Leading the Conversation – Why Design Education should care more about Leadership and Stewardship in Design.

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Abstract: As we gain higher design literacy across many domains other than design, more and more actors become involved in the design conversation itself. Amidst this extension of the design discipline, there is an emerging lack of designers who are able to lead this conversation across different sectors and disciplines. In this context, the present paper critically examines the disciplinary approach that is dominating most of today's design curricula and gives an insight into the development of our new undisciplinary MA curriculum in Design. Stepping out of the mental model of the designer as disciplinary problem-solver or author became key to our re-visited curriculum and led us to focus on collaboration, conversation and leadership. A first result of our research represents an alternative model, which we call the Y-shaped-Designer. The development of this model is based on an extended literature review and workshops with both design educators and professionals. At the core of our examination stands the shift of the designer's role in the professional field on the one hand and the required change, which design education needs to face on the other. According to our insights, part of this change is shifting from discipline-based towards problem- or theme-based curricula in design. Curricula, whose main objective is to enable future designers to lead collaborative processes across different disciplines and sectors. Based upon first experiences made with a series of pilot schemes in our MA programme, two concepts emerge as key to such collaborations: Designers as Conversation Leaders and the fundamental shift from authorship towards Stewardship in Design. As a conclusion, this paper proposes a first set of principles of Stewardship in Design – principles that have become central to the development of our new design curriculum and which are shared in this paper in order to initiate future discussion amongst learners, educators and professionals.

Theme: TOGETHER, THE NEED FOR A SHARED LANGUAGE?

Keywords: Design Education, Y-Shaped-Designer, Stewardship in Design

1. Introduction

At a recent panel discussion during the Innovation by Design Awards the executive director of the New York City Public Design Commission, Justin Garrett Moore, depicted the following state of design: “We have greater design literacy, but where we have a long way to go is who is designing and who is involved in this conversation” (Budds, 2017). While for many decades designers haven’t been part of most conversations – especially when it comes to C-level decision making – now it appears that designers have “a seat at the table” as Kate Aronowitz, design partner at Google Ventures, writes (Aronowitz, 2018). The stake in this conversation comes with new responsibilities though: “As we shoulder new responsibilities and take bigger design leadership roles, we are falling short. I see us paying too much attention to the ‘design’ part of the role and not enough to ‘leadership’” Aronowitz further states in her article (ibid.).

Moore’s and Aronowitz’s observations point out the fundamental change the designer’s role is currently undergoing. While more and more people are taking part in the *design conversation* designers instead need to learn *leading this conversation.* But leading the conversation and collaborating across disciplines doesn’t come naturally and requires a new vocabulary and practice, which are linked or “reconciled with the world we live in” as Moore points out in his talk (Budds, 2017).

Still, design education mostly keeps sticking to a very designer-centred model of the discipline: the autonomous expert designer as *author, problem-solver* or *design thinker*. Considering the picture of the designer drawn by Moore and Aronowitz it is questionable, if the mental model design education still considers as the goal of its curricula really relates to what appears to be quite a different picture in the professional world.

If future graduates really want to take part in the *conversation* or even *lead* it, the question raises how to break down the concept of these cross-disciplinary *conversations* to a trainable range of competences in design education. Furthermore, as design educators we should ask how to integrate these competences in our 21st century’s design curricula. While redesigning our MA curriculum in design, we set out to find answers to these questions and to gather first practical experiences by integrating *conversation leading* as a mental model into our curriculum.

Our first approach was a critical review of the commonly known “T-shaped Skills Model” (Guest, 1991; Brown, 2010), where the depth of skill of a person is supplemented with the ability to collaborate across disciplines. The examination has shown that something that the T-model doesn’t consider, is the transition between the two modalities of working in disciplinary depth and working across disciplines. As a response to this gap, we propose the *Y-Shaped Designer* (Eckert, 2017a, 2017b), which focuses the transition from disciplinary depth towards working across disciplines and explores a range of *connective competences* (ibid.).

Subsequent to our preliminary research, we began mapping such *connective competences* and linking them to our new MA curriculum in design. More specifically, we started applying a range of conversational learning formats during our spring- and fall-term 2016/17. The most important pre-post curriculum change includes the shift from a disciplinary towards a problem-based design studio, co-teaching with multi-disciplinary faculty, context-based learning with partners from the industry and conversation-oriented teaching formats.

