YOUR RESEARCH CANVAS

Learning goals

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- Reflection about the potential of your own research topic/idea
- Assessing potential through identifying users/stakeholders
- Developing or extending potential use cases based on your research & network

Think big!

YOUNG ENTREPRENEURS IN SCIENCE

Imagine it‘s 2030.

Your research project has lead to pioneering results with breakthrough solutions and will be featured as title page in the recent edition of *Science Magazine.*

What could be the headline of this magazine?

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Example by Yih-Shiuan

THINK BIG!

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INSTRUCTIONS

Reflect and fill in the template using sticky notes and pictures.
In 10 minutes you will be called back to the screen.

STEP 1

Claim an empty magazine cover for yourself and mark it with your name.

STEP 2

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What could be the headline of this magazine?

DEEP DIVE INTO YOUR RESEARCH

The research canvas

YOUNG
ENTREPRENEURS
IN SCIENCE

PROBLEM TO BE SOLVED	RESEARCH QUESTION & DESIGN
THEORY	RESEARCH RESULTS (and practical application)

RESEARCH

POTENTIAL
PRODUCT /
SERVICE

USE CASE

The Research Canvas Example

Getting ahead of Alzheimer’s disease

Problem to be solved

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- What is your object/topic of research?
- What underlying problem or challenge are you addressing with your research?

EXAMPLE

So far, there is no efficient treatment available to cure Alzheimer's disease. Thus, there is a need for an early diagnosis, when first changes in the brain occur.

Theory

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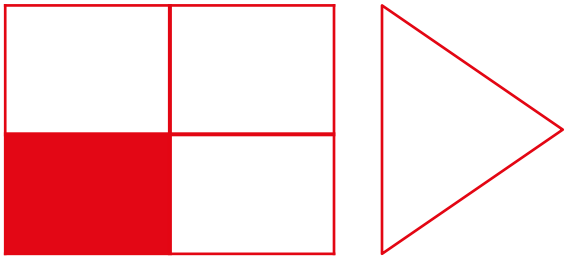
- What theoretical background underlies your research?
- Note the state-of-the-art highlights!



EXAMPLE

Protein accumulations in certain brain regions at the earliest stages of the disease.

Research Question & Design

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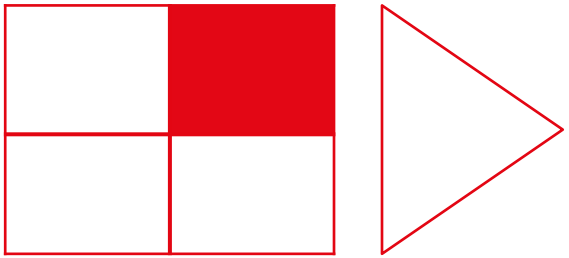
- What specific aspects of the problem/challenge are you researching?
- Note some details about your research setting! (qualitative vs. Quantitative, samples etc.)



EXAMPLE

Can our movement patterns during wayfinding in our surroundings be used to detect early changes/degeneration in the brain?

Research Results

(+practical applications)

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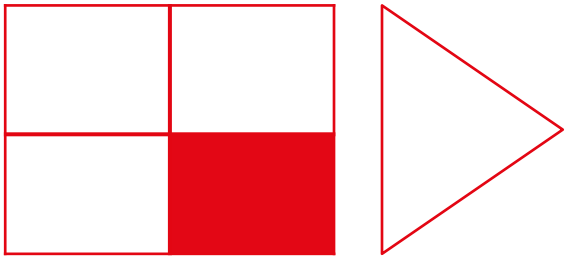
What are your results so far?



EXAMPLE

Tracking GPS and sensor data from smartphones can be used to study movement patterns and related brain change

