

# ANNUAL REPORT 2021-22

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# Letter of Transmittal



Chair

The Hon Ed Husic MP Minister for Industry and Science Parliament House CANBERRA ACT 2600

Dear Minister

I am pleased to present the 2021-22 Annual Report for Industry Innovation and Science Australia (IISA) for the reporting period ending 30 June 2022.

This report has been prepared in accordance with section 46 of the *Industry Research and Development Act 1986*, which requires that I prepare and provide an annual report to you for presentation to the Parliament.

This report includes activities undertaken by IISA and their committees throughout the financial year.

Sincerely,

Andrew Stevens 8 November 2022

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# Industry Innovation and Science Australia's strategic objectives

*Objective 1:* Inform Australian Government policy on Australian industry innovation, science and research.

*Objective 2:* Advocate and champion for Australia's industry, innovation, science and research systems.

*Objective 3:* Oversee innovation programs under a number of committees.

# Welcome from the Chair



I am pleased to present the Industry Innovation and Science Australia (IISA) 2021–22 Annual Report, in which we highlight our efforts and achievements from the year.

As the Chair of the IISA Board, I take this opportunity to reflect on some of our key pieces of work.

I also welcome the new Government and the Minister for Industry and Science, the Hon Ed Husic MP. The Board and I look forward to working with you and contributing our advice to your important work. We watch with great interest and a willingness to lend our expertise as Government policies and programs develop and evolve in vital areas such as industry, innovation, science, jobs, skills, environment, gender and diversity.

In what has been another year heavily impacted by the pandemic, it is prudent to acknowledge the continuing challenges faced by Australian businesses and the community at large. In the last quarter of the financial year there was a strong focus on global events as a catalyst for focussing on supply chains, domestic capability for critical products and services and addressing key risks and areas of potential disruption. Events over the past two years have also highlighted the importance of technology and the need for businesses to focus on business improvements through digital uplift and data. Over this period there has also been a significant impact on costs and increases in the costs of living.

The Australian Bureau of Statistics (ABS) March 2022 Business Conditions and Sentiments Survey showed that 39% of all business respondents reported that they expected the price of their goods or services to increase over the 3 months to the end of the 2021–22 financial year. In fact, more than half of all businesses in Retail trade (59%), Construction (58%), Manufacturing (55%) and Electricity, gas, water and waste services (54%) expected increases in the price of their goods and services.

By April, more than half (57%) of the businesses in the April ABS survey experienced increased business costs over the previous 3 months. Almost half (48%) of these businesses realised their expectations of having to increase the price of their goods and services, passing on increased costs to customers (either partially or fully).

The Accommodation and food services (78%), Manufacturing (73%) and Retail trade (73%) industries had the greatest proportion of businesses with increased business costs over the previous 3 months.

Manufacturing was an area of focus for the IISA Board in 2021–22 with our key advisory role on the Australian Government's Modern Manufacturing Strategy (MMS). IISA provided advice to assist with the implementation of the MMS and provided strategic advice to Government on grant funding decisions under the Modern Manufacturing Initiative (MMI). We provided advice around the potential impact of awarded grants on achieving the program objectives of the MMI and MMS; and the degree to which the grant would be transformative and provide long-term value to the scale and/or competitiveness of the Australian manufacturing sector. During the year, the IISA Board also provided advice to Government on key cross cutting issues in Australia's manufacturing sector and considerations on how to address these issues. In this work we analysed challenges manufacturers face to build scale, adopt technologies and increase their competitiveness.

We worked to better understand how to grow Australian Manufacturing. It was not surprising to find the immense importance for manufacturers of competing on value rather than competing on cost. In Australia's current economic environment, there is little room for Australian businesses to compete on cost alone. Competing on value refers to a business' ability to compete on the higher value of their products, rather than simply on their cost. It involves a shift in focus to increasing sales of high quality outputs (particularly through pre and postproduction activities) rather than simply reducing costs to achieve scale.

It has been a valuable exercise to research and witness Australian manufacturers making this shift and growing through their investments in value and quality.

The competitiveness of our businesses is a topic the IISA Board is passionate about. During the year we also had the opportunity to provide advice to Government on how best to support business leaders leverage intangible capital investments like managerial and staff capabilities, agile business models, data analytics and productivity enhancing digital technologies to drive innovation and build their competitiveness.

Within this work we were able to see the important role skilled and experienced employees play in building and maintaining their business's competitiveness. Skills attraction and retention is particularly important given the changing skills needs across sectors including in the manufacturing sector. High-performing manufacturers recognise and implement effective strategies to ensure they can both retain existing, and attract new, skilled employees to support their current and future business strategies.

However, in April 2022 18% of employing businesses surveyed by the ABS reported not having enough employees. Of these businesses 84% advised that the inability to find suitable staff was a contributing factor, compared to 69% in January 2022. This is an ongoing challenge that Australian businesses face and is only exacerbated by the impact of the pandemic. Managing this challenge will continue to be a focus for businesses, governments and the IISA Board alike.

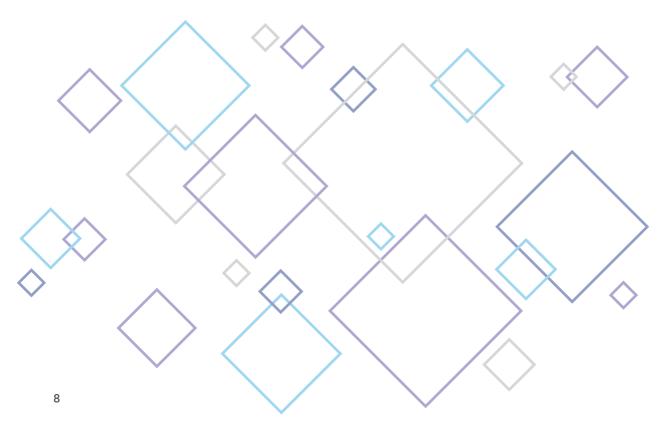
In 2021–22, we also completed work to review Venture Capital (VC) Tax Concession Programs to ensure these concessions were fit-for-purpose and supported genuine early stage Australian start-ups.

We conducted this review in collaboration with the Treasury and together provided the resultant report for the previous Treasurer and Minister's consideration to satisfy the legislative requirement outlined in Section 118–455 of the *Income Tax Assessment Act 1997.* The review considered how the concessions operate in practice and whether they are achieving their intended objectives of the Early Stage Venture Capital Limited Partnership (ESVCLP) program, the Venture Capital Limited Partnership (VCLP) program, and the Australian Fund of Funds (AFOFs) program.

IISA oversees several innovation programs via the Research and Development Incentives Committee, the Entrepreneurs' Programme Committee, the Cooperative Research Centres Advisory Committee, the Innovation Investment Committee, and the Biomedical Translation Fund Committee. These committees play a crucial governance role for key government programs in support of the Australian innovation system and the IISA Board welcomed the opportunity to further support the Committees in their important work this year. The Board continues to look at ways to improve and strengthen our oversight role. I would like to congratulate the Chairs and their committees for their achievements throughout the year which you can read about in further detail in the body of this Annual Report.

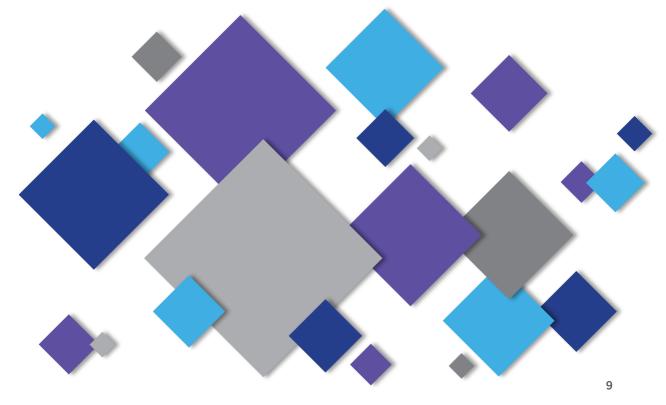
I would like to take this opportunity to thank all members of the IISA Board for their invaluable contributions during the 2021-2022 financial year and provide a special thank you to Professors Elanor Huntington and Raoul Mortley, whose tenures concluded during the 2021-22 year. Your contributions have been incredibly valuable, and we enjoyed working with each of you. I welcome the appointment of Dr Doron Samuell to the Board. I would also like to take the opportunity to welcome Tanya Blight as the Executive Director and to thank the Office of Industry Innovation and Science Australia staff as led by Acting CEO Dr Kate Cameron, and Acting Executive Directors Dr Jane Sexton and Mr Anthony McGregor. Your commitment and efforts throughout the year have been of great support to the Board. I would also like to say a special thank you to Ms Bridgette Lewis and Ms Dharmini Robinson for their work on the Venture Capital Tax Concession Programs Review.

Mr Andrew Stevens Chair



### Section 1 REVIEW OF 2021-22

Overview of Industry Innovation and Science Australia Inform policy through strategic advice Advocacy Program oversight



# Overview of Industry Innovation and Science Australia

IISA is an independent Board that provides strategic advice to whole of Government on industry innovation, science and research matters. IISA also monitors and oversees several innovation programs through 5 committees.

IISA was originally announced as part of the Australian Government's National Innovation and Science Agenda in December 2015, and formally established on 20 October 2016 through amendments to the *Industry Research and Development Act 1986* (IR&D Act).

On its formation, the Board inherited the roles of the body formerly known as Innovation Australia that had been established under the IR&D Act to assist with the administration and oversight of the Government's industry, innovation and venture capital programs.

IISA's role and responsibilities are defined by the IR&D Act with its functions detailed at Section 7 of the Act, the Government's Statement of Expectations (SOE) and any directions issued by the relevant Minister responsible for Industry Innovation and Science Australia. These all provide the basis for which the Board discharges its functions and responsibilities. The current SOE, and IISA's Statement of Intent (SOI) in response, are published on <u>https://industry.gov.au/</u> <u>publications/statement-expectations-andintent-industry-innovation-and-science-australia</u>

IISA continued its whole-of-government remit through working across multiple areas of government to inform the development and delivery of stronger policies to support science, research and innovation. In line with Section 7 of the Act, the IISA Board has functions which can be summarised in three key areas of work:

- Strategic Advice (subsections (a), (aa), (ab), (ad) and (d)).
- 2. Promoting investments, commission and publish research in relation to industry. innovation, science and research (subsections (ac) and (d)).
- 3. Oversight of several innovation programs (subsections (b), (c), (ca) and (d)).

# Informing policy through strategic advice

## 1. Strategic Advice

IISA's strategic advisory role during 2021–22 focussed on 3 key programs of work.

### Cross-cutting issues arising from the National Manufacturing Priority Road Maps

IISA reviewed the Modern Manufacturing Initiative (MMI) roadmaps to identify common, cross-cutting issues that could be addressed to improve productivity across the manufacturing sector.

IISA identified 3 key issues cutting across multiple Australian manufacturing businesses, on which industry and government could work together to secure the transformation of Australia's manufacturing sector. Specifically, IISA examined the ability of Australian manufacturing businesses to:

- grow and build scale through competitiveness
- compete on value rather than solely on cost
- successfully adopt and develop digital technologies that lead to better business outcomes.

To understand how these 3 issues are affecting manufacturers, IISA consulted broadly across the manufacturing sector, including with industry bodies, businesses and government.

