

2024 Sustainability Impact report



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Acknowledgement of Country

Federation University Australia acknowledges the Wotjobaluk, Wergaia, Jupagalk, Jadawadjali, Jaadwa, Wadawurrung, Dja Dja Wurrung, Djab Wurrung, Boonwurrung and Gunai Kurnai, Barkindji, Mutthi Mutthi and Jagera peoples as the Traditional Custodians of the lands and waters where its main campuses, centres and field stations are located, and pay our respects to Elders past and present.

We extend our respect to all Aboriginal and Torres Strait Islander peoples. Federation University seeks to provide a learning and working environment that promotes values of diversity and offers equality of access and opportunity. This commitment to Aboriginal and Torres Strait Islander peoples is embedded in policy, strategy and the University's 'living' values. Seated in the practicalities of teaching, learning, research and community engagement that comprise the daily business of Federation, we are proud to work closely with all Aboriginal and Torres Strait Islander communities in supporting the continuation of knowledge and learning that is central to their peoples, cultures, lands and histories.

Respecting and understanding the longest continuous cultures on earth is crucial in realising who we are as a nation, our role as a university, what we have done, and where we are going. Federation has built strong partnerships with local Aboriginal and Torres Strait Islander communities to support the development of cultural inclusivity and immersion of Aboriginal and Torres Strait Islander cultures, history, and knowledge systems into the whole of university environment. This has included investing in the naming of various buildings and rooms, the acquisition of Aboriginal and Torres Strait Islander art pieces and signage totems at each campus. We are committed to meeting or exceeding a 3% Aboriginal and Torres Strait Islander workforce, and to achieve a balance across both professional and academic positions, to renew and strengthen our Aboriginal and Torres Strait Islander Peoples Workforce Strategy. We will do this by developing our targeted and identified recruitment campaigns, academic and professional recruitment strategy, cadetships, graduate programs and traineeships.



Vice-Chancellor Forward

I am pleased to present Federation University Australia's 2024 Sustainability Impact Report, showcasing our continued commitment to environmental, social, and economic sustainability across our regions and beyond. This report reflects our alignment with the United Nations Sustainable Development Goals (SDGs), a global framework to end poverty, protect the planet, and promote peace and prosperity for all by 2030.

As a regional university with campuses in Ballarat, Berwick, Gippsland, and the Wimmera, Federation is deeply embedded in the communities we serve. We are proud to support the one-third of Australians living in regional, rural, and remote areas, working in partnership with students, staff, industry, government, and community to drive sustainable outcomes.

We are recognised nationally for our inclusive approach to education, enrolling the highest proportion of first-in-family students and ranking #1 in Australia for access and equity. Our Co-operative Education model supports decent work and economic growth by enabling students to earn while they learn, while also addressing critical skills shortages in regional areas.

Federation's research and training initiatives are helping to solve contemporary challenges. From improving regional health outcomes through behavioural change techniques, to supporting the transition to clean energy via our Asia Pacific Renewable Energy Training Centre, we are equipping communities with the skills and knowledge needed for a sustainable future. Our Future Regions Research Centre is also contributing to sustainable cities through research into mine rehabilitation and long-term environmental restoration.

This report offers a snapshot of our progress and partnerships. We remain committed to working collaboratively to advance the social, economic, and cultural prosperity of our regions, and to contribute meaningfully to sustainability efforts both locally and globally.



Professor Duncan Bentley

Vice-Chancellor and President

Federation University Australia

Strategic Plan and Living Values

STRATEGIC AND VALUE ALIGNMENT WITH THE SDGS

		STRATEGIC PLAN			LIVING VALUES				
		TRANSFORMING LIVES	ENHANCING COMMUNITIES	SUSTAINABLE UNIVERSITY	INCLUSION	INNOVATION	EXCELLENCE	EMPOWERMENT	COLLABORATION
SUSTAINABLE DEVELOPMENT GOAL									
	NO POVERTY				★				★
	ZERO HUNGER	★			★				★
	GOOD HEALTH AND WELL-BEING	★	★	★	★	★	★	★	★
	QUALITY EDUCATION	★	★	★	★	★	★	★	★
	GENDER EQUALITY	★	★	★	★			★	★
	CLEAN WATER AND SANITATION	★	★		★	★			★
	AFFORDABLE AND CLEAN ENERGY	★	★	★	★	★	★	★	★
	DECENT WORK AND ECONOMIC GROWTH	★	★	★	★	★	★	★	★
	INDUSTRY, INNOVATION AND INFRASTRUCTURE	★	★	★		★	★		★
	REDUCED INEQUALITIES	★	★	★	★	★	★	★	★
	SUSTAINABLE CITIES AND COMMUNITIES	★	★	★	★	★	★	★	★
	RESPONSIBLE CONSUMPTION AND PRODUCTION		★	★		★	★		★
	CLIMATE ACTION	★	★	★	★	★	★	★	★
	LIFE BELOW WATER	★				★	★		★
	LIFE ON LAND	★				★	★		★
	PEACE, JUSTICE AND STRONG INSTITUTIONS			★		★			★
	PARTNERSHIPS FOR THE GOALS	★	★	★	★	★	★	★	★

1 NO POVERTY



In 2024, our commitment to Sustainable Development Goal 1, No Poverty, remained central to our strategy for inclusive growth and social impact. We focused our efforts in regional and remote communities across Victoria and Australia, where economic disadvantage and limited access to services continue to present significant challenges. Through local partnerships, and community-led programs, and targeted pathways to education programs, we supported initiatives that build resilience, improve access to education and employment, and strengthen social infrastructure.

1.1 Education and Training

Federation University continues with the strong commitment to provide high-quality education to all student demographics regardless of socio-economic background, by working with industry partners, alumni and government to provide financial support to students who would otherwise be unable to access higher education.

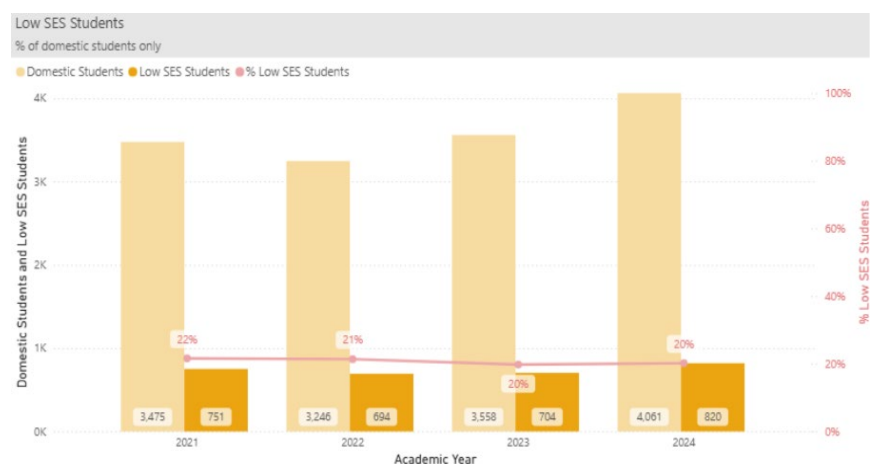
With campuses in regional Victoria, our regional communities have lower post-secondary attainment rates than the metropolitan areas. We focus on removing the barriers to post-secondary education through pathway programs, precision student support and inclusivity at the heart of who we are. Additionally, with the introduction of the Co-op model, students have access to paid placements during their studies, which allows students to support themselves while they complete their studies.

According to the Good Universities guide, Federation University has been given a 5-star rating for social equity, with 20% of students coming from low socio-economic or disadvantaged backgrounds.

1.1.1 Equity targets

The 2021-2025 strategic plan outlines the key goals and objectives for becoming Australia's leading regional education provider, guided by our main principles: transforming lives, enhancing communities, and operating sustainably. We follow through on our principle of transforming lives by providing access to higher education to all demographics.

These demographics are tracked and included in our success measures to maintain at least 20% of students from low socio-economic backgrounds (SES). This goal was achieved in 2024 with 20% or 820 of our



commencing domestic student cohort being from low SES backgrounds in Higher Education. We track enrolment through to completion for student from First Nations backgrounds, those who have a disability, low SES and First in family and those from rural and remote locations.

We go beyond tracking enrolments and are focused on the entire student lifecycle, ensuring they are gaining the support to succeed at every step of the way. That's why in 2024, we had the lowest student attrition rate for domestic students in the Regional Universities in Australia network.

1.1.2 Financial aid for students

Federation University provides financial aid to students in need through the Federation University Australia Foundation. This foundation exists to support students financially through scholarships and grants given either by the university itself or through the numerous industry partners and Alumni, and cover costs for students ranging from \$500-10000 to cover expenses like learning materials, housing, transportation costs and more. This allows students to finish or start studies and helps ensure that future generations of workers are job-ready for their chosen industry. Throughout 2024 the foundation awarded a total of \$859,000 over 254 scholarships. This is an increase over last year in both the amount given and the number of scholarships awarded. These scholarships are given out to students in both higher education and TAFE who have shown a strong commitment to their study despite economic disadvantage. By awarding these students with scholarships, they have the opportunity to complete their studies.

In 2024 the
Foundation delivered



254

Foundation
scholarships

Valued at

\$859,000



1.1.3 Destination Australia 2024

The Destination Australia scholarships are an Australian Government initiative to attract and support domestic and international students to study in regional Australia. The scholarship supports students who are studying courses in an area of demand or future need across both vocational and tertiary levels, including research. These scholarships which are worth \$15,000 per annum also support students from a range of equity backgrounds to enable them to thrive in their studies without the stress of financial barriers.

1.2 Research

1.2.1 Goldfields Education: Tailored Education for Youth Crime Prevention

An initiative of Berry Street in collaboration with A/Prof. Marg Camilleri, Federation University. The focus of the program was to provide a one-to-one year ten equivalent learning experience outside of the school environment. The experiences of the 22 young people aged between 12-17 years, prior to Goldfields, had resulted in their intermittent (at best one hour a week) or severed links with education. Goldfields Education challenges traditional teaching by engaging

young people—especially those disengaged, justice-involved, or affected by trauma—outside conventional classrooms. It emphasises real-life skills and meaningful learning experiences. The program led to a 43% average reduction in criminal charges, improved educational engagement, and milestone achievements like obtaining a Learner's Permit. Participants gained practical skills and began envisioning their futures. Over two years, the initiative showed that consistent support, integrated services, and stakeholder collaboration can re-engage youth in education, reduce police contact, and foster a sense of capability and hope, regardless of their background or time away from school.

1.2.2 Researchers tackle affordable housing barriers in regional communities

Federation University's Future Regions Research Centre is leading an Australian-first study to address the barriers to affordable and sustainable housing in regional areas. Headed by Professors George Earl and Jennifer Martin, the project brings together researchers, industry, government, and community stakeholders to develop a model that encourages cost-effective housing developments outside capital cities. With regional Australia facing a shortfall of over 230,000 dwellings and a projected need for 900,000 new homes over the next 20 years, the study aims to identify policy, investment, and construction challenges that hinder progress.

By applying innovative tools, including machine learning, to forecast housing demand, the project seeks to demonstrate that regional housing can offer comparable returns and lower risks for investors. It also repositions affordable housing as essential infrastructure, advocating for long-term investment strategies. This initiative aligns with **SDG 1: No Poverty** by tackling housing insecurity, a key driver of disadvantage. Improving access to affordable housing in regional communities supports economic stability, health, and social inclusion, helping to break cycles of poverty. Federation's regional footprint and multidisciplinary expertise position it to lead transformative change, ensuring that housing solutions contribute to sustainable living and equitable development across Australia's diverse communities.

1.3 Operations

1.3.1 Access to low-cost services

Federation University Institute of Health and Wellbeing offers healthcare services to all students, staff and the wider community through a variety of health and wellbeing services: FedCare psychology services, health and exercise clinical centre, primary care clinic, physiotherapy clinic. These services are spread out over our campuses across the regional areas in Australia and provide help to regional communities who might not have access to these services if they were not provided at Federation University.

Throughout 2024, FedCare psychology offered psychology services to 940 clients and committed resources to helping 10 primary and 6 secondary schools with psychology services in the Ballarat region, and a further 10 schools in the Grampians region with the help of industry partners.

1.3.2 Local startup assistance

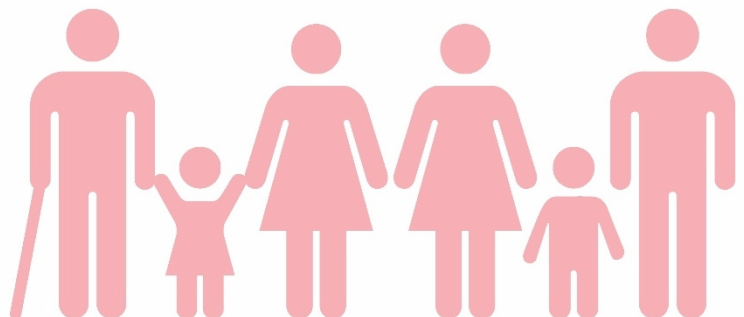
Federation University is a partner in the Runway program that is designed to help launch successful startups in regional Victoria. Since 2017, they have supported 84 startups and 243 micro businesses and corporates. Along with providing support and learning sessions for

startup owners, they have a Ballarat hub located at the SMB campus of Federation University that provides accessible and affordable office spaces for startup businesses. These spaces have the essential amenities for a successful startup.

1.3.3 Participating in government policy

Federation University has continued to strongly support and advocate for increased support from the government for students who come from disadvantaged backgrounds or are facing financial hardship or other impediments that are currently affecting their studies. During 2024 there has been an inquiry into free TAFE submitted to the Senate committee which covers the 2024 free TAFE bill to align federal government policy and procedure with free TAFE and highlights how free TAFE has improved regional education opportunities and further enhanced with the help of government support.

1 NO
POVERTY



2 ZERO HUNGER



Our university supports Sustainable Development Goal 2 by fostering food security through campus-wide food rescue initiatives, promoting sustainable consumption, and ensuring access to affordable, nutritious meals for all students and staff.

2.1 Education and Training

Federation University's alignment with Sustainable Development Goal 2, Zero Hunger, is reflected in its deeply embedded curriculum and practical training programs that directly address food security challenges across regional and agricultural communities. With 22 Higher Education course units focused on sustainable food systems, nutrition, and community wellbeing, and 101 TAFE graduates from Community Services and Cookery qualifications actively working in the field, the university is equipping a skilled workforce to support vulnerable populations, promote food literacy, and strengthen local food resilience.

This targeted education and training not only builds capacity within the region but also fosters long-term, place-based solutions to hunger and malnutrition, reinforcing Federation's commitment to inclusive, sustainable development.

2.2 Research

2.2.1 Compost promotes deeper and more productive soils

Federation University's Future Regions Research Centre (FRRRC) is undertaking field research using compost to improve soil depth, productivity and drought resilience. This work is supported by Sustainability Victoria and Elmore Organics & Compost to help develop agricultural markets for recycled organic compost products. The work contributes to several SDGs and targets including:

- promoting sustainable waste and resource management
- reducing GHG emissions from landfill and agriculture
- promoting more sustainable and efficient agriculture

Increasing yield from the same fertiliser and other farm inputs reduces the environmental footprint of food production and makes farming more financially and ecologically sustainable.

Many farming soils have shallow topsoil overlying clays that physically and chemically constrain deeper plant root growth and can reduce average yields by more than 50%. The FRRRC trials are using different tillage methods to place compost soil amendments into the constraining clay subsoils.



At the main R&D site in central Victoria the compost treatments have increased effective soil depth by a further 20-25cm and in the dry 2024 season saw crop yields in compost-treated areas increase by 30-60% over untreated areas.