The research canvas

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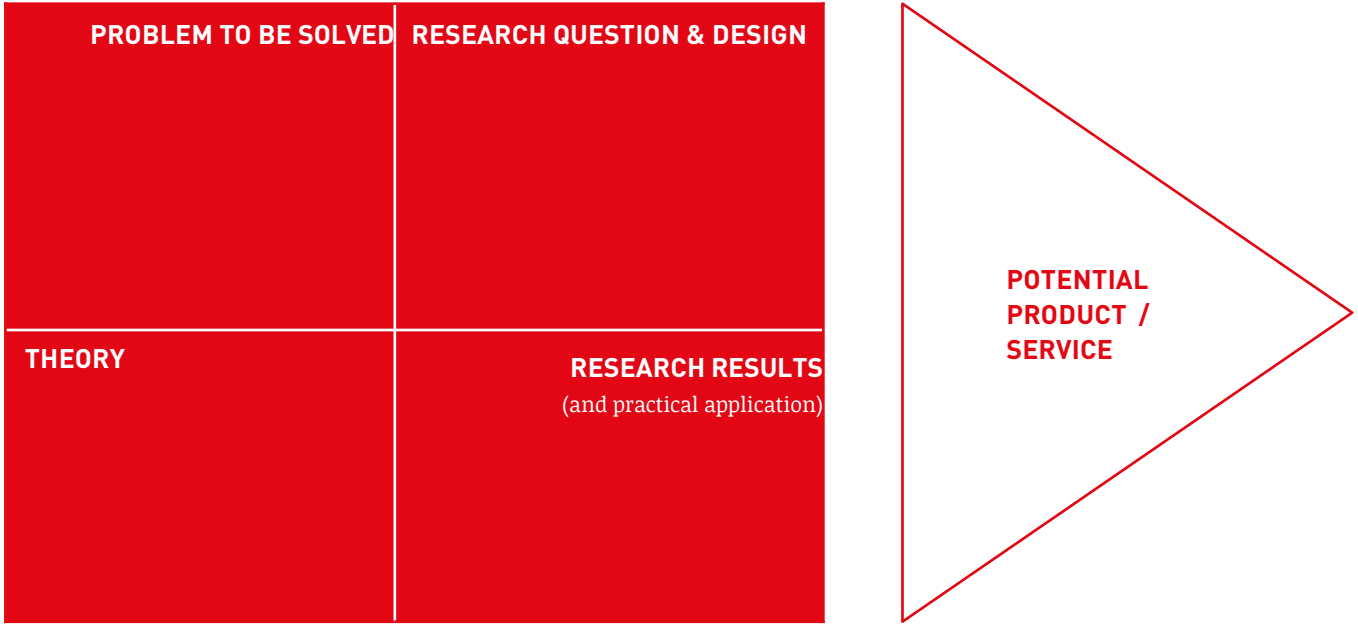

RESEARCH

USE CASE

THE RESEARCH CANVAS

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INSTRUCTIONS

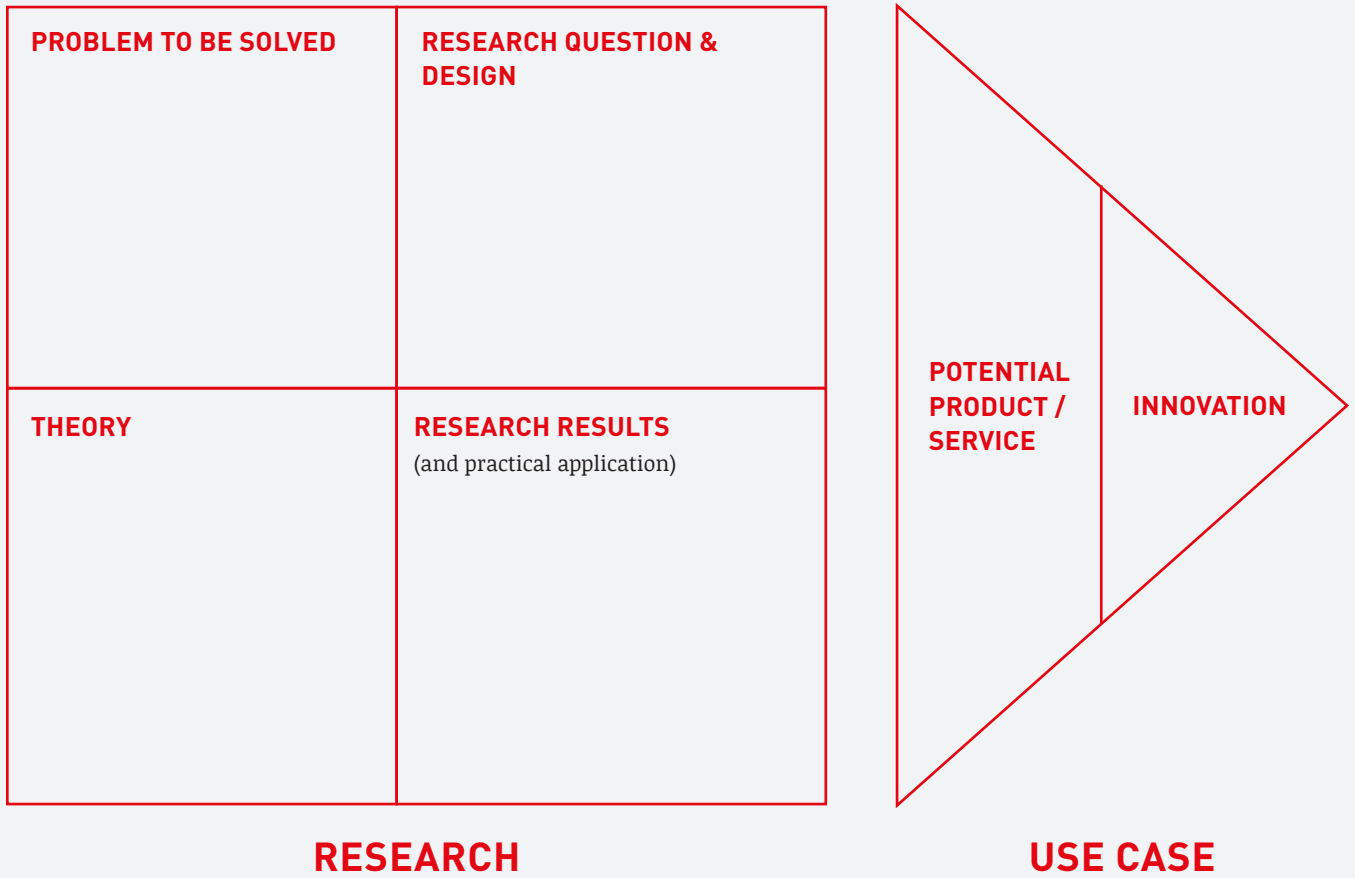
Reflect and fill in the template using sticky notes.
We will focus on the left side first. Then on the right side.