Aim of this paper is to give an insight into the development of the mental model of the *Y-shaped Designer* as *Conversation Leader,* which stands behind our new MA curriculum in design. Further, it reports on our first experiences made with a series of pilot schemes in *conversational learning* as

well as our conclusion and future research on why design should undergo a fundamental shift from *authorship* towards S*tewardship in Design.*

2. Unlearning Design – Why being "T-shaped" isn't enough anymore

Most of today's design professionals learned during their studies that in order to successfully transition into the professional life, they need a strong disciplinary root, which – by making them experts – enables them to act autonomously as well as connect to other disciplines and act collaboratively. For decades, this thinking has been summarised in the so-called "T-shaped Model" (Guest, 1991; Brown, 2010). Moreover, this acting has been supported by the spread of the belief that designers can resolve anything not only because of their professional expertise but also because of their "designerly way of knowing and thinking" (comp. Cross, 2006; Lawson, 2005).

However, this way of approaching collaboration might work as long as the task or issue doesn't exceed a certain level of complexity. Or by relating to Buchanan's "Four Orders of Design" (Buchanan, 2001): this way might be enough to approach *first* and *second order* issues, but as soon as it involves *interaction* or the design of *relationships* within complex systems or organisations (comp. 3rd and 4th order, ibid.) a designer – even by being the biggest expert – can't work on his or her own any more.

Yet, it is exactly this sort of complexity that we are facing today. Also known and widely discussed as "Ill-defined" (Cross, 2006) or "Wicked Problems" (Rittel & Webber, 1973; Buchanan, 1992) most of today's questions and problems unfold within a wide range of contradictory contexts, disciplines, cultures and markets. "We find ourselves in the golden age of Wicked Problems" (Eckert, 2017c) has been one of the conclusions of a recent panel discussion at the „Design in Organisations Conference" in Lucerne, Switzerland.

As a consequence of this affirmation, designers need to be aware of one crucial fact: they can't resolve today's problems by working on their own anymore. And even more fundamentally: they can't even do so by just working with other designers. Or as Mark Curtis puts it during his speech at South Summit 2017 in Madrid:

> "increasingly, design is not being done in a silo - in a design studio, where you just have pure designers thinking (and) not talking to anyone else - it's actually being done in cross-functional teams. And this is undoubtedly the way of the future." (Curtis, 2017).

A closer look to some of the recent annual reports focusing the Creative Economies reveals how concrete this future really is and how the current reality in the Creative Economies already began to shape the figure of future designers:

- In their 2016 report on the Swiss Creative Economy, Weckerle et al. describe the "Embedded Creative" as a figure, who primarily works in a non-design context (Weckerle et al., 2016, p. 65). According to the same report already today, 50% of Swiss creatives work as so-called "Embedded Creatives" (ibid.)
- "The Future of Jobs" - a research published by the World Economic Forum in 2016 states that "the combination of arts and science skills within businesses (is) a key feature of many parts of the Creative Industries" (World Economic Forum, 2016). A fact which is further linked to "6% higher employment growth and 8% higher sales growth." (Balzagette, 2017, p.42)

- The 2017 "AIGA Designers 2025 "report discusses today's design problems that "are increasingly situated within larger systems characterised by interdependent relationships" (AIGA Design Educators Community, 2017). These Relationships "are physical, psychological, social, cultural, technological, and economic in their effects, (and) require interdisciplinary expertise" (ibid.).
- The U.S. Bureau of Labour Statistics, predicts only a 0-1% growth in traditional graphic design positions versus 27% in network communication between 2014 and 2024 (AIGA Design Educators Community, 2017). Similar numbers are currently being discussed amongst European reports, too.
- In its 2016 report on Creative Economies and Innovation, the German Federal Ministry for Economic Affairs and Energy predicts Design the highest growth potential in cross-sector innovation and names collaboration and cooperation as two main factors, which might foster this sort of innovation in the Creative Industries (Bundesministerium für Wirtschaft und Energie, 2016, p. 4)
- Facing the 9th European Horizon 2020 Framework Programme, 20% of the related Position Papers analysed by the "Swiss Core Office for European Research, Innovation and Education" specifically mention the importance of design as driver for innovation and catalyst for social innovation (Swiss Core, 2017).