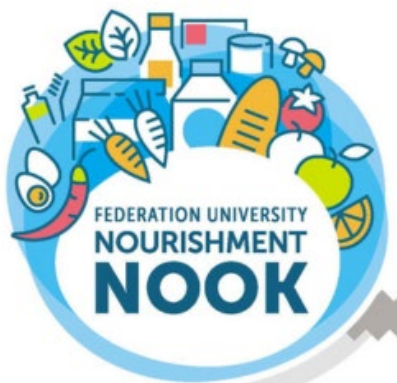
Three and a half years after application the compost is still visible in the soil and can be seen to be promoting deeper root growth. The compost is expected to persist in the soil for many years, increasing soil carbon and health.

2.2.2 Soil CRC Major Investment Round: Defining the economic and social benefits of regenerative farming systems: The economic, environmental and social benefits of regenerative agriculture have not yet been fully defined.

There is a need to better understand the interactions between the development of healthy ecosystems (such as soil health) and the production of high-quality food and fibre. This project develops a framework that can be used to assess a wide range of economic and social impacts of agriculture, allowing comparisons among different approaches. The project uses a case study design that has been used to quantify the effectiveness of regenerative farming systems to improve soil performance across defined soil and climate constraints. It will address the question of the potential of economic, social and environmental co-benefits of adaptive regenerative farming management and how this is specifically linked to healthy soil practices.

2.3 Operations

2.3.1 Helping reduce student hunger



After establishing the Nourishment Nook and partnering with Food Bank in 2023 we have continued to provide free, confidential, and healthy food options on campus for students currently experiencing food insecurity across all of Federation University's locations throughout 2024. Over the last year, at least 1000 students made use of the service. With the ongoing partnership and generous food donations from staff and students, the nourishment nook can continue to provide food for students in need. Federation Nourishment Nook also hosts the Student Cookbook, a collection of easy to prepare healthy meals created by students for students.

2.3.2 Sustainable food at Federation

Cafes at Federation serve a wide range of hot and cold, freshly prepared, low-cost food available for both staff and students, including vegan, vegetarian, halal and gluten-free food options. The cafes are open from 8:30-3:00 on weekdays during teaching periods. There are additional catering options available for functions and other events booked at the university that serve hot and cold food along with drinks.

2 ZERO HUNGER

3 GOOD HEALTH AND WELL-BEING



3.1 Education and Training

As our biggest institute in Higher Education, the **Institute of Health and Wellbeing (IHW)** focuses on delivering industry-relevant health courses through teaching, research, collaboration, and engagement with the health sector. They emphasise practical learning with clinical placements and workplace opportunities, ensuring students can apply their knowledge in real-world settings.

IHW's staff conduct impactful research that supports evidence-based practices on local, national, and international levels, while also considering the unique needs of rural and regional areas. The institute offers flexible study options and various pathways from undergraduate to postgraduate levels, aiming to support students in building or advancing their health careers.

Their teaching approach is student-centred, providing high-quality learning experiences that align with contemporary health needs. The courses are nationally accredited, contributing to high employment rates for graduates.

During 2024, Federation University had 1,555 students graduate with a qualification in health professions across all University campuses and at TAFE we saw 911 total students graduate.

Many of our students studying within the health field complete practical placements with local health organisations. In 2024, we had 5953 health placements contributing over half a million hours of student placement to these organisations.



3.2 Research

3.2.1 Research-Led Health Innovation in Regional Victoria: THRIVE Program

Federation University's **THRIVE (The Healthy Regions Intervention)** program is making a significant research-driven impact on chronic disease prevention and management in regional and rural Victoria. THRIVE is led by a distinguished team of researchers whose work is shaping both local practice and global health policy.

Key Research Contributions and Leadership

- Distinguished Professors Colette Browning and Shane Thomas, along with Professors Fadi Charchar and Britt Klein, are spearheading the initiative. Their collective expertise spans behavioural science, cardiovascular health, and digital health interventions.
- The program integrates Motivational Interviewing (MI) techniques into clinical practice, a method backed by extensive research to support lifestyle changes in patients at risk of or living with chronic conditions.
- THRIVE builds on the Happy Life Club model, previously implemented in China, where it received a China National Health Innovation Award—demonstrating the global relevance and recognition of Federation's research.

Impact on Practice and Policy in the past 18 months

- Over 127 Victorian healthcare professionals have been trained in MI, with plans to double this reach, embedding evidence-based behavioural change strategies into frontline care.
- The program supports management of conditions such as cardiovascular disease, hypertension, diabetes, respiratory disorders, mental health issues, and cancer—targeting modifiable risk behaviours like poor diet, inactivity, smoking, and substance use.
- THRIVE has contributed to international hypertension guidelines and produced over 70 peer-reviewed publications, reinforcing its role in shaping clinical standards and informing public health strategies.

Embedding Research into Education and Community Health

- Federation physiotherapy students now receive advanced MI training, ensuring future practitioners are equipped with cutting-edge behavioural health skills.
- Partner organisations include Silverchain, Ballarat Community Health, East Grampians Health Service, and others, reflecting strong regional collaboration and knowledge translation.

3.3 Operations

3.3.1 Student Support Services

Not only are we specialists in educating in health, but we prioritise it for our staff and students. This exists across an array of initiatives that mean coming to campus is the best place to be.

Federation University offers a comprehensive range of support services to help students succeed both academically and personally. Key services available include:

- **Counselling Services:** Professional counselling is available to support students with personal, academic, or mental health issues.
- **Health Services:** On-campus health services provide medical care and advice.
- **Disability Support:** Assistance for students with disabilities to ensure equal access
- **Financial Support:** Scholarships, grants, and financial advice
- **Accommodation Services:** Support with finding and securing both on-campus and off-campus housing.
- **International Student Support:** Dedicated services to help international students adjust and thrive.
- **Chaplaincy:** Spiritual support and guidance for students of all faiths.
- **Student Advocacy:** Assistance with academic and administrative issues.
- **Safer Campuses:** Initiatives to ensure a safe and inclusive environment.
- **Clubs and Groups:** Opportunities to join various student clubs and groups to enhance social connections and skills

"At Federation University we approach the student experience holistically, giving our students access to more than just a means of completing their studies."

"Our students are often juggling multiple priorities, including family, work, and study. Ensuring that our students have access to education on healthy food, exercise and wellbeing practices is essential for their overall wellbeing and academic success."

Federation University Australia Chief Learner Experience Officer, Samantha Bartlett

These services are designed to create a supportive and enriching environment for all students.

3.3.2 Mental Health Support

Prioritising student and staff wellbeing is a top priority at Federation University. That is why we provide a wide range of both paid and free physical health and mental well-being services for staff and students to access.

Professional counselling/psychology services are provided on campus with expert support to help with mental health concerns, personal or relationship issues, academic stress, trauma and loss issues, wellbeing concerns and life transition/adjustment concerns.

Case Study: FedCare Impact

Throughout 2024 FedCare offered 6,645 completed sessions, serviced 940 clients and provided psychology outreach programs to 10 primary schools, 6 secondary schools across the Ballarat region. Fedcare's partnership with The One Tree Resource Centre provided psychology support to 18 schools in the Grampians region. FedCare's partnered with the Ballarat and Ararat District Aboriginal Co-op has provided 125 hours of mental health care throughout 2024 to the BADAC community, this has resulted in funding for a clinical placement

and a new clinical registrar position. Fedcare's partnership with the Grampians Health Assessment clinic has provided better access to psychological services and assessment too the Ballarat community, we are proud to announce that this agreement has been extended for an additional 12 months so we can help ensure access to psychological services is available to those who need it.

3.3.3 FedWell

FedWell Fest launched in 2024 and is a free event featuring a variety of activities centred around the themes of being active, wellness, and healthy eating.

Throughout the week, students can look forward to a range of activations, including free exercise classes, yoga sessions, and at the university's Mount Helen campus in Ballarat, there will also be a cooking demonstration from popular Youtuber and media personality 'Nat's What I Reckon'.

Recognising the importance of healthy nutrition and physical activity for mental health, academic success, and overall wellbeing, Federation University is committed to addressing this important need within the student community.

3.3.4 Staff Support

Much like our students, every member of staff is unique, so there is no one size fits all to promote a healthy working environment. Wellbeing and support services available to our staff include:

- **Employee Assistance Program (EAP):** Offers free, confidential counselling available 24/7 for personal or work-related issues. Staff can access up to four free sessions per year
- **Health and Wellbeing Resources:** Includes access to health services, mental health support, and initiatives to promote physical and mental wellbeing
- **Flexible Work Options:** Policies to support work-life balance, including flexible work arrangements
- **Training and Development:** Opportunities for professional growth and development through various training programs
- **Safety and Wellbeing Services:** Comprehensive health, safety, and wellbeing services to ensure a safe and supportive work environment
- These services aim to create a supportive and healthy workplace for all staff members.

3 GOOD HEALTH AND WELL-BEING

4 QUALITY EDUCATION



At Federation University, our commitment to Sustainable Development Goal 4, quality education, drives everything we do. We're proud to offer a diverse range of learning opportunities as a dual sector University that meet the needs of today's workforce and prepare our students for the challenges and possibilities of tomorrow.

4.1 Education and Training

In 2024, 12,520 students were enrolled in higher education programs at Federation University, with 3,215 graduates completing their studies. The university also welcomed 4,855 new students, including 1,726 first-generation students—those who are the first in their family to attend university. Federation delivers education across higher education and TAFE, offering undergraduate, postgraduate, and vocational training.

For the seventh consecutive year, Federation was rated Australia's number one university in Australia for First-Generation Student Enrolments, with 50% of the student cohort taking the pioneering step into higher education.

In the 2024 Good university Guide we earned a five-star rating for Skills Development, with 83% of undergraduates positively rating their skill growth during their studies. The university also maintained its number one ranking in Victoria for social equity and student-to-teacher ratio, reinforcing its commitment to inclusive, high-quality education.

Discipline-specific excellence was also highlighted:

- #1 in Australia for Overall Education Experience in Law & Paralegal Studies
- #1 in Victoria for Overall Education Experience in Health Services and Support, Science and Mathematics, Social Work, and Creative Arts

The 2025 Times Higher Education World University Rankings (based on 2024 data) placed Federation University in the top 401–500 universities globally and was one of only four Australian universities to improve its global ranking. This advancement was driven by strong performance in:

- Research Environment
- Research Quality
- International Outlook
- Industry Engagement

4.1.1 Academic Support

We offer a wide range of programs and services designed to help both commencing and continuing students succeed with their education goals.

- **Studiosity:** this is a free online service that is always available to help students improve their study skills by talking to expert tutors about any questions they have about their study.

- **Peer-assisted Study Sessions:** the PASS program brings together groups of students and a mentor to help them understand the course content and help them develop their study skills.
- **Learning skills advisors:** LASs are a group of professional educators who are available online or in person and will assist with a variety of educational problems.
- **ASK desk:** the ASK desk is operated by a group of academic leaders who can provide help with exam preparation, professional writing skills, help with general study, general assignment tips and preparation.
- **FedReady:** this is an optional non-awarded course that helps commencing and continuing students develop or enhance their academic study skills that will help them succeed. The content consists of units each designed to help improve their education journey with units including time management, professional writing, how to submit assignments and more.

4.1.2 Student retention

Throughout 2024 our commitment to increasing student retention by listening to the valuable and insightful feedback our students provide about the way teaching is done and our continued implementing and expanding on our work placement opportunities and collaborations with local businesses in multiple fields that allows students to gain practical experience in a workplace related to their chosen area of study has resulted in a noticeable decrease in student attrition from 2023's value of 18.1% down to 13.3%. This shows further progress towards our goal of achieving a 2% year-on-year reduction in student attrition and demonstrates that we are making an impactful difference.

4.1.3 Graduate Outcomes

We saw a total of 2,357 students in Higher Education graduate across a wide range of subjects. Our graduation numbers per subject are: 44 in arts and humanities, 151 in business economics, 831 in clinical, pre-clinical and health, 154 in computer science, 419 in education, 146 in engineering and technology, 20 in law, 29 in life sciences, 108 in physical sciences, 227 psychology and 228 students in social sciences. 67.20% of student graduates were female and 32.12% were male, with 0.68% as other.



4.2 Research

4.2.1 AVETRA -Strengthening VET Researcher Connections to VET Policymaking: Project 2: Role of industry in teaching and learning:

This project aims to understand the problems facing industry relations with VET and the way relations between the two are currently managed and conceptualised with the goal of creating a greater understanding around how the voice of industry can best work alongside VET as equal partners rather than VET being viewed as a 'servant' of industry.

The projects main goals aimed to highlight the different ways industry can be defined and conceptualised across VET.

- Present and outline the range of roles industry can perform in VET.
- Explore and outline the ways in which industry can be involved with the delivery of education.
- Identify key models that could be implemented into the existing Australian/Victorian system.

To explore this topic and help uncover some solutions the project involved a range of activities: the review of existing academic literature and grey literature (existing models and case studies), a review of the current Australian study models, information about VET and teaching collaboration at a local level and a look at high level industry involvement consisting of both international and Australian data.

During July 2024 two conferences were held to present the findings, each presenting different ways industry can be conceptualised. These conferences were the NCVER 'no frills' conference covering VET partnerships: Powering a dynamic workforce this conference was held in Perth while the second was presented virtually during the 'Thinking globally and acting locally' conference of UALL/SCUTREA held in London.

4.3 Operations

Federation University's dual-sector offerings are designed to connect students with local industries earlier in their academic careers, acquire skills through paid placements, and find pathways to impactful employment in their regions. This model is particularly beneficial for regional students, as it helps address local skill shortages and supports regional development.

4.2.1 Preparing the education leaders of the future

In 2023, Federation University partnered with the Victorian Government and local schools to deliver an [Initial Teacher Education \(ITE\) program to the Wimmera region](#).

This initiative is part of the university's broader commitment to improving access to education in regional areas and addressing local skill shortages. This program is designed to enrol education support staff already working in local schools, allowing them to continue working while they study.

This approach not only bolsters the teaching workforce in the Wimmera but also enhances the chances of students staying and working in the Horsham area once they are qualified. The impact this program is having is critical for this region, where post-secondary participation, literacy and numeracy rates are some of the lowest in Australia. Programs like this are

contributing to breaking the cycle of inter-generational welfare dependency and high unemployment.

Quotes attributable to Minister for Education, the Hon. Ben Carroll MP

"This initiative provides an accessible path for experienced education support staff to transition into the teaching workforce."

"We're proud to be supporting schools in the Wimmera region to grow their pipeline of passionate and committed teachers who are already part of their school communities".

4.2.2 Free TAFE

In 2024, Federation University's expansion of [FREE TAFE](#) places resulted in a significant increase in enrolments to 1685 Free TAFE course enrolments, including in qualifications such as the Certificate IV in Training and Education.

Across Free TAFE Courses

- 6% of students have a disability.
- 40% are female.
- 25% from low socioeconomic backgrounds
- 3.5% are Indigenous.

Free TAFE programs not only lead to pathways into undergraduate education but are essential to filling skills shortages. Ballarat and Gippsland post-secondary participation rates are below the national average, the uplift in demand we have seen in these courses is evidence in removing barriers to education drives a measurable impact.

4.2.3 Public lifelong learning

Federation University hosts an array of events available to the public, like orations, innovation breakfasts, and public lectures, to encourage collaboration and innovation with our community.

In 2024, we hosted a series of public events to enhance the communities and regions in which our campuses are placed.

Other public events included:

- Albert Coats Oration- Award-winning writer and journalist, Grantlee Kieza OAM, keynote address
- Menzies Oration – Kim Williams AM, Renowned media executive and chair of the ABC
- National Centre for Reconciliation, Truth, and Justice annual lecture
- business events to engage employers and partners with the Federation Co-operative Model of education, and
- Ballarat Old Gaol Tours as part of the Ballarat Heritage Festival.

4 QUALITY
EDUCATION

5 GENDER EQUALITY



Federation University is committed to fostering a safe, inclusive and equitable environment for all staff and students. We actively promote diversity and gender equality by ensuring equal opportunities across academic and leadership roles.