# Investment characteristics of successful innovative businesses

Building on the Board's previous report Stimulating business investment in innovation, IISA further analysed the investment characteristics of successful innovative businesses to determine how business growth through innovation can be supported. It explored how Australian business leaders are using their intangible capital investments to implement innovative practices and differentiation, driving competitiveness, scale and resilience within their businesses. The report also examined some of the challenges Australian business leaders face in prioritising investment in, and the leveraging of, their intangible assets and the solutions they are implementing.

IISA's research combined quantitative and qualitative approaches to explore how Australian businesses of varying sizes and ages create and sustain value and remain resilient. It was further informed by engagement with a range of innovative Australian businesses and stakeholders to identify common investment characteristics of successful Australian businesses.

IISA's analysis found Australian businesses are tangible asset heavy and they need to place a greater priority on investment in intangible capital. This needs to be a focus for any industry or government measures going forward to ensure Australian businesses remain internationally competitive.

# Venture capital tax concession programs review

In conjunction with the Treasury, IISA undertook an impact assessment of venture capital tax concessions. The review was announced in the 2021–22 Budget and the Terms of Reference for the Review were released on 7 July 2021. The purpose of the review was to:

- consider how the concessions operate in practice and whether they are achieving their intended objectives
- satisfy the legislative requirement of an impact assessment of the operation of the concessions outlined in Section 118–455 of the *Income Tax Assessment Act 1997*
- consider the recommendations of other relevant reviews, to which the Government has not yet responded, that examine the venture capital tax concessions.

The Review scope included the Venture Capital Limited Partnership (VCLP), Early Stage Venture Capital Limited Partnership (ESVCLP), and Australian Venture Capital Fund of Funds (AFOF) tax concession programs, as well as investments made directly by foreign residents under Part 3 of the Venture Capital Act 2002.

Public consultations for the Review ran from 27 July to 3 September 2021. The findings of these consultations were to be considered alongside qualitative and quantitative data, relevant previous reviews, and analyses of Australian venture capital sector trends. These findings inform a final report to the Treasurer and subsequently the Parliament.

# Advocacy

# 2. Promoting investment in industry, innovation, science and research

IISA's second strategic objective is to 'promote and advocate and champion for Australia's industry innovation, science and research (ISR) system'.

IISA does this by publishing reports, public engagements, site visits, media interviews and social media.

This objective encompasses a range of activities for IISA, from speeches and presentations at conferences and public events, to participation in roundtable forums and meetings with stakeholder groups from industry and government.

IISA is represented by a number of spokespeople in public engagement activities and advocacy work, including the IISA Board Chair, IISA Board Members, and the Executive Director of the Office of Industry Innovation and Science Australia (OIISA).

During 2021–22, IISA continued to work directly with stakeholder groups to better understand the barriers and characteristics to success within their industries, with particular attention to assisting rapid and sustained economic and industry recovery from the ongoing impacts of the COVID-19 pandemic.

In 2021–22 we continued our use of social media to engage with the public, industry and ISR stakeholders. In its third year operating we used LinkedIn to reach the Australian business community and those with an interest in innovation. We reached just over 650 followers on our LinkedIn account by the end of the financial year, joining our 2884 Twitter followers.

Some highlights from IISA's public engagement activities over the year included our involvement in:

- the Treasury's Macroeconomic seminar
- the Academy of Technology and Engineering (ATSE) Symposium
- the Transport New South Wales (NSW) Quantum Expert Advisory Panel.

Along with the above public engagement activities, the Board and the Executive Officer of OIISA undertook visits to Royal Melbourne Institute of Technology (RMIT) University, (Melbourne), the Australian Institute of Machine Learning, Inovor Technologies, Carina Biotech, Max Kelson, Redeye, and M3DCINE amongst others.

During the year we also met with members of the Innovation Advisory Committee in Queensland to discuss its purpose, current work, priorities and how it operates and interacts with government.

In many instances our public engagement activities were impacted by COVID.



IISA Board Members

# Program oversight

# 3. Oversight of several innovation programs

IISA's third strategic objective is to 'oversee innovation programs to ensure effectiveness and efficiency of delivery'. As at 30 June 2022, the IISA Board, through regular engagement with IISA committee chairs, provided oversight to, and support for, the administration of the following programs':

- 1. Research and Development Tax Incentive Program
- 2. Cooperative Research Centres Program
  - Cooperative Research Centres (CRCs)
  - Cooperative Research Centres Projects (CRC-Ps)

- **3. Venture Capital Programs** 
  - Early Stage Venture Capital Limited Partnerships (ESVCLPs)
  - Venture Capital Limited Partnerships (VCLPs)
- 4. **Biomedical Translation Fund** (delivered by AusIndustry on behalf of the Department of Health)
- 5. Entrepreneurs' Programme<sup>2</sup>
  - Accelerating Commercialisation (AC)
  - Incubator Support (IS)

### 6. Business Research Innovation Initiative<sup>3</sup>

The IISA Committees and the Department of Industry, Science and Resources (DISR) assisted the IISA Board to oversee these programs. The programs were delivered by the Department. The Australian Taxation Office (ATO) also assists the Department with the administration of the Research and Development Tax Incentive and Venture Capital programs.

<sup>&</sup>lt;sup>1</sup> Legacy programs no longer open to new applicants and of which Industry Innovation and Science Australia maintains oversight are listed at page 48.

<sup>&</sup>lt;sup>2</sup> Note that there are 2 other components of the Entrepreneurs' Programme, the Business Management component and the Innovation Connections component, which are not included here as IISA does not have a formal oversight role of these components.

<sup>&</sup>lt;sup>3</sup> Note that the Business Research Innovation Initiative does not have its own committee, but instead is overseen by the Entrepreneurs' Programme Committee.

# **Program Overview**

# Research and Development Incentives Committee



"The Research and Development Tax Incentive (R&DTI) is one of the Government's most important industry innovation policies. The benefits of R&D spill over into the broader economy through ideas, skills and knowledge transfer, and play an important role in Australia's technological progress and economic growth.

Through the R&DTI, the Government encourages companies to invest in R&D activities that are less likely to be undertaken without government support and most likely to deliver benefits to the broader Australian economy.

The R&DTI is designed to encourage businesses by offsetting some of the costs associated with conducting R&D. This helps businesses develop new products and services, improve processes and solve problems.

Since its inception in 2011–12, the number of registered participants and the subsequent value of tax benefits delivered has grown. The total annual cost of the program to the Government in the form of revenue forgone and refunds around \$2.7 billion. *The program has delivered benefits to over 11,000 businesses each year".* 

The RDTI Program has been stable for a few years, which has allowed measurement of the impact of improvements to its administration, including enhanced customer engagement and giving tailored guidance to applicants earlier in the assessment process."

"Recommendations and findings from various external and internal reviews have also fed into program improvements including ways to reduce assessment times and launch of a new customer portal".

MS JULIE PHILLIPS CHAIR, R&D TAX INCENTIVE COMMITTEE

### Research and Development Tax Incentive Program

2021 marks the 10th anniversary of the R&DTI. The R&DTI has supported well over 30,000 companies in its lifetime. Each year between 2000 and 3000 businesses register for the program for the first time.

Key outcomes in relation to the R&DTI for the 2020–2021 income year, as at end-June 2022<sup>4</sup>

- \$13,063,837,519 in registered R&D expenditure
- 12,090 registrations, representing 13,960 R&D performing entities
- 10,611 registrations, representing 11,420 small to medium companies (82% of program participation)
- 2591 companies registered that were new to the program (18.6% of program participation)
- The program continued to support companies throughout the COVID-19 pandemic and natural disasters.

From July 2021 companies commenced applying for the R&DTI through a new Customer Portal. Benefits include increased security and real-time information validation.

IISA made its first determination that certain clinical trials meet the requirements for being 'core R&D activities', providing certainty for companies and streamlining applying to the program.

The Industry Research and Development Regulations 2022 and the Industry Research and Development Decision-making Principles 2022 have been remade with minimal changes to ensure administrative continuity of the R&D Tax Incentive. The 2011 version of these instruments were due to automatically end this year. April 2022 saw the release of 'Software-related activities and the Research and Development Tax Incentive', the latest sector-specific guidance product published under the AusIndustry/Australian Taxation Office (ATO) joint administration, providing critical guidance for software related R&D activities.

AusIndustry is reviewing its R&DTI advice and guidance products to ensure they are up to date and investigating the development of additional guidance products. New guidance products being considered include Decision Impact Statements on court and tribunal decisions, and Interpretative Decisions to explain policy approaches where the law is not straightforward. These are similar to guidance products our co-administrator, the ATO, uses to assist people to understand the legislation we administer.

The R&DTI program is also continuing to work with the software sector to develop additional guidance to help companies self-assess and register their software-related activities for the R&DTI.

The 2021 review of the R&DTI by the Australian National Audit Office was accepted by AusIndustry, while the 2021 Board of Taxation review has been noted. AusIndustry is considering the recommendations of both reviews.

Further information and details on the R&DTI program are available on <u>www.industry.gov.au</u>. Find out more information on eligibility for the R&DTI program and apply via the customer portal at <u>www.business.gov.au</u> or call 13 28 46.

<sup>4</sup> Please note that income year 2020–21 is incomplete. Companies with a substituted accounting period (SAP), ending after 30 June 2021 (but before 31 December 2021) may continue to register for the R&DTI until 30 September 2022.

## **Case study**

Moodle—Tax incentive critical for online learning developer Moodle

Perth-based Moodle has been an innovator in online learning for 20 years, but now it competes against giants such as Google and Microsoft for the enormous opportunities in online learning platforms.

The COVID-19 pandemic accelerated the shift to online learning, presenting both challenges and opportunities for Moodle. Support from the Australian Government, through the R&DTI, has been critical in helping the company maintain its innovative edge and keep ahead of competitors.

Founder and CEO Martin Dougiamas says the pandemic has produced a fundamental shift in the way businesses conduct their work and the way the world thinks about education.

"Moodle's been doing this for 20 years, but it feels like the rest of the world just caught up with the idea. We're now going head-to-head with the Googles and Microsoft's of the world, and we need all the help we can get."

Moodle is a global business. Its products are used by universities and schools as well as other large public and private institutions, including Britain's National Health Service and the United States Air Force.

But Moodle is a very different type of business to competitors like Microsoft and Google.

"We're an open-source software company," says Martin. "This means our software is free and available, and it's used all over the world. About two thirds of the world's universities use Moodle as their online learning platform."

"Educational institutions need online learning and they're also prepared to work together on it. We are the glue that helps teachers and students from different institutions work together," he explains. Moodle is a certified B Corporation, which means its focus is not just on profits.

"This is not a business designed to make a lot of money for people. This is a business designed to sustain an open-source community project and product," he says.

The biggest challenge we face is an increasingly commercial environment around learning and a huge number of competitors and a lot of venture capitalist funding, he adds.

Moodle employs about 150 people, 40 of them in Australia and the rest around the globe. It continually develops new online learning ideas and the software to turn those ideas into reality.

Research and innovation are the core of Moodle's business. When Chief Financial Officer Rohan Hardie joined the team, he set about making sure Moodle was conducting research and development that was eligible for the R&DTI.

"Since 2016 we've been lodging claims every year. It has allowed us to hire more developers and continue with the R&D in a stronger fashion," he says.

AusIndustry has helped the company to understand the R&D Tax Incentive approval process, which has been particularly important because much of its research comes from overseas.



Moodle used the Research and Development Tax Incentive to help maintain their innovative edge and keep ahead of competitors.

