Innovation, Technology, and Knowledge Management

Pauline Mattsson
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Making Universities Matter

Collaboration, Engagement, Impact

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Introduction: Universities and the Matter of Mattering

Pauline Mattsson, Eugenia Perez Vico, and Linus Salö

Making Universities Matter

Universities have long been integral to society, fulfilling a vital role as institutions for knowledge development, exchange, and diffusion. Even though universities have only in recent decades been portrayed as bridging the gap between academia and society through interdisciplinary collaboration and engagement, they have always been founded on societal needs and thereby have also recognized the importance of interactions with society.

Recently, however, there has been a wave of discussion about the role of universities—within universities, among policymakers, and in the public sphere. On the one hand, there is an increasing public skepticism toward science fired by the replication crisis (Fanelli, 2018), the mistrust of experts (Eyal, 2019), and the (mis)use of scholarly work for political purposes (Peci et al., 2023). This skepticism is also fueled by the widespread occurrence of unethical behaviors and misconduct—including fabrication and falsification (Biagioli et al., 2019). On the other hand, there are repeated calls for universities to matter more—to spread their impact further, broader, and in new ways (Benner et al., 2022; Upton et al., 2014). Indeed, there has been a global

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push to reinvigorate universities' social responsibilities, to reorient toward extra-scientific modes of knowledge exchange, and to make research accountable to end users and not only target the scientific community (Sarewitz, 2016; see also Cuppen et al., 2019). Together, these calls highlight an increased imperative for making universities matter more to society by embracing a broader societal responsibility, in terms of both scope and magnitude. As the perception of universities' societal role continues to evolve, there is a broadened understanding that goes beyond traditional notions of industry–academia collaboration and technological progress for economic growth. Instead, universities are now seen as integral to a complex system that embraces diverse interactions and involves multiple stakeholders, with the aim of driving transformative progress within society (D'Este et al., 2018; Trencher et al., 2014).

While the desire to make universities more socially engaged and impactful—to make them matter more—is well-intended, it also introduces a number of challenges and tensions that must be carefully navigated. As the seeds of previously mentioned public skepticism reveal, as universities seek to broaden their societal roles, a number of concerns emerge that may threaten their core functions and integrity, or the view thereof of some actors both within and outside of academia. One such concern is that the drive to prioritize making universities matter to current societal issues may shift resources and attention away from fundamental research and knowledge quest for its own sake. This could jeopardize long-term scientific advances, which have historically formed vital building blocks for universities' contributions to society (Gulbrandsen & Smeby, 2005; Sauermann & Stephan, 2013). If research grows more focused on current societal demands, there are expressed concerns about overlooking path-breaking and curiosity-driven projects that may not yield immediate practical applications but may lead to future discoveries (Fleming et al., 2019; Spector et al., 2018). Another source of concern is the potential for conflicts of interest and challenges to academic independence and openness that pressure to engage with various stakeholders outside of academia can bring about (Schmid & Betsch, 2019; Tartari & Breschi, 2012). Questions about research integrity and objectivity may arise as universities form tighter partnerships with industry, government, and other societal actors in their quest to matter more. As universities are integrated into complex dependencies involving multiple stakeholders, power dynamics and inequalities can emerge. Different actors might have varying degrees of influence, leading to potential biases in research agendas and outcomes. There are thus concerns about ensuring that universities' engagement with external partners is appropriate and transparent and does not jeopardize the integrity of their academic pursuits. As a result, the importance of striking a balance between collaborative engagement and critical independence has been highlighted.

For universities to maintain their deep-rooted societal role, we must better understand how the nature and dynamics of such a role may determine and potentially strengthen their ability to matter. The present volume seeks to tap into these debates and, moreover, to contribute to the evolving literature on universities' role in society through a coherent set of chapters, all of which speak to questions of universities' collaboration, engagement, and impact. More specifically, we address questions such

as: How can the knowledge produced in and through the activities of universities matter beyond intra-scientific knowledge exchange? How have the conditions for universities mattering changed over time, and how do they vary across disciplines or areas of scientific conduct? Attending to such questions, the volume explores how universities can extend their impact beyond traditional higher education missions. By presenting a collection of insightful inquiries, we strive to deepen our comprehension of the diverse dimensions in which universities matter, shedding light on the how, where, and when of their influence in and on the societies that enable their continuation.

The studies in this volume arose from a knowledge platform funded by the Swedish Innovation Agency Vinnova between 2015 and 2023. The platform's goal was to shed light on how universities organize their activities and how they align with various societal interests, including those within universities. The platform brought together researchers and policymakers in a variety of collaborative projects, policy debates, and studies centered on topical discussions of mutual interest for the many issues addressed in this volume. These circumstances help explain the tendency of the present volume to draw on historical examples and empirical materials mainly from the Swedish context in the discussion of past, present, and potential future roles of universities in society. While international perspectives are also covered in the volume, we hold that Sweden stands out as a captivating country to explore. Firstly, Sweden is a country that allocates substantial funding to research in proportion to its population. Secondly, the country has witnessed a growing influence of external funding actors, resulting in mounting expectations to foster collaboration with society and ensure that their work transcends academic boundaries and benefits the broader community. Thirdly, in Sweden, the so-called third mission is institutionalized and enshrined in legal frameworks that stipulate that higher education institutions should, apart from teaching and conducting research, collaborate with society and make sure that research results come into use (e.g., Benneworth et al., 2015).

The present chapter introduces the volume, including the contexts, themes, and issues addressed herein. In so doing, it contextualizes the included chapters in addition to outlining their topics, angles, and arguments. First, however, we turn to the idea of "mattering," the core concept of the volume.

The Matter of Mattering

In the present volume, the pivotal notion of "mattering" serves as the lynchpin concept that runs through all chapters. Its centrality necessitates delving deeper into the concept to clarify and expand on its meaning. Given that "to matter" is to be of importance or have some sort of effect on somebody or something, the notion of "mattering" encompasses various connotations and implications within the context of universities. What is it for universities to matter? Matter to whom? Matter how and when? Engaging with such corrective questions is vital in order to avoid reductionistic

understandings of the questions at hand. Universities may matter in different ways, many of which go unnoticed, to different types of stakeholders.

The ways in which universities matter range from the microscopic scale and individuals who profit or flourish from their existence to the macroscopic scale and questions of pervasive sociocultural change. The former scale pinpoints the fact that universities logically mean something to those who pass through them, leaving either with degree certificates, life-long *bildung*, or personal growth (e.g., Nussbaum, 2010), or those who experience the fruits of academic knowledge through books, documentaries, exhibitions, or other media. They also include those who benefit from health, technological, or environmental improvements, have their lives and jobs made easier, or profit from commercial inventions or solutions originating in academia. The latter is the collective and cumulative scale at which the knowledges that flow through universities at different points in time exert more or less tangible influences on the environments in which they are placed (e.g., Myhre, 2011). This includes the accumulation of knowledge that educates the general public and enhances our understanding of society, finds solutions to societal challenges, and through the establishment of new firms, stimulates the creation of job opportunities and competitiveness.

In direct and indirect ways, then, universities may mean something to publics or beneficiaries of research and other university-based activities. However, mattering is not a one-way street in which extramural actors are merely recipients of academic activities. As we will explicate later in this chapter, mattering can include an interactive process in which the benefits of the relationship are mutual, and mattering is more than just getting a direct return on taxpayers' money from public universities (Laredo, 2007; Nedeva, 2008). Nevertheless, for universities to matter is also a political request and a warranted public demand. As policymakers and society place greater emphasis on universities being accountable for public and private funding investments, there is a growing plea for universities to matter with expectations of some sort of return. Accordingly, mattering may also be seen as a demand placed upon universities as a way of sustaining their legitimacy.