In 2024, 3,312 women commenced a higher education degree at Federation, including 1,150 first-generation students, a testament to our role in expanding access to university education. That same year, 1,584 women graduated, representing 67.2% of our higher education graduating cohort.

These outcomes reflect our ongoing efforts to create pathways for women and first-generation students to thrive, and to build a university community where everyone has the opportunity to succeed.

5.1 Education and Training

5.1.1 Women in trades up at TAFE

Data at Federation shows that due to a growing need for skills and the removal of learning barriers encourages more women to seek a trade qualification, this increase is helping to address the gender gap in TAFE fields of work. The number of women in TAFE is expected to continue to grow as the Federal Government has pledged \$8.6 million to deliver the Australian Skills Guarantee, this pledge is going towards helping grow the number of women in TAFE and hopes to achieve its goal by 2030.

The effect of the increase is showing with the number of women studying electrotechnology Electrician programs having doubled since 2019. Additionally, the number of women enrolled in early childhood education programs has effectively doubled year on year, and women now make up the majority of enrolments in this sector. Contributing factors for these increases are the free TAFE program, organisational promotion of TAFE and trade programs from organisations like the National Association of Women in Construction and Tradeswomen Australia. Improving working equality conditions are also contributing to the increase of women in trades.

5.1.2 Women and girls in STEMM

Federation University is actively involved in the Athena SWAN initiative through the Science in Australia Gender Equity (SAGE) collaboration program. This national program promotes gender equity and diversity in Science, Technology, Engineering, Mathematics, and Medicine (STEMM). The university achieved Bronze Accreditation in 2020, recognising our commitment to improving gender equity. The accreditation process involved a comprehensive self-assessment, data collection, and analysis to identify barriers to



gender equity. See further: [Women in STEMM thriving with Federation University's equality pledge | Times Higher Education](#).

Federation's Ballarat Tech School is also addressing the underrepresentation of girls and women in science, technology, engineering, and math (STEM) with their annual [Girls in STEM program](#). The program provides young women with access to mentors, experiences and skill development in a focused and supported environment. In 2024, we had 60 students from local and regional schools engaging with local industries and STEM professionals over eight full-day workshops across the year.

5.2 Research

5.2.1 Empowering Women in Casey through Co-Designed Physical Activity Programs

Federation University, in partnership with the Active Communities team at the City of Casey, led a research project to identify barriers and co-design physical activity programs that support women's health and wellbeing. The project delivered evidence-based insights that directly informed council decision-making, resulting in the strategic redesign and development of local programs to increase physical activity participation among women.

Evaluation results showed that, on average, women in the study increased their physical activity levels and their physical health significantly improved. These findings highlight the tangible health benefits of accessible and inclusive programming.

The research significantly influenced local council policy and investment, addressing barriers such as access, affordability, childcare, and cultural inclusion. One key outcome was a co-designed water safety program for multicultural women, which included female facilitators, childcare support, and subsidised fees. This created a culturally safe space and a sustainable pathway to swim lessons.

The project also led to the creation of the Physical Activity Network Facebook group, after participants highlighted that many women were unaware of existing programs such as #CaseyGirlsCan. This new communication platform was launched to better reach and engage women through more accessible and relevant channels.

By involving women in the design process, the project fostered ownership and community connection, supporting long-term participation. The co-design model has proven essential in creating inclusive, lasting opportunities to improve the health of women across Casey.

5.2.2 1000 Rural Women Project

Rural women in Australia contribute significantly to their communities and industries, at the same time facing unique challenges and opportunities that may not apply to males living in rural and remote locations. The Lived experiences of 1000 rural women in Australia project is being led by CheekyMac Productions, a Gippsland based production company, who approached the Collaborative Evaluation and Research Centre (CERC) to develop a national survey that will shed light on important topics faced by rural women living, working, and raising families around the country.

The survey gathered data on the following topics: gender inequality, rurality, employment, childcare, tall poppy syndrome, gender bias, domestic and family violence, natural disasters and community connectiveness. Open ended responses were analysed with themes and quotes presented on feminism, accessing healthcare services, natural disasters and role women play, and collective shared stories of life as a woman in rural Australia. The findings are from the 1,000 Rural Women Survey, the largest and most comprehensive national study of women living in Australia's rural, regional, and remote areas.

Of the 1,000 participants surveyed, 41 per cent felt they lacked the same opportunities for career advancement as men, and women aged 30-39 and 50-59 expressed scepticism about receiving equitable professional prospects, revealing a concerning generational divide.

The survey also examines a wide array of critical issues, including natural disasters, health and domestic violence, societal attitudes, racial prejudice, Tall Poppy Syndrome, community life, leadership, and the importance of female role models.

The survey's findings will shed light on the critical topics faced by rural women living, working, and raising families around the country. The survey results will be used to inform the documentary and it is hoped it will also help shape policy.

The documentary – expected to be released in 2026 – will use the statistical analysis to highlight the personal journeys of regional women, showcasing how they overcome adversity, discover their purpose, challenge limitations and lead innovatively in their communities.

Quote attributable to Professor Joanne Porter, Director Collaborative Evaluation & Research Centre (CERC)

"Rural women remain the invisible backbone of Australia, often working full-time jobs, while caring for children and elderly parents and volunteering in their communities. This study is about bringing their contributions out of the shadows – and recognising the vital role they play in driving our nation forward."

5.3 Operations

Our priorities



1. Increase the diversity of our staff and students, at all levels and in all disciplines.



2. Create equal opportunities for all.



3. Inform and empower our leaders.



4. Remove discrimination and systemic and individual biases.

We measure our gender equity targets through a comprehensive framework of Key Performance Indicators (KPIs) and reporting mechanisms.

The university has developed a Gender Equality Action Plan (GEAP) for 2021-2025, which includes specific KPIs aimed at achieving gender equity across all levels, including executive management. By setting targets for equal gender representation, particularly focusing on senior academic and

executive management positions, the university aims to increase the percentage of women in senior roles. Regular workplace gender audits are conducted, and progress is reported to government bodies as required by the Gender Equality Act 2020 (Victoria).

5.3.1 Policy at Federation

Another way gender equality is supported at Federation University is through policy implementation. The Equal Opportunity and Valuing Diversity Guidelines policy outlines the way all opportunities and positions must be accessible by all people, it also covers inclusivity and ensures that diversity targets are met. There are additional policies that cover the prevention of sexual harassment, and non-discrimination that strictly prohibit any such discriminatory action, these policies contain the procedure to correctly report any discrimination so that it can be dealt with using the proper channels.

Federation University delivers a range of initiatives to influence change and to create an inclusive and respectful environment for students of all genders.

These include:

- development of the Respectful and Inclusive Communities Action Plan
- development of the Accessibility Action Plan
- implementation of the FedPride Strategy
- Respect Month, March 2023, including events, training and launch of action plans
- Training initiatives, on gender-based violence
- Streamlining student applications for adjustments in Work Integrated Learning
- Trans Awareness Week, flying the trans flag for the first time in 2022

5.3.2 Safety and Respect on Campus

Federation has a zero tolerance policy towards sexual harassment and assault with regard to both students, staff and all visitors to campus. In response to acting on the National Student Safety Survey in 2022 Federation University held its second consecutive year of Respect Month in March 2024 as a response to this and assisted in raising the visibility of the support services and reporting channels available through Student Equity and Inclusion and increasing awareness of the behaviours we foster within our University.

Some of the programs and initiatives launched in 2024:

- Art Competition A creative opportunity to explore and express themes of respect through visual art.
- Lunchtime Fun & Games Interactive sessions held across campuses to build community and raise awareness in a relaxed setting.
- Consent Conversations with Free Fries Informal discussions about consent, paired with a casual campus snack event.
- Bystander Conversation Forum A facilitated discussion on how individuals can safely intervene and support respectful behaviours.
- Coffee Scrolls, Not Gender Roles Morning tea events focused on challenging gender stereotypes and promoting inclusive dialogue.
- Speed Friending A social activity designed to help students connect quickly and build new friendships.
- Movie Screening A thought-provoking film (The Feminist in Cell Block Y) shown at FedLiving to prompt reflection and discussion.

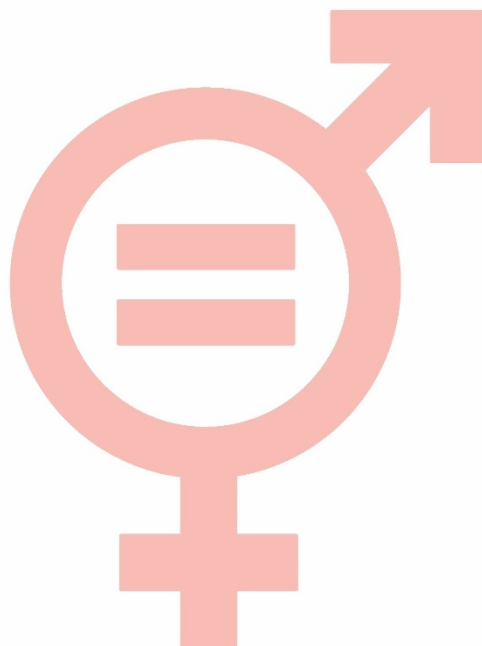
- Respect@Fed: Our Communities. An online training module designed to deepen understanding of respectful behaviours and community responsibility.
- Staff Resources Practical tools and guidance for staff to support students, respond to disclosures, and make appropriate referrals.

5.3.3 Parental support at Federation.

Federation university offers up to 26 weeks off paid parental leave for primary caregivers and additional unpaid leave options available in case of unforeseen circumstances for staff who have children. In addition, there are childcare services available at the Mt Helen campus in Ballarat for staff with young children. There are also leave and support services/arrangements for staff who are experiencing family violence, this time off allows them to seek legal advice and resolve the issue without work stresses.

Additionally, flexible work arrangements are available for primary caregivers who need specific or flexible work hours such as part-time work, remote work, flexible hours. These arrangements are tailored to the specific needs of the caregiver and allow a healthy balance to maintain a healthy professional work life balance. There is additional long service leave and annual leave given to staff ensuring they have the necessary time off if needed. By providing these services and arrangements the university demonstrates its commitment to equality.

5 GENDER EQUALITY



6 CLEAN WATER AND SANITATION



6.1 Education and Training

Federation University is actively contributing to Sustainable Development Goal 6: Clean Water and Sanitation by embedding water-related sustainability into its curriculum and practical training. Across its higher education programs, 23 units directly align with SDG 6, equipping students with the knowledge and skills to address water management challenges. This commitment extends beyond the classroom, with students completing over 533 placement days in collaboration with key industry partners such as Central Highlands Water and East Gippsland Water. These placements provide hands-on experience in sustainable water practices, reinforcing the university's role in preparing future professionals to support resilient and equitable water systems.

6.1.1 Co-Op Partner spotlight: Central Highlands Water

CHW is committed to supporting and representing the communities we serve. One of the ways we do this is by working with a number of local educational and support agencies to provide opportunities for workplace training, pre-employment exposure and experience, and early career support and placements.

As we strive to nurture talent within our region, building a thriving and innovating workforce and culture, we offer student placements through our Co-Operative Partnership with Federation University. In 2024 we welcomed two undergraduate students into our ICT & Digital division. These students became part of the team, gaining hands-on experience while contributing fresh perspectives, and improving collaboration.

6.2 Research

6.2.1 Snowy Hydro Co-Funded Scholarship: Improving the Reliability of Streamflow and Water Level Forecasting using Artificial Intelligence Techniques

Student: Sandhya Eswara, Supervisors:
Prof. Andrew Barton, Dr. Tanveer
Choudhry, Dr. Thomas Chubb

The growing hydrological needs of populations across the globe in addition to the drastic impacts of climate-change demand mechanisms for efficient and reliable water resources management. Streamflow is a key indicator of surface water levels, making it an important variable for making important decisions pertinent to water resources. This project



focuses on developing a robust predictive system for forecasting streamflow over the medium to large term forecast horizon using information from key predictors including, precipitation, temperature, snow depth, snow density, snow water content, and antecedent streamflow. Specifically, the predictive framework is based on a long- short term memory (LSTM) network, which forecasts future streamflow over horizons ranging from two-eight weeks on hourly resolution. Results from the developed system validate it's forecast performance, hence making it an important reference point for future work on enhanced streamflow forecasting horizons.

6.2.2 Bioaccumulation and Magnification of Pharmaceuticals in Australian Waterways & Terminal Lake Systems:

Research Lead: Federation University

Project Partners: Deakin University, and Greater Western Water

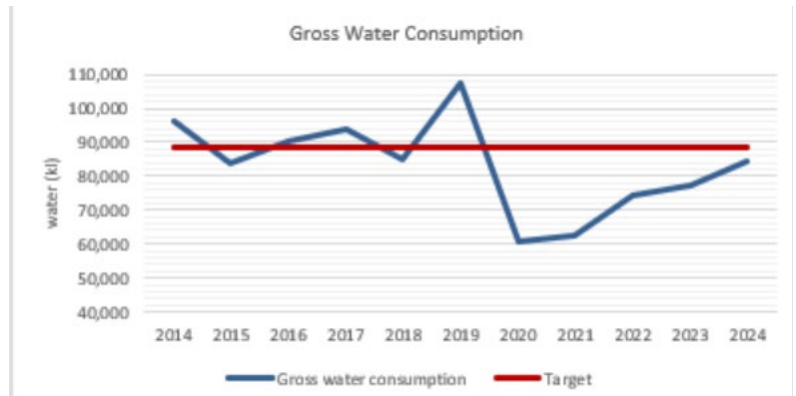


Pharmaceuticals have become emerging pollutants in Australian waterways, primarily entering through wastewater streams. Even at low concentrations, drugs like carbamazepine (anti-epileptic), tramadol (pain relief), and venlafaxine (anti-depressant) have been shown to disrupt gene expression, behaviour, and growth in aquatic species. However, long-term ecological and health impacts remain poorly understood. Our study aims to ensure our regional ecosystems remain unspoiled through (1) An in-depth food web analysis of the ecosystem at Lake Colac to ensure low levels of pharmaceuticals remain contained in the water and do not affect the whole ecosystem; and (2) provide green solutions for removing pharmaceuticals from wastewater using plants (phytoremediation) that can then be reused in circular economy approaches.



6.3 Operations

During 2024 we saw campuses return to pre pandemic levels with staff and students. Whilst water consumption was higher than 2023 we consumed 84,432L but were below the yearly target of 88,266 litres of water. By being below our target, the university has saved 3,834 litres of water from being used.



6.3.1 Water conservation measures

Western campus

Federation University's western campuses have installed dual flush toilets to reduce water wastage in the bathrooms and limited real time water metering for an accurate water measurement and control. Posters in kitchens and bathrooms promote intelligent and sustainable water usage practices.

Gippsland campus

The Gippsland campus has implemented water-efficient devices like dual flush toilets, water restrictors to save on water use, and waterless urinals. A timed irrigation system is also in place to use reclaimed stormwater to hydrate plants. A collection of rainwater tanks supplies water to gardens, washing machines for student living and is also used for car washing. The cooling tower has also been upgraded to improve campus water efficiency, along with leak detection and real time monitoring via IOTA data loggers to minimise water wastage. Posters in kitchens and bathrooms promote intelligent and sustainable water usage practices.

Berwick campus

The Berwick campus has installed water-saving shower heads and dual flush toilets in fedliving/residential spaces to help reduce water wastage on campus. The fedliving /residential irrigation system operates using a timer to ensure the plants are hydrated but also ensuring water is not wasted, the water for the irrigation system comes from reclaimed stormwater stored in rainwater tanks so clean drinking water is not used. Campus water usage is also monitored in real time to check for any potential leaks via the Water Wise Group. Posters in kitchens and bathrooms promote intelligent and sustainable water usage practices.