A positive advance overseas finding is essentially a pre-approval. It allows Moodle to spend money on overseas research and development knowing it can claim the tax offset later under the R&DTI.

"We had a meeting with AusIndustry to understand the process, and an external provider helped too, but it was more of a partnership along with AusIndustry. Ultimately, we qualified for the tax incentive in 2020," says Rohan.

Since the start of the pandemic, Moodle have adapted and accelerated its research program.

"We've pushed forward with R&D and come up with new solutions on a much faster scale. Revenue has grown by 70% in the last 12 months, which is a fantastic result. We're forecasting over 90% growth for the 2022 calendar year," he says.

As CEO, Martin Dougiamas sees innovation continuing to drive the company's future.

"We are now looking at a new platform from scratch. We're starting with the assumption that the technologies of 2025 or 2030 are here, and asking 'what does learning look like?' And we are going right back into deep research. So, looking at the current state of neuroscience, of educational psychology, of different ways of working," he says.

"We're very grateful for the support through the AusIndustry R&D Tax Incentive program. It feels like Australia's 'got our back'," says Martin.

We had a product we were developing in the UK and Europe, where the technology and expertise wasn't available in Australia. AusIndustry helped us understand how we could get an 'advance overseas finding', which gave us certainty that the R&D we were doing offshore could be claimed through the Australian business.

# **Case study**

# espresso—Portable monitors with endless possibilities



espresso's world-class portable monitor technology continues to evolve with AusIndustry support through R&D Tax Incentives.

espresso Displays was founded in Sydney in 2018 by 3 engineering graduates who were frustrated by the limited screen 'real estate' on their laptop computers. They wanted to create a lightweight, portable monitor that would fit into a backpack and that could be linked to a laptop, mobile or gaming console to provide a better workspace or gaming experience, wherever they went.

In 2019, Will Scuderi, Scott McKeon and Fabian Maritato were joined by business partner Gary Caldarola, to officially launch the espresso Display as the world's thinnest portable touch-screen monitor. Their innovative technology incorporates award-winning design and high-definition resolution, cased in aeronautical-grade aluminium. It is just 5.5mm thick. A Minimum Viable Product grant from the NSW Government helped the company to launch a Kickstarter fundraiser in 2019 that was almost 3000% oversubscribed. Extensive, ongoing research has been needed to refine the hardware technology and related software. The company has also faced challenges in sourcing components and the logistics of assembly. This is done overseas as there is limited manufacturing capacity in Australia.

Co-founder Will Scuderi says while there is a growing software capability in Sydney, Australia exports much of its electronic engineering and design talent.

# How the R&DTI helped

Will says the R&DTI has helped to fund ongoing research. "It has helped us to get new technology into the market, to scale up our product and expand our reach."

It has also allowed the business to expand its team, providing jobs for skilled engineers. He sees the company's growth as part of a broader opportunity to re-establish advanced electronic manufacturing in Australia, in conjunction with the growing software industry.

## Outcome

Within 3 years espresso Displays has grown from a team of 4 to a full-time staff of 15, with another 8 part-time and casual workers. The business launched e-commerce sales in 2020. Its monthly user base has grown tenfold in the first year and it has customers in more than 30 countries.

In 2021, espresso won the international Red Dot Design Award and Australian Good Design Award, and it was named in *TIME's* Best Inventions of 2021.

"The R&D Tax Incentive has helped us to get new technology into the market, to scale up our product and expand our reach."

WILL SCUDERI, CO-FOUNDER, ESPRESSO DISPLAY.

# **Program Overview** Cooperative Research Centres (CRC)



"2022 saw the 30th anniversary of the Cooperative Research Centres programme, a milestone delivering generations of research, development, new technologies and solutions. With the anniversary celebrations we reflected on exemplars of industry-academic innovation from the full breadth of the Australian economy. While there are too many individual success stories to mention, I want to take a moment to recognise the collaborative community involved over the 30 year history.

In addition to the many and varied technology solutions delivered, a key success arising from the life of the programme is the community of industryfocussed academic researchers, and research-experienced innovators based in industry. We thank them all for their hard work and commitment over the years, and long may it continue.

Turning to this year, the Cooperative Research Centres Advisory Committee (CRCAC) has once again been delighted with the continued strong support for the program from across industry, research and government sectors. This on-going commitment demonstrates the value of the CRC Program in delivering outcomes and building Australia's capabilities. The CRC and CRC-P streams have achieved solid results against a back drop of disruptions, with those funded in the 2020-21 financial year addressing the government's manufacturing focus, the Regional Decentralisation Agenda, as well as mRNA-based therapeutics and the priority technology stretch goals of the Technology Investment Roadmap.

As industries continue to deal with the impacts of the pandemic, including skills shortages, supply chain disruptions and unsettled financial markets, it is encouraging to see the role the CRC Program is playing in boosting Australia's competiveness and productivity to solve problems for industry and deliver real outcomes".

"The 2021–22 financial year has seen the program continue to be a highly competitive and sought after source of funding with demand from quality applications continuing to outstrip available funds. The Committee was pleased to support the funding of 35 CRC-Ps over Rounds 11 and 12 with grant funding totalling \$79.2 million and 3 CRCs, announced in May 2022, with \$154.4 million committed".

"Collectively, these projects continue to strengthen Australia's capabilities, particularly in the national manufacturing sector through the development of a skilled workforce and advanced technologies, buffering the volatility of overseas markets on our economy".

MS KYLIE SPROSTON CHAIR, CRCAC.

#### INDUSTRY INNOVATION AND SCIENCE AUSTRALIA | ANNUAL REPORT 2021-22

### Cooperative Research Centres Program

The CRC Program is a competitive, merit-based grant program that provides funding to support industry-led collaborative research partnerships solving industry-identified problems. The program aims to improve the competitiveness of Australian industries by fostering high quality research and encouraging small to medium enterprises (SMEs) participation in collaborative research.

The CRC Program has 2 streams:

 CRCs, which undertake medium to long term, industry-led collaborative research for up to 10 years. There is no set limit on grant funding, but it must at least be matched by cash and in kind contributions from CRC partners.

CRCs must have at least one Australian industry entity and one Australian research organisation as partners.

 CRC Projects (CRC-Ps) undertake short term, industry-led collaborative research for up to 3 years. Grants have a minimum funding limit of \$100,000, are capped at \$3 million and must have at least 2 Australian industry entities (one must be a small or medium enterprise) and one Australian research organisation as partners.

Over the life of the program (since 1990), \$5.5 billion of Australian Government funding has supported the establishment of 236 CRCs and 189 CRC Projects (CRCP). Partners have committed a further \$16.8 billion in cash and in-kind contributions.

During 2021–22, CRCs and CRC-Ps operated across a variety of sectors, including manufacturing, mining, healthcare, agriculture and the environment. The total Government commitment for new CRCs (3) and CRC-Ps (35) in 2021–22 was \$233.6 million, which leveraged over \$550.6 million in partner cash and in-kind contributions.

Round 23 CRC outcomes were announced in May 2022. A total of \$154.4 million was committed to fund 3 CRCs developing solutions across the composite manufacturing industry, antimicrobial resistance challenges and Murray Darling Basin competitiveness and resilience.

Round 11 and Round 12 CRC-P funding outcomes were announced on 3 September 2021 and 24 March 2022 respectively. Thirty-five projects were supported across both rounds, with grant funding totalling \$79.2 million. The Department of Infrastructure, Transport, Regional Development and Communications also provided \$6 million to support 2 regional CRC-Ps supporting the Government's Regional Decentralisation Agenda. Round 12 encouraged applications that focused on mRNA-based therapeutics and the priority technology stretch goals of the Technology Investment Roadmap.

The CRC Program is well placed to support the Government's objectives of helping Australian manufacturers scale-up, become more competitive and build more resilient supply chains. Round 11 of CRC-Ps included a focus on enhancing Australia's manufacturing capability, and saw a wide range of applications submitted that aligned to the 6 priorities. Round 23 of the CRC Grants stream, which opened in June 2021, also encourages applications that contribute to government priorities. Looking ahead, the CRC Program will continue to develop important, real world, solutions to improve the competitiveness, productivity and sustainability of Australian industries, strengthen the economy and create jobs. As the impact of COVID-19 continues to create uncertainty for businesses and the research sector, the CRC Program will continue to support businesses to innovate, collaborate and capture new market opportunities.

An impact evaluation of the CRC Program was conducted in 2021 and is currently being considered by the Department of Industry, Science and Resources. The evaluation focussed on analysing qualitative and quantitative outcomes, assessing the extent to which the program is delivering on its intent, overall impacts and value for money. It also explores the program's impacts on improving industry-research collaboration and commercialisation.

Both streams of the CRC Program are continuing to improve application and reporting systems. This will enhance the experience for applicants and grantees, while improving management and oversight of application processes and grant delivery.

For more information on the CRC Program, visit <u>www.business.gov.au</u>, or call 13 28 46.

### Active CRC-Ps and CRCs 2021–22

STATE	NUMBER OF CRC-PS (LOCATION OF LEAD PARTNER)	TOTAL CRC-P GRANT FUNDING (GST EXCL)	NUMBER OF CRCS (LOCATION OF HEADQUARTERS)	TOTAL CRC GRANT FUNDING (GST EXCL)
ACT	2	\$5,795,179	0	\$0
NSW	39	\$92,551,745	9	\$425,150,000
NT	0	\$0	0	\$0
QLD	27	\$56,960,554	2	\$106,001,000
SA	4	\$8,307,689	5	\$217,500,000
TAS	1	\$2,385,067	1	\$70,000,000
VIC	30	\$65,261,660	4	\$173,000,000
WA	14	\$29,169,301	6	\$201,500,000
Total	117	\$260,431,195	27	\$1,193,151,000



Nyngan, New South Wales, Australia. Image credit: Andrew Merry Gettyimages.

# **Case study**

The Cooperative Research Centre for Honey Bee Products (CRCHBP)

An enduring legacy driving value for the Australian honey bee industry.

Work by the CRCHBP has helped bring the Australian honey industry quality assurance program into the digital age.

2021–22 saw the final year of operation of the successful CRCHBP, awarded an Australian Government CRC Program Grant of \$7 million from July 2017 to June 2022. It resolved industry problems that limit both the value and expansion of the Australian honey bee products industry.

One such problem came to a head in 2018, with allegations, subsequently disproven, of adulteration of Australian honey (that is, claims the honey had been mixed with other non-honey substances). The claims harmed the industry and highlighted the need for an improved traceability system.

In response, the CRCHBP partnered with industry body B-QUAL Australia to create a new online honey traceability system.

"In the past, B-QUAL was paper-based, meaning it was time consuming to interrogate and to trace back into the supply chain," says Professor Sharon Purchase, the CRC's partnership leader from the University of Western Australia.

As well as tracking honey batches to their origins, the digital system brings many additional benefits. It is a secure platform for business data management, for audit purposes and business benchmarking.

"Australia is vast. Each region is so different. To continuously improve, beekeepers may want to compare their productivity with other beekeepers working in the same region. B-QUAL lets them do this," says Professor Purchase. Beekeepers will be able to download data to study apiary site honey yields over time, and to explore climate effects such as temperature and rainfall.

The system can provide insights to the impacts of resource security, such as forest logging, burn intensity and the vegetation recovery rate, which will help with hive placement planning.

Beekeepers participated in development of B-QUAL, as did AUSQUAL Pty Ltd, who monitor quality assurance compliance across Australia.

