

BENDIGO TECH SCHOOL

LA TROBE
UNIVERSITY

THE
EDUCATION
STATE

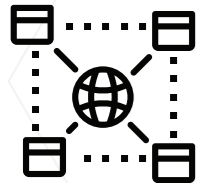
VICTORIA
Department of
Education and Training



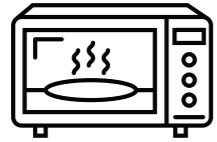
Futures Cone

What do you know about the past?

Below are several technical innovations from the past 60 years. Do you know the year they were introduced? Draw a line to the correct spot on the time-line below.



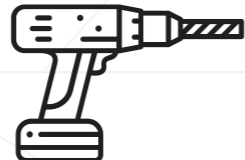
internet



microwave oven



wi-fi
(standard)



cordless tools



video games



cellphone



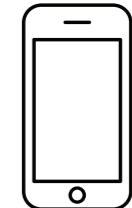
reusable
spacecraft



personal
computer



portable music
(walkman)



iphone



gps

1950

1960

1970

1980

1990

2000

2010

2019

What can you predict about the future?

The future is hard to predict.

What is: **Possible** (they might happen), **Plausible** (they could happen), **Probable** (likely to happen) and **Preferable** (what / want to happen).

In the space below, write (or draw) as many things as you can think will be part of your future.

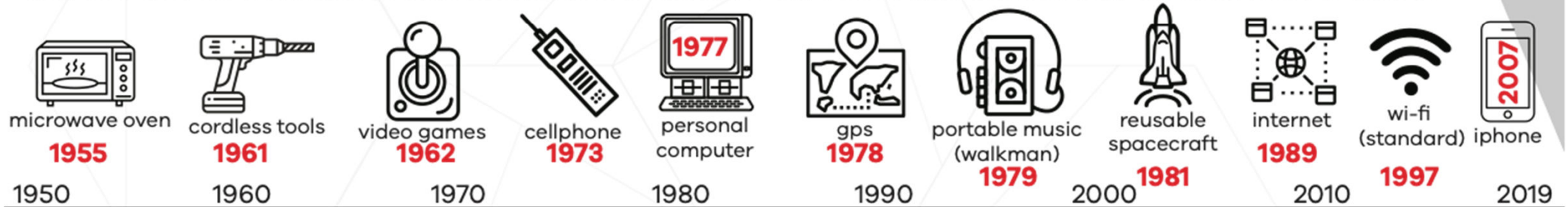
How can you achieve the future you want?

What can you do today? What will you need to do tomorrow?:

Futures Cone

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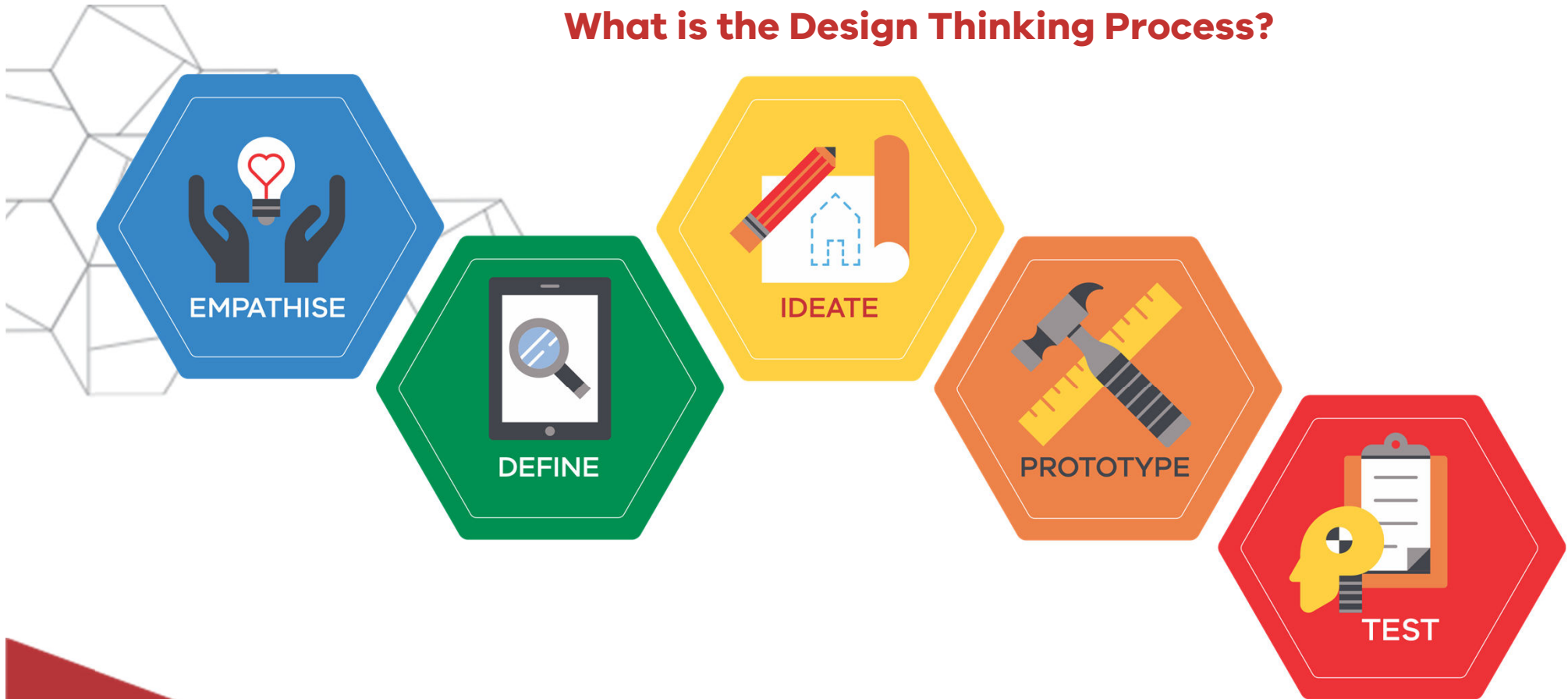
What is: **Possible** (they might happen), **Plausible** (they could happen), **Probable** (likely to happen) and **Preferable** (what I want to happen).

In the space below, write (or draw) as many things as you can think will be part of your future.



Introduction to Programming

What is the Design Thinking Process?



Team Charter

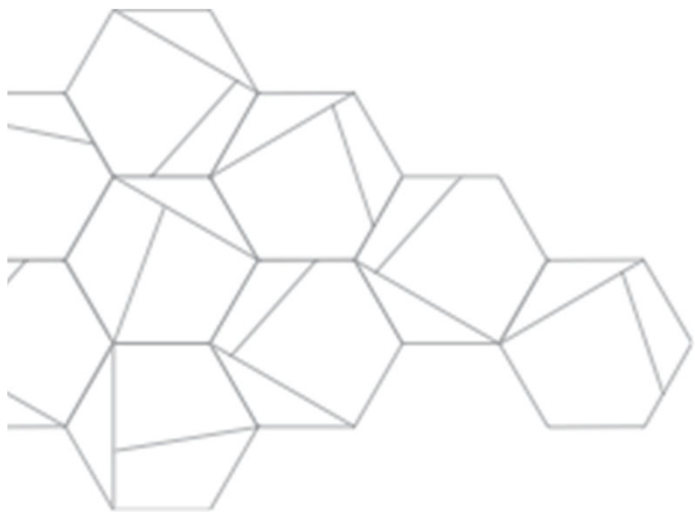
our individual values:

our group values:

- 1.
- 2.
- 3.
- 4.
- 5.