6.3.2 Water pollution control measures

Western campus

To prevent chemical pollution a specific lab wastewater treatment process is in place to ensure that any lab water does not contaminate the surrounding environment or make its way into the regular wastewater drain system without being properly treated first, for storage before treatment there are specific lab wastewater tanks. To prevent damage to native plant/tree species no destructive herbicides/pesticides are used and there are dedicated bays for car/

equipment cleaning with appropriate drainage in place to collect the runoff water, this ensures that it does not drain onto plants or trees causing damage.

Gippsland campus

For stormwater management on the Gippsland campus there are gross pollutant traps installed in stormwater tanks to prevent pollution from entering the water, detention dams and swales are also installed for effective stormwater management on campus. Chemical storage is done through specialised tanks and follows lab management protocols for safe chemical handling, all sinks connected to labs are linked to harmful chemical neutralising tanks to prevent harmful chemicals from entering the wastewater stream, and standard grease traps are installed campus wide in kitchen sinks to catch any pollutants. For plant/wildlife management environmentally friendly fertilisers and herbicides/pesticide products are used to ensure no harmful chemicals are introduced, additionally, like the Western Campus dedicated vehicle and equipment wash bays are installed with the proper wastewater management systems.

Berwick campus

The Berwick campus has neutraliser pits, grease traps in sinks and stormwater/wastewater backflow prevention systems installed to reduce wastewater. All chemical free stormwater is directed into a retention pond and swale drain for effective stormwater management. Chemical safety handling protocols are also implemented and adjusted depending on the situation to ensure safe handling, storage and disposal of chemicals or chemical contaminated wastewater. Plant and wildlife management is implemented through the use of environmentally friendly herbicides/pesticides to prevent damage to the native environment/wildlife. Vehicle and equipment cleaning is done off site using external contractors.

6 CLEAN WATER AND SANITATION





At Federation University ensuring that active research into clean and affordable energy is continued as the world advances is an important goal for the transition to fully renewable energy sources, as we continue to make progress towards our net zero goal by 2030.

7.1 Education and Training

7.1.1 Asia Pacific Renewable Energy Training Centre

Federation University Australia is strengthening its capability to support the renewable energy industry in Gippsland with the expansion of its Asia Pacific Renewable Energy Training Centre (APRETC) to Eastern Victoria. It comes as energy experts converge on the region in September for the Gippsland New Energy Conference in Traralgon to explore the latest innovations in renewable industries.

APRETC will become a central hub for the delivery of renewable energy training and research in Gippsland, with a more than \$2.6 million investment from industry partners Corio Generation, OSMI Australia, Iberdrola Renewables Australia and Origin x RES. This will fund 300 scholarships over the next 10 years, worth \$1.6 million, for students studying in the areas of Engineering, Business, Information Technology, Data Science, and Environmental Science, beginning from 2025.

It will also support renewable energy research and repurposing spaces at Federation's Gippsland campus in Churchill, where energy partners, researchers, students and the community can collaborate.

APRETC was first established at Federation's Mt Helen Campus in Ballarat in 2021 in collaboration with industry and government, and supports the wind energy sector with specialised training. APRETC is certified by the Global Wind Organisation and is the first facility in Australia to provide specialist training from a 20-metre-high replica wind tower. In Gippsland, APRETC will provide training, education and research to support renewable technologies, including hydrogen, geothermal, wind, and solar, along with the transmission, storage and social licence for renewable projects.

7.2.3 Our new energy programs

Many of our course offerings, particularly those in business, IT and science, prepare students to tackle the transition to new energy. All of our engineering degrees, for instance, focus on circular economy and sustainability, and our business degrees follow the United Nations' Sustainable Development Goals teaching strategy to ensure all graduates are able to focus on sustainability.

Some of our current programs with a particular focus on new energy transition include:

Short courses

- Basic Safety Training Course provides essential GWO working safely at heights training for those looking to work on a wind farm, either in its construction or as a part of the long-term maintenance of a turbine.
- Global Wind Organisation Standard globally certifies trade qualified students with a passion for the renewable energy sector to work on wind turbines as a technician.

Technical and Further Education (TAFE)

- Certificate III in Electrotechnology Electrician enables apprentices to apply for an A Grade Electrical Licence through an approved Energy Safe Victoria examination process.
- Certificate III in Engineering – Composites Trade is Australia's first defined pathway for people to enter the wind generation industry as blade repair technicians.
- Global Wind Organisation Standard – Basic Technical Training – prepares participants with the necessary training to perform basic hydraulic, mechanical, electrical, bolt tightening and installation tasks.
- Diploma of Engineering – Technical prepares students to become technicians highly skilled in turning energy into power and motion.

Bachelor degrees

- Bachelor of Engineering (Electrical and Information Engineering) (Honours) provides in-depth knowledge and skills across the interdisciplinary domain of electrical and information engineering.
- Bachelor of Engineering (Mechanical) provides in-depth knowledge about energy conversion, and wind energy in particular.
- Bachelor of Information Technology (Professional Practice) gives students an understanding of how to deliver large-scale and complex IT projects including those in new energy, through a combination of study and practical industry experience.

Postgraduate Certificates

- Graduate Certificate in Community Energy and Micro-Grid enables students to progress their careers in the energy sector, learning from leaders in energy research.

Postgraduate by Coursework

- Master of Engineering Project Management enables students to build in-depth knowledge and skills to plan and execute major projects across the construction, infrastructure, development and energy sectors.
- Master of Engineering Technology (Renewable Energy and Electrical Power Systems) enables students to advance their careers as professional engineers with the required analytical, technical and leadership skills in renewable energy and electrical power systems.
- Master of Applied Cybersecurity prepares students with the skills and knowledge critical to the IoT technology underpinning remote monitoring of solar and wind energy assets, among other applications

7.2 Research

7.2.1 Waste heat recovery for the onsite production of hydrogen utilising microgeneration and machine learning.

CSIRO Industry PhD Program,

This innovative project, launched in March 2025, addresses SDG 7 (Affordable and Clean Energy) and SDG 9 (Industry, Innovation, and Infrastructure) by transforming waste heat from industrial processes into a clean energy source—hydrogen. Through the development of a

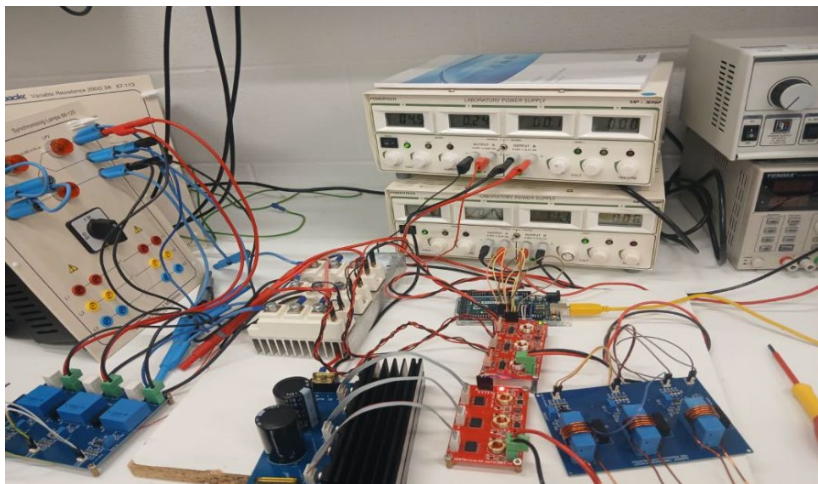
microgeneration plant powered by a novel high power-to-size ratio gas expander, the initiative captures low-grade heat typically lost in industries such as food processing and petrochemicals. The recovered energy is then used to generate electricity for on-site hydrogen production, utilising both electrolyzers and waste heat. Advanced thermodynamic modelling and machine learning techniques are employed to optimise system performance and maximise hydrogen yield. The project achieves environmental and economic benefits by enhancing energy efficiency, reducing greenhouse gas emissions, and presenting a viable business case through techno-economic modelling. A prototype system will be tested at Meredith Dairy, paving the way for broader industry adoption and the generation of intellectual property. This collaborative effort between CSIRO, Federation University, and regional industry strengthens Australia's innovation ecosystem and supports its transition into the hydrogen economy.

7.2.2 REACH Project Snapshot

OZTRON Energy Pty Ltd – Trailblazer, Recycling and Clean Energy Commercialisation Hub (REACH) Intelligent Power Inverters for Future Community Micro grids.

Intelligent Power Inverters for Future Community Microgrids

Prepared By: Dr. Md Liton Hossain, Post Doctoral Fellow, Federation University Australia



Federation University's Recycling and Clean Energy Commercialisation Hub (REACH) is driving innovation in clean energy systems, directly contributing to United Nations Sustainable Development Goal 7: Affordable and Clean Energy. Through the development of intelligent, grid-forming inverters, the

research supports the creation of resilient microgrids in communities with limited or unreliable access to traditional power infrastructure. These inverters use a hybrid control system that significantly improves harmonic performance and dynamic load response, making them suitable for sensitive electrical environments. The integration of real-time monitoring and adaptive control technologies ensures both reliability and scalability, with systems ranging from 8kW to 24kW and compliant with key international standards.

The research has demonstrated a reduction in total harmonic distortion to below 3%, delivering clean and stable energy outputs. Beyond technical excellence, the project has strong social and commercial relevance—supporting Australia's clean energy transition and offering practical solutions for off-grid and remote communities. By aligning advanced engineering with community needs, the REACH initiative exemplifies how targeted research can deliver scalable, sustainable energy technologies with real-world impact. Its potential for commercial rollout further reinforces Federation University's leadership in applied clean energy research.

7.3 Operations

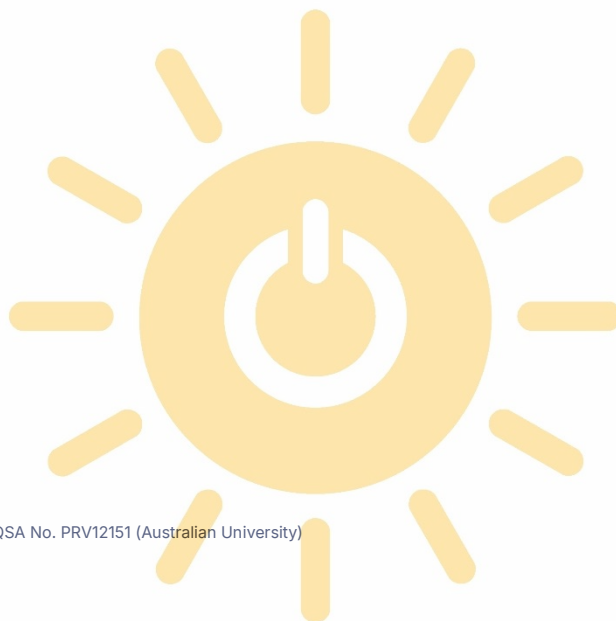
7.3.1 Sustainable power at Federation

At Federation University ensuring that we are a power efficient organisation is very important throughout 2024 a total of 62,515 kwh of energy was generated from green solar energy sources, these panels are installed at the Mt Helen, SMB and Stawell campuses and help reduce the reliance on fossil fuel power generation.

We have committed to reaching net zero emissions by 2030, to follow though on this, the towards net zero 2030 plan was implemented in 2021 and outlines the key principles needed to reach net zero in the short, medium and long term.

- Invest in assets and resources consistent with net zero targets to ensure funding and infrastructure is available to help switch existing systems over to environmentally friendly ones.
- Prioritise the uptake of new and proven renewable energy sources mainly the installation of solar and battery storage technologies on existing buildings across all campuses.
- Implement an electrification program, convert the vehicle fleet to electric vehicles, including the installation of electric charging stations in carparks and swap over systems that rely on fossil fuels for more environmentally friendly systems.
- Adopt best technology practices to reduce energy usage. Develop decision making criteria and procedures centred around reducing energy usage and converting to green energy sources.
- Implement virtual energy networks, enable power to be shared between campuses by connecting them together and balancing the power load evenly via the use of solar panels, reducing energy costs for the university.

7 AFFORDABLE AND CLEAN ENERGY



8 DECENT WORK AND ECONOMIC GROWTH



8.1 Education and Training

8.1.1 Co-Operative Model of Education

Federation University's Co-operative Education Model is making a tangible contribution to SDG 8: Decent Work and Economic Growth by integrating real-world experience into academic learning and strengthening regional workforce development. In 2024, the model rolled out courses in Business, Information Technology and Arts. In 2025 a further 15 Higher Education courses will be in market, and we aim to be a fully co-op university by 2026.

These courses supported 59 student placements across key disciplines, engineering (4 placements), science (10), information technology (24), and business (21), providing students with hands-on experience directly aligned with their field of study. These placements are embedded within coursework, ensuring students graduate with both theoretical knowledge and practical skills, integrating work into their course without extending the length of study. Strategic partnerships with industry leaders such as IBM, Ernst and Young, Accenture and Kyndryl, are just some of the partners our students have placements with.

Beyond individual student outcomes, the Co-op model plays a vital role in growing regional economies. By partnering with local businesses to host placements, Federation supports workforce development in regional areas, helping businesses access emerging talent and build capacity. The university also works closely with industry stakeholders to identify evolving skill needs, ensuring that its programs remain responsive to labour market demands. This alignment between education and employment fosters inclusive economic growth, supports job creation, and ensures students are prepared for meaningful careers in a rapidly changing world.

8.1.2 Student Placements in Community

Outside of the co-operative model in health and education, we still see student placement making an impact in the community and local economies. With nearly 10, 000 student placements within the year and almost half of which are in nursing.

Academic Group
Placements



8.2 Research

8.2.1 Creating Inclusive Work Environments through Leadership and Management Innovations

The Collaborative Evaluation & Research Centre (CERC) in partnership with the Victorian Skills Authority (VIC) and Federation TAFE aims to create inclusive work environments in the construction and manufacturing sectors by introducing leadership and management innovations. The output of this project is expected to contribute to addressing challenges in these sectors related to attraction, retention, and completion of apprenticeships.

The leadership and management innovations will be developed through a codesign process with stakeholders of the construction and manufacturing sectors, registered training organisations, employees and their associations, and the government. The innovations will be a package of leadership and management learning materials that will be delivered in formal learning settings.

8.3 Operations

8.3.1 Ararat Jobs and Technology Precinct

In 2024, the Ararat Jobs and Technology Precinct is driving transformative regional impact through a collaborative partnership between Federation University, Ararat Rural City, local industry, and the community. The precinct is fostering innovation and economic growth by connecting national and global networks to solve rural challenges, particularly in agriculture, advanced manufacturing, health, and the circular economy. Key initiatives include the development of tools like GrainSupp, which uses AI and blockchain to improve grain traceability, and partnerships with international agribusiness leaders such as ITC.

The precinct also supports workforce development through expanded coworking spaces, Free TAFE programs, and localised training in early childhood education and care. These efforts are helping to build a skilled, future-ready workforce while supporting inclusive access to education and employment.

8.3.2 Co-op model helping to reduce placement poverty.

With the implementation of the Co-op model here at Federation students have access to paid placements of varying lengths during their studies, given the ever rising cost of living and other financial pressure some students simply cannot afford to study without an income but by offering internships students who previously may not have been able too can now complete their studies, increasing the number of skilled people entering the workforce. Additional support is available for low SES students like deferred class payments and government support.

Case Study: IBM Partnership

Th Federation-IBM collaboration has had a remarkable impact on the Ballarat region and the University:

- IBM has become an integral part of the University's education offering – deep collaborative partners in the university's efforts to design and teach relevant courses, link to industry, and ensure graduates are job-ready.*

- IBM has employed 300-plus of the University's 400 Bachelor of IT Professional Practice) graduates in that time, and 70 per cent were still at IBM seven years later.
- 90 per cent of the University's IT graduates have found employment in the region, up from less than 40 per cent in 2001.

In totality, A 2020 economic impact statement assessed that the Federation University and IBM partnership, as part of the Park, had contributed \$125 million to GDP, \$62 million to household incomes, and 716 full time equivalent jobs.