"The ability to trace Australian honey sources will also inherently increase biosecurity benefits for the industry by way of tracking disease or pest outbreaks through biogeographical regions," says Mr Don Muir, BQUAL director.

The B-QUAL system also includes a honey bee flora reference library, known as the Australian Honey Library. By accurately recording flowering history and nectar and pollen production, the Library opens the opportunity to add a new layer of honey assurance of Australian product and authenticity.

The CRCHBP partners have further extended the B-QUAL system to include a new function that details honey chemistry to capture information on the provenance of honey. This provides consumers with the assurance that every time they purchase Australian honey, they are getting what they paid for – a unique, high-quality product. It will also provide Australian beekeepers with a competitive advantage as Australian honey is pure, geographically diverse and sourced from healthy bees.



CRCHBP has helped bring the Australian honey industry quality assurance program into the digital age. Image credit: CRCHBP

To find out more about this and other work contributing to the enduring legacy of the CRC, visit: <u>www.crchoneybeeproducts.com</u>

# **Case study**

Australian medical device Stethee Pro

*Is the world's first US FDA approved Artificial Intelligence (AI) enabled stethoscope for cardiac and respiratory vital signs.* 

Al driven digital stethoscope enables real time medical diagnostics through cloud connection to remote devices.

A \$1 million CRC-P grant has helped M3DICINE Holdings Pty Ltd (M3DICINE) and its CRC-P partners devise a world-first AI driven digital stethoscope, providing powerful diagnostic capabilities to help tackle serious diseases such as paediatric pneumonia and heart disease. Soon to be available commercially in the US, Stethee Pro is expected to be available on the Australian market by the end of 2022.

The cloud based platform stethoscope is a revolutionary step in remote care and telemedicine, democratising the availability of medical services by allowing clinicians to capture and analyse patient vital sign data anywhere and anytime. Stethee Pro can provide a respiratory rate in just 20 seconds, greatly expanding the possibilities of telemedicine through monitoring and analysis. A powerful device for clinicians, the elegant and wireless design of the stethoscope also allows it to be used by patients at home to provide vital sign data to health-care providers during telemedicine consultations.

Lead partner M3DICINE is an Australian medical device and data platform company, focused on making high quality screening and diagnostic medical devices available to everyone through connected products, powered by intuitive and intelligent software. M3DICINE CEO Dr Nayyar Hussain says "M3DICINE's vision is to 'monitor the 'vital signs of the planet'... empowering healthcare professionals and patients with elegant devices and real-time clinical insights, to help in the diagnosis, treatment and management of cardiac and respiratory diseases."

Together with partners Queensland University of Technology and Kuraby Cardiac Investigation Centre, the CRC-P has contributed more than \$1.5 million in cash and in-kind contributions to fund research and collaborate with other industry, research and health partners around world to develop the world's first US FDA cleared AI driven compact digital stethoscope.

Heart disease is the leading cause of death worldwide, whilst paediatric pneumonia is the biggest killer of children under five years, particularly in developing countries. The CRC-P's research analysed pathology data collected from Australia and overseas to develop AI algorithms. Health providers can develop clinical treatment plans informed with real-time quantitative data to help manage these diseases.

As AI enhancements continue to be developed, downloadable software updates and new diagnostic algorithms will be made available for Stethee Pro users and subscribers.



Stethee Pro—the world's first US FDA approved AI driven digital stethoscope is a revolutionary step in remote care and telemedicine. Image credit: M3dicines Holdings Pty Ltd

The CRC-P's work contributes significantly to disease management and health knowledge worldwide. De-identified big health data collected by Stethee Pro can help the global health industry to understand chronic diseases as well as understand nationwide and global health trends.

## **Program Overview** Venture capital programs



"The Innovation Investment Committee has continued to witness strong interest from fund managers in the Government's venture capital programs. In the last year, there has been an increase in the number of partnerships registered and record amounts invested. Over the life of the programs, investors have agreed to commit over \$25 billion of capital to partnerships.

The Committee welcomed 4 new members in 2022 and is currently conducting meetings online. The Committee continues to focus on ensuring that funds meet their reporting obligations and relies on the Department's annual Compliance Response Plans to guide compliance work. Reporting has improved as a result of the Department's communication strategy with partnerships and the publication of information papers.

While partnerships seem to have generally been able to navigate their way through the COVID-19 pandemic, the recent volatility in global financial markets and changing economic conditions may throw up new challenges for the venture capital sector."

PROFESSOR STEPHEN BARKOCZY CHAIR, IIC

# Venture Capital programs

The Australian Government has a suite of programs designed to cultivate innovation and encourage venture capital investment in entrepreneurial start-up and early stage companies. These programs are designed to stimulate the Australian venture capital sector by attracting both domestic and foreign capital into Australian venture capital markets.

The Venture Capital Limited Partnerships (VCLP) program aims to stimulate Australia's venture capital sector by attracting foreign investors. A VCLP is entitled to flow through tax treatment and its foreign investors do not pay capital gains tax on their share of returns the VCLP makes from eligible venture capital investments. The program is also open to domestic investors. VCLPs benefit Australian businesses as they increase the level of foreign investment available in the Australian venture capital sector.

The Early Stage Venture Capital Limited Partnerships (ESVCLP) program aims to increase venture capital investment in start-ups and early stage companies. ESVCLPs offer flow-through tax concessions to investors on their share of returns, assisting fund managers to attract pooled capital. In addition, investors in ESVCLPs receive a 10% investor tax offset on capital invested during the year. ESVCLPs encourage investment in start-up enterprises with a view to commercialisation of activity and company growth.

Australian Venture Capital Fund of Funds (AFOF) are available to Australian resident general partners to pool capital from limited partners for investment into VCLPs and ESVCLPs.

Eligible Venture Capital Investor (EVCI) registration is available for tax-exempt foreign residents under the *Venture Capital Act 2002*. Under the incentive, EVCIs disregard their capital gains or capital losses from eligible investments they have held for at least 12 months. The Pooled Development Fund (PDF) scheme established under the *Pooled Development Fund Act 1992* (the PDF Act) closed to new entrants in 2007 and there are currently 17 registered PDFs. Oversight and compliance is managed by the Innovation Investment Committee. The PDF Act is actively monitored by the Department and reported to the Innovation Investment Committee on a regular basis.

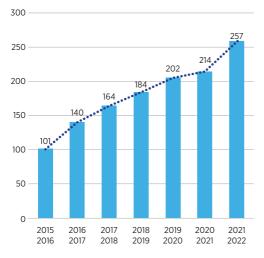
For example, one PDF had its licence revoked in the 2021–22 for non-compliance with the reporting requirements under the PDF Act.

As these are open ended funds, PDFs will continue to be monitored by the Department and the Innovation Investment Committee until the PDF Act is revoked, or there are no more registrants.

### **Program statistics**

Over their lifetime, the total capital committed by registered partnerships is \$25.41 billion with over \$12.79 billion invested into an estimated 2180 businesses.

### Number of registered partnerships



Growth of participation in VCLP, ESVLP and AFOF programs

There has been steady increase of investments over time, demonstrating the continued positive

impact of the VCLP program in attracting foreign investment into Australian businesses.

#### \$10.1bn \$10bn \$8.8bn \$7.7bn \$6.4bn \$5.6bn \$5bn \$4.5br \$3.7bn \$2.8bn \$1.5bn \$1.8bn \$2.0bn \$2.3bn \$0.2bn \$0.6bn \$0.9bn \$1.1bn \$ \$ \$ ).9b bn \$0.2bn \$0 \$0bn FΥ FY FY F١ F١ F FY F١ FΥ FY 13/14 06/07 07/08 08/09 09/10 10/11 11/12 12/13 14/15 15/16 16/17 17/18 18/19 19/20 20/21 21/22

#### Cumulative Invested Amount Financial Year • Invested Amount

Growth of VCLP partnership investments over time



As at 30 June 2022, there were 108 conditionally and unconditionally registered VCLPs. The committed capital is the amount investors have agreed to contribute to a partnership.

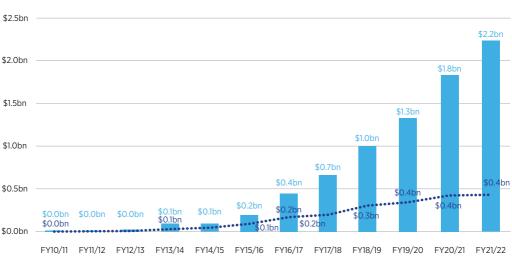
Disclaimer:

All figures are current according to latest data. This may vary from previously published data for the same time period due to additional information supplied by customers. Committed capital and investment data is based on preliminary financial year figures, current as at 30 June 2022.

### **ESVCLP** outcomes

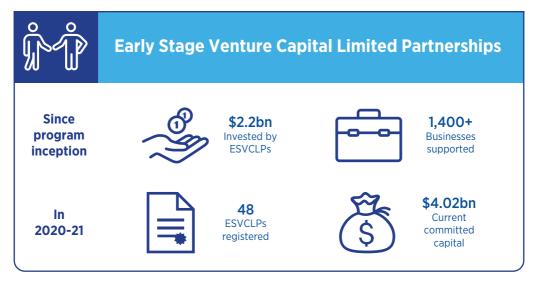
Boosting investment in Australian businesses is critical for commercialising new ideas and

encouraging new start-ups. A record \$170 million was invested in the December 2021 quarter.



#### Cumulative Invested Amount Financial Year • Invested Amount

Growth of ESVCLP partnership investments over time



As at 30 June 2022, there were 135 conditionally and unconditionally registered VCLPs. The committed capital is the amount investors have agreed to contribute to a partnership.

For more information detailed guidelines are available online for fund managers interested in establishing and registering venture capital partnerships. Companies seeking private investment to commercialise ideas and scale their businesses are encouraged to view the lists of registered partnerships and approach fund managers directly. <u>www.business.gov.au/venture-capital</u>

## **Case study**

Jelix Ventures—Is an Australian venture capital fund manager investing in early stage technology companies.

Jelix invests in daring founders to make the world better. It focusses on innovative technologies that provide a strong competitive advantage in a global market and start-ups operated by extraordinary founders



Andrea Gardiner, CEO, Jelix Ventures

Mitch Stevens, founder of Jelix portfolio company Wagetap, says that Jelix's main competitive advantage is the investors in its fund. Jelix investors are typically successful entrepreneurs that have great depth and breadth of experience in building and scaling early-stage technology companies and, together with the Jelix fund managers, provide game changing expertise and connections to portfolio companies. The venture capital sector within Australia has expanded significantly from near non-existence less than 10 years ago. This saw the value of companies such as Atlassian and Canva drastically grow and generated at least 25 Australian unicorns – startups now worth at least \$1 billion.



lan Gardiner, Investment partner, Jelix Ventures

Founders thinking of seeking investment from venture capital funds should be aware that it is not for everyone. Venture capital essentially helps accelerate company growth, but in return you are selling equity in your company. Ian Gardiner, an investor partner at Jelix Ventures, recommends *"the number one reason you should be doing it for is speed, so you can execute what you're trying to do faster".* 

Andrea Gardiner, CEO and founder of Jelix Ventures states *"ideally, those who want to raise and manage a venture capital fund, should have entrepreneurial expertise, funds that they can invest in themselves so that potential investors are comfortable that they've got skin in the game, and a strong investment track record."* 

For too long, venture capital within Australia has been afflicted with unconscious gender bias. Amongst those who are combating this problem is Andrea Gardiner who is "really proud that almost 40% of our portfolio founders are women and 50% of the Jelix team are women." Andrea, together with Ingrid Maes, founder and managing partner W23 ventures and Michelle Deaker, co-founder and managing partner of One Ventures, have recently launched WinVC to facilitate the success of women venture firm founders and investors and to attract more women into venture.

