



## tu-e4040 opportunity prototyping

fall 2022 (tuesdays 09.00 – 12.00)

3 ects

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### overview

This course used to be called New Venture Development and tossed the “entrepreneurship” word around a lot. For students, the natural reflex was to think “startup” – find an idea, write up a plan, raise resources and secure customers. Entrepreneurship is a process of recognizing and acting upon opportunities. **Startups are but one mode of activation, but by no means the only one.**

My thinking has been guided by Harvard Professor Howard Stevenson who defined entrepreneurship as “opportunity pursuit in the face of resource constraints”. Notice no explicit mention of startups. “Entrepreneurial” individuals chart the pathway that bridges the inevitable gap that exists between “opportunity” “resources” and “customer buy in”. Calling this course Opportunity Prototyping is a deliberate choice on my part.

**OPPORTUNITY** is perceived. Opportunity has an ephemeral quality as we often speak of “opportunity windows”. Opportunity exists because our senses alert us that something is missing or amiss. And importantly, opportunities are **framed in the future**. Think about it, if you wanted to introduce a new foodstuff into the market, the time-to-market could be a year. Put another way, the “new” product on the shelf today is at least one year old!

**Prototyping** is a sensible risk management strategy both in figuring out what to do and as a basis for creating buy in from resource providers and customers alike. Novelty implies that something has not been done before or in the way proposed. The inherent challenge with novelty is that human beings by their very nature are neophobic – we tend to shy away from new things when confronted with them.

## course objectives

The goals of the course:

- To appreciate the value of exploring visions of the future as a basis for guiding entrepreneurial action
- To understand the importance of the critical X factor (you) by assuming personal agency in the exploration process
- To instill confidence to take action

The learning objectives of the course:

- To develop your design and entrepreneurial acumen guided by the **Vision in Product (VIP)** framework and **Effectuation** theory
- To hone your sensemaking ability through observation, rigorous research, and discussion
- To identify relevant and meaningful starting points to guide new product development

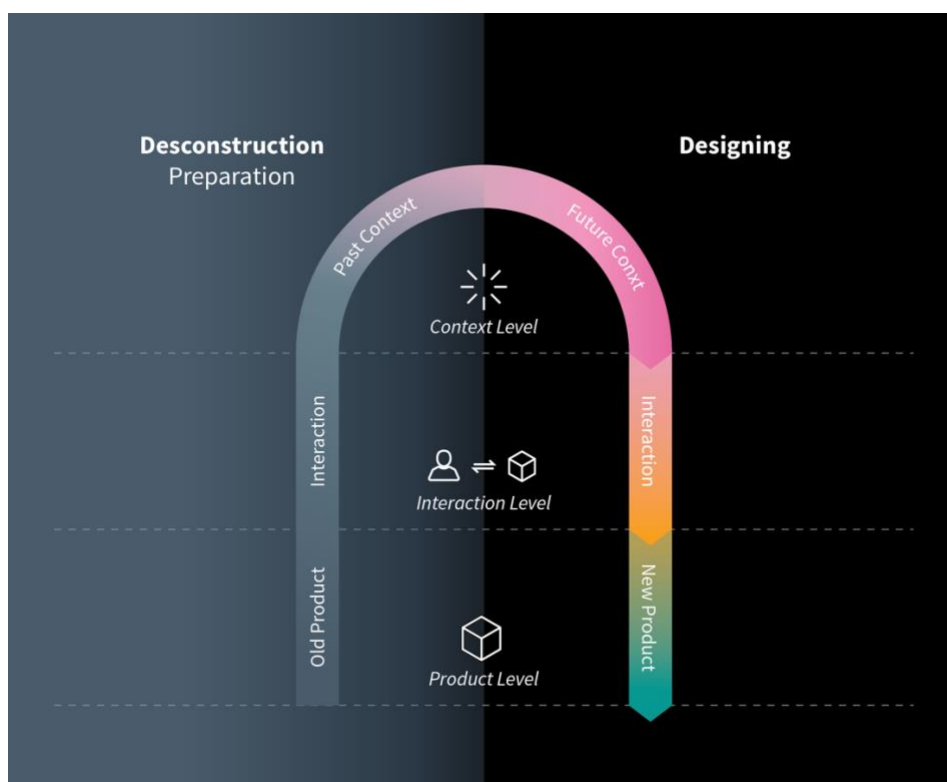
We are working from the premise that exploring future possibilities is more important than solving present problems. Opportunity is "placed" in a future context that is constructed on the back of research insights, personal perspective and conscious choice.