STEP 1

Claim one of the empty Research Canvasses for yourself and mark it with your name & topic

STEP 2

Consider each field separately when filling out the Canvas using sticky notes. Try to stay short and concise!



FROM RESEARCH TO USE CASE

What is a use case?

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Raise your virtual hand or share in the chat!

What comes to your mind when you think of users/use cases?

What is a use case?

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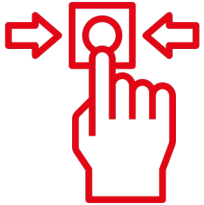

"A specific situation in which a product / service / solution can potentially be used."

Lawerence Chapman for PMA

From research to use case

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Research

Transfer

Potential use case

New theory
New state of the art
New technology
Thesis
Publications

Product
Service
Process
Context

From research to use case

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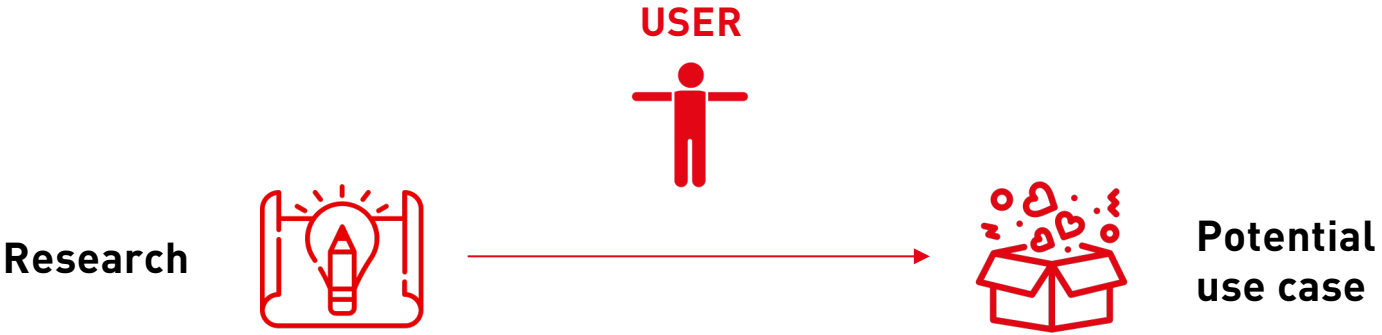