Jelix has an important role in the female-led environment as a result of Andrea Gardiner's leadership, work ethic and influence.

"Having Andrea as our founder, it sets an amazing example for women who want to get into the venture capital sector in Australia." Says lan Gardiner.

*"If there are any woman investors out there who want to establish an Early Stage Venture Capital fund, shout out."* 

ANDREA GARDINER CEO AND FOUNDER, JELIXVENTURES

## **Program Overview** Biomedical Translation Fund



"The past financial year saw the 3 Biomedical Translation Fund (BTF) fund managers making \$37.7 million of commitments into 5 new companies.

- 1. Acrux Ltd, \$5 million (BioScience Managers)
- 2. Axial Bio therapeutics Pty Ltd, \$10.6 million (OneVentures)
- Cynata Therapeutics Limited, \$10 million (BioScience Managers)
- 4. OccuRx Pty Ltd \$8 million (MRCF - BTF)
- 5. OncoRes Medical Pty Ltd \$4.1 million (MRCF - BTF)

"OncoRes Medical seeks to develop an intraoperative imaging technology to provide surgeons with real-time assessment of tissue microstructure. This will allow for the full excision of tumours during initial surgery, reducing the need for further procedures in the future.

"The BTF committee remained entirely virtual during this period and the previous experience gained during financial year 2020–21 was invaluable in allowing us to fulfil all our functions".

MR PETER WILLS AC CHAIR, BTF COMMITTEE.

# The Biomedical Translation Fund

The BTF is an equity co-investment venture capital program. It combines public and private funds to invest in high-growth potential companies working on medical innovations and supports the commercialisation of innovative biomedical research.

Funds for investment total more than \$500 million, made up of \$250 million of Commonwealth capital and \$251.25 million contributed by private investors.

Investing to develop and commercialise biomedical discoveries has twin benefits:

- translating cutting edge research into products and services that can improve the long term health of Australians
- supporting companies with high potential to grow the economy and create skilled employment opportunities.

As at 30 June 2022, BTF fund managers have publicly announced 27 investments totalling \$306.89 million into innovative biomedical companies.

Funding has been used to support the development of a range of biomedical discoveries, from new treatments of food allergies, autoimmune disease and women's health, to smart and robotic medical devices, artificial hearts and vaccines.

Three fund managers partnered with the Commonwealth and private investors to foster game-changing breakthroughs: Brandon Capital Partners, OneVentures Management and BioScience Managers. They demonstrate expertise in identifying high-potential companies, finding gaps in the market and growing concepts from seed to fruition. Biomedical discoveries include: therapeutic, medical or pharmaceutical products, processes, services (including digital health services), technologies or procedures that represent the application and commercialisation of the outcomes of research that serve to improve health and wellbeing. It does not include alternative or complementary medicine, or traditional medicine.

BTF fund managers not only invest in promising biomedical discoveries, they encourage the growth of companies developing products by providing guidance, skills, resources and expertise.

All BTF investment decisions are made by the selected fund managers. The Government has no role in selecting investments, technologies or markets, but ensures all investments are consistent with the requirements of the program guidelines. This approach has been taken to ensure the venture capital expertise required to invest in commercialisation opportunities is provided by those most qualified.

Announced in December 2015, the BTF was as a key initiative under the National Innovation and Science Agenda. The Department of Health has policy responsibility, while the Department administers the program.

Following a competitive, merit-based selection process, the 3 private sector BTF fund managers were licensed in December 2016. This process was conducted by the BTF Committee under the auspices of the IISA Board.

Support is available for early stage companies with intriguing ideas to pitch their proposal to the fund managers for a share in the dedicated venture capital on offer.

Find out more about the BTF fund managers and current investments via: <u>business.gov.au/BTF</u>

venture.capital@industry.gov.au

## **Case study**

One Ventures: Partners with BiVACOR to revolutionise heart-transplant technology

As a technology and healthcare investor, OneVentures' portfolio companies are creating thousands of jobs and supporting the economy over long periods of time. By bringing hands-on business experience and providing mentorship to key senior leaders, their contribution alongside their capital investment are designed to give their companies the best possible probability to succeed.

The BTF allows venture capital managers to invest in Australian commercialisation started in research organisations and universities, and turn them into commercial products of the future

"A lot of companies really need capital to scale. Putting in place the systems, processes, and practices that can really help a business to flourish, and I think that's what venture capital brings to the table" says Dr Michelle Deaker, the Managing Director of OneVentures.

The BTF provides \$501.25 million in capital that assists in supporting ground breaking innovation in Australia. A total of \$250 million is from Commonwealth capital and \$251.25 million is from private sector capital. Many companies could simply not otherwise raise the capital to overcome the barriers they face in the commercialisation process.

Dr Paul Kelly, the Founding Partner of OneVentures, states that he is most proud of BiVACOR, as it epitomises the role of the BTF.

BiVACOR is a preclinical stage medical device company developing the BiVACOR Total Artificial Heart (TAH), the first long-term therapy for patients with severe heart failure. The TAH is designed to replace the complete heart function of the native heart and address the global unmet need of patients with end-stage heart failure (HF) by providing a life-extending solution.

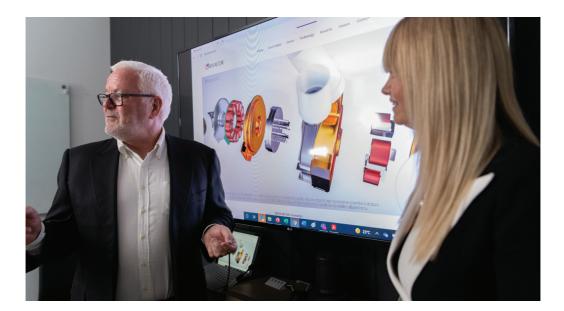
BiVACOR was founded by a bio-medical scientist at the University of Queensland, who originally started experimenting with an artificial heart in his kitchen and garage with his dad.

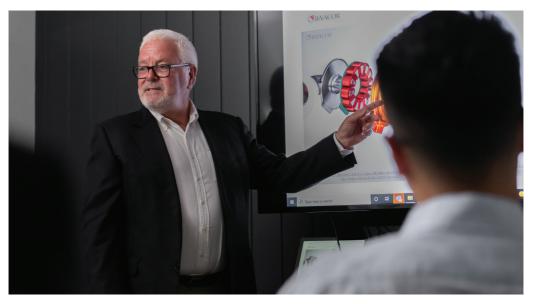
"Now this has the potential of transforming how heart failure is treated and replaces the need for heart transplantations" says Dr Paul Kelly.

"It's an Australian innovation, it's an Australian inventor, and we've supported it from benchtop through to the clinic, and that's what the BTF is all about."

The BiVACOR team doubled in size with 8 new hires in December 2021 and is actively preparing documentation for the FDA to approve use of the device in a clinical trial, following very positive results in animal trials. It is anticipated that first-in-human trials will commence in the coming 6–12 months.

Venture capital is a critical component for the progress of biotech innovation, providing both expertise and capital to help drive the success of businesses. For Dr Paul Kelly, venture capital helps bring those innovations into the world, ultimately transforming patient's lives.





Top photo: Dr Paul Kelly and Dr Michelle Deaker. Bottom photo: Dr Paul Kelly. Image credit: Screencraft Media

"Biotech is different to other industries who are able to generate revenue and scale quickly—often the process of R&D and the highly regulated environment for clinical trials means that investors need to take a very long term view. The BTF is an important initiative that supports innovation in companies who are changing the way patients will be treated in the future, ultimately providing better healthcare outcomes."

DR PAUL KELLY FOUNDING PARTNER, ONEVENTURES

## **Program Overview** Entrepreneurs' Programme



"Commercialisation is the key process that drives returns to R&D investment and innovation in the economy. The work of the Entrepreneurs' Programme Committee is to apply commercial experience across key sectors and independence to the merit assessment process. The Entrepreneurs' Programme Committee provides input to the Delegate regarding commercialisation challenges and opportunities that face both Accelerating Commercialisation applicants and national challenges facing Federal Agencies under the Business Research and Investment Initiative.

#### Accelerating Commercialisation (AC) is

merit-based program designed to assist meritorious businesses find early commercial success. The program was opened for applications on 1 November 2014 and has to date provided grants totalling just over \$296.5 million in matched grant funding. The AC program has provided guidance to almost 7800 applicants (as at 30th June 2022).

The Committee is now at full strength with 7 members whose experience and domain expertise include investing, building and commercialisation of digital, blockchain and web3 applications, biotech, medical and life sciences, mining and agritech applications, climate and sustainability technologies, impact investment and digital transformation. Committee meetings continued to undertake deliberations online in light of COVID and, have continued to be both productive and successful through the dedication and support of department staff and Committee members to draw on their insights and experiences.

Business Research and Innovation Initiative (BRII) continues to provide opportunities for Australian startups to work with APS agencies to develop innovative solutions to public policy and service delivery challenges. Two new rounds of BRII launched in 2021 providing 8 challenges.

Under the BRII Regulatory Technology (RegTech) Round, 17 SMEs shared in \$1.67 million in Feasibility grants to test technology solutions seeking to reduce regulatory burden. RegTech solutions streamline government administration and simplify regulatory compliance for businesses or individuals.

Under the BRII Automatic Mutual Recognition Round, 10 SMEs shared in \$674,277 to test innovative solutions to help with the Automatic Mutual Recognition of Occupational Registrations (AMR) for the Department of the Prime Minister and Cabinet. The AMR scheme removes the need for people to apply and pay for an additional registration or licence when working in another state or territory, saving them time and money making it easier for registered and licensed workers to work across state and territory borders".

MR ANTHONY SURTEES CHAIR, EPC.

## Entrepreneurs' Programme

The Entrepreneurs' Programme (EP) delivers advice and grants to enable high potential businesses to strengthen, grow, innovate and commercialise nationally and globally. In addition to improving outcomes for clients, it also improves outcomes for the broader economy, regions, industries and communities.

EP is delivered through a suite of unique offerings, including Accelerating Commercialisation, which offers expert guidance, connections and grants to help businesses and researchers commercialise their novel product, process or service.

Eligible businesses can apply for Commercialisation Guidance that allows them to receive tailored guidance and assistance to develop the commercialisation potential of their novel product, process or service. Guidance is provided by either a departmental officer or a facilitator. Following commercialisation guidance, businesses can apply for an Accelerating Commercialisation Grant. Applicants can access grants of up to \$500,000 for Research Commercialisation Entities and Eligible Partner Entities, or up to \$1 million for all other eligible applicants, matched by the applicants up to 50% for the eligible project. Since program inception in October 2014, Accelerating Commercialisation has awarded 588 grants worth \$290,319,736.

- Satisfaction rates from the EP Client Satisfaction Survey (2021) indicate the AC service has very high rates of client satisfaction (88%) of 163 respondents (144 respondents) were satisfied with the service).
- Post-service program data covering the period from AC's inception in October 2014 to December 2018 indicates the following in relation to AC grantees:
  - 72% attract new capital into their businesses
  - Collectively they have attracted an impressive \$553 million of new capital after leaving the program. This is a \$3.75 return on every dollar invested by the program
  - 68% increased turnover attributed to the commercialisation of their product, process or service
  - 73% growth in Full Time Equivalent positions.