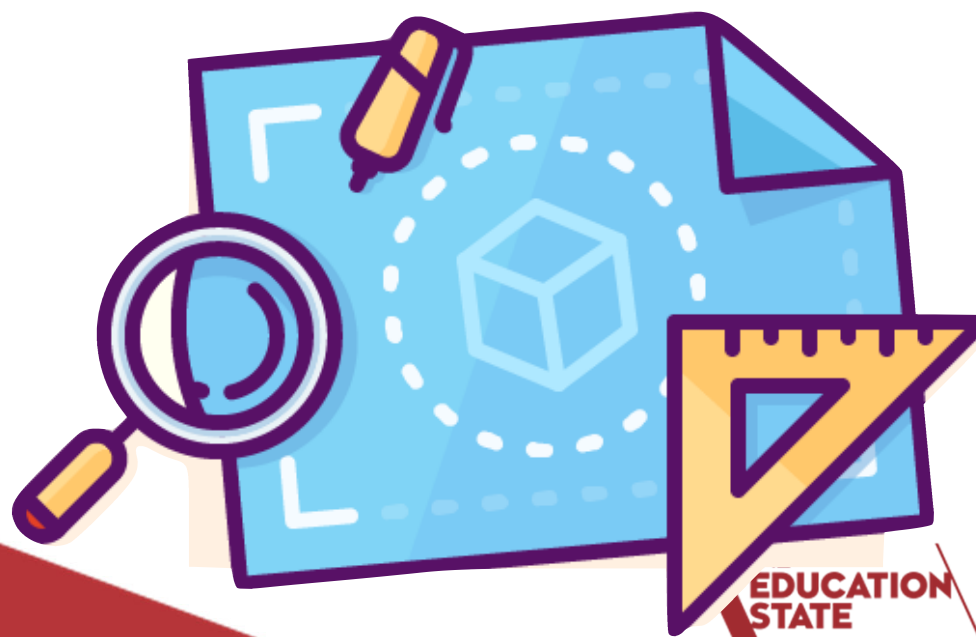
dept. xyz

our team name

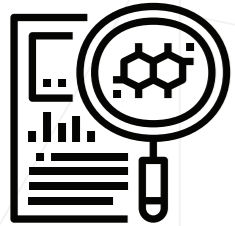


Project Briefs

Let's talk about briefs (no, not those ones) 



Research



What do you know about your user or problem?

Use the best research tool you have available to you. In most cases this will be the Internet, though you may be able to talk directly with your user. The more you know about your user, the better you can empathise with them, and in turn, develop a solution to best suit. We have given you some suggested avenues to follow for your research below but feel free to go down your own paths. Look for **images, articles, headlines**, etc.



Personal

What do you already know about your user or issue?



Historical

What has happened in the past? How have things changed? What were some significant issues or break through?



Survey

What do others know about your user or issue?



Social Media

How does this user or issue represent themselves on Social Media. How do others see them?



Other Research

How does this user or issue represent themselves on Social Media. How do others see them?



Design Thinking

EMPATHISE

Empathise

Start by gaining empathy for your user. To empathise, you: **Observe** - View users and their behavior in the context of their lives.

Engage - interact with and interview users through both scheduled and short 'intercept' encounters. **Immerse** - Experience what your user experiences.

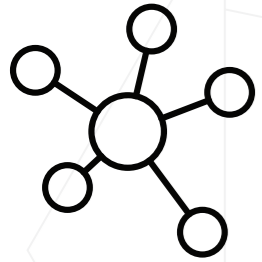
User Brief Notes:



An easy way to gain empathy is to have a conversation and ask open ended questions. First get to know your user (hobbies, movies, music?). Then start to try and gain more info relevant to the challenge, ask 'Why?' often

As we don't have a user for you to interview today, we have some user briefs for you to read through. Make some notes about it as you go. Remember, a user can be a person or an organisation

Mind Map



Map it out.