In this light, there is kinship between mattering as a normative idea and Kerr's (1982) oft-quoted expression "the uses of the university." Firstly, "mattering," as well as "uses," alludes to the idea that universities house a plurality of knowledges that affect—and should affect—the environments of which they are integral parts. Secondly, they both seem to feed on the idea that universities are institutions whose knowledge resources can—and should—be extracted and utilized for a range of different purposes, all of which change over time. As mentioned earlier, the expectations that society places on universities and their own pursuit of fulfilling those expectations have undergone significant changes over time, from ancient establishments of wisdom and learning to contemporary interdisciplinary knowledge and innovation hubs. In this way, the long-standing pursuit of knowledge production has been reorganized to encompass additional forms of advantages, benefits, and values aligned with the demands of the entrepreneurial university (Clark, 2003a, 2003b).

We recognize the importance of maintaining a critical gaze on such developments. Correspondingly, we hold that it is important to establish and defend a broad and multifaceted understanding of mattering. Indeed, in science policy circles, there

has been a tendency to ascribe value mostly to research that contributes to material innovations, economic growth, or practical solutions. Similarly, the literature on how universities can matter has mostly focused on universities as the main knowledge producers that contribute to the development of tangible outputs. While important, it would be a perilous mistake to conflate the raison d'être of universities with simplified conceptions of knowledge utility. It is a stillborn project to single out knowledge that does *not* matter, ultimately because there is no easy way of knowing what will matter when and to whom.

The idea of mattering is designed to bolster and enrich the discussion on universities in societies. While there are manifold dimensions of mattering, the present volume necessarily centers on a demarcated selection. A first delineation presents itself through our choice to focus on research-related activities, which admittedly are not the only mission through which universities can matter. In many countries, universities have been expected to fulfill three major interrelated missions: education, the generation of new knowledge, and the use and transfer of that knowledge to help benefit societal development. Although we recognize the critical societal importance of education and training of students, this book primarily focuses on how knowledge is generated and disseminated through the second and third missions. This is due to the fact that the unique and undeniable role of education in constructing society has been part of universities' tasks since their founding and it is rarely central to the debate over how and whether universities matter.

Mattering Through Collaboration, Engagement, and Impact

In this volume, we approach mattering through three key concepts associated with the manifold ways mattering can be grasped and achieved: collaboration, engagement, and impact. While we argue that all these concepts, from different perspectives, are central to the understanding of how universities matter, they are not exhaustive; we acknowledge that there are aspects of mattering beyond those covered by our key concepts. However, previous literature has argued that some kind of engagement is needed to create impact, and this is facilitated through collaboration between actors from academia and society. Before going into the individual chapters that, separately or jointly, deal with the three concepts, we will briefly outline why and how each concept contributes to an increasing understanding of mattering.

Collaboration involves the mutually beneficial interaction between diverse actors within academia and between academia and external actors (Bozeman & Boardman, 2014). Such collaborations allow universities to leverage diverse knowledge and perspectives within universities and in various societal contexts, fostering novel approaches to complex challenges. Previous literature has mainly focused solely on academic collaboration or on collaboration between academia and industry, where the latter in both policy and academic spheres has become synonymous with societal collaboration (Clark, 2011; Wagner, 2018). To matter beyond tangible outputs such as publications and commercial products, collaboration must take place through

mutual interactions with a multitude of stakeholders beyond business. To address this partly limited view, several chapters in this volume address collaboration from the perspective of how different environments and cultures can create barriers to as well as strengthen collaboration.

Engagement involves deep and active commitment to concerns of importance to different sectors, such as industry, communities, public organizations, and policy-makers, to ensure relevance and responsiveness and to mobilize for societal change and renewal (D'Este et al., 2018). Also, the existing body of engagement literature has shown a certain narrowness when it comes to examining academia's potential interactions with external entities. In a comprehensive analysis of academic engagement, Perkmann et al. (2021) determined that prior research has primarily focused on activities such as consulting, contractual agreements, and collaborative research, with industries as the primary means through which academia interacts with external stakeholders. These studies, however, provide a limited view on engagement. The chapters concerned with engagement in this book expand the conversation about academic engagement by going beyond conventional descriptions of engagement focused on commercialization and entrepreneurship and exploring diverse engagement channels in political and social movement spheres. By doing so, we emphasize the broader significance of universities' engagement with various actors to widen the societal impact of their endeavors.

Lastly, *impact* focuses on understandings of the long-term consequences that result from the pursuit of knowledge, making a progressive difference in society. While collaboration and engagement with external actors emphasize the importance of actively involving specific stakeholders to whom universities should matter, the concept of impact focuses on the outcomes of these interactions (Bornmann, 2013; Donovan, 2011; Martin, 2011). With the increasing emphasis on impact, scientific as well as external evaluations have largely come to focus on measurable, often quantitative, indicators such as publications, patents, and start-ups. These, however, only cover a small segment of the multifaceted ways in which universities can make a meaningful difference. The chapters in this volume dedicated to examining impact discuss different channels through which impact can be achieved. Moreover, they acknowledge that measuring impact goes beyond academic metrics and encompasses the broader societal implications of research. The chapters recognize that impactful research is not confined to immediate outcomes but rather unfolds through unpredictable and meandering knowledge flows, influenced by the actions of external actors.

The first section of the volume includes chapters that primarily discuss the role of *collaboration* as a driver for making universities matter. In Chap. 2, Jonsson, Perez Vico, and Politis investigate the role of post-doctoral education in developing faculty and support staff capacity for long-term and integrated societal participation and collaboration. Taking as its starting point the need and desire for the individual academic researchers and teachers to matter, the authors demonstrate, through a study of their own training initiative, how education can promote reflective scholars of societal collaboration.

Chapter 3, by Ralfs, delves into the role of proximity in collaboration and reveals how the potential of universities to matter is determined by their position in the global system of science. The point of departure is the assumption that collaboration between scholars is seen as a means to handle inequality between the Global North and Global South. The conditions for collaboration and types of inequalities are discussed using a multidimensional proximity framework.

The second section of the volume discusses the role of *engagement*. In Chap. 4 by Bashiri, the focus is on researchers that use activism to engage in societal challenges. The chapter provides an overview of existing literature on activism and argues that scholar activism may bring academic work closer to social impact and transformation, particularly within the context of social justice and the issue of mattering to social movements and the struggles of the people.

Chapter 5, by Perez Vico, Joelsson, Mattsson, and Nelhans, links to both the concepts of *collaboration* and *engagement* by investigating the connection between university collaboration strategies and how engagement skills are valued on an operational level. More particularly, the chapter investigates the significance of mattering by analyzing the assessment guidelines for docentship of Swedish universities. The use of strategies is a way for universities to signal their intentions and emphasis on collaboration. However, as this chapter demonstrates, these intentions are not necessarily implemented internally.

In Chap. 6, Benner and Hylmö study research centers as a policy model for engagement and, more specifically, how they have been set up in relation to other parts of the university and what types of engagement and collaboration they foster. The authors emphasize the importance of alignment between work modes, university strategy, and partner orientation to maximize the benefits of collaboration with extramural actors.