## our lenses

We will rely on the **Vision in Product (VIP)** design framework developed at Delft University by Paul Hekkert and Matthijs van Dijk. Their work is part of a broader movement called speculative design. Phil Balagtas, Experience Design Partner at McKinsey considers speculative design as: "...a way to manifest possibilities, to prepare us for inconvenient challenges and facilitate a more desirable, responsible path in the future."

The VIP process is displayed below and moving from lower left to bottom right.

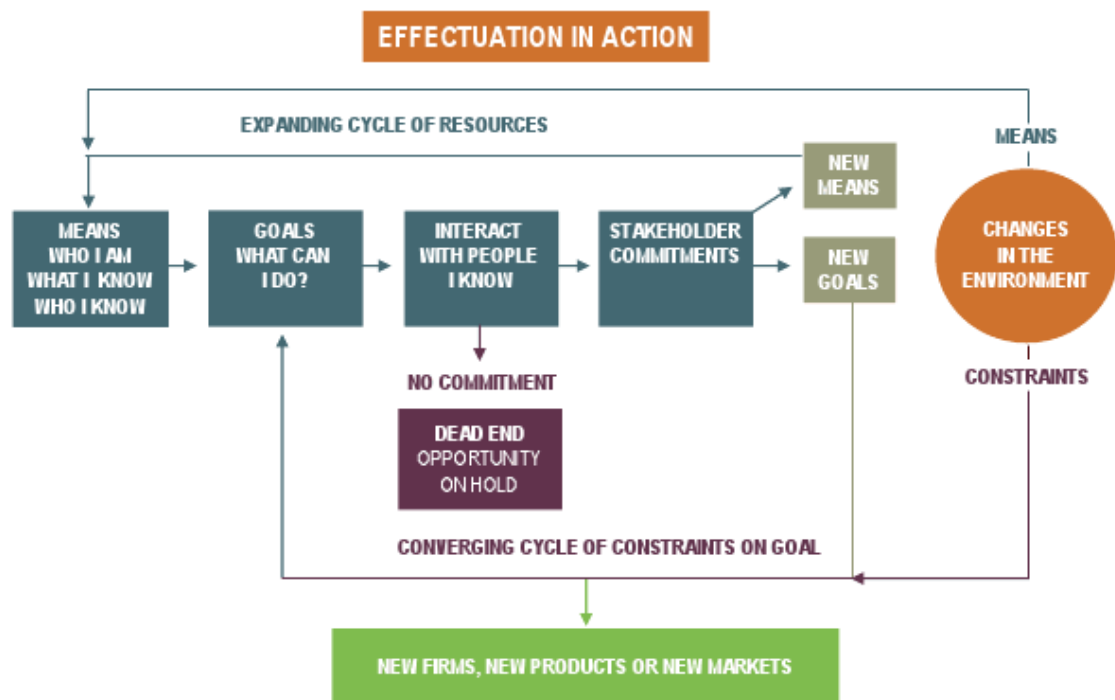
**Note that designing new products is the LAST not the FIRST stage of the process!**



The **Vision in Product (VIP)** approach strongly resonates with **Effectuation theory**. Saras Sarasvathy identified a set of decision-making principles that **expert entrepreneurs** (been there, done that, got several t-shirts) use in situations of high uncertainty. She noted that experts:

- 1) Action is initiated based on means available and not pre-set goals
- 2) Limit their investment both in terms of time and money up front
- 3) Explore and develop opportunities in co-creation with outside parties
- 4) Welcome unexpected surprises as new insights to be considered
- 5) Believe the future is shaped by the actions they take

Her theory is summarized below and her seminal work "What Makes Entrepreneurs Entrepreneurial" has been uploaded on MyCourses.