Identifying users

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PROBLEM TO BE SOLVED	RESEARCH QUESTION &DESIGN
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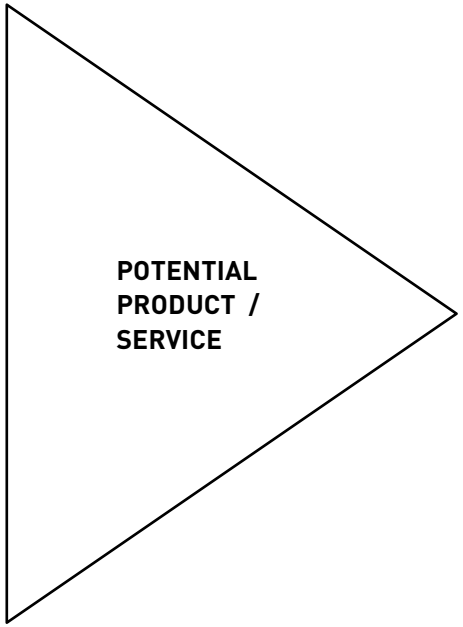

RESEARCH

USER

USE CASE

Identifying users

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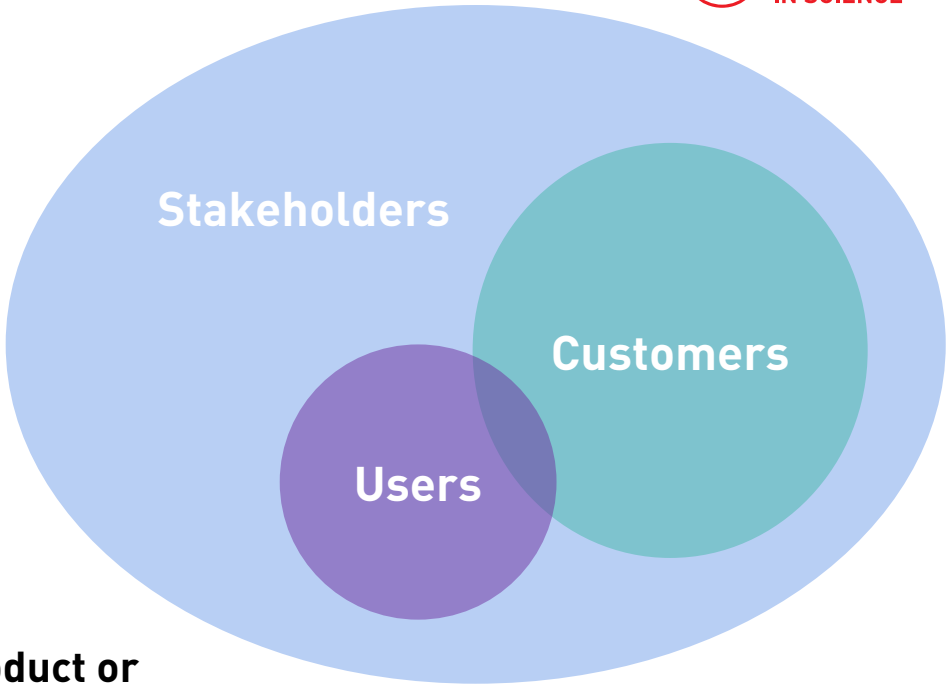
Stakeholder
has an interest in, or is affected by what a business does

Customer
is willing to pay for a product or service that satisfies an unmet need

User (Beneficiary)
benefits from the value created by the product or service (though they might not be the one to pay for it)



Identifying users example

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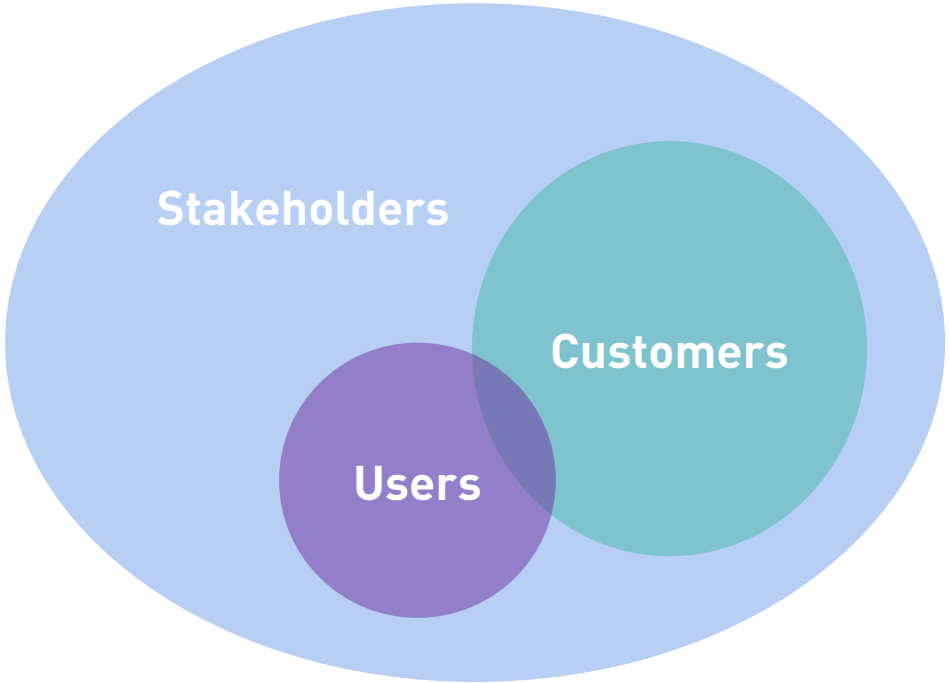
Stakeholder
Society in General