The third concept that needs to be tackled in order to understand the consequences of how universities can matter is the *impact* that the above-mentioned collaboration and engagement with society may have. In Chap. 7, Bjare gives a historical overview of how the Swedish state has sought to have an impact on how universities should matter. Through metagovernance, as Bjare argues, the state has attempted to steer the direction of policy agendas for educational reform of Swedish academia in ways that advance the means through which universities can matter to society at large. This indirect way of governing may be exemplified by attending to the ways in which changes in research policy affect the development of research quality in different areas of research. In Chap. 8, Müller discusses how such dynamics have unfolded with regard to the humanities in Sweden. She shows that dominant ideas in the national policy space, for instance concerning quality metrics, have not had a straightforward impact on the humanities. Rather, understandings of research quality in the humanities have been shaped in response to, and thus in collaboration with, articulations of research quality more generally.

Chapter 9, by Salö, Hammarfelt, and Nelhans, illustrates yet again that *collaboration*, *engagement*, and *impact* are intertwined concepts with nested scopes. The chapter deals with policy impact, understood as knowledge uptake in science–policy interaction, by using the sources of references in governmental reports. It argues that the knowledge produced in settings where political decisions are made has not

been acknowledged as a channel for scientific output and that it rarely lingers in debates about how to measure research impact. It also points to the value of agency in the production of impactful texts: researchers who seek to matter can enhance their chances by adapting their publishing practices.

By the same token, in Chap. 10, Perez Vico, Sörlin, Hanell, and Salö point to agentive collaboration and engagement as means to achieve impact. The chapter takes as its departure point the marginalization of humanities knowledge in research policy and emphasizes the need to understand how the valorization of humanities knowledge generates societal impact. The authors propose using historical impact stories as a methodological approach to gain a deeper understanding of valorization and its unpredictable nature. They introduce the concepts of "acting space" and "meandering knowledge flows" to shed light on the access, collaborators, and channels that enable knowledge valorization in the humanities.

To conclude, this volume offers what we hope is a compelling argument for redefining the concept of mattering within the context of universities. By advocating for a context-sensitive and nonnormative understanding, we shed light on the potential meanings and implications of mattering that extend beyond conventional interpretations that have emphasized industry–academia interactions with a focus on commercialization. The chapters of the volume reveal that "to matter" encompasses diverse dimensions, including collaboration with a diversity of actors and modes, engagement far beyond industry interaction, and the production of fundamental scientific knowledge. While collaboration and engagement with external actors are commonly associated with mattering, we have also emphasized the importance of producing scientific knowledge that addresses unknown future societal challenges. This expanded perspective acknowledges the crucial role of universities in generating knowledge that can effectively respond to the evolving needs of society. Furthermore, we have explored the concept of external knowledge partners and beneficiaries—the individuals or groups to whom universities should genuinely matter. Through examining perspectives on the relationship between the science community and these external actors, we have highlighted the shared responsibility and collective act of making universities matter. By fostering understanding, dialogue, and mutual recognition, universities can establish meaningful connections with diverse stakeholders and effectively address their unique needs and aspirations.

In this light, the book may contribute to broadening the dominant understandings of impact that have been focused on interaction with a few actors, such as industry and policymakers. It highlights the many aspects of how universities matter in society as a whole and how mattering can be further improved by considering both an evolutionary and a futuristic perspective. Taken together, the scope and focus of the volume offer a multifaceted and critical understanding of the many ways in which universities have mattered, currently matter, and can matter in the future. Such understandings enrich present-day debates on impacts, practices, and conditions for making universities matter in society.

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Engaging in Societal Collaboration Through Reflexivity: Experiences from a Cross-Disciplinary Pilot Course for Faculty

Anna Jonsson, Eugenia Perez Vico, and Diamanto Politis

Introduction

Recently, voices have been raised calling for increased collaboration between academia and society, stemming from expectations that collaboration will make universities matter by producing new knowledge for solving societal problems related to urgent issues such as inequality, health, environmental degradation, and climate change (Benneworth et al., 2017; Jonsson et al., 2021). However, forging the path to making universities matter through fruitful collaboration demands careful consideration. On the one hand, collaboration can enrich the scholarly work of teachers and researchers by producing empirical data and infrastructure, inspiring new research endeavors (Perez Vico, 2018; Perez Vico & Hallonsten, 2019), and opening up new conversations and mutual learning opportunities (Jonsson, 2019; Terosky, 2018). On the other hand, societal collaboration requires time, effort, and skills to identify common interests and build trust (Perkmann & Walsh, 2009; Tartari & Breschi, 2012). In addition, academic values such as openness and independence may influence the incentives for collaboration (Bruneel et al., 2010; Slaughter et al., 2002). To

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be better equipped for an enriching societal collaboration, managers, policymakers, and individual scholars need to acknowledge both the challenges and the opportunities, not least if the ambition is to develop higher education institutions (HEIs) where collaboration can proceed in a reflective and rigorous way.

While we see an increasing call for scholars to engage and collaborate with actors outside of academia, it becomes apparent that there are multifaceted interpretations and interconnected concepts that may pose challenges or intricacies when it comes to heeding these calls. Despite conceptual overlaps, we can identify two distinct approaches to societal collaboration from a scholarly standpoint: as an object of study and as a scientific endeavor. Scholars who approach societal collaboration as an object of study investigate and analyze its various aspects, such as motivations, processes, conditions, outcomes, and challenges, and gain an understanding of the dynamics, impacts, and factors that contribute to effective collaboration between academia and external stakeholders. Concepts that relate to societal collaboration as an object of study and that have paved the way for these insights include, among others, academic engagement (Perkmann et al., 2021), third-stream activities (Molas-Gallart et al., 2002), and productive interactions (Spaapen & Van Drooge, 2011). Societal collaboration can also be regarded as a scientific endeavor in and of itself. This viewpoint emphasizes the use of scientific principles, methodologies, and rigorous investigation to advance the practice of collaborative engagement. The scholarship of engagement by Boyer (1996), integrated research (Van Kerkhoff, 2014), engaged scholarship (Van de Ven, 2007), and various approaches connected to action research (Reason & Bradbury, 2008) are examples of this standpoint.

Although these two scholarly standpoints have had successful developments on their own, they have rarely cross-fertilized and informed each other, representing undeveloped potential. Drawing on a synthesis of these concepts, adapted for the Swedish higher education context following the origin of this study, we define societal collaboration as the participative form of academic work (integrated into research, teaching, and outreach) that involves engagement with various types of actors outside of academia (Perez Vico, 2018).

Despite the increased contemporary demand for engagement and collaboration, the idea of strengthening the societal engagement of academia is not new. Early on, Ernest Boyer (1990, 1996) called for including engagement as an integral part of the "academic scholarship" in which societal collaboration and engagement are regarded as directly tied to the academic discipline and thus require the rigor, critical reflection, and accountability traditionally associated with research. Developing such skills and academic rigor entails reflecting on existing practices and acquiring comprehensive academic knowledge *about* societal collaboration. It requires linking theory with practice in a critical and nuanced way, and engagement in reflexivity (cf. Alvesson, 2007; Cunliffe, 2002; Jonsson et al., 2023). Scholars need to scrutinize underlying assumptions about their perceived and enacted societal role and their engagement.