8.3.3 Upholding excellent employment practices.

As one of the leading employers across multiple regional cities it is vital that Federation University upholds employment practices to a high standard. We continue to follow the Enterprise agreement that was renegotiated with the NTEU on the 21st of December in 2023 and sets standards for employment like adequate and equal wage payments, time off, workload balance, equal opportunities and staff benefits. Federation University also has policies in place to prevent any workplace discrimination or unfair treatment; these also apply to third party workers.

8 DECENT WORK AND ECONOMIC GROWTH

9 INDUSTRIES, INNOVATION AND INFRASTRUCTURE



9.1 Education and Training

9.1.1 Innovation led infrastructure

Federation University opened the Morwell innovation centre in Gippsland in 2021 and provides a space that welcomes innovative ideas and promotes collaboration across all levels of education and training, higher technology research and businesses interested in commercial development.

In 2024, the innovation centre hosted a mix of industry project teams focusing on transformative projects, university research partners and private sector commercial tenants. The tenants include: Alinta Energy, Opal, Committee for Gippsland, Gippsland Climate Change Network, Australia Regional AI Network, and Latrobe Health Assembly.

With support for both on site and remote projects the Morwell innovation centre is a flexible space for achieving new breakthroughs, building networks, and enabling innovative solutions that boost economic growth, the centre also hosts public events for potential tenants and the public such as the Innovation Series breakfast events with local partners, and the 2024 Festival of Big Ideas to empower young entrepreneurs, foster innovation, and support local businesses adapting to the changing regional economy.

Providing support for innovation and industry growth, the University technology parks provide a space for technological innovation to flourish and prosper in dynamic and supportive environments. These fast-evolving precincts encourage and support the development of emerging and existing technology-oriented enterprises.

9.1.2 The Federation Co-operative Model

Federation University is on its pathway to become Australia's first fully Co-operative (Co-op) university. It is at the heart of our strategy and our identity within the regional communities in which we operate.

Federation Co-op gets students work and world ready, by partnering with employers to offer paid placements, career preparation and workplace skill development, supported by a leader in student support, skills development and social equity.

Our industry stakeholders are excited about Federation Co-op as it addresses skill shortages by inviting them to collaborate on our courses, to identify the real skills that our students need to succeed in their chosen industry.

For our communities, Federation Co-op will drive the growth of our regional economies by developing talented local graduates who understand exactly what our regional businesses need. Federation has the know-how to deliver Co-op through our award-winning relationships with industry, including our 25+ year partnership with IBM, and our extensive research into the co-op model's success in the USA, Canada and Europe for generations of students.

9.2 Research

9.2.1 Sustainability as a core strategy

Professor Harpinder Sandhu from Federation University Case Study on Sustainable Development.

The Remei AG and bioRe® case study exemplifies transformative progress towards SDG 9 by fostering sustainable industry, driving agricultural innovation, and strengthening rural infrastructure. Remei AG, a Swiss textile company, established bioRe® India Ltd and bioRe® Tanzania Ltd to create a transparent, fair-trade supply chain for organic cotton. This initiative directly supports 5,598 smallholder farmers, providing guaranteed market access and premium payments, which enhances financial stability and empowers local communities.

Innovation is at the heart of bioRe®'s strategy. The organisation invests in research partnerships with FiBL (Switzerland) and the University of Agricultural Sciences (India) to develop and trial non-GMO organic cotton seeds, advancing agronomic practices and improving yields. Regular farmer training and extension services ensure the adoption of cutting edge organic techniques, pest management, and certification standards. These efforts not only boost productivity but also build local capacity for sustainable agriculture.

Infrastructure development is evident in bioRe®'s integrated approach. The company supplies high-quality seeds and organic inputs, operates efficient procurement systems that collect cotton directly from farms, and ensures timely payments. Extension teams work at the village level, providing year-round support and facilitating the transition from conventional to organic farming. This holistic model strengthens agricultural ecosystems, supports inclusive growth, and demonstrates the potential of North-South cooperation in building resilient rural economies.

By embedding sustainability into its core business, Remei AG and bioRe® contribute to the advancement of SDG 9, showcasing how ethical industry practices, innovation, and infrastructure investment can drive economic, social, and environmental progress in developing regions. Their approach offers a replicable blueprint for other sectors seeking to align with the United Nations Sustainable Development Goals.

9.3 Operations

9.3.1 Tech Parks – The impact of partnership

Partnering with industry and co-locating work, research and training is at the heart of the co-op model. Either across the 29 hectare area at Mt Helen, or the reimaged precinct in the heart of Ballarat City, or at Churchill in Gippsland, you are supported with close proximity to Federation University Australia and major regional cities with easy access to Melbourne.

Federation University Technology Parks continue to thrive and prosper and make a very significant contribution to the regional economy.

At the Federation University Technology Parks, the spirit of innovation and entrepreneurship enables techno-driven businesses to thrive and prosper in dynamic and supportive

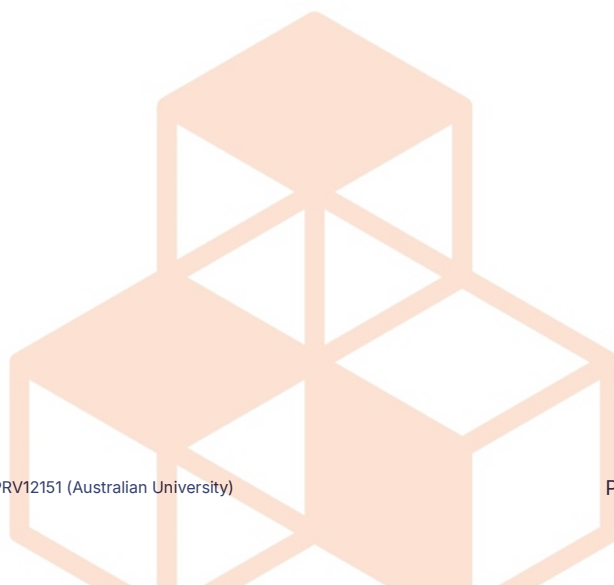
environments. These fast-evolving precincts encourage and support the development of emerging and existing technology-oriented enterprises.

Fifty-nine enterprises use the Federation University Technology Parks, including Ernst & Young, Concentrix, IBM, Emergency Services Telecommunications Authority, Primary Health Care, Fiona Elsey Cancer Research, WIN Network, Grampians Health, and Southern Cross Austereo.

The Parks' ideal locations provide great lifestyle opportunities as well as having the convenience of being close to Melbourne and major regional cities.

- Established in 1995, the Federation University Technology Parks currently host - 2,200 private sector employees across 59 enterprises.
- The sites are located in MT Helen, Ballarat CBD, Churchill and Morwell
- 1:1 jobs generator
- \$100 million in capital assets
- 30,000m² across ten core buildings
- \$700.5 million per annum in industry value added to Australia.
- \$476.1 million per annum in industry value added to local Ballarat LGA
- 2,200 FTE direct positions at Federation University Technology Parks
- 4,712 in FTE employment added to Australia nationally.
- 3,766 in FTE employment added to local Ballarat LGA
- Largest regional Technology Park in Australia

9 INDUSTRY, INNOVATION AND INFRASTRUCTURE



10 REDUCED INEQUALITIES



Federation University is committed to providing equal opportunity and freedom from discrimination and harassment for all members of the Federation community, and to creating an environment that reflects and values the social and cultural diversity within Federation community and the communities it serves.

Inclusion is at the heart of who we are, as a leader in equity with a large cohort of students from Low Socio-Economic Students (SES) backgrounds, first in family, female, Indigenous and living with a disability.

10.1 Education and Training

10.1.1 Reducing inequality in access to education

Federation provides numerous pathways to access higher education and vocational courses, along with more than 200 types of scholarships to reduce the financial burden of study. The Federation University Foundation scholarships were established in 2013 and are delivered in partnership with industry, government, community and staff. Thanks to the generosity of our donors, in 2024 we awarded a record 254 scholarships totalling \$859000.

We support students with lower ATAR results through pathways to entry and transition from TAFE through to Higher Education courses, equip them with additional skills, and offer opportunities to "earn and learn" through the Co-op model.

10.1.2 Student equity and inclusion

Our Student Equity and Inclusion team spent 2023 leading the development of the university's Respectful and Inclusive Communities Action Plan 2023-2026 (RICAP).

The RICAP is a comprehensive, university-wide strategy aimed at realising Federation University's goal to embody and exemplify the principles of respect, inclusion, belonging, equality and responsibility at all times.

The RICAP applies an intersectional lens to all planned actions to ensure that the University:

- Promotes and fosters a safe, inclusive environment
- Accommodates and celebrates student and staff diversity
- Creates and embeds into its institutional policies, practices and approaches to teaching, learning and research, equivalent opportunities for academic success, regardless of individual backgrounds, (dis)abilities and/or identifications.

The RICAP's key actions and initiatives align with established measures that Federation University has taken to prevent or respond to in a timely and appropriate manner to incidences of sexual harm in university-related contexts and issues identified in the 2021 National Student Safety Survey. The RICAP incorporates input from students and staff, building upon lived experience and extending our existing quality frameworks for safety, diversity and inclusion.

The RICAP takes into consideration and builds upon existing strategies and action plans:

- FedPride Strategy 2021–2024
- Gender Equality Action Plan 2021–2025
- Accessibility Action Plan 2024–2026 Procedures and Guidelines
- Equal Opportunity and Valuing Diversity Guidelines
- Guidelines for responding to a disclosure of sexual harm
- Complaint procedures for students and staff
- Student and staff codes of conduct
- Training modules for staff in: prevention of bullying; prevention of discrimination and harassment
- Training module for students in: Equal Rights are Your Rights

10.1.3 FedPride

FedPride 2021–2024 is a comprehensive strategy, aimed at achieving the best inclusive practice in every area of university life: from recruitment and enrolment, to our culture, campuses, how we engage with the communities where our campuses are located and importantly through our curriculum and research.

We know that diversity, having access to and embracing difference in backgrounds, perspectives, knowledge and skills, gives our university a breadth that supports innovation and the highest quality of thinking. It enriches us as individuals and as a community. FedPride has a particular focus on our staff and students being able to bring their whole selves to university life. When we feel safe, included and celebrated, we contribute freely and with enthusiasm and bring the best of ourselves to work and study.

FedPride is an intersectional strategy, in that the rights, inclusion and access of people from diverse cultural backgrounds, people with disability and Aboriginal and Torres Strait Islander Peoples are held as core to every impact area.

FedPride 2021–2024 has been developed with consultation across the University. The strategy is led by the FedPride Steering Group and implemented and monitored by the Implementation Group. Reports to measure progress will be provided annually for the Vice-Chancellor's Senior Team.

10.1.4 Indigenous Education

Incorporating First Nations custodians into organisational culture is strategically vital for fostering inclusivity, diversity, and reconciliation. Federation University is an education provider that enables the cultural security of Aboriginal and Torres Strait Islander staff and students. Aboriginal and Torres Strait Islander people will be empowered to succeed, and Aboriginal and Torres Strait Islander knowledge and cultural practice will be firmly embedded within the University environment. Indigenous representation at the highest levels, such as on University Council and through Indigenous Professors, ensures that decision-making processes are informed by diverse perspectives and cultural insights, promoting equity and respect.

10.1.5 Aboriginal Education Centre

The Federation Aboriginal Education Centre actively engaged and supported the University's 314 Aboriginal and Torres Strait Islander students in 2024 (185 – TAFE, 129 – Higher Ed) with a range of activities and events designed to nurture the ambitions of our Indigenous students.

- Nine major procedures amended to be cultural inclusive of the needs of Aboriginal and Torres Strait Islander students
- Expressions of Interest from 20 Aboriginal and Torres Strait Islander peoples for Cert IV in Training and Assessment (seven enrolments)
- Hosted 60 local Aboriginal and Torres Strait Islander youth for Aspiration Day
- Conducted an intensive 5-day Junior University Camp for 25 year 9, 10 and 11 Aboriginal and Torres Strait Islander youth focusing on TAFE, HE and employment
- Ballarat and District Aboriginal cooperative (BADAC) partnership to support 14 students to undertake the Diploma of Business (Leadership), working with Fed's Aboriginal Education Centre (AEC) to support the group.

Federation also continued its close collaboration with the First Peoples Assembly of Victoria and the Yoorrook Justice Commission to support their work on Treaty and Truth in Victoria, and with local Indigenous community groups.

10.3 Operations

10.3.1 Commitment to equity at the highest level

Federation's commitment to inclusion and equity is recognised at the highest level through our governance structure, which establishes an Inclusion Committee as a subcommittee of the Federation University Council. The Inclusion Committee is responsible for advising the Council with respect to matters of inclusion, equity, gender equality, diversity and multiculturalism.

10.3.2 National Centre for Reconciliation, Truth and Justice

2024 was the second year of operation for our [National Centre for Reconciliation Truth and Justice](#). It serves as a hub for fostering understanding, dialogue, and collaboration between Indigenous and non-Indigenous communities, driving systemic change.

The Centre proudly led national and regional advocacy on inclusion and reconciliation through engagement with communities across Australia on the referendum on a First Nations Voice to Parliament.

In 2024, we created the inaugural National Centre for Reconciliation, Truth, and Justice Public Lecture Series. We held three lectures during the year – Professor Dennis Foley spoke on Indigenous business at Ballarat in March; Jesse Fleay spoke on constitutional reform at Berwick in June; and Professor Emma Lee spoke about cultural engagements at Morwell in September. In December, we co-hosted two conferences, "Class, Race, Place: Exploring Intersectionality for Access to Higher Education Globally", with the Alliance of Working-Class Academics and "Barriers to Truth-Telling", with the Australia Centre at the University of Melbourne. Both conferences were co-convened by Professor Gavin. We have again been highly successful in obtaining research funding from many sources, including ARC, philanthropic, and government, with our current grants totalling over \$13 million.

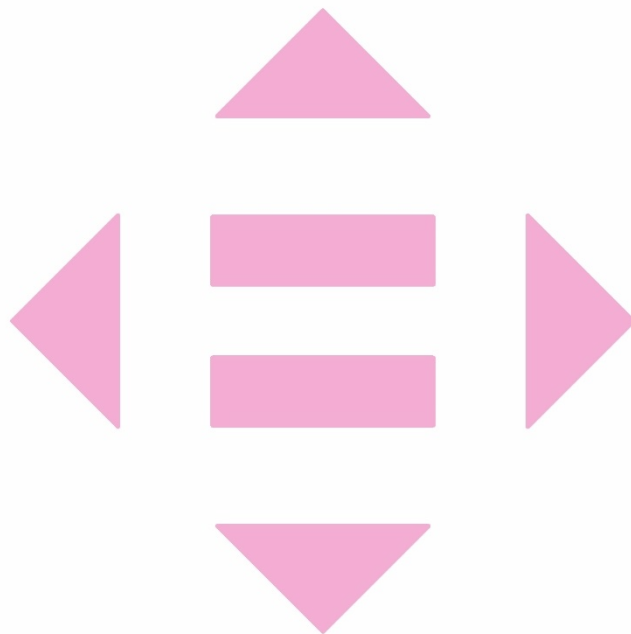
10.3.3 Class, Race, Place: Exploring Intersectionality for Access to Higher Education Globally Conference

Professor Emma-Jaye Gavin and the National Centre for Reconciliation, Truth, and Justice, in partnership with the Alliance of Working-Class Academics, co-hosted the "Class, Race, Place: Exploring Intersectionality for Access to Higher Education Globally" Conference on December

6, 2024. The online conference included two keynote addresses, a series of conference presentations, and a panel discussion.

The first keynote was delivered by Professor Jay Phillips (Monash University) on “Truth-telling for colonial contexts: Intersectionality, silencing, and equitable access”. The second keynote was delivered by Gavin Brewis (Scottish Poverty and Inequality Research Unit, Glasgow Caledonian University) on “Intersections of class, identity, and institutional power within Scottish education system”. The conference presentations were delivered by academics and research students from across Australia, Aotearoa NZ, England, and Scotland, and contained intersectional themes, such as class, race, sexuality, gender, migration/asylum, and location.