Accelerating Commercialisation will continue to provide support and guidance to help business in a post COVID-19 global economy.

- 588 grants awarded
- grantees have attracted an impressive \$553 million of new capital after leaving the program.

This is a \$3.75 return on every dollar invested by the program.

## **Case study**

Sea Forest—Cultivating seaweed to reduce methane emissions and fight climate change

Tasmanian start-up company, Sea Forest, was founded by Stephen Turner as managing director, Sam Elsom as CEO and Dion Cohen as CFO. All shared the same vision: to create a global business based on a marine technology that would help the world's livestock industries eliminate their sizeable contribution to global warming. When used as an additive in livestock feed, Asparagopsis (seaweed) has been proven to reduce the animals' methane emissions by 98%.

Sam Elsom describes Sea Forest as a collaboration between scientists, business managers and marine farmers; people with very different backgrounds, but all required to make the venture a success.

Sea Forest and the development of cultivated Asparagopsis had its genesis in 2006 in research by the Commonwealth Scientific and Industrial Research organisation (CSIRO) followed up by Professor Rocky de Nys at James Cook University. The research identified the properties of the Asparagopsis for methane reduction. The science was published and peer reviewed, but it was still not known how to take this laboratory achievement to large-scale cultivation. This was the hurdle that Sea Forest was created to jump, using the intellectual property (IP) held by CSIRO.

In early 2021 Sea Forest was awarded the maximum \$1 million grant through the Government's Accelerating Commercialisation service.

The Accelerating Commercialisation program played a pivotal and timely role: "We'd raised a certain amount of money through Stephen Dion and I having backgrounds in establishing businesses. We had a great scientific team backing that up, but we were still developing the proof of concept and were limited in our ability to attract further funding."

"The Accelerating Commercialisation grant allowed us to bridge the R&D and the proof of concept for cultivating Asparagopsis on a commercial scale."

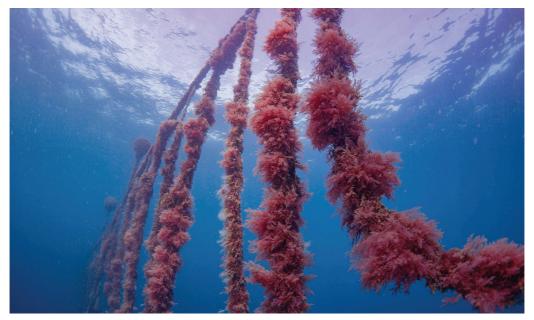
SAM ELSOM, CO-FOUNDER AND CEO, SEA FOREST

Dion Cohen says "this was aided significantly by the relationship the company guickly developed with its Commercialisation Facilitators. We had several conversations through 2019 and these provided very constructive guidance. In fact it was through those discussions that we were able to crystallise our thinking on how to organise the plant production facilities, the laboratory, hatchery tanks and marine farm, and also come up with detailed plans, milestones and costs. It was through the grant application process and working with i4 Connect that we really pulled all the numerous elements together. Cultivating Asparagopsis is complex you're starting with laboratory flasks, then small glass tanks, scaling up 1000 litre tanks and finally an 800 hectare marine farm."

Stephen Turner says that "the grant, when awarded, further built-up the business momentum". The company raised \$5m in early 2020 and raised a further \$34 million from investors in April 2021. As of September 2021 Sea Forests' capital value was \$55 million and it has seen growing international interest in the company and its technology, especially in countries like the United States and The Netherlands.



Two divers surfacing the ocean



Asparagopsis growing in the ocean

## **Case study**

Black Box Co—Transforming beef data into industry insights

Agtech start-up Black Box Co unlocks data from the beef industry to help producers become more productive, profitable and sustainable. AusIndustry has helped the business fast-track its development and scale-up quickly.



Shannon Speight Co-founder, Black Box Co

Emma Black and Shannon Speight launched Black Box Co in Northern Queensland in 2020. Their software analyses raw data from the beef supply chain and presents the results in easy-to-understand formats. This helps producers make decisions that will improve their farm performance.

Emma and Shannon saw an opportunity to do more with the large amounts of production data being collected in the beef industry every day. Their challenge was to develop software that could take raw data from multiple sources and analyse it to extract useful information. They also needed technology that was easy for producers to use. The response from customers when they launched their product in 2020 indicated they also needed to scale-up rapidly to meet demand.

AusIndustry helped Black Box Co navigate the intellectual property challenges that often come with technology start-ups through its Entrepreneurs' Programme Accelerating Commercialisation service. It also provided a \$334,532 Accelerating Commercialisation Grant in 2020.

"The Accelerating Commercialisation grant is a very rigorous and competitive process, a fantastic opportunity to really accelerate the foundation that we built at Black Box." Says Shannon Speight Co-founder, Black Box Co.

"AusIndustry took us through the process of how to apply for funding and improve our business development skills," says co-founder Shannon Speight. "It also assisted with mentors to guide us through our journey and, most importantly, the funding."

Shannon says receiving the AusIndustry grant has made it easier to attract investment. From a starting team of 3 in 2020, the business grew to 11 staff by 2022. It has been able to refine its software and invest in cloud-based solutions to scale-up quickly.



Shannon Speight Co-founder, Black Box Co and Donna Patane

"We've also gone from having around 200,000 animals on the database to over a million," says Shannon. Black Box Co aims to become the dominant data pooling and analysis source for livestock in the Asia Pacific by 2027.

## **Program Overview** Business Research Innovation Initiative

BRII is the Government's challenge-based innovation program. BRII provides opportunities for Australian SMEs to work with Australian Government agencies to develop novel solutions for public policy and service delivery challenges.

SMEs with the best proposed solutions for each challenge receive grants (up to \$100,000) to test the technical and commercial viability (feasibility) of their ideas over 3 months. SMEs who successfully complete this Feasibility stage are then eligible for a further grant (up to \$1 million) to develop a working prototype or proof of concept. Australian Government agencies work closely with SMEs to develop these solutions and, at the conclusion of the project, have the opportunity to procure the solutions. SMEs retain the rights to their IP and are encouraged to further commercialise their solution and explore in domestic and global markets.

As at 30 June 2022, BRII has launched 5 rounds (23 challenges) supported by 16 Government agencies over the life of the program. BRII has supported 81 innovative SMEs, providing 110 grants worth over \$32 million in grant funding to bring new products and technologies to market. Throughout 2021-22:

- 10 SMEs shared in \$9.9 million grant funding to commence Proof of Concept projects for the Priority Sectors Round. These projects relate to challenges in focussed on oceans, soil and water quality, and technologies advancing recycling.
- A BRII round focused on improving information sharing for occupational licensing and uptake of the Automatic Mutual Recognition scheme launched in October 2021. Grants totalling \$674,277 were awarded to 10 SMEs to test the feasibility of technology solutions which address this challenge.
- Seventeen SMEs leveraged \$1.67 million in grants to test the feasibility of solutions for the Regulatory Technology Round, responding to challenges focused on decreasing regulatory burden and streamlining regulatory processes.

BRII will continue as a demand-side innovation policy lever for Government agencies, to help stimulate SME research and development and deliver novel solutions to government challenges. BRII continues to gain interest from other portfolios and the Department is considering the future direction of the program following completion of an independent impact evaluation.

For more information on BRII and previous grant recipients, refer to <u>business.gov.au/BRII</u>.

## CHALLENGE SELECTION

- **1.** Australian Government Agencies submit challenges
- 2. Industry Innovation and Science Australia shortlist challenges through assessment process
- **3.** Minister approves shortlisted challenges
- **4.** Challenges are announced by the Minister

## FEASIBILITY STUDY

- **1.** SMEs apply to respond to a challenge
- 2. Industry Innovation and Science Australia assess applications
- Minister approves recommended applications for funding
- **4.** Successful SMEs conduct feasibility studies

## PROOF OF CONCEPT

- **1.** Successful SMEs apply for proof of concept grant
- 2. Industry Innovation and Science Australia assess applications
- **3.** Minister approves recommended applications for funding
- **4.** Successful SMEs conduct proof of concepts

# Case study

## Intelligent System Design

Utilising BRII funding and working with the (then) Department of Agriculture, Water and the Environment (DAWE) enabled Intelligent System Design (ISD) (formerly Industry Spec Drones) to develop technology to manage biosecurity risks. This project was in response to DAWE's challenge of tackling pests and diseases on incoming cargo containers.

Incoming shipping or sea containers are a pathway for hitchhiking pests, weeds and other contaminants to enter Australia. This creates a biosecurity risk to Australia's \$60 billion agriculture industry. DAWE conducts targeted physical inspections of containers to manage this risk – an often challenging, time-consuming and costly manual process that is predicted to become more challenging as trade volumes and container arrivals increase.

DAWE required an innovative, cost-effective solution that provided an alternative to human inspection. The solution needed to consider the efficient movement of containers and, among other things, use by a wide range of staff, real-time data capture, and operation in different environments. ISD developed the Hyperspectral Handheld Device that identifies hitchhiking pest materials on shipping containers using various wavelengths of light and integrated AI.

The AI detects and classifies pests based on differences in their spectral signatures. As the system works on individual pixels it can identify very small pests. This enables DAWE and biosecurity operators to quickly and easily identify threats in real time. The device is designed to access small tight areas, under vehicles, in machinery, and within containers. The versatility of the system ensures it can be used with no training in pest identification. This creates a much wider scope for the interception of pests entering the country through various logistics streams. The technology will have a significant impact in reducing the economic costs associated with pest incursions and helping to protect Australia's agriculture sector and natural resources.

The prototype has since been procured by DAWE for further trials and development. ISD expects the technology to be widely adopted through various departments, other agencies and internationally. The technology can also be used to classify other materials and the company are exploring alternative use cases for the technology that includes the addition of alternative sensors.



The ISD team at DP World (Sydney) testing the imaging systems developed using BRII Proof of Concept grant. Left to right: Jason Clissold, Brooke Mourtos, Paul Phillpott and Julian van den Berg. Image credit: ISD

In addition to positive commercialisation outcomes, BRII was instrumental in shaping the development and direction of ISD that was a young business when funding was awarded. ISD has grown significantly since then, attracting further venture capital and increasing in size. It also fostered a lasting collaboration with partner companies, original equipment manufacturer suppliers and DAWE.

"The BRII grant allowed ISD to develop a novel idea into a commercially viable product that is helping to protect Australia's agriculture sector and environment"

JULIAN VAN DEN BERG - CEO



Co-founders Julian and Jason pictured with the Handheld Device developed by ISD, which utilises multiple sensors including hyper-spectral and RGB cameras. The onboard AI is capable of detecting pests in real time alerting operations and biosecurity staff. Image credit: ISD

# Legacy programs

As at 30 June 2021 IISA continues to monitor the following programs that are closed to applications:

- Innovation Investment Follow-on Fund
- Innovation Investment Fund
- Pre-Seed Fund.