Yet, when looking into various efforts to organize for societal collaboration, we detect a lack of reflexivity related to these issues in the everyday work of contemporary academics. Based on this observation, and with the intention of creating a space

for reflexivity to draw on the idea of a "reflexive scholarship of societal collaboration" as an extension of Boyer's argument about "scholarship of engagement," we initiated a cross-disciplinary pilot course to discuss these issues.

The motivation for initiating a pilot course was that faculty education initiatives have been highlighted as a promising tool for scholarship development (Welch & Plaxton-Moore, 2017). Moreover, scholars have identified a need to strengthen the capability of HEI employees through sharing and building on existing knowledge on societal engagement and collaboration from both theory and practice (cf. Jonsson et al., 2021). This need has also been acknowledged outside of Sweden as scholars have pointed to the lack of theoretical framing in faculty development initiatives for societal engagement and collaboration (Welch & Plaxton-Moore, 2017). Yet, while the literature has yielded important insights about the conditions for societal engagement and collaboration in academia, covering issues such as academic promotion (Crookes et al., 2015; Glass et al., 2011) and supportive institutional structures (Giles, 2008; Sandmann et al., 2008), less attention has been given to the particular role that education initiatives geared toward faculty can play in fostering a long-term and integrated societal collaboration capacity in HEIs (Welch & Plaxton-Moore, 2017). Further, most initiatives, as well as literature on faculty development interventions related to societal engagement and collaboration, concern descriptions of shorter consultations, workshops, or fellowship programs (Welch & Plaxton-Moore, 2017).

In this regard, there is little recognition of the role of courses targeting collective reflections among diverse participants in developing skills and academic rigor toward a reflexive scholarship of societal collaboration. This chapter offers insights from a case study of a cross-disciplinary pilot course offered to faculty and support staff at Swedish universities, which corresponded to approximately three weeks of work spread over three months. The study aims to explore how skills and academic rigor for engaging in societal collaboration can be developed toward a reflexive scholarship of societal collaboration and engagement. Building on the experiences from the pilot course, we explore and discuss the participants' reflections on how their partaking in the course may support a reflexive scholarship of societal collaboration. The findings are relevant for scholars, university management, and policy actors interested in fostering HEIs' long-term and integrated societal collaboration capacity.

Means for Strengthening a Scholarship of Societal Collaboration Through Reflexivity

The need to develop skills and capabilities for societal collaboration was one of the aspects Boyer (1990) raised in his argument for expanding the notion of scholarship. He suggested four broader forms of scholarship: discovery, integration, application, and teaching. Compared to academia's efforts to embrace the scholarship of teaching (Hutchings & Shulman Lee, 1999), less attention has been given to societal engagement and collaboration, which are important aspects of the other forms of

scholarship, particularly the scholarship of discovery and application. Nevertheless, there has been a noteworthy drive to incorporate Boyer's views into faculty development in the US (Blanchard et al., 2009), although there has been much less interest in doing so in a European context.

Following Boyer's (1996) view, societal collaboration concerns ensuring a societal *impact from* academic work while at the same time *enriching* academic work itself. In this regard, theory and practice offer different and complementary insights into phenomena that pave the way for a thicker understanding of reality (Perez Vico, 2018; Van de Ven, 2007). Boyer (1990) distinguishes between general services that academics provide to a community and scholarship activities that are directly tied to the academic discipline, thus requiring the rigor, critical reflection, and accountability traditionally associated with research. Based on this logic, societal collaboration is not considered a third mission but entails teaching, research, and outreach. Therefore, according to Boyer's distinction, societal collaboration should be viewed as an integral part of academic tasks rather than a separate one—a view that echoes that of many scholars (e.g., Laredo, 2007; Nedeva, 2008). This alignment of perspectives among scholars not only reinforces the significance of integrating societal collaboration into academic endeavors but also underscores the growing recognition within the scholarly community of the transformative potential and value of collaborative engagement with external stakeholders.

Although Boyer (1990, 1996) repeatedly emphasized the need for this consideration under the term "scholarship of engagement," and despite some interest in collaborative scholarship approaches (e.g., Van de Ven, 2007), societal collaboration has not seen the same comprehensive scholarly journey as teaching has. While teaching has long been recognized as a core component of academic work, with pedagogical theories and practices extensively studied and developed, the exploration and understanding of societal collaboration as an academic skill have not received comparable attention. Scholarship in teaching has flourished, with research and discourse focusing on effective teaching methods, curriculum development, student learning outcomes, and the scholarship of teaching and learning. In contrast, the scholarly investigation of societal collaboration as an academic practice and skill, its methodologies, impact, and integration within academic disciplines, remains comparatively limited.

The concept of reflexivity has been an important component in both the scholarly development of teaching and the development of scholarly rigor in general (Alvesson, 2007; Cunliffe, 2002). Through a reflexive approach, academics can engage in continuous questioning, evaluation, and refinement of their ideas and theories, as well as of the impact of their teaching approaches and practices. Reflexivity prompts researchers and educators to engage in ongoing dialogue with themselves, their peers, and their broader communities, fostering a spirit of intellectual curiosity, growth, and adaptability.

Informed by the promises of reflexivity to support learning and develop academic rigor, we suggest that a "scholarship of engagement" should also include reflexivity as it provides a space for debating assumptions and differences in practices (Lövbrand, 2011; Phillips et al., 2013). Reflexivity enables academics to scrutinize

current collaboration strategies, values, and beliefs and identify new options and alternative ways of collaborating. In this way, reflexivity can assist academics in making informed decisions about when and how to engage in collaboration, thus paving the way for developing a reflexive scholarship of societal collaboration.

In line with these ideas, the pedagogical background for the pilot course was to provide a space where participants could critically question assumptions underlying their own practices (Cunliffe & Jun, 2005). In this context, we further apply Schön's (1984) ideas of the reflective practitioner, meaning that theory is used to reflect on practices and vice versa. Based on Schön's (1984) ideas of the advantages of collaborative reflection among participants from diverse disciplines and contexts, Schratz (1993) further proposed a method for developing reflective professionality in teaching. While Schön (1984) and Argyris (1991) are mainly concerned with critical reflection that connects theory and practice, reflexivity also involves questioning the basic assumptions underlying the ends, means, and relevance of a practice (Cunliffe & Jun, 2005). Reflexivity goes beyond learning through reflection to include critical self-reflection in the rigorous critique of routinized practices, individual thought patterns, responsibility, and contributions related to social conditions (see also Alvesson & Sköldberg, 2017).

Course Content and Outline

Drawing on Boyer's (1990) "scholarship of engagement" and a reflexive approach, we designed a pilot course. The ambition was to offer participants an opportunity to critically scrutinize assumptions underlying their practice through scholarly eyes and connect practical and theoretical perspectives.

We developed a set of qualification descriptors encompassing knowledge, skills, and judgment that make up a scholarship of societal collaboration, reflecting existing descriptions of such competencies (Blanchard et al., 2009; Welch & Plaxton-Moore, 2017). The descriptors were adapted to a Swedish institutional context and served as learning outcomes with key implications for the course design, delivery, assessment, and standards (see Table 1). The learning outcomes targeted the ability to discuss *what* societal collaboration is, *how* it can be understood, *who* is expected to contribute, *what* outcomes academia and society can expect from it, and *why* it is considered important.