While redeveloping our MA curriculum in design, we critically examined these reports and more specifically the concepts and mental models standing behind them. Most of these concepts do not relate to the commonly known *T-Shaped Model* anymore. And by taking a closer look to the *T-shape*, our conclusion was, that clearly there is a missing link between having a "depth of skill" and "collaboration across disciplines" (Guest, 1991; Brown, 2010). As soon as designers need to step out of the „silo" (Curtis, 2017) and collaborate within or even lead cross-disciplinary teams, they must acquire additional competences. Competences that enable them to listen, analyse, facilitate and lead dialogues across different disciplines and sectors of innovation. We therefore *zoomed* into the junction of the T-shape and added a connecting piece, which we call the *Y-shape* (Fig.1).

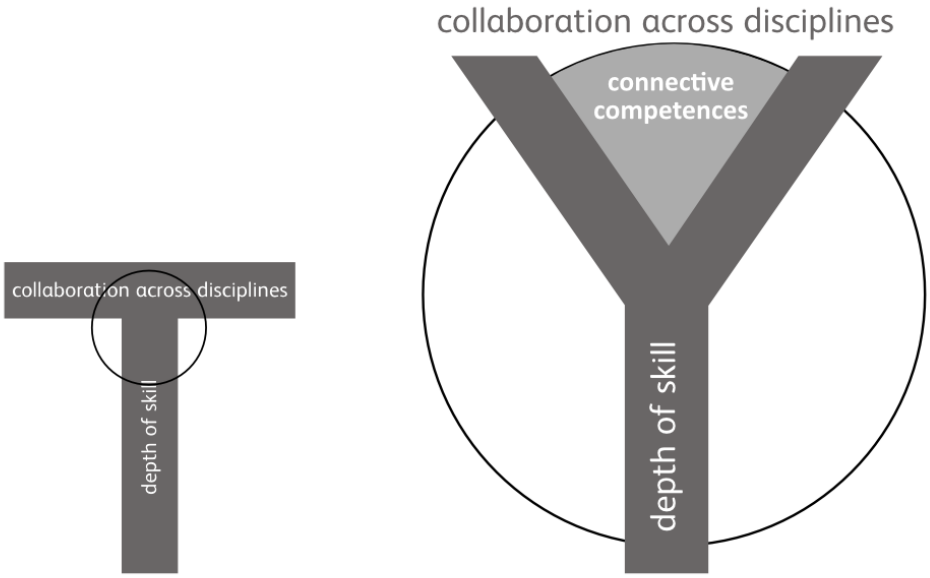

Figure 1. Extending the T-shape to the Y-Shaped Designer. Eckert, 2017a, 2017b, 2018

Within this *connecting piece* or *area,* a new field of competences unfolds: "connective competences" (Eckert, 2017a, 2017b), which enable designers to collaborate and more importantly *lead the conversation* across disciplines that primarily don't belong to the design domain. Machine learning designer Caroline Sinders points out what it might mean to be a *Y-shaped Designer* in the future:

> "The future is less of a T-shaped designer, but a designer that's a Jill-of-all-trades. You should have an aesthetic eye, but you need to be a systems designer when dealing with AI, you need to be a designer that focuses on ethics or (as) an ethicist, you need to have a little bit of a technical understanding. And you need to be highly data-minded and data-questioning." (Sinders in Schwab, 2017).

As a consequence of these observations one thing, which is about to change drastically, is the self-perceived role of the designer. Whereas most of today's design professionals still see themselves as authors of their design outcomes, the depicted future in the *Y-shaped* approach clearly differs from such a perception. The *Y-shaped Designer* becomes more of a "broker", "catalyst" or "facilitator" (Eckert, 2017b) than the *author* of design interventions. But first and foremost, *Y-shaped Designers* need to evolve from problem-solvers to problem-identifiers (Frascara, 2002; Author 2009), who – thanks to their connectivity – become "active agents in the identification of problems." (Frascara & Winkler, 2008, p. 5). The latter makes clear: designers need to be a step ahead in order to become involved or even lead the conversation. For this reason, in this paper, I will use the term *Conversation Leader* in order to better describe the mental model of the *Y-Shaped Designer*.