10 REDUCED INEQUALITIES



11 SUSTAINABLE CITIES AND COMMUNITIES



11.1 Education and Training

11.1.1 Culture at Federation

Located in the heart of Ballarat, amongst beautiful heritage buildings at our Camp Street arts and community campus offers courses for visual arts and performing arts to Federation students. Our arts academy has had the honour of providing training to some of the best world leading performers. The arts academy is integrated in Ballarat's local community, often working closely with the Ballarat art gallery and local council for local art exhibitions and performances.

An example of community work is during the annual heritage weekend, when historical buildings are opened to the public alongside performances and exhibitions of historical art and culture showcases that bring Ballarat's vibrant history to life for all to experience. When not hosting an event our art galleries showcase the wonderful artwork of our current students alongside the galleries collection of high-quality artworks from mostly Australian artists dating all the way back to 1909 there are also art pieces and sculptures from Federation alumni students and University art staff.

These galleries provide the Ballarat community with a vibrant and enriching cultural experience, allowing students to showcase their works to the public.

11.2 Research

11.2.1 Ararat Rural City Council, Informing sustainable urban expansion in Victoria

"Informing the protection of biodiversity in expanding rural towns of Victoria: a case study in Ararat"

This project is in collaboration with Ararat Rural City Council, and aims to create a framework for sustainable expansion, which will holistically determine how development can be implemented to integrate wildlife biodiversity outcomes, benefit the community, and achieve local development goals. The culmination of this work will result in:

- a methodology to achieve biodiversity conservation objectives through collaboration between local government, scientists, and the community, and
- an output which can be used in the ARCC planning scheme to inform sustainable expansion.

This overarching goal will be achieved through addressing the following aims, and sub-aims:

1. Determine the baseline biodiversity of wildlife:
2. Determine which factors influence the biodiversity of wildlife:
3. Understand the moderators of biodiversity protection by local governments, specifically:
 - a. Local government policy, strategy and other planning frameworks.
 - b. The opinions, values and experiences of local experts and stakeholders

4. Create a framework and output for biodiversity conservation by local governments.

To date the project has achieved the following outcomes:

- The development of a new Environmental Sustainability Strategy for ARCC (<https://www.ararat.vic.gov.au/environmental-sustainability-strategy-2024-2034>)
- Preliminary results which demonstrate:
- a wide variety of mammal, bird and frog species across the township and nearby regional park.
- The importance of certain landscape attributes varies across taxa: e.g. mid story vegetation is important for mammals as a source of food and habitat.

11.2.2 Measuring the success of smart city initiatives

Federation University researcher and CeRDI PhD candidate Rida Mazhar is developing a smart city evaluation tool tailored for regional cities, using Ballarat as a case study. The tool will help cities with populations between 50,000 and 200,000 assess their readiness and performance in becoming smart cities. It includes two frameworks: one to measure resource availability and another to evaluate outcomes against sustainable development criteria. This initiative directly supports SDG 11: Sustainable Cities and Communities by promoting inclusive, resilient, and sustainable urban development.

Mazhar's research emphasises a human-centric approach to smart cities, integrating digital infrastructure, governance, and community values. The tool enables city leaders to monitor progress, refine strategies, and ensure that technological advancements align with regional heritage and lifestyle. By preserving traditional values while enhancing urban functionality, the project fosters community acceptance and long-term sustainability.

The work addresses a global challenge: the migration from regional to metropolitan areas due to limited services. By equipping regional cities with tools to improve infrastructure, planning, and service delivery, the project supports decentralisation and reduces urban congestion. Ultimately, it empowers regional communities to thrive independently, contributing to more balanced and sustainable national urban development.

11.3 Operations

11.3.1 Post office gallery

The Post Office Gallery is committed to providing an outstanding educational resource and presenting an innovative exhibition programme, encouraging diverse audiences while creating strong links with the local and broader community.

The Gallery's changing exhibition program features a broad range of work by Federation University's Arts Academy students and staff, local, emerging and internationally recognised Australian contemporary artists and recent acquisitions from Federation University's extensive Permanent Art Collection. Our vision is for the Post Office Gallery to be a vibrant, evolving centre for the creation and presentation of contemporary art.

A unique learning and teaching facility, the Gallery also provides the opportunity for mentoring of visual arts students in professional gallery and museum practice. Over 2024 the gallery has featured multiple exhibitions of artworks from both current Federation students and local artists.

11.3.2 Flexible communities

At Federation University providing flexible working and study arrangements for our staff and students is very important to us. Staff can prearrange flexible working hours to fit around other commitments and the option to work from home is available for certain roles and positions.

Students have study flexibility as most higher education classes have multiple time slots for in person classes, allowing students to fit their study arrangements around work or other commitments. Online delivery of classes is also available for students who cannot travel to campus.

11.3.3 Sustainable housing for students

Federation University provides students with the opportunity to live on campus at the Ballarat, Gippsland and Berwick campuses. This is available to students who live out of town and may need to travel far to study or for other reasons, cannot find accommodation locally and is provided at affordable rates. Depending on location the university provides multiple accommodation options to fit students needs. All places have amenities provided including a shared laundry and indoor shared community spaces. Short stay accommodation is also available for students on placements (4 weeks max). Accommodation is also available for visiting academics and professionals in a separate section. (waiting on reply for specifics around gallery exhibitions)



11.3.4 Regional community collaboration for sustainability

We have been actively working with local governments to plan and develop sustainable communities while continuing to follow our towards net zero 2033 plan to build a sustainable future. Through these partnerships and collaborations Federation has been able to provide expert advice addressing key decisions and transitions to help foster economic growth, further enhance community wellbeing and build a more sustainable future. The university is committed to ensuring these partnerships deliver real positive change to the regions it serves.

11.3.5 University libraries

Providing students with the tools and resources they need to succeed and thrive throughout their studies is important to us at Federation University, the library is a key resource to help accomplish this goal, with locations at MT Helen, SMB, Gippsland, Berwick and Wimmera, these locations are open from 8:30-5:00 most days and provide students with a quiet place to study and collaborate on shared projects. The library houses a wide range of physical and digital text books, encyclopaedias, informative texts, equipment as well as laptops and more that students and staff with a library membership or student ID can borrow. The library also serves as a help desk for students and can provide assistance with general matters or help contact the correct department for more specific matters. The library website serves as a digital centre for all library information providing access to study support, subject guides, FedCite referencing tool and borrowing digital textbooks.

11.3.6 Place of Being

We are committed to creating culturally significant campuses that honour Aboriginal and Torres Strait Islander heritage. In 2024 we launched outdoor space, *Warulung*, meaning "Our place" in Gunaikurnai language, at the Gippsland Campus provides a safe, welcoming environment for Indigenous staff, students, and community members to connect to Country and celebrate culture. Developed in partnership with Traditional Owners and Indigenous artists, the site supports spiritual practices, ceremonies, and cultural events. Featuring symbolic elements like clan shields and fire pits, Warulung reflects deep respect for Indigenous heritage. Similar *Places of Being* have been established at Ballarat and Wimmera campuses, with Berwick to follow in 2025.

11 SUSTAINABLE CITIES AND COMMUNITIES

12 RESPONSIBLE CONSUMPTION AND PRODUCTION



12.1 Education and Training

The university is making a measurable impact on SDG 12 through targeted education and industry collaboration. In 2024, 173 graduates from renewable energy and engineering programs and 219 from service industries and environmental studies at TAFE have entered the workforce equipped to drive sustainable practices. With 63 academic units directly linked to SDG 12, students gain critical knowledge in resource efficiency, circular economy, and sustainable systems. These efforts are amplified by numerous strategic co-op partnerships in the energy sector, ensuring that learning is grounded in real-world application and innovation. Together, these initiatives foster a skilled graduate community capable of advancing responsible consumption and production across industries.

12.2 Research

Federation University is always working to reduce the amount of waste generated one of our key research examples in energy reduction are our research centres, CfNETR (centre for new energy transition research) is dedicated to delivering new and sustainable ways to generate store and transmit power throughout communities by focusing on four main research streams.

12.2.1 [Empowering farmers with better water insights during drought](#)

Researchers from Federation University's Centre for eResearch and Digital Innovation (CeRDI), in collaboration with the Future Regions Research Centre, are developing an innovative dam water forecasting tool to support farmers in drought-prone regions. Funded through a \$1 million grant from the Australian Government's **Future Drought Fund**, the project is part of the Victoria Drought Resilience Adoption & Innovation Hub, one of eight national hubs aimed at enhancing drought preparedness. CeRDI is leading the development of a web-based portal that integrates real-time data from 12 monitored farm dams across Victoria, providing farmers with accessible insights into dam performance under varying seasonal conditions.

This tool empowers landowners to make informed decisions about water use, land planning, and drought mitigation—such as destocking or modifying dam infrastructure—based on forecasted water availability. By enabling smarter resource management and reducing waste, the project directly supports SDG 12: Responsible Consumption and Production. CeRDI's role in designing user-friendly digital platforms ensures that critical environmental data is translated into practical, on-farm action. The initiative not only strengthens regional resilience but also promotes sustainable agricultural practices, contributing to long-term environmental stewardship and more efficient use of natural resources.

12.2.2 [Exploring the challenges and opportunities for livestock industry](#)

Federation University PhD candidate Priyambada Joshi is leading a global study to explore how traditional livestock farming can adapt to the rise of plant-based and cultivated meat alternatives. With global food systems shifting to meet sustainability goals, the study

investigates how innovations in meat production can coexist with traditional practices, ensuring farmers' livelihoods are protected. By examining beef production models in the US, Brazil, and France, the research identifies environmental, economic, and social challenges, and proposes sustainable business models that integrate cultivated meat into existing systems. This aligns with **SDG 12: Responsible Consumption and Production** by promoting more efficient, ethical, and low-emission food systems. The study aims to support a just transition for farmers, recognising their role in feeding communities while addressing concerns around environmental impact and industry innovation. It seeks to balance tradition and technology, ensuring food production remains sustainable, inclusive, and resilient for future generations.

12.2.2 Circular Economy Innovation Fund : Gippsland Circular Futures Initiative

The Gippsland Circular Futures Initiative (GCFI) sought to address identified gaps in Circular Economy knowledge and foster collaboration among a wide range of Gippsland Small to Medium Enterprises (SMEs) to drive innovative and sustainable practices. During the program 66 Participants were engaged in the project over 4 workshops. The action plans developed through the program are expected to lead to 35.55t of avoided waste and 126.7t of Green House Gas (GHG) emissions avoided through the project. The project took place on the 16th, 23rd and 30th of October 2024. Businesses also had the opportunity to volunteer for case studies that showcase the businesses circular economy journey, providing recognition and promotion of local enterprises demonstrating forward thinking leadership skills and commitment to a more sustainable future. The project is delivered by GCCN in partnership with Federation University and support from the Victorian Government's Circular Economy Capability Building Fund.

12.3 Operations

12.3.1 Recycling on Campus

During 2024 the university's waste tracking resource measured tracked a total of 585,512kg of waste generate throughout the year across all campuses with 154,488kg of waste successfully recycled that is below our 2024 target of 282,000kg. This means that 73% of overall waste generated was landfill and 27% of waste generated was recycling.

Initiatives like the Victorian Container Deposit scheme was rolled out in the latter portion of the year and have seen an impact, especially in library and dining areas in changing student and staff behaviours and encouraging recycling.

Water consumption during 2024 was 84,432 litres, this is below our 2024 target of 88,266 litres. Gas usage was 72,698 megajoules and the total gas emissions were 40,59 tonnes a decrease from 2023s measurement of 5,246 tonnes.

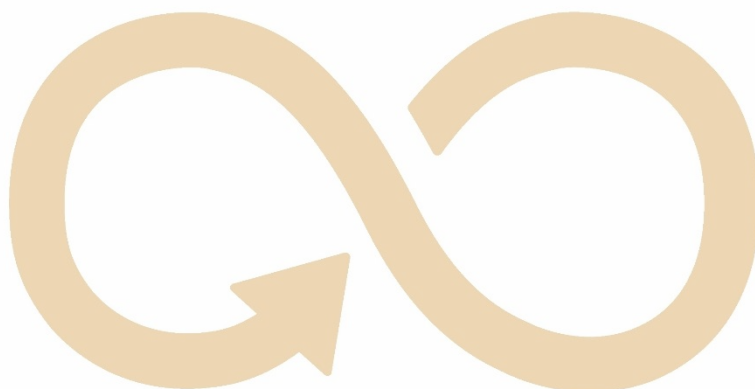


12.3.2 Fedliving sustainability

Campuses that have fedliving student accommodation on site have waste reduction measures in place. While these measures may seem small, it all adds up to a large impact on reducing waste. Currently, students who live on campus are asked to do the following to reduce waste:

- Reduce the number of single use plastic containers, plates, cutlery, etc that are used and swap to alternatives that can be washed and reused.
- Recycle any plastic that can't be reused properly and place organic waste in the appropriate compost bin instead of the regular waste bin.
- Decide to actively cut down on consumption of single use items and managing resources correctly like taking shorter showers, using sustainable containers/plates and using electricity responsibly.
- Participate in the container deposit scheme in Victoria where 10-cents are refunded for every eligible can that is returned to collection points.

12 RESPONSIBLE CONSUMPTION AND PRODUCTION



13 CLIMATE ACTION



13.1 Education and Training

Federation University is playing a key role in Victoria's clean energy transition by helping coal workers reskill for careers in the emerging offshore wind sector. In collaboration with EnergyAustralia, Southerly Ten, and TAFE Gippsland, the university supported the development of a training guide mapping coal industry roles to offshore wind jobs. Backed by the Victorian Government's Clean Economy Workforce Capacity Building Fund, the guide outlines local training pathways, some requiring less than six months, to prepare workers for roles like wind turbine technicians. This initiative supports a just transition, ensuring regional communities are equipped for sustainable employment in a net-zero future.

We provide 75 higher education units that have an involvement/in providing education to students on climate action, this can be in the form of information presented in the lectures or through assignments. Short certificates are also available, Carbon Literacy Training is a short certification partnered with Swinburne, The University of Queensland and Deakin University. When students finish studying the material for the certificate, they take an assessment and make a pledge to reduce carbon emissions wherever they can so they can become certified as carbon literate.

13.2 Research

Federation University is leading Victoria's transition to clean energy by advancing microgrid technology through a prestigious ARC Future Fellowship awarded to Associate Professor Jiefeng Hu. With nearly \$1.2 million in funding, the four-year project will develop intelligent power converter systems to improve energy resilience and efficiency in community microgrids. These decentralised systems allow local energy generation and sharing, reducing reliance on fossil fuels and enhancing stability during grid disruptions. By integrating renewable sources like solar and wind, the project supports Australia's shift to a net-zero future and positions Federation as a key innovator in sustainable energy infrastructure and workforce development.

13.2.1 Empowering rural communities facing climate disasters

Federation University's Professor Bindi Bennett is contributing to a national initiative aimed at strengthening the psychological resilience of rural communities facing climate-driven disasters. Funded by a \$5 million Medical Research Future Fund grant, the project, **Psychological Wellbeing, Resilience, Preparedness and Adaptation in Rural Communities for Extreme Weather**, will be rolled out across New South Wales, South Australia, and Western Australia. It builds on a successful pilot in Ebor, NSW, which helped bushfire-affected residents prepare emotionally and practically for future events.

The program addresses the growing mental health impacts of climate change, including stress, grief, and anxiety, particularly among young people. It equips communities with coping strategies before, during, and after extreme weather events, fostering peer support and

collective preparedness. Professor Bennett brings a First Nations perspective, ensuring cultural relevance and inclusivity.

This initiative aligns strongly with **SDG 13: Climate Action** by enhancing community-level adaptation and resilience to climate-related hazards. It goes beyond physical preparedness, recognising the emotional toll of disasters and promoting sustainable mental health support. By empowering rural populations to respond proactively to climate risks, the project contributes to long-term resilience, reduces vulnerability, and supports equitable climate adaptation across Australia's most at-risk regions.