The course was structured into several modules covering key themes. Each module was designed drawing on a diverse set of pedagogical approaches to enrich course participants' pool of experiences and to encourage reflexivity for learning. The modules included conventional seminar-type lectures with the course and guest lecturers, experience-sharing workshops with the participants, as well as panel discussions with invited guests representing different perspectives on the selected themes. The participants were asked to read the assigned literature and other course material for each module and document their own (or a colleague's) experiences related to the theme. This form of preparation served as a point of departure for the

Table 1 Learning outcomes for the course

Qualification descriptors	Learning outcomes
Knowledge and understanding	Describe different perspectives on societal collaboration Account for key concepts related to the nature, impact, and ethics of societal collaboration Discuss the various practices of societal collaboration related to research and education Explain how societal collaboration relates to associated concepts (and to the Swedish higher education ordinance)
Skills and abilities	Derive the particularities of societal collaboration within the context of one's scholarly field, and relate it to other fields Derive and characterize potential challenges with societal collaboration related to ethical aspects, conflicts of interest, and costs Identify potential opportunities for societal collaboration and assess the suitability of engaging in these given presented conditions
Judgment and approach	Critically evaluate one's ability and prerequisites related to societal collaboration in a particular situation Critically discuss strategic considerations related to engaging in societal collaboration

experience-sharing workshops and enabled collective reflection. To pass the course, the participants needed to demonstrate that they had fulfilled the learning outcomes through a written assignment of (future) practical use to themselves. In Table 2, we offer an overview of the modules and the assignments.

The pilot course was made available to faculty members across all Swedish universities, and it was organized and delivered on two occasions. The initial course, held during the fall of 2019, encompassed a series of three on-campus sessions spread over a period of three weeks, hosted at distinct universities located in diverse cities. Thirteen participants, comprising researchers and educators from six universities, took part. On the second occasion, the course transitioned to an online format in response to the Covid-19 pandemic that arose during the fall of 2020. To facilitate remote learning, a digital learning platform was established, and all lectures, featuring the course instructors and a guest lecturer, were pre-recorded. These recorded video materials varied in duration, ranging from 10 to 30 min each. The experience-sharing workshops, panel discussions, and guest lectures with invited speakers were all held via Zoom. On this second occasion, the course participants were more diverse, representing both support staff responsible for collaborative efforts at universities (six participants) and faculty members (three participants). The purpose of a diverse composition was to bring together faculty and individuals from support functions that facilitate the core activities of academic work and often underpin collaborative

Table 2 Course content and assignment

Modules
1. Introduction and conceptual discussion—what is societal collaboration? • Introduction to the course and its pedagogical approach • Existing perspectives on societal collaboration • Positioning societal collaboration vis-à-vis related concepts (e.g., the third mission, innovation, research utilization) • Overview of formal expectations of societal collaboration
2. Research and practical examples of societal collaboration in research and education • Practical perspectives on societal collaboration in research and education • Practical examples from various forms of collaboration in education and research, respectively • Dialogue drawing on documented experiences from participants
3. Research and practical examples of societal collaboration in tech transfer and outreach • Perspectives on societal collaboration in knowledge/technology transfer • Perspectives on societal collaboration in outreach/communication • Practical examples from various forms of collaboration in knowledge/technology transfer and outreach/communication • Dialogue drawing on documented experiences from participants
4. Benefits and challenges with societal collaboration • Potential benefits from societal collaboration in terms of societal benefits and benefits potentially strengthening teaching and research • Challenges in working with societal collaboration in terms of relational conditions
5. Landscape conditions and course synthesis • Legal and ethical aspects of societal collaboration • Overview of university policy developments • Quality in societal collaboration—goal formulation, measures, monitoring, and assessment
Assignment: To pass the course, the participants needed to complete an assignment of practical (future) use for themselves, choosing one of the four alternatives below: • Writing a real or fictive section of a research proposal targeting outreach, dissemination, or societal collaboration • Revising a description for a course at any level (from undergraduate to Ph.D.), strengthening the course's collaborative element • Writing a societal collaboration portfolio and personal approach/perspective/strategy to be included in an academic qualification portfolio • Revising or writing a strategic document that captures lessons from the course to strengthen the collaboration support function

efforts at universities (Fang, 2016; Watermeyer & Lewis, 2018; Watermeyer & Rowe, 2021). Recognizing the potential divergence in viewpoints between support staff and researchers, we identified the importance of fostering boundary-spanning discussions for interactive learning. By doing so, we aimed to create opportunities for mutual understanding and knowledge exchange that would contribute to the cultivation of reflexivity (cf. Jonsson et al., 2023).

Method

Aligned with our overarching objective, a comprehensive case study was undertaken to assess the pilot course, with particular attention given to *how* the participants perceived the course (cf. Merriam, 1998; Yin, 2014). The empirical data encompasses multiple data sources, capturing insights from distinct temporal vantage points spanning the pre-course, during-course, and post-course phases. By utilizing a diverse range of data collection methods and time points, we aimed to gain a holistic understanding of the participants' experiences and how their perspectives evolved throughout the educational journey. Before offering the course, we collected documentation of participants' previous societal collaboration experiences and perspectives through course applications and accompanying CVs. The ambition was to contrast their pre-understandings with their understanding after the finished course. During the course, we took field notes and observed the participants' interactions and interests in specific course elements. We focused on capturing their reflections and the types of questions that were raised. All participants were initially informed that the course was part of a study, and all interviewees were further informed about the study and the use of the data. After the course, we conducted a survey to capture perceived experiences and learning outcomes. Drawing upon the dataset obtained, an interview guide was crafted to facilitate follow-up interviews. Out of the original cohort of 22 participants, a substantial majority of 18 individuals were willing to be interviewed. To uphold confidentiality and safeguard the identities of the respondents, pseudonyms were employed. Table 3 provides a comprehensive overview of the interviews conducted and the corresponding pseudonyms assigned.

The interviews were conducted in Swedish through Zoom due to the Covid-19 restrictions, using a semi-structured template (see Appendix 1) focusing on various themes related to the participants' experiences and learning. All interviews were recorded and transcribed verbatim.

We applied a data-centric open coding strategy in which the analytical process starts out with data that are fractured, conceptualized, and integrated to build theoretical insights (Strauss & Corbin, 1990). First, all authors carefully reviewed the data and engaged in general discussions focusing on participants' experiences and insights from the course. This discussion laid the ground for a tentative coding frame that was transferred into a coding scheme in the software NVivo. All data were uploaded in NVivo, and the 18 interviewees were assigned as NVivo cases and classified according to six attributes (attended course, gender, seniority, profession, discipline, and university). Second, the material was processed and coded in NVivo through an abductive coding technique where we iteratively moved between coding themes that emerged in the raw data and our initial coding frame, in line with systematic combining approaches (Dubois & Gadde, 2002; Yin, 2014). This allowed for more reflexive sense-making of the material (Merriam, 1998), as we initially used the tentative coding frame to guide the analysis while it was continuously revised and new codes emerged from the data. Third, we searched for themes and patterns, both

Table 3 Overview of interviews

Pseudonym	Profession	Length of interview (minutes)	Date of interview (2021) day/month	Course occasion
Ari	Teacher/researcher	40	03/03	On campus 2019
Ellis	Teacher/researcher	61	05/03	-”
Cleo	Teacher/researcher	73	30/03	-”-
Tory	Teacher/researcher	68	22/03	-”-
Sasha	Teacher/researcher	56	01/03	-”-
Drew	Teacher/researcher	74	05/02	-”-
Kyle	Teacher/researcher	61	01/03	-”-
Max	Teacher/researcher	55	04/03	-”-
Dani	Teacher/researcher	52	04/03	-”-
Austin	Teacher/researcher	44	02/03	-”-
Dale	Teacher/researcher	50	04/03	-”-
Alex	Support staff	48	24/03	Online 2020
Kim	Support staff	60	24/03	-”-
Charlie	Support staff	60	23/03	-”-
Indy	Support staff	42	22/03	-”-
Lou	Teacher/researcher	52	23/03	-”-
Noa	Teacher/researcher	62	23/03	-”-
Nico	Support staff	61	01/03	-”-

manually and with the aid of crosstab and matrix queries in NVivo, combining interview classifications and codes. From this work, three overarching themes emerged, together with patterns that captured qualitative differences between participants' experiences of the course. These patterns and themes were validated through continuous discussions between the researchers and triangulation between the multiple sources of data (Merriam, 1998).