Yet, whichever term we use or prefer, the fact is that as designers we are facing a paradigm at whose centre we have to put ourselves – or better the mental model of ourselves as designers. This of course takes a lot of re-thinking and unlearning how to learn to become a designer. While in the professional field, technology and its speed of driving change and innovation steadily pushes designers to rethink and adopt their professional acting, in design education instead, these driving forces mostly arrive with a delay. Which is the reason, that most schools and universities still stick to a very disciplinary or *T-shaped* model of the designer.

When we first started introducing some of the didactical approaches related to the *Y-shape* at our MA Programme in design, most of the time, we spent *unlearning* what students have learned before enrolling in our programme. Many of them first were disappointed that in our re-visited programme it appeared not being that much about themselves and their own work but much more about identifying the people they need to work with. Some of the students even got afraid they might need to forget about all the precious skills and competences they had acquired during their undergraduate studies. As an answer to this fear there is probably no better response, than Mark Bonchek's statement on unlearning:

> "Unlearning is not about forgetting. It's about the ability to choose an alternative mental model or paradigm. When we learn, we add new skills or knowledge to what we already know. When we unlearn, we step outside the mental model in order to choose a different one." (Bonchek, 2016).

3. Being connective by becoming "undisciplinary".

As a first step towards changing the mental model behind our future MA curriculum, we analysed the different curricula taught at BA level at our department in Arts and Design. In fact, all of them were following a pure disciplinary approach by being divided into traditional BA programmes (such as e.g. Graphic Design, product design or similar) that were pursuing a disciplinary set of competences and learning goals. On Master's level instead, our MA programme in Design used to offer one common

programme which again was subdivided into the same different disciplines. Consequently, students coming from one discipline would enrol with the same or similar discipline and study e.g. product design all over again while aiming at becoming an even more skilled product designer – or in other words: to deepen the disciplinary root instead of transition into a collaborative mode.

In order to face this gap between the clear shift in the design profession and what still used to be taught in our programmes, we organised a series of workshops together with faculty from both Bachelor's and Master's programmes. During these workshops course-leaders and lecturers were asked to identify different competences related to their programs. In a secondary step, a list of the most important learning goals has been elaborated by distributing these goals over both BA and MA curricula (Table 1).

Table 1. Learning Goals assigned to BA and MA level.

Learning Goals on BA Level	**Learning Goals on MA Level**
Professional qualification	Self-determined learning
Discipline-driven skills	Project-driven learning
Acquiring depth of skill	Collaborative acting
Responding to a client's brief	Self-management
Enrol with a creative profession	Wide range of methods
	Ethical awareness
	Leadership skills
	Purpose-oriented acting
	Embed into different markets and domains (also other than design)

This first insight showed that on the one hand most of the faculty perfectly realised the ongoing shift in the design profession, on the other instead, our curricula haven't yet been adopted to this shift. For us, this was a clear indicator that while our BA programmes might keep their disciplinary approach, our MA Curriculum in design had to aim at *unlearning* the disciplinary in a way students get the chance to transition into the collaborative mode that is being requested in the professional field.

In order to get an understanding how to *unlearn* the disciplinary, we reached out to better understand the exact opposite: the *undisciplinary*. Design educators Craig Bremner and Paul Rodgers pick up Marshall and Bleecker's concept of "undisciplinarity" (Marshall & Bleecker, 2010; Bremner & Rodgers, 2013) and put it into an evolutionary order reaching from "disciplinarity" to "undisciplinarity" (Bremner & Rodgers, 2013, p.11-12). As key factor of this evolution, Bremner and Rodgers amongst others (comp. Heppell, 2006) name "problem- or issue-based learning" (Bremner & Rodgers, 2013, p.11-12). Consequently, we decided that next to our mental model of the *Y-shaped Designer* as *Conversation Leader,* our principal pre–post curriculum change had to include the shift from a disciplinary towards a problem–based design studio (Table 2).