Sara's research was framed as a novelty challenge "what would you create from a common set of background information?". In the VIP perspective, my sense is that respondents jumped quickly from the preparation to the design phase with a short-term horizon in mind. Framing possibilities (VIP) is essential groundwork for deciding what to do (effectuation). We spend too little time on the "why" as opposed to the "what". **It is my firm belief that the quality of the effectuation output will be immeasurably better placed on the back of VIP infused input!**

## deliverables & evaluation

Course deliverables involves both **individual (50%) and group (50%) tasks**

**Each participant** will need to complete the following:

1. For the **What Am I Seeing** exercise, you will closely examine a product of your choosing. How would you describe it? What are its qualities? What is its "personality"? Why is it designed the way it is? Make up your own questions!
2. For the **What Are Others Experiencing** exercise, the focus is on the interaction between users and products. Examine any interaction

between a person and a product of your choosing. Describe what you think is going on by identifying qualities of the interaction itself. It will be helpful for you to think of at least 4 words to complete the phrase "the interaction can be characterized by ... x, and you fill in the x."

3. **For the What's My Take exercise, using the future context you developed as a group as a springboard, what would you like to offer people living in that world? Usually answers begin with "I want to offer people ...", "I want to enable people to ...", "I would like people to see/experience ...", or "I want people to feel ... to understand ..."**
4. **Learning Diary – the VIP process is both exhilarating and challenging for student and teacher alike! As you embark on this journey, I want you to provide a personal perspective on your experience. What were the key takeaways for you? What did you learn through the process? What worked well? Not so well? What would you have done differently? In my experience, keeping brief notes as you go through the process stimulates and enhances the reflection process. There is no page limit per se but you get out of it what you put into it !**

### **Vision 2030 (Group Task 50%)**

The **group task** will be discussed at length in the introductory session. It will provide you with an opportunity to engage with the VIP approach on a domain of your choosing. You will "deconstruct" the present (and past) as a basis for visualizing a future context that envision new forms of interactions and offerings. What domain is of interest is up to you but to encourage you to look over the horizon a bit more, **I have set the time frame as 2030.**

Why 2030? Many of you will graduate in 2023 – a lot can happen in 7 years after graduation! Longer time frames opens up more possibilities. As students, you also have the freedom of not being constrained by shorter time horizons that is the comfort zone of companies and governments. Interestingly, experienced venture capitalists often describe funding and investing horizons in 7 year cycles albeit with large variation!

Governments, companies, consultancies and experts across many fields also actively share insights and perspectives which will be very helpful to your group's research efforts. As a group, you will navigate through the deconstruction phase (understanding what is) and develop a reasonably detailed vision of the future context based on building blocks ("factors") taking into account elements that are changing or in flux ("trends" or "developments") or remaining relatively stable ("states" or "principles") over time. We will have more to say about this in the introductory session.

Determining what is **relevant** and **meaningful** relies on both research and intuition (hunches). Dependent on domain, the research could span many fields including cultural, psychological, demographic, sociological, biological, evolutionary, economic or technological, among others. There is an abundance of insights and perspectives to be uncovered in research papers, books, articles, internet/social media, movies, blogs, opinion leaders, to name a few. For an amuse bouche, check out **2030 Perspectives** in MyCourses.

Each group will submit:

- A maximum 5 page (excluding exhibits & resource bibliography) written

executive summary detailing the future context created and elements of the process used to create it **AND**

- A 5 minute video describing your future context directed toward an audience of your choosing. For some inspiration, have a look at the **Apple Knowledge Navigator video** (1985) in MyCourses.

## **The Team**

- 1) You will be working in teams of ideally 6 students – “founding teams” display diversity and this will be no different in terms of gender, nationality and discipline (to the extent possible);
- 2) I will work with each team as a Mentor providing guidance, advice and constructive feedback throughout the process. Having said this, remember your team “owns” the vision you create!

## **Schedule of Coming Attractions (subject to revision)**

**ALL SESSIONS WILL BE HELD IN PERSON**

**@ Aalto Design Factory (The Stage)**

<b>6 September</b>	<b>Introduction</b>
<b>13 September</b>	<b>What Do You See (Product)</b>
<b>20 September</b>	<b>What Do Others Experience (Interaction)</b>
<b>27 September</b>	<b>Understanding Context</b>
<b>4 October</b>	<b>Team Consultations</b>
<b>11 October</b>	<b>Future Context Showcase</b>