Results

In the following section, we present and discuss our findings structured according to three themes that capture participants' reflections on their experiences from the course to identify enabling conditions for developing skills and academic rigor toward a reflexive scholarship of societal collaboration.

Theorizing Collaboration—the Value of Having Access to a "Smorgasbord"

An overall theme from participants' accounts is the perceived value of having access to a "smorgasbord" of models and frameworks to support theorizing collaboration. This made it possible to navigate the research landscape of collaboration and gain insights into the scholarship of societal collaboration. Several informants emphasized that the orientation in existing research was a significant benefit from the course. *Max*, who in parallel with the course worked on a collaborative project, explains:

> We got a lot of help from the course, with, like, probing the literature […] We have bought all the books, and we have, like, taken in everything. And you read over and over again as well.

Theorizing stimulated participants to consider their collaboration practices in light of different perspectives and models. An example comes from *Indy*:

> The biggest yield I got, I feel, was that there was so much research […] it gave me some food for thought that we should think more about working, if you could say, on a scientific basis with collaboration.

Another example comes from *Lou's* experience of learnings concerning their work with societal collaboration in teaching:

> Even though I have worked with education for a long time, I may not have thought about educational collaboration in the way it was framed in the course. […] I have received a lot of insights that we could spin on here.

As Indy's and Lou's statements illustrate, participants discovered more evidence-based and structured ways of working with societal collaboration through insights into theoretical perspectives. Another recurring benefit was finding concepts and terms for describing collaboration activities already being carried out. *Charlie* illustrates this:

> I got some Aha! experiences. Like putting into words phenomena that you have experienced, but may not have been able to really describe for yourself. It was a lot like that… I like neat models like this.

Some informants also emphasized that insights into theoretical perspectives were essential to developing a sense of rigor in their professions. These insights also relate to the accounts above on providing frames for communicating and explaining practices. *Indy* exemplifies this further:

> I [sought] theoretical knowledge about collaboration and [wanted to] feel that this is my competence—that I wanted to strengthen it. As someone with subject competence at the university who wants to strengthen themselves in their subject, I felt that: Yes, but this is my niche, and here I would like to strengthen myself.

In addition, some participants experienced that they gained greater insight into challenges and critical perspectives through theories. *Dani* elaborates on the choice of literature:

> [I] often return to certain texts as well, and the literature we had. And feel that I better understand certain things and why they are organized as they are. And problems. And [I] can […] describe difficulties and opportunities in a better way.

Participants not only found framings for challenges they had already experienced, but the theoretical perspectives also offered insights into unfamiliar problems, as explained by *Kim*:

> And I think I have brought with me, like, different… yes, models and also any future problems that may arise with collaboration. […] I am aware of what can arise and different interests and motivations.

However, a few participants also indicated that the course theorized and problematized collaboration to an unnecessarily large extent.

> [The course] also made collaboration perhaps more complicated than I myself have experienced it. […] So, I do not know. Now I'm theoretically oriented enough to appreciate it […] But… sometimes you can, like… As soon as researchers put their teeth into things, it becomes very complex. (Dani)

Two faculty members with extensive practical collaboration experience considered collaboration a purely practical pursuit with limited need for theorizing. *Kyle* describes it as follows:

> [Collaboration] is quite a lot about tangible things such as information dissemination—how to create networks and how to…, who you invite to meetings and such things. … And I did not think we got there really in the course, such tangible things. It is not, like, researchable how one spreads information. Yes, maybe it is. I do not know. But I mean… But this is so much based on the fact that I am then very much a practitioner in the context.

However, *Austin*, in contrast to *Kyle*, did see a point in theorizing, but for other reasons:

> I did not intend to […] sit at home and read books on things that are entirely different topics. […] And I'm not an economist or collaboration theorist, or whatever it is. And that's not why I was there. I was there to discuss and get inspired.

Indeed, although the participants overall seemed to appreciate the theoretical perspective on collaboration, some requested more practical perspectives, including methods, checklists, and best practices. Interestingly, most of these were faculty members, who expressed more negative sentiments toward theorizing than support staff. One observation that points toward an explanation is that support staff participants tended to see a greater need to legitimize themselves to faculty and saw theoretical grounding as a means for achieving this. *Charlie* explains:

> I think that I have gotten, so to speak, a theoretical foundation to stand on. And I wish I had [taken the course] several years ago, and got like a…, more weight in different arguments, more […] research to refer to, for example… when arguing for various things.

An Opportunity for Reflection and Reflexivity

The course targeted reflexivity through collective discussion to blend theory and practice by sharing experiences among participants from various contexts. The discussions encouraged the participants to reflect on their perspectives and provided an opportunity to draw on their experiences to conscious insights into assumptions about societal collaboration. Participants appreciated the opportunity to reflect with others and contribute to learning about others' practices.

> Well, there were several interesting conversations… Which made me reflect a little more during that time on what I do myself, how it fits in or does not fit in. But I also became a little extra-curious about some others and learned a little more about what they do and how they think. (Austin)

Informants also highlighted that the discussion gave insights into critical aspects of collaboration that they had not previously considered. This made them aware of specific challenges that made them question their assumptions. As *Noa* explains:

> Because many of the conversations ended up very much on difficulties and obstacles and […] So, it has also opened my eyes of course, that it is not just flowers and green lawns. […] Yes, then I must have been a little blinded […] in that I think collaboration is positive in some way. So I was surprised that there were so many difficulties all the time, that everyone raised in the conversations.

Bringing together participants from diverse disciplines and universities stimulated participants' reflections on collaboration. Some of the reflections related to cross-disciplinarity:

> We came from different contexts, all of us that took the course. […] The opportunity for collaboration looks different for the different areas. […] I will not say that I understand the conditions for everyone, but [it is important] to be humble, to take in and try to understand, and ask people to, like… describe how they experience their conditions in different contexts, linked to collaboration. (Drew)

Similarly, *Ari* emphasizes the benefits of bringing together participants from different universities:

> And it was good that it was from different universities. It was exciting to hear how others are doing things and to be able to discuss it.

On the second course occasion, the diversity widened as both faculty and support staff participated. This diversity was highlighted as positive by most participants. It provided good opportunities to engage in discussions leading to a better understanding of each other's work roles and prerequisites to engage in a scholarship of collaboration. *Lou*, a faculty member, shares their experiences of discussions with support staff:

> So I really think that you also got a greater understanding of what challenges [the support function] faces. […] Sometimes, you might whine a little about the support. * Little laugh * […] But I think I have gained a greater understanding of how the support works and so on.