Table 2. PRE– POST–Curriculum change, Author 2017

Didactical Aspect	PRE-curriculum	POST-curriculum
Project- and Issue-based learning	Disciplinary learning-track (e.g. graphic design) and disciplinary studio-work.	Project- and issue-based design studio. Taught by multidisciplinary faculty.
Collaborative learning	Individual project-work and studio-coaching.	Collaborative project-work and group-coaching in the design studio.
Context-based learning, scaffolding	One disciplinary project; often approached from a design-only point of view.	An initial series (1st semester) of brief interdisciplinary projects in collaboration with external partners shifts the attention to the real-world context.
Self-determined learning and micro teaching	Students can choose between a variety of courses and pick one personal subject for their project.	Students get involved into the organization of student-led courses, alumni lessons and focus groups. Subjects and projects get discussed collectively by both, learners and educators.
Competence-oriented learning and self-evaluation	Students get evaluated and graded by a set of criteria.	Students start evaluating themselves with a competence-matrix. Based upon this evaluation a *learning-agreement* is made after the 2nd semester. This agreement is part of the final evaluation and grading as well as the base for an individual coaching to achieve the established learning-goals.
External referencing systems	Students develop their MA project in the design studio and mainly get taught and evaluated by the program's own faculty.	During the 1st semester, short-projects are held together with external partners and companies. During semester 2 and 3, students set up partnerships for their own project and work at the partner's or company's site.
Learning that traverses institutional boundaries across different sites of expression	Students mainly work in the studio and the university's different labs.	The studio and the lab (newly collocated on the same floor) merge together. Project-weeks held at companies' sites and collaborations with external partners extend the studio into a *real-world lab*.

4. Connective Competences – first experiences made

In order to bring the mental model of the *Conversation Leader* to the classroom*,* we started reaching out for a more concrete description of the *connective competences* represented in the *Y–shaped model.* We did so, by introducing three new learning formats, which are exposed in the following subsections of this paper. At the centre of these formats stand competences that are aiming at connecting learners, educators and partners from the industry by providing a base for a cross-disciplinary conversation*:*

- Handling a wide range of different opinions expressed by both designers and non-designers.
- Evaluating these opinions and creating a common ground and vocabulary for discussion.

- Leading and facilitating a cross-disciplinary discussion amongst learners, educators and partners form the industry.
- Identifying areas of friction and leverage points which might be the starting point for a design intervention.
- Critically analysing these areas of friction from multiple point of views.
- Choosing from a wide range of methods in order to define an appropriate and participatory and/or human-centred process.
- Leading a participatory and/or human-centred design process.
- Implementing design interventions (in non-design contexts).
- Foreseeing, evaluating and controlling the impact of the design process and intervention in ethical, social, economic, ecological and technological terms.

From a didactical point of view, the competences and our three new formats relate to Kaiser's concept of "situative skills" and "concrete competences" (Kaiser, 2005, 2011). His concept states that most learning goals and competences should relate the closest possible to real-world situations encountered by the students in the professional world after graduating (e.g.: facilitating a cross-disciplinary discussion amongst different stakeholders). In order to foster such situations, that provide "learning (that) traverses institutional boundaries" (Jewitt, 2008, p. 242) during fall 2016, we launched a series of pilot schemes combining the traditional design studio with the participation of external partners such as e.g. companies, public entities or external experts. The following subsections dive into three of these experiences made, each one of them based upon a specific collaboration with an external company, entity or organisation.

4.1 Weekly conversation training – "Atelier Day"

While before, in our design studio students would split up into their disciplinary groups and being followed by one or two teachers, we now decided to gather all students and faculty together in order to collaboratively focus on project-based questions. We did so by introducing a weekly *Atelier Day*. A day, where all students and teachers from our programme would meet together in the morning and decide based upon subjects and matters which groups would work together for the rest of the day.

As hard as it initially appeared for organisational reasons, as astonishing was the range of possibilities to explore and train the *conversational mode* we were aiming at. After the first week, students took over most of the conversation by bringing in different subjects, organising micro-learning sessions (Hattie, 2013, p. 134ff), workshops or lunch cooking sessions. Especially, the high level of self-management showed by the students came as an evidence that it was worth opening up the studio in order to turn it into an open platform for discussion between learners and educators coming from different backgrounds.

In order to even emphasize this openness, we started inviting external guests such as e.g. experts from a specific field that we were discussing in a project. This way, the conversation got enriched with an external point of view and besides reflecting their work from multiple design angles, students now also had the opportunity to blend in perspectives from disciplines outside of the design domain. A fact that relates a lot to the described shift in the professional field, where designers more and more *embed* into sectors that don't necessarily belong to the design domain itself.