Customer
Health Care System
Medical Industry

User (Beneficiary)
Patients with subjective cognitive decline



From research to use case

YOUNG ENTREPRENEURS IN SCIENCE

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RESEARCH

USER

USE CASE

Potential use case

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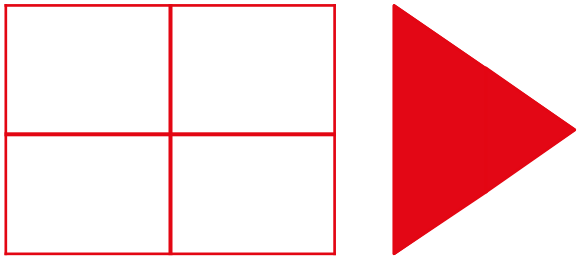
- In which context could your research find application?
- What is a problem you could solve in that field and who is having that problem?
- Can you build a new product/service around your research to solve their problem?



EXAMPLE

Smartphone App and state-of-the-art Machine Learning algorithms to classify individual movement patterns and to predict cognitive health status

Explore-app

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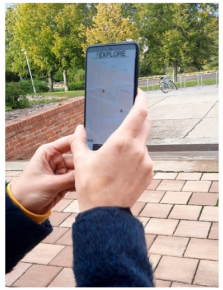
EXPLORE

Task: Finding 5 POIs on campus

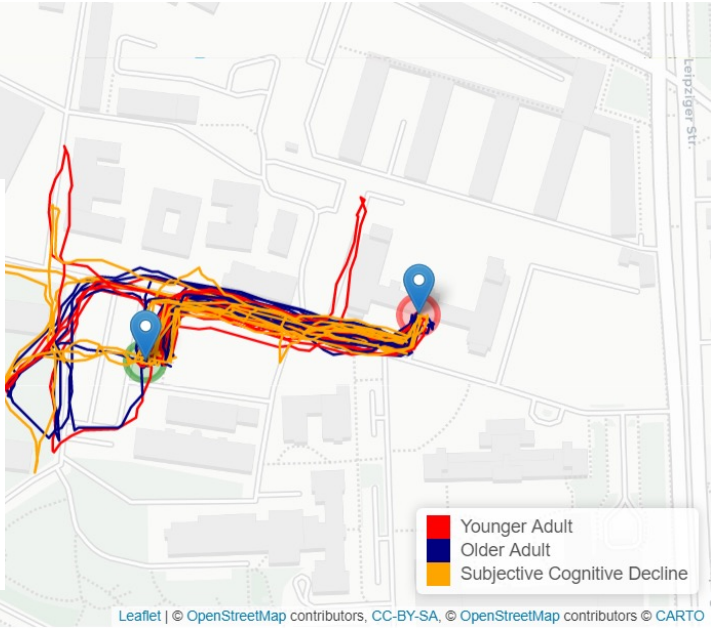


- walking
- map-viewing

GPS data logging

GPS & sensor data (acceleration/gyroscope) logging

Copyright: Nadine Diersch/DZNE



From research to use case

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Some questions to brainstorm:

- In which contexts and for whom could your research be useful as well? Think out of the box!
- What would you do with your research if you had 1 billion Euro?
- With which add-ons or features could you extend and improve your research (idea)?

Next steps

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- Build up a network
- Talk about your use case(s) with friends, family, colleagues > collect feedback
- Get professional support
- Train your entrepreneurial mindset
- Exchange with role models
- Take it step by step