 1.) that creates a pathway for individual and organisations to contribute to real change.

3. Hub rebrand.

- The Centre for Sustainable Practice has no true identity. It's not a school, it's not a business unit. So what is it? What should it be? What is its place within Otago Polytechnic?

4. Actions and resources needed to create development pathway.

- Leadership time to establish identity and place for the Centre.
- Resource for examining purpose and rebranding accordingly.
- Redevelopment of, and marketing strategy for, organisational programme. ASV needs a new place to 'sit' - potentially as a Level 7 Certificate. It will require a full rebrand to target a changing market.
- Time allocation and resources to build the offering and partnerships for systems level.

| Level | Outputs | Programme | Potential |
|--------------|---|---|--|
| System | Biodiesel at the pump | Queenstown Biodiesel facility (since 2010) | Wider roll out when cost effective |
| | Community led development | Shaping Our Future in Queenstown Lakes (since 2010) | Shaping Our Future model across NZ |
| | Ecological Footprint as a planning tool | NZ Footprint Project (2011-13) | Footprint calculation services for communities |
| | | Bhutan Ecological Footprint (2014) | International Footprint calculation services |
| | Localising Food research | Otago Localising Food Project (2014-15) | More of it |
| Organisation | Strategic planning for sustainable practice in organisations | Adding Sustainable Value Regional Programmes Dunedin (2010) Queenstown (2010), Manawatu (since 2011), Auckland (since 2012), Waikato (since 2012), Bay of Plenty/ Rotorua (since 2013) | Every region in NZ then consider Australia Consultants use this programme to deliver change in their sector |
| | In house strategic planning for sustainable practice | Adding Sustainable Value Otago Polytechnic programme (since 2013) Auckland Transport (2016) | Provide in-house to larger organisations which have graduated from the regional programme |
| | Ecological Footprinting of organisations | Ecological Footprint of three of Otago Polytechnic schools (2014) | Footprint calculation services for organisations |
| Individual | Transformational Learning for People able to lead sustainable practice programmes | Graduate Diploma in Sustainable Practice (since 2011) Creating Living Buildings short course (since 2013) Open source Creating Sustainable Futures course (2016) | Delivery hubs throughout NZ and internationally |

| Programme | Year began | Year ended | Income | Partners | Role the programme has played in the Centre |
|--|------------|------------|---|---|--|
| Sustainable Tourism in Regions | 2008 | 2010 | \$100k | Ministry of Tourism, Destination Queenstown, Lake Wanaka Tourism | Got known and respected |
| Biodiesel establishment | 2010 | 2011 | \$35k | Queenstown Lakes District Council, Dunedin City Council, ECCA | Got known and respected to deliver |
| Adding Sustainable Value | 2010 | - | 18 EFTS per annum 2013-15 | 115 business clients, The Natural Step, Business NZ, local govts | Doorway into business, mainstream challenge |
| Graduate Diploma in Sustainable Practice | 2011 | - | 12 EFTS per annum 2013-15 16 in 2016 | 66 Individuals | The think tank |
| Sustainable Practice 360 | 2011 | 2012 | 20k | The Sustainability Company | Helped define open source as a key value |
| Shaping Our Future | 2011 | 2015 | 200k | Queenstown Lakes District Council, Shaping Our Future Inc | Showed the value of applied research in innovating |
| NZ Footprint Project | 2011 | 2013 | \$150k | Foundation for Science and Research technology, Victoria University Auckland Council | Showed we can win large research grants |

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