4.2 Re-briefing the brief – "Sprint Projects"

As a second format, in fall 2016, we introduced so-called *Sprint Projects* – projects that include a primary brief by an external partner (e.g. company or organisation), which then gets re-briefed and critically analysed by a group of students during a period of approx. 2.5 months. Aim of this format is

to push students into the role of the *conversation leader*, who basically has to re-think a problem or task from a design point of view while connecting to the wide range of opinions represented by the different stakeholders.

Our latest *Sprint Project* took place in fall 2017 together with the Zürich-based firm *Medignition*, who engages in the field of healthcare innovation. Starting point of the project was a method developed by the company, which was aiming at the self-diagnosis of vision impairment via mobile devices such as e.g. smartphones. Initially, the company's brief was to re-imagine this technology in order to provide a mobile-based alcohol-test addressing party-people. After a while and a series of conversations instead, the students came up with the proof, that according to statistics, in Switzerland most people use public transport or taxis after a night out or decide on somebody who doesn't drink and drives the others home. After a subsequent study, our students found out that due to its popularity as recreational sport, there was a much larger potential in preventing people having accidents related to alcohol consumption while skiing than partying.

Our student's re-brief of the initial project idea is a perfect example of how designers might take over the conversation when trained to critically analyse a situation or issue and re-frame it from multiple points of view. After their re-brief, our students conducted a more precise analysis based on statistics, interviews and surveys in order to develop a first series of wireframe prototypes of the future application, which is now further developed to track the alcohol consumption and its relation to the performance of recreationists in Swiss ski resorts.

4.3 Changing points of view – "Project Week"

A third example of how we started shifting the focus of our curriculum towards the designer as *Conversation Leader* is our *Project Week.* During the first week of their master studies, students get exposed to a brief provided by an external partner or company. Last fall, this project was led together with *Küng Sauna* – the Swiss market-leader in private saunas and spas. This time, the brief wasn't to improve the company's products but step into the company's shoes and think how to transfer their expertise to a different sector in order to open up new markets. In *Küng Sauna's* case, students had to evaluate the company's potential in improving people's well-being while working in office spaces. For seven days, students were asked to conduct a preliminary research on health and well-being in offices in order to identify leverage points where the sauna company could develop new products or services aiming at the health and well-being of today's office workers.

Subdivided into four interdisciplinary groups, students from different design backgrounds discussed ideas around indoor air quality, light quality and temperature in office buildings or the fact that today's knowledge workers lack movement during office hours. The research became a real quest for design interventions and the students finally discussed four different areas with the company in order to develop and place new products or services.

This last example illustrates the shift from thinking in solutions towards identifying areas of friction and potentials for future design interventions. All in all, we realised that no matter what subject, the fact that thanks to these three first attempts to move away from disciplinary learning, students acquired a lot more responsibility and control over their personal learning process. The discussion shifted from "being a better designer" to "shape my own role as a designer". Even if students weren't aware of our mental model behind the new learning formats, they perfectly realised that the learning focus had shifted and that they found themselves in a more self-governed position when re-briefing or briefing themselves – a fact that led to an overall higher engagement of students and a much more autonomous position when discussing the projects with our partners from the industry. Overall, our design studio turned from a disciplinary and mostly design-led discussion to a problem-

based platform for cross-disciplinary and reciprocal learning between young designers, educators and practitioners.

5. From authorship to Stewardship in Design

Besides being a first success in bringing multi-disciplinary learners and educators together, the three examples of provoking problem-based conversations in our MA curriculum also led to another conclusion: while before, our students mostly were encouraged to position themselves as authors of their personal design work, thanks to these new learning experiences the attention shifted towards becoming leaders in identifying design opportunities by taking responsibility for a certain group of people, a new context, a social or technological issue or simply by stepping out of the designer's shoes and taking an entirely new perspective.

We therefore, started arguing the term *authorship in design* (a discussion which will not further be exposed in this paper) and came across the term *stewardship.* After our fist experiences made with the mental model of the designer as C*onversation Leader,* the concept of *stewardship* perfectly relates to what has been discussed in the second section of this paper: actively identifying problems and taking responsibility for the identified issues. An important reference to this discussion is the latest report of the AIGA Design Educators Community (DEC) which projects designer's professional roles into the year 2025 (AIGA Design Educators Community, 2017). Emily Gosling, who is a senior editor at *AIGA – Eye on Design*, takes a closer look at the "AIGA Designer 2025" report (ibid.) and draws the conclusion that:

> "design students of the present and future need to be able to both deftly negotiate the concerns of various stakeholders within projects and also evaluate their work in terms of its potential social, cultural, technological, economic and environmental impact. What that essentially boils down to is accountability: designers now more than ever need to justify their research and outcomes" (Gosling, 2017).