Nico, a support staff member, shares their reflections in a way that mirrors *Lou's* reflections:

> I liked the discussions we had in the group about these issues on all occasions… Yes, but "how is the collaboration experienced by the [faculty] and what can we do to support them, how can we work?" has been incredibly rewarding.

Thus, combining various perspectives through collective discussions provided insights into how the conditions and understandings of societal collaboration vary between universities, collaboration forms, disciplines, and occupational roles. Some participants highlighted the need for conscious self-reflection by contemplating one's own experiences with others and linking experiences to theory. This raised the awareness of their way of collaboration or new and different perspectives. Participants also stressed that there are not many opportunities for such reflection in contemporary academic life and that the course provided conditions for such reflection. However, several participants, mainly from the course given on campus, wished for more time for discussion. They felt discussions provided an understanding of general challenges related to societal collaboration and differences in how individuals and groups from diverse contexts perceive and approach issues. As *Charlie* states:

> It is very interesting to hear what others do under similar conditions […] And sometimes it can be enough just to hear that others have the same problem, so you know that: "Okay, but then it is not… It is not our team that is wrong. Rather, this phenomenon occurs in all major universities."

Participants also underlined the benefits of continuously meeting co-participants through peer interactions as it developed confidence that paved the way for more trustful conversations, stimulating reflections, and reflexivity.

> … One of the most important aspects of that, I think, is that we started to get to know each other. So, one dared to be more revealing. … One… dared to make oneself a little vulnerable. … And you do not do that until you have some form of trust or…, between each other in the group. (Drew)

Many discussions were first held in groups of three or four, then in plenum. Several participants, like *Dani* from the on-campus course, found these group discussions to be a very valuable format for collective reflections:

> And it worked well when we had, like, group discussions along with our reflections. Because then it happened that everyone spoke and you discussed, and you got to know each other. So I think it's a good feature, that you have discussions in a small group. Discussions in large groups, like with reflections and so on, are difficult [...]. And that it is not just that you want to shine with your experiences.

Several participants underlined the importance of meeting face-to-face to encourage collective reflection. Yet, participants in the off-campus course experienced that group discussions worked relatively well online. *Nico* illustrates this:

> It's always a little nerve-wracking before you meet people. […] We work a bit like that, people, that you think it's hard to meet new people. But it feels safe very quickly, just through one or two group discussions.

The participants were asked to prepare individually for each discussion session by writing about their reflections on the specific theme. Both Dani and Charlie underlined the usefulness of preparing in this way since it forced them into self-contemplation that produced initial thoughts that could be used as a point of departure for collective reflections.

> One was forced to formulate oneself. Because then you won some time during the discussions. You got straight into the core, somewhat, somehow. People had had time to think. It was good. (Charlie)

Despite these overall positive sentiments, some participants viewed these collective reflections differently. *Sasha* sometimes perceived the discussions to be too unstructured and called for more guidance:

> It was very scattered and very… We had very much different…, came from different places and maybe also had different perceptions of what the course would contribute, in some way. […] At the same time, I also think that it is always very exciting to meet people from different places and with different thoughts. […] So that's contradictory. […] maybe that [the lecturers] could also have been a little clearer with thoughts about the layout [for discussions]. Not be so careful to ensure that there are different opinions and that everyone is right.

Ari describes the discussion sessions as less valuable because they tended to be superficial and unsubstantial:

> The discussions were… maybe interesting, like, from some perspective. But for me, it was a bit more… yes, almost * Laughter * […] It was very much, like, just talk.

Interestingly, participants questioning the usefulness of collective discussions were all faculty members from the first course occasion, when the group composition was more homogeneous (only faculty members) and the discussions took place face-to-face. Yet other participants from the same occasion stressed that the time for collective reflections was too short, indicating a perceived need for collective reflections.

A Need to Transform Knowledge into Practice

A prominent insight from our data was the perceived importance of using the knowledge acquired during the course to make it part of one's scholarship. Indeed, participants with few opportunities to apply insights given their current work roles, or who changed roles after course completion, found the knowledge from the course less relevant.

> The yield benefit in relation to the time spent… was perhaps not super high. […] But it is not because of the course, but because of my role. (Kyle)

In addition, *Cleo* highlighted that the course format gave limited opportunities to apply concrete learnings and called for a more practice-oriented pedagogy:

> I think you need to do…, you need to use it. […] It may need to be a little more action-oriented. Or where you sort of go between theory and practice in a slightly more seamless way.

Ellis also had few opportunities to apply insights from the course in practice but expressed that they were eager to use the new knowledge and insights in their context:

> But it's knowledge; it's practice and applications and that. And good books to go back to, and so on. And a little longing too, you could say, [to] have the opportunity to apply this, now with that knowledge.

Thus, there seems to be a need to closely link the course content with current professional practice to absorb insights and make them part of one's scholarship. A critical part of this need is having a relevant context to return to after course completion. Our analysis reveals that participants had different opportunities to access such a context. One factor was the participants' occupational role. Another was the freedom, support, and opportunities that the home university offered participants to apply this knowledge and transform insights into organization-wide initiatives. For instance, *Max*, a faculty member from a large established university, reflected on the limitations that they experienced and compared these to what participants from smaller universities would encounter:

> … Those who came from [smaller universities]—it felt like they had, like, much shorter to…, what should I say, university management and collaboration thinking. So, the distance is much, much shorter.

Indeed, our data indicate that participants from larger and older universities experienced that their organizations offered less fruitful conditions for applying their knowledge than the other participants. These participants also highlighted that the management's lack of incentives and responsiveness created unfavorable conditions for taking advantage of the new knowledge. *Ellis* elaborated on this, connecting it with the lack of knowledge among university managers:

> … It has not been unexpected for me to, like, take this into account, use it and also see the need. But I also notice upwards that they do not understand it. […] It would be great if the deans could take this course.

Other participants, including those from smaller universities, expressed difficulties in establishing institutionalized collaboration initiatives at their universities, which also seemed to prevent participants from using their acquired competencies to make any lasting changes to their organizations. *Max*, for instance, experienced a lack of support and incentives to work with collaboration as a practice integrated into the everyday work of a faculty member:

> What you do must not end up as oil on top of the water, but it must get into the existing structure. […] It kind of needs to mature, so that collaboration becomes part of what is done, in practice. […] So that it just kind of becomes part of one's everyday activities.

Nevertheless, several participants stated that they used the course to conduct actual initiatives, although these were not always university-wide or integrated. However,

the practical use of the course learnings varied slightly between the types of participants. The faculty members used the learnings in tangible ways, as inputs to applications, research, courses, and operational development. *Dale* accounted for how they developed a course of their own:

> We have started our own little course, very much inspired by the course that you gave. [We wanted to] try to widen… or a little like a tipping point. You try to engage more people and raise the general, like, the level of knowledge and commitment.

Almost all support staff participants made use of the course learnings, even though they had less time or opportunity to apply them than faculty since only four months had passed before they were interviewed. They got input to conferences, research communication, introductions to new employees, strategic management support, and organizational development. As an example, *Indy* explains how experiences from the course contributed to the build-up of a collaboration support structure at their university:

> I will enter a new role at the university. […] I will work as a full-time strategic coordinator […] there; collaboration is becomming a very central part because it is our profile. And we have just started a new unit that will take care of collaboration. […] We talked about that on the course as well… […] I think that such knowledge in that role that I will have in our management office—I think that is good […] So I see many possibilities [to apply learnings].