13.2.2 Community panel sought on mine lands future

Federation University Australia researchers are seeking participants in a Community Panel to discuss the future uses of the land surrounding the Latrobe Valley's disused coal mines.

Over the past 18 months, Federation University and the CSIRO, funded through the Cooperative Research Centre for Transformations in Mining Economies (CRC-TiME), have been working with mine operators, government agencies and Traditional Owners to determine what future land uses might be possible once coal mining for power generation comes to an end in the Latrobe Valley. The panel will be made up of 30 people who will take part in sessions throughout October and November including site visits and the opportunity to ask project partners questions about mine rehabilitation, environment, economic development, planning, social services and new energy.

The outcomes of these deliberations, including preferences and concerns for the future land use options, will help contribute to future strategic planning in the Latrobe Valley region and the licensees' mine closure plans.

As part of the project, the researchers, led by Federation's Associate Professor Jess Reeves and the CSIRO's Dr Tira Foran are also working with an Indigenous Reference group co-facilitated with the Gunaikurnai Land and Waters Aboriginal Corporation and delivering a Youth Design Summit in collaboration with the Gippsland Tech School.

Federation University Associate Professor Jess Reeves

"As regions across the world transition to renewable energy, the legacy sites of old power generation and what benefit can be gained beyond their current purpose needs to be considered."

"There are excellent examples we can draw from around the world, but it is important to open this conversation up to the community of the Latrobe Valley to understand what they would like their future to look like and what opportunities there are to heal country whilst providing prosperity for future generations and acknowledging the contribution that the Latrobe Valley has made to powering Victoria."

13.3 Operations

13.3.1 Towards net zero 2033

The towards net zero 2033 plan demonstrates our commitment to a sustainable future by laying out the short medium- and long-term milestones needed to reach a net zero emissions goal by transitioning to newer and sustainable sources of clean energy across multiple sectors.

Throughout 2024 the university has committed to following the plan's goals building on last year's accomplishments, continuing to establish Federation University's broader long term sustainability framework of social, environmental, and economic sustainability for both the university and regional Victoria.

As milestones are achieved and new processes are implemented the plan and sustainability framework are reviewed and updated to ensure relevance and consistency throughout its implementation. By following the Towards Net Zero 2033 plan and committing to the larger sustainability framework, Federation University shows its commitment to SDG 3, 4, 7, 9, 11, 12 and 13.

Taking actions to preserve our natural climate and making commitments to building a sustainable future are very important to us here at Federation. Though our annual Sustainability Impact report Federation University tracks the amount of energy that has been generated through low-carbon emission sources. In 2024 62,515 kwh of power was generated from low-carbon solar energy sources installed on buildings in some campuses. We have made commitments to reduce carbon emissions and reach a net zero output by 2033 to help reduce environmental impact and preserve the regional ecosystem.

13 CLIMATE ACTION



14

 LIFE BELOW
WATER

14.1 Education and Training

Federation university offers educational opportunities for those looking to increase their knowledge of the environment through research opportunities and higher education/TAFE units. One of our main units that focuses on environmental impact is Climate and Environmental Issues in Changing World (SCENV3500). This unit covers past, present and predicted changes in the environment, what causes these changes and the effects these changes have on the world around us. The unit also covers various mitigation strategies to help eliminate negative effects and create a future with a healthier environment. The practical part of this unit is a field trip where students engage in tours of urban waterways in and around Ballarat, considering the design elements that will influence biodiversity, conservation and how the climate will adapt.

14.2 Research

14.2.1 Partnership with Southern Rural Water to develop new waterway clearing technology

Federation University has worked with Southern Rural Water in a partnership to design a new UV-C light radiation technology to help combat aquatic weeds in irrigation districts. Through this partnership Federation University MSc by research student, Dian Udugamasuriyage has been exploring the potential of using UV-C light radiation to effectively remove aquatic weeds to improve water flow in irrigation channels, using this more environmentally friendly method to remove weeds removes the need for harmful chemicals that the industry currently uses.

"Currently, I am checking the cellular level changes that effect on aquatic plant leaves from UV-C radiation. This will give us conclusive evidence that aquatic weeds can be killed using this radiation. After that, an application will be designed as an apparatus to be used in the field," Dian said.

This research and discovery were made possible through an industry funded higher degrees by research grant. These grants play a vital role in the Universities Co-Op model and allows for not only academic progress but also the development of practical solutions that improve industry.

14.2.2 First Nations Sustainable Oceans Reference Group

The Australian Government is a member of the High Level Panel for a Sustainable Ocean Economy and works in partnership with 17 others to develop national plans for a Sustainable Ocean. In 2023-24, Professor Emma Lee was a member of the First Nations Advisory Group to draft Australia's Sustainable Ocean Plan. The draft Plan was launched at The Global Nature Positive Summit in Sydney, 2024. This Plan is the first of its kind in Australia to be co-designed with First Nations and to make central First Nations connections to sea country in designing sustainable ocean economies.



Photo caption: 'First Nation Advisory Group members © Australian Government DCCEEW'

14.2.3 New tool highlights our valuable urban wetlands

The Centre for eResearch and Digital Innovation (CeRDI), led by Senior Research Fellow Dr Birgita Hansen, has developed Valuing Urban Wetlands, a pioneering mapping tool that raises awareness of the ecological importance of urban wetlands. In collaboration with the Atlas of Living Australia (ALA), the Australian Urban Research Infrastructure Network (AURIN), and BirdLife Australia, the tool integrates waterbird, frog, and landscape data to assess wetland health across Greater Melbourne. It provides individual reports on species presence, including threatened species, and highlights key habitats for migratory birds like Latham's Snipe.

Urban wetlands are often undervalued in planning due to their modified nature, yet they play a vital role in biodiversity, water quality, and flood regulation. By combining citizen science with open data, CeRDI's tool empowers communities, researchers, and planners to make informed decisions about wetland conservation. This initiative aligns with SDG 12: Responsible Consumption and Production by promoting sustainable urban land use and protecting natural ecosystems. It also enhances public engagement and supports data-driven environmental

stewardship. The flexible, scalable design of the tool allows for future expansion, making it a valuable resource for biodiversity conservation in urban environments across Australia.

14.3 Operations

Life below water plays a key role in the planet's ecosystem, with the current changes to the climate and new discoveries being made that help to unravel the mysteries of our oceans. Understanding the role our oceans have in our environment and protecting and preserving this delicate ecosystem is of vital importance for the longevity of society and the environment. While not located near any major oceans we are committed to contributing to life below water by participating in research and delivering environmental education to students so that they can better support our ecosystem for future generations.



14 LIFE BELOW WATER

15

 LIFE ON
LAND

15.1 Education and Training

Federation University is strengthening its impact on SDG 15 through expanding education and training in environmental and land management disciplines. Enrolments have grown across three key programs: the *Diploma of Conservation and Ecosystem Management*, the *Bachelor of Science (Environmental Science)*, and Certificate III in *Conservation and Ecosystem Management* at Federation TAFE. These programs equip students with practical skills in biodiversity protection, ecological restoration, and sustainable land use. A further 44 academic units directly align with SDG 15, embedding sustainability into the curriculum and preparing graduates to address pressing environmental challenges. This growth reflects increasing student interest and industry demand for expertise in conservation, supported by strong partnerships with land management and environmental organisations.



15.1.1 Environmental conservation across borders

Jeremy Werner, an environmental science student at Federation University's Gippsland Campus, has been awarded a prestigious New Colombo Plan (NCP) scholarship and named the 2024 NCP Fellow for Sri Lanka. As the first in his family to attend university, Jeremy's selection marks a significant personal and academic milestone. His fellowship will focus on strengthening

Australia's environmental engagement in the Indo-Pacific region, particularly through biodiversity conservation and sustainable development. Jeremy aims to collaborate with organisations such as the United Nations and DFAT, conducting research on tropical ecosystems and building networks to support future student exchanges. His earlier NCP mobility tour to Sri Lanka deepened his passion for ecology and reinforced his commitment to global environmental sustainability. Jeremy's work aligns with Federation University's values of inclusion, leadership, and international collaboration, and his fellowship is expected to enhance Australia's regional relationships while promoting environmental stewardship across borders.

15.1.2 The Biodiversity Across the Borders Conference

The Future Regions Research Centre has successfully continued to organised the Biodiversity Across the Borders conference in both 2022 and 2024. This one-day event aims to disseminate new ecological research findings to natural resource managers, researchers and community individuals passionate about environmental stewardship.

The conference is jointly hosted by Federation University, La Trobe University, Deakin University, RMIT, Charles Sturt University, University of Melbourne, Parks Victoria and other research partners. Held at the Federation University Mt. Helen campus in Ballarat, the biennial event attracts over 550 delegates. Industry collaborators, including Corangamite CMA, Glenelg Hopkins CMA, CeRDI, Aus Eco Solutions, Nature Advisory, City of Whittlesea, and Biosis, generously sponsor these conferences, with, in total, over \$80,000 being raised in sponsorships to support the events.

These conferences provided an invaluable platform for sharing cutting-edge ecological research and fostering collaborations among diverse stakeholders committed to advancing biodiversity and environmental sustainability.

15.2 Research

15.2.1 Celebrating success

A Federation University ecologist has been awarded an Australian Research Council Early Career Industry Fellowship for her work restoring habitat crucial to many threatened species.

Dr Heather Neilly says she became interested in ecology for the same reasons many others do – getting out into the environment with an inherent curiosity about why things are the way they are. The Future Regions Research Centre ecologist has been awarded a prestigious Australian Research Council Early Career Industry Fellowship worth \$453,000 for her work restoring habitat crucial for many threatened species.

Dr Neilly's work focuses on restoring semi-arid and arid zone environments. Her current project is investigating how best to restore function and resilience to one million hectares of degraded eucalyptus mallee woodland.

15.2.1 H5N1 outbreak: monitoring the risk to human health

Since 2020 the H1N1 avian influenza virus has been circulating amongst bird flocks globally, currently Australia remains unaffected by this latest outbreak but that will most likely change. The latest outbreak has spread throughout multiple species of migratory sea birds, shore birds, and waterfowl, including gulls, geese, terns, pelicans, and penguins. Dr Meagan

Dewar a researcher at Federation recently visited Antarctica and reported four new outbreaks of the virus in skuas, this highlights the global reach the virus has and raises concerns that entire colonies may be wiped out. Given the widespread nature of the virus, it is almost impossible to stop it from spreading to farmed birds resulting in potentially huge economic losses. A current concern is the extent to which this variant of the virus has become infectious to mammals especially livestock. Although the current outbreak is not easily spreading to humans there have been a small number of cases mostly those with high exposure to infected livestock. Public health officials are confident there is not a significant risk to humanity from this current variant although they will continue to monitor it for further mutations that may increase its effectiveness. To minimise risk to human health, colonies and farms are monitored closely, a human vaccine for H5N1 is available, but the reserve stocks are low, and as per the annual vaccine taken for seasonal human flu variants, the design of an effective vaccine would need to be adjusted to reflect the structure of the infectious variant, should it ever emerge. An upside to the covid-19 pandemic was the development of highly effective mRNA vaccines, there is hope that this technology can be used to rapidly develop effective vaccines against H5N1 variants and possibly provide protection against all forms of Influenza.

15.2.2 Federation researcher discovers three new gecko species in remote Nepal

A team led by Federation University researcher Santosh Bhattarai has discovered three new species of geckos during an expedition into remote Nepal and published the findings in an international science journal. The expedition lasted from April to September of 2023 during this time the research team documented four distinct populations of bent-toed geckoes in four locations in the Chitwan-Annapurna Landscape in Central Nepal. During these observations the team suspected that the populations represented new species due to differences in their body patterns and colour. After performing genetic testing, the researchers confirmed the presence of 3 new distinct species of gecko in these populations. While known species are found in separate corners of Nepal the 3 newly discovered species are located in central Nepal 500km away from the other species. This discovery was made possible through comprehensive and collaborations with colleagues from the Thackeray Wildlife Foundation in India and the Museum for Naturkunde Berlin in Germany. The discovery shows the importance of continued research expeditions and conservation efforts to protect both discovered and undiscovered species from the threat of climate change and other environmental pressures that may cause extinction.

15.3 Operations

As a regional university in Victoria our history is embedded in the School of Mines in Ballarat. The impact of mining from the Goldrush in Victoria is seen across our regions within the Central Highlands. Reflecting on our history as an institution guides us on our future decisions when setting out Campus master plans and developing out brownfield sites as a matter of priority for growth. Through participation in research and implementing preservation plans to reduce our environmental impacts and emissions, Federation university is doing its part to preserve the native population of trees and animals.

13.3.1 Plant a Tree Day

In May 2024 the Mount Helen campus hosted staff, students and the on-campus kindergarten students to plant a tree. There were over 60 native trees planted on the day, a wonderful

activity for staff and future generation students to contribute to the indigenous flora environment of the campus.

13.3.2 Conservation at Nanya station

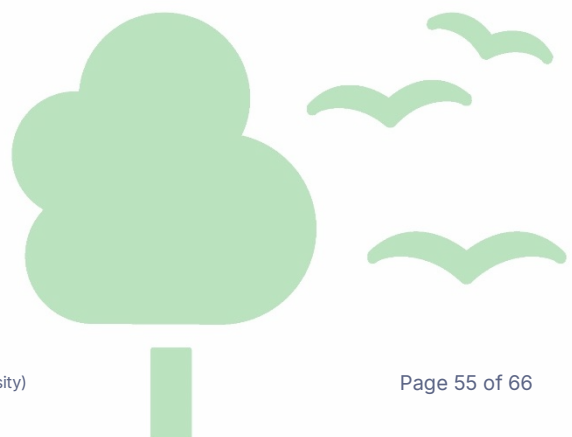
One of our main conservation projects is Nanya station, this 40,000-hectare property located in outback New South Wales has been looked after by the university since 2004 and plays a key role in preserving biological diversity and providing key research opportunities. The top priority of Nanya station is to preserve both Australia's natural fauna and flora, we are conserving Nanya's natural assets by:

- reducing grazing pressure on the land by closing ground tanks, goat control and ripping rabbit warrens. The tank closure is complemented by research into impacts on biodiversity
- regenerating endangered flora and fauna communities by using exclusion fencing around critical communities
- protecting the Mallee fowl population by exotic predator control and monitoring their nest sites
- environmental research into topics such as:
 - factors affecting the distribution of plant and animal species including bats, birds, reptiles, ants and endangered plant species
 - the impacts of grazing, fire and flood
 - characteristics and values of 'old growth' mallee
- island biogeography, and
- adaptation of plants to salinity and gypsophily.
- any Aboriginal cultural sites identified will be managed in consultation with the Barkindji community
- conservation of European cultural heritage sites will be managed by guidelines established by the Burra Charter, and recommendations by recognised authorities in heritage conservation.

Nearly 400 flora and fauna species have been recorded at Nanya, of which nine have either not previously been recorded or have restricted distribution in Western NSW.

There are 22 plant communities on Nanya of which two are dominated by species not previously recorded in NSW.

15 LIFE
ON LAND



16 PEACE, JUSTICE AND STRONG INSTITUTIONS



16.1 Education and Training

Federation University promotes peace and justice through its programs in social sciences, law, and humanities.

Through 2024 Good University Guide Federation has the highest results nationally from the National Student Experience Survey in **Law** for *overall experience, skills development* and *teaching quality*.

16.1.1 Partnership with Corrections Victoria

Federation TAFE significantly expanded its provision of education and vocational training services in Victorian prisons and post sentencing facilities after signing a new six-year agreement with the Department of Justice and Community Safety commencing 1 July 2024.