Being accountable for something also means to care and to take responsibility for it. For designers whose discipline is extending into various fields of the knowledge society this signifies that besides *leading the conversation* they must become *stewards* of the people and the context they design for. Based upon this insight, in this paper I would like to refine the model of *Y-shaped Designer* by adding two aspects in between which *connective competences* unfold: *Leadership* and *Stewardship in Design* (Fig. 2).

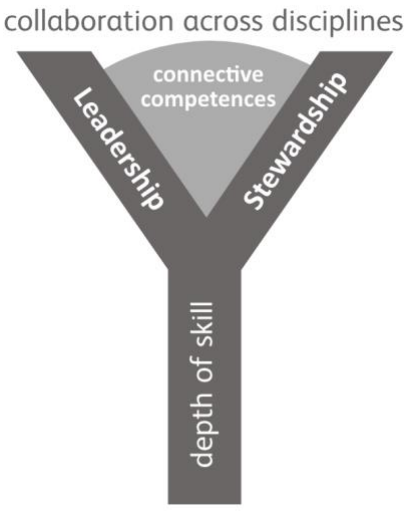

Figure 2. Leadership and Stewardship as two main aspects of the Y-shaped Designer, Eckert, 2018.

6. Conclusion. Ten principles of Stewardship in Design.

On a practical level, the final insight on *Stewardship in Design* extends the mental model of the *Y-shaped Designer* and *Conversation Leader* into aspects of ethics, social responsibility, ecological and economic awareness as well as the foresight and control of the impact a design intervention might unfold in a certain context. Furthermore, it asks for the inclusion of such topics as well as leadership skills in design education. A definition of *Stewardship in Design* therefore represents a future step for the further development of our curriculum in design.

Yet, a first attempt of what might be 10 core competences or aspects of *Stewardship in Design* shall be exposed at the end of this paper in order to draw a first conclusion from the research and experiences shared so far as well as open it up towards future discussion amongst learners, educators and professionals. The following "Ten principles of Stewardship in Design" represent a summary of the reviewed literature, the workshops held with our faculty at Lucerne University of Applied Sciences and Arts and our first experiences made while implementing our new MA curriculum in design. Amongst the different reviewed papers during this process, the "AIGA Designer 2025" report (AIGA Design Educators Community, 2017) gave a mentionable cut to the following *Ten principles of Stewardship in Design:*

1. **Ethical and cultural awareness**: designers are ethically aware that at the core of their work stands the relationship between any design intervention and its impact on the human being, cultures and the ecosystem we live in.
2. **Identifying problems & Framing Projects**: Designers actively identify areas of friction and leverage points as starting points for design interventions, which may unfold in value and huge impact.
3. **Agility**: Designers embrace the openness and unfinishedness of their intervention and artefacts in order to make them adaptive design solutions ready for a continuous updating.
4. **Data literacy and De-Computation**: Designers are aware of the rise of data-driven processes and are able to relate to these processes as "actors of de-computation" in order to turn them into benefits for the human society and the world it lives in.
5. **Research culture**: Designers are able to embed their work into a culture of research and documentation in order to be accountable for their work and making their acting as transparent as possible towards the community.
6. **Methodology**: Designers master a wide range of processes and methods. They therefore are able to match a design process with the right methodology.
7. **Leadership**: Designers acquire leadership skills in order to lead cross-disciplinary conversations and projects. They adopt their leadership style to the stakeholder ecosystem they work in.
8. **Facilitate**: Designers act as facilitators and translators across disciplines, media, cultures, economies and technologies.
9. **Empathy & Inclusion**: As conversation leaders, designers are responsible for the active inclusion of all necessary participants of a design process.
10. **Foresight and evaluation**: Designers are able to anticipate, evaluate and control the impact of their interventions in relationship to the human being, culture, society, economy and the ecosystem we live in.

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