

Curtin Credentials

Design Thinking for Educators around SDG









Increase your ability to embed design thinking into your teaching practice and to support your students as they examine real-world issues through a design-thinking lens.

This credential considers the United Nations' Sustainable Development Goals and explores social issues through a design-thinking approach.

In the course you will identify, define and scope out a local social problem or issue and apply a designthinking process to propose a solution. You may then design, create and implement the solution. This will be the process that you will support your students through to gain agency and solve real world wicked problems.

You will also identify the integrated curriculum concepts of the project and develop a lesson sequence that incorporates your project into your classroom learning.

Who is this credential for?

This credential is suitable for all teachers and education professionals. The course supports teacher confidence in the creation of integrated experiences in STEM and beyond and aligns with AITSL standards in designing, creating and assessing lesson plans.

Design Thinking for Educators is an Extend credential, which provides intermediate knowledge and skills in a discipline. Extend credentials usually require related prior learning or experience.

What you will learn

By completing this credential you will learn to:

- · Review the importance of STEM education and identify the United Nations Sustainable Development Goals (UNSDGs) exploring the Goals and targets in your specific context.
- Demonstrate and evaluate your ability to ideate, scope, collaborate, communicate, and problem-solve a challenging project that addresses environmental, social, health, and/or cultural issues around the UNSDGs.
- Demonstrate your ability to embed the designthinking process into your classroom curriculum and reflect on the effectiveness of the project.

Key Topics

Your learning journey includes access to five online modules.

Module 1 – Explore STEM integrated education in your school and in the classroom.

Module 2 - United Nations and Sustainable Development Goals (SDGs).

Module 3 – Design thinking models and inquiry thinking.

Module 4 – Using a design thinking approach to address a real world 'wicked' problem.

Module 5 - Integrating design-thinking into classroom practice and collecting assessment evidence.

Assessment

To successfully complete this credential, you are required to pass a final assessment. To demonstrate what you have learned, you will complete and upload learning artifacts that when combined, will demonstrate authentic competency. These artifacts will also provide you with a sequence of lessons that can be embedded into you contextual practice.

Earn a badge

Once you successfully complete and pass the final assessment, you'll earn a digital badge that is instantly shareable to your social networks (including LinkedIn) which showcases your new skills and knowledge mastery.



This credential allows you to acquire intermediate knowledge and skills in a discipline. This credential usually requires you to have some related prior learning or experience.

You will also earn 5 credit points which are in line with <u>Australian Qualification Framework</u> Level 8 criteria, ensuring comprehensive theoretical and/or technical knowledge of the credential. 100 credit points are required to earn a Graduate Certificate at Curtin.

Discover more

Curtin Credentials focus on five themes, which have been carefully curated based on what's most relevant and valuable to professionals today, and in the future. This credential fits within the following theme:



Future of Work

Thrive and adapt in the changing world of work by developing and broadening your skillset in a range of areas including work design and cognitive flexibility.



Innovation

Unleash your inner entrepreneur and blend your creativity and problem-solving skills to create valuable new products and services.

Make tomorrow better.

This publication is available in alternative formats on request.

- * Curtin may cancel or reschedule a credential at any time and for any reason as it sees fit. The Start Date and the other details of this credentials are provided as a general guide only and may change from time to time.
- † This credential involves 30 hours of online resources, readings, activities and assessments at your own pace. However to pass and gain 5 credit points, you may need to commit further time.
- ^ Learning is done completely online
- § Price subject to change. Please check price at time of purchase.

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creds.curtin.edu.au



more information

Curtin Credentials

Poetal Address GPO Box U1987

Perth Western Australia 6845

Tel: +61.8.1300.222.888

Email: curtincredentials@curtin.edu.au

Web: creds.curtin.edu.au

Meet your facilitators



Dr Rachel Sheffield

School of Education

Dr Sheffield is a Professor in the School of Education at Curtin University, Australia and is a passionate science educator and the Chair of the prestigious Curtin Academy which supports and celebrates excellent teaching. She has won several Faculty, University and National awards for Teaching Excellence, and was awarded an Executive Endeavour Fellowship. Her work with the STEMinist group through grants has seen her supporting pre-service teachers, teachers and primary students globally. In 2020 she was inducted into the WA Women's Hall of Fame for her 30 years of service to STEM and Science Education. Rachel was a 2019 Homeward Bound participant selected as an acknowledgement of her work and influence in science education promoting women in STEM and supporting and collaborating with STEM women from around the world. In 2022, she was commissioned by UNESCO under the authority of the Director of UNESCO Asia and Pacific Regional Bureau for Education to report on global citizenship education (GCED) in the Asia-Pacific region. She has been teaching design thinking for a number of years including an international transdisciplinary program with 202 tertiary students.



https://www.linkedin.com/in/rachel-sheffield/



Dr Rekha Koul

School of Education

Dr Rekha Koul is a Professor, Deputy Head of School and Discipline Lead at STEM Research Group, School of Education, Curtin University, Australia. She has over three decades of teaching and research experience. She sits on various advisory and editorial boards. Her expertise lies in the development, refinement and validation of questionnaires; investigations of the effects of classroom environments on student outcomes; evaluation of educational programs; teacheraction research aimed at improving their environments and evaluation of curriculum. She is well published and has won research grants, has delivered invited keynote addresses in various countries and also conducts teacher professional learning workshops.



https://www.linkedin.com/in/rekha-koul-0b331826/

For more information



Curtin Credentials

Postal Address GPO Box U1987 Perth Western Australia 6845

Tel: +61 8 1300 222 888

Email: curtincredentials@curtin.edu.au

Web: creds.curtin.edu.au