A mind map is a diagram that you create as a way to visually represent your thinking and organise information. Now you have defined your user's problem, think about all the major ideas, people, industries, elements, etc that may be connected directly to this central problem. Then, **branch out further**, what is connected to those major ideas?



Your Defined Problem



Design Thinking

Ideate

Ideate is the mode of your design process in which you aim to generate radical design alternatives. The goal of ideation is to explore a wide solution space – both a large quantity of ideas and a diversity among those ideas. From this vast depository of ideas you can build prototypes to test with users.

IDEATE

4. Sketch at least 5 **radical** ways to meet your user's needs.



Create solutions to the new challenge you have identified.
GO FOR VOLUME - This stage is quantity not quality.
DON'T BE RESTRAINED BY REASON OR LOGIC! - Maybe for one of your solutions you need to come up with a time-machine or magic.
Come up with as many ideas as possible!



Mo.S.Co.W

**Must
Have**

**Should
Have**

**Could
Have**

**Won't
Have**



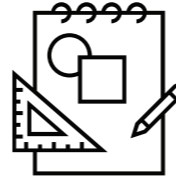
Design Thinking

Iterate based on feedback.

Ideate is the mode of your design process in which you aim to generate radical design alternatives. The goal of ideation is to explore a wide solution space – both a large quantity of ideas and a diversity among those ideas. From this vast depository of ideas you can build prototypes to test with users.

IDEATE

Reflect & generate a new solution.



Take a moment to consider what you have learned about your user, and about the solutions you generated, hopefully you have a deeper understating of your user. From this new understanding of your user and his or her needs, sketch a new idea (or iterate on a previous one)

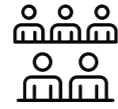
Communicating



Talk the Talk

Everybody in almost every job needs to be able to communicate effectively, but it also helps greatly to be able to tailor your communication to elicit specific responses or actions (a.k.a: get what you want!)

1. Who is your audience?



2. What do they want?



How will you appeal
to your audience
- what is your hook?



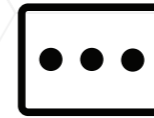
Head



Heart



Stomach



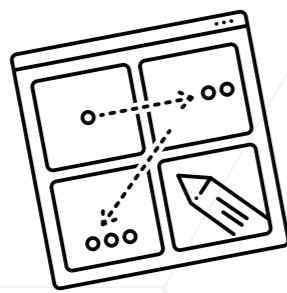
Other?

4. How will you get it?



3. What do you want from your audience?





Storyboard

Add extra detail each panel, eg:
Who? (group members)
What? (focus / info)
Tech / Props (sign, prototype in scene)
Outcome (thoughts, emotion, action)
Time (90 secs?)
Other details?

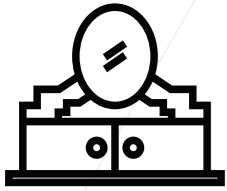
Remember your
Design Thinking
Stages and include
these in your pitch

- EMPATHISE
- DEFINE
- IDEATE
- PROTOTYPE
- TEST

Time-line (of pitch):


0min. 5min. →

Reflective Practice




Reflective writing.


Gibbs' Reflective Cycle encourages you to think step by step (*each step informs the next*) about the phases of an experience or activity you have completed.




Final evaluation & Action Plan
What would you do differently next time?




Description
What happened?




Feelings
What were you thinking and feeling?



Conclusion
What have you learnt
What else **could** you have done?



Analysis
Can you explain **why** things happened like they did? (*why did something go wrong or right?*)



Evaluation
What was good & bad about the experience

BENDIGO
TECH
SCHOOL

Hi, I'm a cute,
anthropomorphic pencil
which means I want you
to do stuff!
That stuff being a survey
on how your day went so
we can make it better...for
future students, oh, and
you too!

[**www.rebrand.ly/**](http://www.rebrand.ly/) [redacted]

students

teachers

[**www.rebrand.ly/**](http://www.rebrand.ly/) [redacted]



Please
help!

THE
EDUCATION
STATE