The agreement will see Federation continue to deliver vocational education and training to learners at Langi Kal Kal Prison, Hopkins Correctional Centre and Rivergum and Corella Place post-sentence facilities in the Grampians region and expand education delivery to facilities in the Barwon Southwest Region, including Barwon Prison, Marngoneet Correctional Centre, and Karreenga Annexe. Federation's prison delivery model will encourage personal development, self-efficacy, and wellbeing, with each student assessed to determine the best education intervention to improve their individual capabilities.

This will provide learners with the skills to become job ready and gain meaningful employment post-release, increasing chances of successful rehabilitation and reintegration into the workforce and community and decreasing the risk of reoffending.

Federation will aim to ensure people in the correctional system have equivalent opportunities to people in the community and prioritise the needs of the most disengaged and disadvantaged learners. Training will focus on critical language, literacy, numeracy, and digital skills, be industry aligned and promote pathways into skills shortage areas as identified in the Victorian Skills Plan.

16.2 Research

16.2.1 Civil and safe societies

In 2021 the Tasmanian Government commissioned a report 'Pathway to Truth-telling and Treaty' for Tasmanian Aboriginal peoples. One of the recommendations for a Treaty included securing commercial abalone fishery rights to continue 40,000 years of cultural fisheries. Professor Emma Lee and multiple Tasmanian Aboriginal communities came together in December 2024 to celebrate the Tasmanian Government delivering on that Treaty recommendation and returning one per cent of Tasmania's commercial abalone quota back to First Peoples of Tasmania. The Land and Sea Aboriginal Corporation Tasmania established Tasmanian Aboriginal Seafoods and is the first commercial abalone fishery to be managed as a registered charity. Profits are

invested in programs that support Aboriginal youth, women and excluded workers and abalone is delivered to Tasmanian hospitality and tourism sectors as a partnership for civil society.

16.2.2 ECR Seed Funding Grants, Preserving the privacy of healthcare data using local differential privacy and distributed deep learning.

A single organisation always owns medical data (patient records) and is often limited in terms of calculations and diversity. To increase the accuracy of results, there is a need to share data collected by multiple healthcare organisations. However, due to the sensitive nature of data, healthcare organisations cannot participate in data sharing and processing activities due to privacy concerns. To address this challenge, we aimed to propose a framework to allow multiple healthcare organisations to share data for training and generating the results without compromising the sensitivity of shared information. Distributed deep learning and edge computing were combined to train and process medical data in multiple stages to protect the privacy of sensitive information. The outcome of the first phase of this project was published in the IEEE Internet of Things Journal. It is a Q1-ranked journal and is in the top 5% list of its category with an impact factor of 8.9. The outcome of the second phase of this project was submitted for publication in ACM Transactions on Internet Technology. It is a Q1-ranked journal and is in the top 5% list of its category with an impact factor of 4.1.

16.3 Operations

16.3.1 University Governance

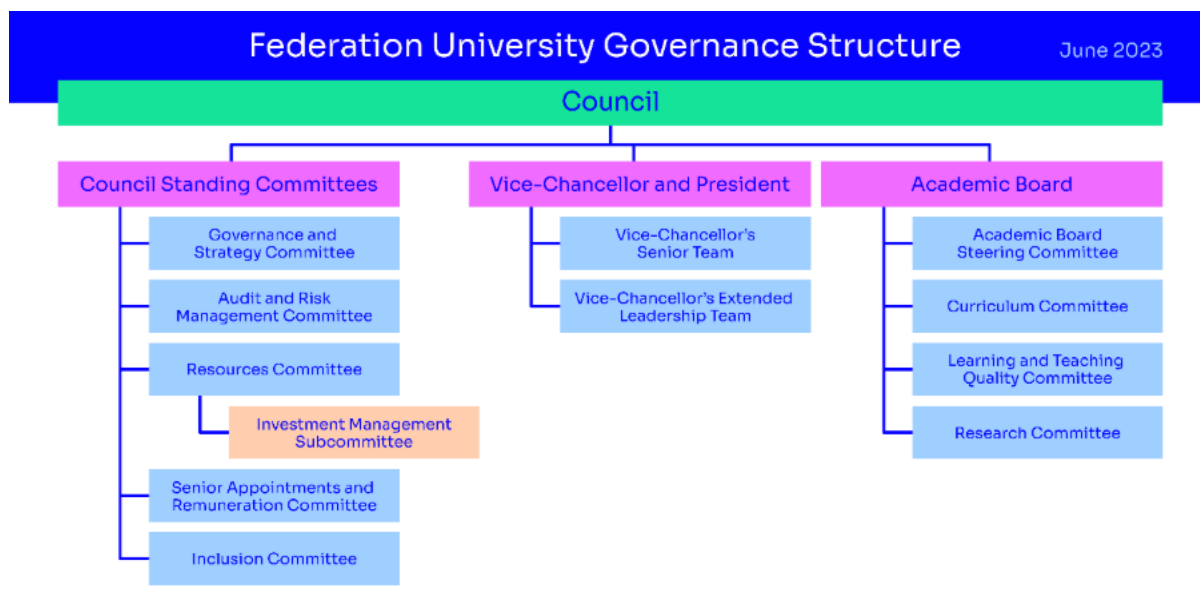
Federation University is committed to maintaining the highest standards in governance, academic quality, and strategic planning.

The Federation University Australia Council is the governing authority of the university and is responsible for the direction and oversight of Federation University. The Council Charter describes key responsibilities such as monitoring annual budgets, reviewing business plans, reviewing management and its performance, monitoring systems of control and accountability and managing risk mitigation.

Council membership expertise provides an environment for innovative thinking, evidence-based decision making and agile approaches towards sustained growth and success of the university. Council membership includes senior public and private sector leaders, business owners and academics, ensuring a diversity of views. Many are based in our regional communities. Council is supported by committees focusing on specific areas such as finance, audit, risk management, and academic quality.

Academic Board as the peak academic governing body that oversees academic governance, ensuring the quality of learning, teaching, research, and research training. It sets and monitors academic standards and provides advice to the Council and Vice-Chancellor.

The university's Strategic Plan (2021-2025) is underpinned by three key strategic objectives (Transform Lives; Enhance Communities; Strong and Sustainable University). The Vice-Chancellor's Senior Team monitors accountability and progress against the plan's success measures quarterly based on input from all portfolios. Progress is reviewed bi-annually by Governance and Strategy Committee and by Council.



16.3.2 National Centre for Reconciliation, Truth and Justice

The National Centre for Reconciliation, Truth and Justice is the leading academic centre for engaging with communities around reconciliation, it works to create understanding and engagement around truth and reconciliation across the industry, community and academic sectors by delivering a detailed selection of education and engagement programs combined with research activities. Some highlighted events are included in the next section.

During 2024 the centre has hosted a range of events, conferences and research tasks. Some events of note were the 2024 annual lecture on reconciliation featuring conversations with eminent first nations leaders Dr Jackie Huggins AM FAHA, Commissioner Sue Anne Hunter, and Rueben Berg.

In 2024 the inaugural National Centre for Reconciliation, Truth, and Justice Public Lecture Series was created and 3 total lectures were held throughout the year with different speakers on different topics: – Professor Dennis Foley spoke on Indigenous business at Ballarat in March; Jesse Fleay spoke on constitutional reform at Berwick in June; and Professor Emma Lee spoke about cultural engagements at Morwell in September.

2 major conferences were held during the year: “Class, Race, Place: Exploring Intersectionality for Access to Higher Education Globally”, with the Alliance of Working-Class Academics, and “Barriers to Truth-Telling”, with the Australia Centre at the University of Melbourne. Both conferences were coconvened by Professor Gavin.

Research funding has been very successful throughout the year generating over 13 million dollars in fundings towards research around truth reconciliation and justice. Jesse Fleay was appointed to the position of research fellow from 2025 for conducting an outstanding year of research as a research associate. Alex Radoll has been given a 6-month appointment as a project and administrative officer while Sare Jubran is on leave.

16.3.3 Policy contribution and working with the Government

Federation University has made regular contributions to local, federal and state government bodies. During 2024, 13 documents were submitted by Federation to the government for review. These submissions consist of policies and legislation designed to help improve education by introducing and changing existing models to adapt to fill the current skills demand and improve the quality of life in regional Victoria for all residents.

16

PEACE, JUSTICE AND STRONG INSTITUTIONS



17 PARTNERSHIPS FOR THE GOALS



17.1 Education and Training

17.1.1 Education in the SDGs

Starting in 2023 Federation University has started identifying aspects of each unit that contribute to the SDGs values and mapping the wide range of higher education and TAFE courses to align with one or more of the 17 SDGs. 2024 has seen great progress in correctly mapping the units to an SDG, with the majority of units falling under SDGs 3 and 4. Offering quality education across the health and education sectors, these units are designed to address critical skills shortages for our regions. By aligning these units with the SDGs we can ensure that quality education and skills are being delivered to prepare students for the workforce.

17.1.2 Co-op University

Federation university is proud to be a major regional university adopting the co-operative learning model by partnering with industry leading companies to provide real work experience to students through partnerships, throughout 2024 some major achievements were made in implementing the co-op model university wide.

Some key milestones achieved in 2024 are:

- 110 courses were transformed to meet the Co-op standards across Higher education and TAFE.
- 241 students enrolled in the 5 IISS Co-op courses in market this year.
- 63 Federation students participating in Co-op placements, with 9 of the placements being at Federation University, allowing an insight into how to scale up the number of placements for future years.
- 64 Industry employers are officially onboarded with the Co-op model of learning.
- Changed international and domestic advertising campaigns to reflect the updated Co-op model.

We are in a position to offer Co-op courses to most IISS students commencing their learning journey in 2025, with (4) additional Co-op courses offered by IEAC.

We continue to partner with local, national and global organisations to deliver this model of education. In 2024 for example a key partnership with McCain foods was made as they became an early adopter of the Co-op placement model, providing placements to students studying at the start of 2024 and plans to have more placements available throughout 2025.

17.2 Research

Research highlights. In 2024 Federation universities research and innovation portfolio celebrated a number of major achievements including reaching \$17.144 million from research income and grants, 50 higher degrees by research completions, in the 2025 Times Higher Education World University Rankings Federation University increased its ranking by two cohorts of universities, this rank increase is a testament to Federations commitment to deliver quality research. Federation received its first ARC Industrial Transformation proposal reaching over 7

million dollar bid to establish a PhD and Postdoctoral training centre for the goal of 'Enabling Technologies for Offshore Wind Energy'. Federation also received its first ARC Industry Fellowship and future Fellowship. As part of our commitment to openness and transparency, we signed up to the ANZCCART Openness Agreement on Animal Research and Teaching and have made a publicly available statement about our wildlife research.

17.2.1 Researchers develop tool to help businesses reach net zero targets

Federation University's Centre for New Energy Transition Research (CfNETR), in collaboration with the University of Technology Sydney (UTS), has developed **CEREI**, a free, open-source tool to help businesses plan cost-effective renewable energy investments and meet net zero targets. The desktop application models energy markets using real-world data, enabling users to assess energy generation options, payback periods, and potential income from distributed energy resources like solar, biogas, and microturbines. Initially applied to industries in Gippsland, including the forest products sector, the tool helps identify viable pathways for transitioning from fossil fuels to renewables.

The project supports Australia's climate goals, including a 43% emissions reduction by 2030 and net zero by 2050. It also addresses sector-specific challenges, such as using timber byproducts to generate electricity. By combining technical expertise, government funding, and industry collaboration, the initiative exemplifies **SDG 17: Partnerships for the Goals**, leveraging multi-sector cooperation to drive sustainable development. The tool empowers industries, communities, and policymakers with accessible, data-driven solutions, fostering innovation and resilience in the clean energy transition. Future enhancements will include forecasting capabilities, further strengthening its role in supporting collaborative climate action across Australia's regions.

17.2.2 CRC for Transformations in Mining Economies (CRC TIME Limited) : Collaborative planning for post-mining development in the Latrobe Valley (Stage 2)

The collaborative planning for post-mining land use in the Latrobe Valley brought together mine operators, relevant government departments, First Nations and community organisations in an authentic co-design process to enable the community of the Latrobe Valley to have a say in their vision for the future. The researchers facilitated a 5-session, 30-person deliberative panel, a youth summit and a series of on-Country workshops with First Nations participants to enable each group to express their concerns and aspirations for the future of the Valley and consider the opportunities that the 10,000 ha of land surrounding the mines could facilitate. The outcomes of these deliberations resulted in a suite of agreed principles for future land uses, which included connectivity of biodiversity corridors, active transport and accessible housing, a range of renewable energy opportunities and enhanced food production and manufacturing, as well as increasing active and passive recreation opportunities and supporting the arts to enhance liveability and reputation of the region. These outcomes are informing the closure and redevelopment plans of each of the mine licensees, as well as the position statements on mine rehabilitation for Gunaikurnai Land and Waters Aboriginal Corporation and regional development planning for Gippsland. It has also greatly enhanced community literacy and agency in mine closure and post mine land use, as well as built trust between community and operators.

17.3 Operations

Federation university proudly maintains industry leading partnerships with both students and industry partners to help drive industry and community engagement in regional areas across Australia. By working to put together this sustainability impact report Federation university demonstrates its commitment to upholding the 17 sustainable development goals.

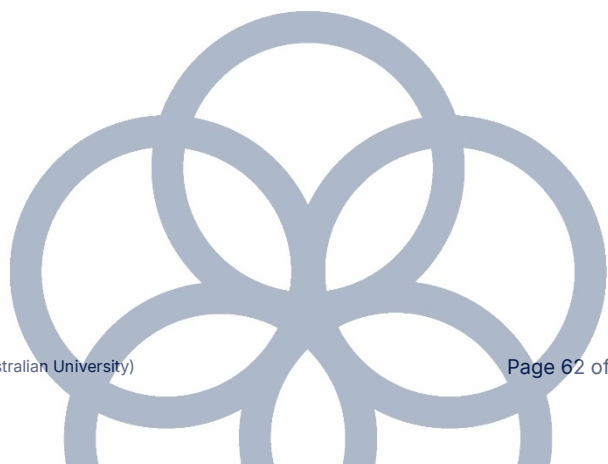
17.3.1 Technology parks

Federation university is proud to have one of the largest technology parks of any university in Australia. with parks located at our Ballarat, Gippsland and Ararat locations these parks are designed to promote collaboration between the university and enterprises for the development of emerging technologies and the improvement of current technologies. These parks also give companies the opportunity to work closely with the university for student placements for the Co-operative model especially those studying information technology, business and engineering courses. The technology parks continue to grow hosting a total of 59 local and internationally recognised businesses including IBM, Concentrix, Kyndryl, Ernst & Young, Grampians Health, WIN network, SECRO, Precision Agriculture, Fiona Elsey Cancer Research, Committee for Ballarat, Berry Street, Southern Cross Austereo and the Emergency Services Telecommunications Authority.

17.3.2 Campus vision 2023-2030

Federation Universities campus vision plan 2023-2030 continued to drive positive change to Federations future across all campuses following known budget limitations. The campus vision is built around the 5 fundamental goals: Industry and community engagement, Enriched learning experience, Connected to Country, Optimised and consolidated, Support sustainability framework. These goals help guide the university in mapping out key projects do develop community engagement with staff and students to enhance existing buildings and provide vibrant community connected spaces for each campus.

17 PARTNERSHIPS FOR THE GOALS



Acknowledgments

Institutes:

Institute of Education, Arts and Community (IEAC)

Institute of Health and Wellbeing (IHW)

Institute of Innovation, Science and Sustainability (IISS)

Federation TAFE

Research Centres:

Centre for eResearch and Digital Innovation (CeRDI)

Health Innovation and Transformation Centre (HITC)

Future Regions Research Centre (FRRRC)

Centre for Smart Analytics (CSA)

Centre for New Energy Transition Research (CfNETR)

Collaborative Evaluation and Research Centre (CERC)

National Centre for Reconciliation, Truth, and Justice

Federation University Tech Parks

Morwell Innovation Centre

Ararat Jobs and Technology Precinct

Governance, Strategy and Office of the Vice Chancellor Portfolio