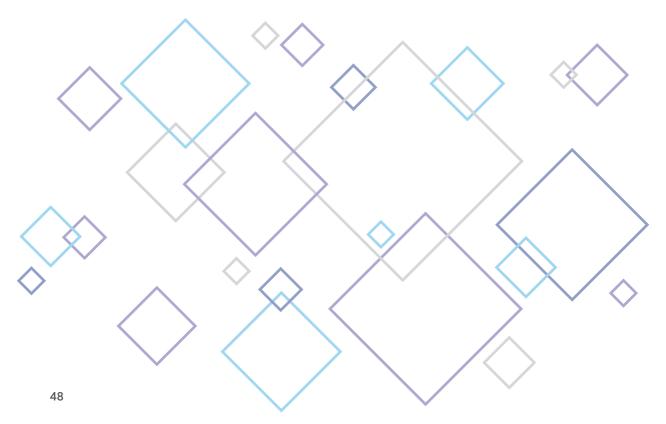
The department actively oversees the remaining Pre-Seed Fund, Innovation Investment Fund, and Innovation Investment Follow-on Funds (IIFF) programs. These 3 schemes are all closed to new entrants, with the last licence for a new fund granted in 2014.

In relation to the Pre-Seed Fund and IIFF programs there are 2 arrangements in place for the realisation of assets. All other funds under these programs have been wound up in an orderly manner and the realisations of the assets distributed appropriately. Upon exits from any of these vehicles, the Department conducts a wind-up audit to ensure that all measures have been taken appropriately to protect the Commonwealth.

There are currently 7 Innovation Investment Funds active, with a total of \$320,000,000 in committed capital, of which 50% is from the Commonwealth.

There are 2 Innovation Investment Funds approaching wind up in 2022–23.

The department takes an active role in monitoring compliance with these funds and receives monthly and annual reporting on the performance of the funds, and has bi-yearly supervisory board meetings attended by a representative of the Commonwealth. On exit from these funds, a wind-up audit is conducted to ensure that there are no enduring Commonwealth responsibilities. Some of the funds are also registered under the *Venture Capital Act 2002* and their compliance is overseen by the Innovation Investment Committee as well as the department.



## Section Two GOVERNANCE

Industry Innovation and Science Australia

Legislation

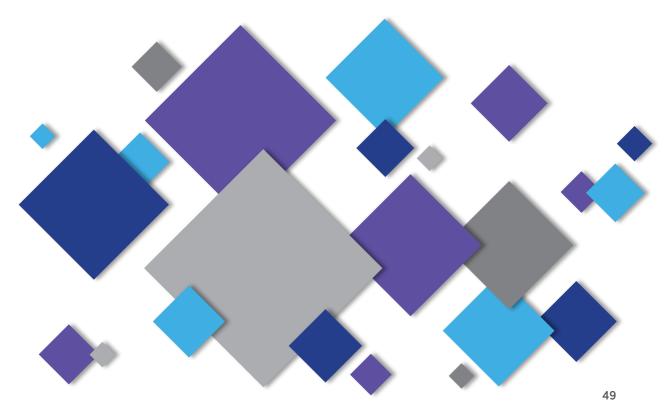
Organisation and Management

Board and Committee Membership in 2021-22

Meetings of Industry Innovation and Science Australia in 2021-22

Structure of Industry Innovation and Science Australia

Legal Matters/Litigation



## Industry Innovation and Science Australia

Through IISA's partnership and administration of the Government's industry, research and development, innovation and venture capital programs, it seeks to encourage a more entrepreneurial Australian innovation, science and research system.

In 2021-22, IISA reported to the Minister for Industry, Science and Technology, the Hon Christian Porter MP and subsequently the Minister for Industry and Technology, the Hon Angus Taylor until 31 May 2022. From 1 June 2022, IISA reported to the Minister for Industry and Science, the Hon Ed Husic MP, in accordance with the Board's legislative requirements as described below.

# Legislation

# The Industry Research and Development Act 1986

IISA operates under the authority of the Industry Research and Development Act 1986 (IR&D Act). The aims of the IR&D Act are to:

- facilitate the provision of independent strategic advice about investment in industry, innovation, science and research
- supporting and encouraging collaboration in the development and delivery of programs relating to industry, innovation, science and research
- authorising spending on programs relating to industry, innovation, science and research
- promote the development of, and improve the efficiency and international competitiveness of, Australian industry by encouraging research and development, innovation and venture capital activities.

## IISA functions and powers

IISA's functions are set out in the IR&D Act and associated Ministerial Directions.

The Board's responsibilities include:

- provision of independent strategic whole-of-government advice to government in relation to industry, innovation, science and research matters
- promotion of investment in industry and Australia's innovation, science and research system
- co-administration, monitoring and operation of the R&D Tax Incentive
- registering, monitoring and revoking the registrations of Venture Capital Limited Partnerships and Early Stage Venture Capital Partnerships
- co-administration and oversight of the Cooperative Research Centres Program
- strategic oversight of the Entrepreneurs' Programme, which includes administration and monitoring of the Accelerating Commercialisation and Incubator Support Initiative
- monitoring ongoing projects under programs which are now closed to applications (see list of legacy programs on page 48)
- advising the Minister about the operation of the IR&D Act, the Pooled Development Funds Act 1992, the Venture Capital Act 2002, and the Commonwealth's Income Tax Assessment Act 1997 as they operate in relation to those Acts.

Ministerial Directions issued to the former Innovation and Science Australia Board and the IISA Board also provided additional functions for IISA, which were undertaken in the 2021–22 reporting period.

In December 2020, the then Government provided IISA with a SOE outlining IISA's core objectives and activities. These objectives and activities support work to drive investment in innovation that will build prosperity across the country and broaden Australia's industrial base. IISA worked on 3 priority tasks set out in the SOE: an impact assessment of Venture capital tax concessions, a report on the investment characteristics of successful Australian innovative businesses, and an evaluation of cross-cutting issues for the Australian manufacturers following on from road maps developed for the National Manufacturing Priority areas. Further information on these pieces of work can be found in the Strategic Advice section of this report.

# Financial responsibilities of IISA under the IR&D Act

IISA has no financial responsibility for program-related grants, loan or licence agreements entered into after 10 September 2004. This follows amendments to the IR&D Act which came into effect on 11 September 2004, and removed powers of the former Innovation Australia to commit, approve or recommend expenditure of government funds and further safeguarded members from any personal liability stemming from board membership.

## Organisation and Management

IISA uses a committee structure to support administration and provide expert advice on innovation and venture capital programs. As at 30 June 2022, 5 committees reported to IISA; each committee has the following specific functions:

 Research and Development Incentives
 Committee – This committee is responsible for advising the Board about the operations of the R&D Tax Concession program for income years commencing before 1 July 2011 and the R&D Tax Incentive program for income years commencing on or after 1 July 2011. The Committee advises on operational policy as well as providing certificates to the Commissioner for Taxation about the eligibility of activities registered for the concession and the incentive. The R&D Incentives Committee met 7 times in 2021-22

- Cooperative Research Centres Advisory
   Committee This committee has an
   ongoing role to provide advice and
   recommendations on applications for
   funding, the progress and performance of
   individual CRCs, and the operation of the
   CRC Program. The CRC Advisory Committee
   met 5 times in 2021-22
- Innovation Investment Committee

   This committee is responsible for administering the venture capital programs and providing guidance to the Department throughout the programs' lifecycles.
   This includes decisions on registration and decisions relating to compliance and interpretation. The IIC Committee met 9 times in 2021-22
- Biomedical Translation Fund Committee

   This committee administers the BTF program and guides the Department throughout the lifecycle of the program.
   The BTF Committee did not meet in 2021-22.
- Entrepreneurs' Programme Committee

   This committee is responsible for
   providing merit assessments and merit
   ranking recommendations on applications
   under the Accelerating Commercialisation
   and the Incubator Support Initiatives.
   The Committee also provides merit
   assessments for the Business Research
   Innovation Initiative which supports
   Australian businesses to develop innovative
   solutions that address persistent government
   challenges. The EP Committee meet 12 times
   in 2021-22.

# Board and committee membership in 2021-22

## Membership

Members of the IISA Board are appointed by the portfolio Minister, in writing. The IR&D Act provides for a maximum of 15 members, including the Chair, Deputy Chair and an ex-officio member. Four members of the IISA Board constitute a quorum.

IISA committee members are appointed by the portfolio Minister and operate under delegation from the IISA Board. Committees comprise a chair and up to 6 members, with 3 committee members constituting a quorum. These committees also include departmental members.

IISA (Board and committee) members are individuals with an appropriate mix of professional and technical expertise across a broad section of industries, technologies and capital markets, as well as experience in commercialisation of industry innovation, corporate governance and business finance.

The IISA Board and its committee members, other than the departmental members, are remunerated in accordance with determinations set by the Remuneration Tribunal.

## Conduct

As statutory office holders, Board and committee members are bound by the Australian Public Service Code of Conduct as per sections 13 and 14 of the *Public Service Act 1999.* 

# Office of Industry Innovation and Science Australia

Whilst IISA is independent of government by virtue of its founding statute, it is supported by the OIISA, which is located within, and supported by the Department. As part of the development of its advice to Government, IISA (through OIISA), undertakes consultation with relevant government portfolios, industry, the innovation community, and the research and science communities.

OIISA supports the IISA Board and is led by Executive Director, Tanya Blight, this role is appointed by the Department. OIISA also has a dedicated Board Manager. OIISA has staff across three office locations, Canberra, Adelaide and Brisbane. OIISA staff as at 30 June 2022 included 12 full time staff and a first year graduate.

## Partners in delivery

The Department staff in the national, state, territory and regional offices provide project reporting, technical assessment and promotional services for the programs that IISA oversees. The Department officers also advise customers about the range of government industry support programs.

The Department (on behalf of IISA) and the ATO jointly administer the R&D Tax Incentive, the R&D Tax Concession, the Venture Capital Tax Programs and Pooled Development Fund. The Department manages the registration of research and development activities and conducts compliance reviews related to the eligibility of these activities.

The ATO determines if the research and development expenditure claimed in a tax return is eligible.

The Department of Health has policy responsibility for the BTF and the Department is responsible for administering the Fund.



Office of Industry Innovation and Science Australia staff based in Canberra.



Office of Industry Innovation and Science Australia staff based in Brisbane.



Office of Industry Innovation and Science Australia staff based in Adelaide.

#### Industry Innovation and Science Australia Membership - Board members as at 30 June 2022

#### CHAIR



Mr Andrew Stevens 20 December 2018 to 19 December 2021 (Chair)

21 December 2021 to 6 February 2022 (Acting Chair)

7 February 2022 to 17 December 2024 (Chair)

#### **DEPUTY CHAIR**



Dr Catherine Foley AO Australia's Chief Scientist 1 January 2021 to 31 December 2023



Ms Lauren Stafford Manager, Open Innovation at Woodside Energy Limited 7 October 2020 to 6 October 2023



Mr Patrick Houlihan Chairman and CEO, DuluxGroup Limited

Chairman Murdoch Children's Research Institute 7 October 2020 to 6 October 2023



Dr Scott Farrell Partner, King & Wood Mallesons 7 October 2020 to 6 October 2022



Ms Sarah Nolet CEO, AgThentic 7 October 2020 to 6 October 2022



Dr Alexander Grant Co-Founder, Myriota Pty Ltd 7 October 2020 to 6 October 2022



Ms Glenys Beauchamp

Chair of Australian Government Boards and a non-exec board director. 1 January 2021 to 31 December 2023



Dr Doron Samuell Founder, owner and Practice lead at Behaviour 11 April 2022 to 10 April 2025



The Secretary, Mr David Fredericks, PSM Department of Industry, Science, Energy and Resources 3 February 2020 to 30 June 2022

Professor Elanor Huntington Dean of Engineering and Computer Science at the Australian National University 20 Dec 2018 to 19 Dec 2021



Professor Raoul Mortley AO Principal, Raoul Mortley Consulting Chairman Spee3D 20 Dec 2018 to 19 Dec 2021

#### Members who retired from the Board in 2021–22

## **Committee Tables**

### **R&D Incentives Committee**

#### **R&D INCENTIVES COMMITTEE MEMBERS TERM OF APPOINTMENT**

Ms Julie Phillips, Chair	CEO, BioDiem Ltd	15 November 2021 to 14 November 2024 (Chair) 16 August 2019 to 31 October 2021 (Chair) 1 November 2018 to 31 October 2021 (member) 14 September 2015 to 13 September 2018 (member)
Mr Lachlan James	Executive Director of Frontier Fund Management & ITP renewables CEO of Haystack HQ	4 April 2022 to 3 April 2024 4 April 2019 to 3 April 2022
Ms Geraldine "Gerry" Farrell	Chief Compliance Officer Cann Group	31 March 2022 to 30 March 2025
Mr Mark Stevens	Managing Director, ActionTech	11 September 2019 to 10 September 2022

#### Cooperative Research Centres (CRC) Advisory Committee

#### CRC ADVISORY COMMITTEE MEMBERS TERM OF APPOINTMENT

Ms Kylie Sproston, Chair	CEO, Bellberry Ltd	18 June 2021 to 17 June 2024 (Chair) 18 June 2018 to 17 June 2021 (Chair) 20 October 2016 to 17 June 2018 (member)
Dr Damian Barrett	Research Director, Onshore Gas Program Director, Gas Industry Social & Environment Research Alliance (GISERA) CSIRO	9 April 2022 to 8 April 2025 9 April 2019 to 8 April 2022
Mr Douglas Stuart	Chief Marketing Officer, Instaclustr	20 June 2020 to19 June 2023 20 June 2017 to 19 June 2020
Professor Wendy Erber	Professor of Pathology and Laboratory Medicine, The University of Western Australia	18 November 2020 to23 August 2023
Professor Bronwyn Harch	Executive Director, Institute for Future Environments, QUT	24 August 2020 to23 August 2023
Ms Denise Goldsworthy AO	Chancellor Edith Cowan University	17 November 2021 to 16 November 2024 08 August 2018 to 07 August 2021

#### **Innovation Investment Committee**

#### INNOVATION INVESTMENT COMMITTEE MEMBERS TERM OF APPOINTMENT

Professor Stephen Barkoczy Chair	Professor, Faculty of Law, Monash University	20 April 2022 to 19 April 2025 (Chair) 20 April 2019 to 19 April 2022 20 April 2016 to 19 April 2019
Ms Lynda Coker	Entrepreneur in Residence 1835i Non-Executive Director Scale Investors Ltd	31 March 2022 to 30 March 2025
Ms Tara Munro-Mobbs	Principal Adviser Proximity	31 March 2022 to 30 March 2025
Mr Jeremy Samuel	Founder & Managing Director, Anacacia Capital	31 March 2022 to 30 March 2025
Mr Dion Smith	Director Sales and Marketing MineARC Systems	7 April 2022 to 6 April 2025

#### Entrepreneurs' Programme Committee

#### ENTREPRENEURS' PROGRAMME COMMITTEE MEMBERS TERM OF APPOINTMENT

Mr Anthony Surtees, Chair	Co-founder and Director of Marketing and Strategy, Zeetings Pty Ltd	4 April 2022 to 3 April 2025 (Chair) 1 November 2018 to 31 October 2021 (Chair) 19 July 2017 to 31 October 2018 (member) 1 July 2015 to 30 June 2017 (member)
Ms Bessi Graham	Co-Founder, Benefit Capital	29 January 2022 to 28 January 2025 29 January 2019 to 28 January 2022
Dr James Williams	Investment Director Yuuwa Capital	19 July 2020 to30 June 2023 18 July 2017 to 17 July 2020
Mr Paul Hunyor	Co-founder Wollemi Capital	11 August 2021 to 10 August 2024
Ms Nicola Hazell	Inclusion Innovation Lead Amazon Web Services	4 April 2022 to 3 April 2025
Mr Peter Bradd	Chief Executive Officer The Beanstalk Factory	4 April 2022 to 3 April 2025
Mr Mitchell Hooke AM		4 April 2022 to 3 April 2025

## Meetings of Industry Innovation and Science Australia in 2021-22

During the 2021-22 financial year IISA held 4 formal board meetings. Members attended either in person (when possible) or virtually (if travel or health restrictions existed), at the time of each meeting.

Virtual meeting
Melbourne
Adelaide
Brisbane

IISA also held a number of out of session meetings to consider matters.

# Structure of Industry Innovation and Science Australia as at 30 June 2022

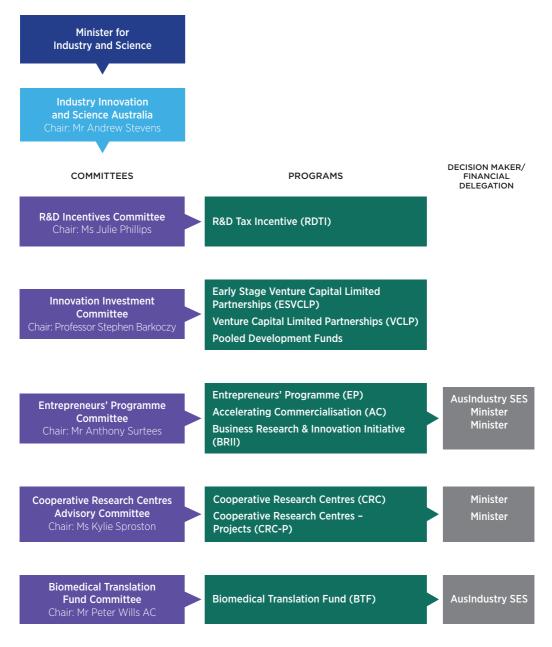


Figure 1: Articulates the Program oversight responsibilities of IISA through its committees and the ultimate decision makers and financial delegation for relevant grant programs

# Legal matters and litigation

### Research & Development Tax Incentive (R&DTI)

In 2021-22, 3 new applications were made seeking review of IISA's internal review decision in the Administrative Appeals Tribunal (AAT) and 1 new application seeking review of a Federal Court of Australia (FCA) decision to the Full Federal Court of Australia (FFC).

Ten AAT matters were resolved (1 withdrawn by the applicant and 9 resolved by consent orders after agreement was reached between the parties). There were no AAT matters that proceeded to final hearing in the 2021-22 year. There were no AAT judgments handed down on an RDTI matter involving IISA during the 2021-22 period.

IISA was the respondent in an appeal to the FCA involving a decision of the AAT. In Ultimate Vision v IISA, the FCA affirmed the decision of the AAT (in favour of IISA) on 24 May 2022. The Applicant then appealed this FCA decision to the Full Federal Court of Australia (FFC) on 21 June 2022. The FFC matter has not yet been listed for final hearing—it is not expected to be listed for hearing in 2022.

IISA was also the respondent in an application to the High Court of Australia seeking review of an FFC decision—*Coal of Queensland v IISA*. The High Court dismissed the application on 2 September 2021. The tables below summarises the status of the AAT and court proceedings for R&DTI matters for the 2021-22 year.

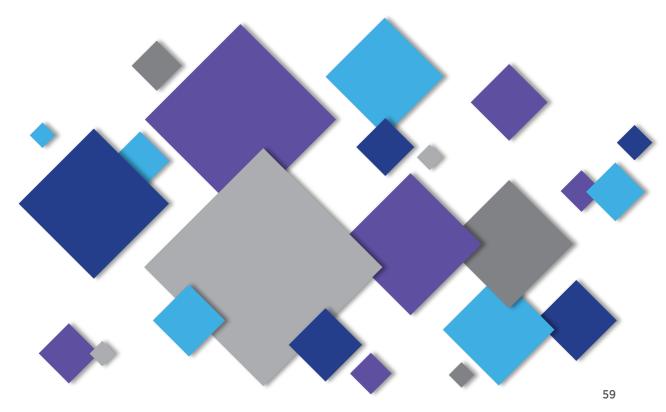
	HIGH COURT OF AUSTRALIA	FEDERAL COURT OF AUSTRALIA	ADMINISTRATIVE APPEALS TRIBUNAL
Current matters as at 30 June 2022 (IISA as respondent)	0	1	12
New matters during 2021–22 (IISA as respondent)	0	1	3

RESOLUTION OF MATTERS DURING 2021-22	HIGH COURT OF AUSTRALIA	FEDERAL COURT OF AUSTRALIA	ADMINISTRATIVE APPEALS TRIBUNAL
Decision	1 dismissal	1	0
Withdrawal			1
Agreement (Consent Orders)			9

## Venture Capital Program

In 2020-21, MEC Resources Ltd (Applicant) made an application to the Tribunal for review of IISA's internal review decision. The internal review affirmed the initial decision to revoke the Applicant's registration declaration under paragraph 47(1)(a) of the Pooled Development Funds Act 1992. (PDF Act). The matter was heard before the Tribunal on 9 June 2022. The Department is waiting for the Tribunal to hand down its decision.

# ACRONYM LIST



# Acronym list

Α	
AAT	Administrative Appeals Tribunal
ABS	Australian Bureau of Statistics
AC	Accelerating Commercialisation
AFOF	Australian Venture Capital Fund of Funds
AM	Member of the Order
AO	Officer of the Order
APS	Australian Public Service
ATO	Australian Taxation Office
ATSE	Academy of Technology and Engineering
В	
Board	Industry Innovation and Science Australia Board
BRII	Business Research Innovation Initiative
BTF	Biomedical Translation Fund
С	
CEO	Chief Executive Officer
CRC	Cooperative Research Centres
CRCHBP	Cooperative Research Centre for Honey Bee Products
CRC-P	Cooperative Research Centres Projects
CSIRO	Commonwealth Scientific and Industrial Research Organisation
D	
DAWE	Department of Agriculture, Water and the Environment
DISER	Department of Industry, Science, Energy and Resources
DISR	Department of Industry Science and Resources
E	
EP	Entrepreneurs' Programme
EPC	Entrepreneurs' Programme Committee
ESVCLP	Early Stage Venture Capital Limited Partnerships
EVCI	Eligible Venture Capital Investor

F	
FCA	Federal Court of Australia
FFC	Full Federal Court of Australia
I	
ICC	Innovation Investment Committee
IIFF	Innovation Investment Follow on-Funds
IISA	Industry Innovation and Science Australia
IR&D	Industry Research and Development
IR&D Act	Industry Research and Development Act 1986
IS	Incubator Support
ISD	Intelligent System Design
ISI	Incubator Support Initiative
ISR	Innovation, Science and Research
L	
Ltd.	Limited
м	
MEC	MEC Resources Ltd.
MMI	Modern Manufacturing Initiative
Ν	
NMP	National Manufacturing Priority
0	
OIISA	Office of Industry Innovation and Science Australia
Ρ	
PDF	Pooled Development Fund
PSM	The Public Service Medal
Q	
QUT	Queensland University of Technology
R	
R&D	Research and Development
R&DTI	Research and Development Tax Incentive
RegTech	Regulatory Technology
RMIT	Royal Melbourne Institute of Technology

### S

Substituted Accounting Period
Small and Medium Enterprise
Statement of Expectations
Statement of Intent
Total Artificial Heart
Industry Innovation and Science Australia Board
Venture Capital Limited Partnerships

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