A few faculty participants expressed that they had no or little tangible use for the course learnings. Some were also skeptical of theorizing collaboration and of the course's pedagogical approach. Others, like *Drew*, stated that the course still led to a change of mindset and attitude, even though they could not point to tangible outcomes:

> It is not the case that I walk around thinking that "this is what I learned in that course and I will apply it now." But […] if there is something I have taken with me, it's my way of relating to these things. […] I have become a little more… Oh…, nuanced. Though it's not really right. But… I reflect a little more on why some external actors really want to collaborate.

Indeed, many interviewees also experienced intangible outcomes from reflexivity linked to aspects of their scholarship, such as the aforementioned changes in beliefs, assumptions, judgment, and accuracy related to collaboration practice. Consequently, some participants stressed that colleagues now considered them experts on societal collaboration and consulted them. Others affirmed that they had strengthened their skills and understanding of collaboration in a way that reinforced their professional identity and confidence. While this applied to less than half of the faculty members, all support staff articulated such experiences. According to our data, support staff tended to need to strengthen their professional identity as they belong to an unestablished profession. As previously mentioned, these individuals highlighted that theoretical perspectives were crucial for developing a sense of professional rigor and legitimacy in academia. In addition, they valued learning terminology and concepts that could be used to explain their profession to others. *Nico* exemplified such experiences:

> I thought it was difficult at the beginning of my employment to answer what it was I really did when people asked. … And yes, those discussions were also raised in the course. And

> I think it's very good to talk about it. … It is part of the identity as well, that it… How one is experienced by others. […] So [professional identity] was an important outcome [of the course].

Although two faculty members were given new assignments partly because of competence gained from the course, most did not experience a sense of strengthened professional identity or confidence. This holds true also for participants in a more mature phase of their careers. *Kyle* reflects on their seniority in relation to what they got out of the course:

> So, I think I know collaboration quite well. […] I have quite a lot of experience from collaboration in practice. […] If you come as much, much younger and fresher, then there are many more things that are new.

Concluding Discussion: A Need for Space and Engagement

The aim of this study was to explore how skills and academic rigor for engaging in societal collaboration can be developed toward a reflexive scholarship of societal collaboration. From our case study, three main findings emerge, highlighting features that contribute to the development of a reflexive scholarship of societal collaboration collaboration.

First, providing participants with a theoretical orientation and framing enabled them to strengthen their "scholarship" by allowing them to capture and explain existing practices and critical aspects of those practices. Through this contribution, we substantiate the importance of increasing the element of theory in courses, which underlines the need to increase elements of this type since previous literature has highlighted that they are underutilized (Welch & Plaxton-Moore, 2017). However, our findings also indicate that participants' intentions to partake in the course, along with seniority and experience, influenced their need for and benefits from strengthening the scholarship. We found that participants with a need to legitimize their competence and activities benefited most from theorizing. This relates to the importance of targeting the participants in a receptive professional phase.

Second, long-term collective reflections among diverse participants play an important role in developing the scholarship of societal collaboration. The continuous process of moving back and forth between the description of diverse experiences, individual reflections, and group reflection paved the way for self-awareness and questioning assumptions related to one's and others' practical experiences. It provided opportunities for reflexive learning (Cunliffe & Jun, 2005) and means of strengthening the scholarship of societal collaboration. Disciplinary diversity was a welcomed feature in the course and offered valuable opportunities for increasing self-awareness and mutual recognition. This points to the benefit for faculty development of socializing not only within one's academic home (Sandmann et al., 2008) but also outside. Yet our observations also highlight the challenges of collective reflexivity among participants with different perspectives from various professions, disciplines, and universities.

Third, transforming gained knowledge into abilities and integrating these into the scholarship requires applying knowledge in real-world contexts. From our interviews, we learned that the participants who lacked opportunities to practice learnings experienced fewer benefits. This echoes previous studies that underline the importance of connecting gained insights and practice for fruitful and sustained faculty development (Blanchard et al., 2009; Welch & Plaxton-Moore, 2017). Our findings emphasize that the organization's incentives and support are essential for enabling the application of gained knowledge. In this way, our study furthers understanding of the importance of the institutional context for societal engagement and collaboration, not only from an incentivizing perspective (Giles, 2008; Sandmann et al., 2008) but also as a space where learnings can be applied. Nevertheless, we found diverse examples of tangible use of course learnings and intangible outcomes related to a strengthened professional identity and confidence. However, this was more frequently experienced by support staff than by faculty members, particularly senior faculty. This result reflects that the professional support staff often experience disempowerment and lack of status and thus seek more recognition from faculty (Watermeyer & Rowe, 2021).

Due to the time limits of our research project, we could only conduct interviews with the participants within 4–18 months after the end of the course. Thus, we could not capture the long-term consequences of participation nor patterns related to which outcomes persisted or disappeared with time. Consequently, future research could target tracing long-term sequences of the impact of this type of initiative over a more extended period. Further, the study is conditioned by the particularities of the Swedish higher education system. Hence, our study joins many single case studies of similar initiatives in particular institutional contexts that present challenges for translating insights into new settings. Future research should therefore focus on comparative case studies across different institutional contexts to foster increased knowledge of the role that institutional conditions play in enabling fruitful educational initiatives for engaged scholarship development. Also, our study did not aim to capture the effects of the courses in terms of whether the participants' perceived benefits and experiences of the course led to higher excellence or quality in their actual societal engagement and collaborative activities. This would have required interviewing additional informants from both within and outside academia. This limitation offers an intriguing arena for future research that includes exploring the relationship between the perceived development of scholarship and practical engagement endeavors.

With this study, we answer Boyer's (1990, 1996) call to reconsider scholarship and support the need for making societal collaboration an integral part of academic scholarship by revealing how this can be done in practice. In terms of practical implications, this study is relevant to scholars, managers, and policymakers interested in making universities matter by fostering a long-term and integrated societal collaboration capacity in HEIs. We demonstrate that a course that brings together participants from many professions and disciplines is a beneficial instrument for promoting the development of abilities that pave the way for a rigorous social collaboration practice, improving universities' ability to matter more. Strengthening the

academic rigor of societal collaboration requires collective reflexivity and boundary-spanning conversations. This not only improves the competence of individuals but enables the collaborative work of HEIs to function in a more integrated way by connecting the perspectives and practices of faculty and support functions. Further, faculty and support staff need to be allowed to apply newly gained insights, and the development of societal collaboration abilities and skills of individuals need to be noticed and utilized in the organization. This suggests that managers and policy actors face the imperative of designing and implementing efficient incentive systems that encourage the application of knowledge to cultivate a sustained and integrated capacity for societal collaboration within higher education institutions. Establishing such incentive systems demands that managers and policymakers possess a comprehensive understanding of the academic intricacies surrounding social collaboration as a pivotal mechanism through which universities can establish their relevance and impact in society. In other words, they must recognize and value the mechanism that allows universities to matter in society, not just in the short term but also in the long run. Consequently, a robust and well-informed academic knowledge base becomes indispensable for these decision-makers as they navigate the complexities and develop strategic approaches to foster enduring and meaningful collaborations between academia and stakeholders in society at large.

Appendix 1: Interview Guide

Background of informant

- What is your position and what are you working on currently?
- What is your educational background?
- How long have you been active in academia?
- What experience do you have when it comes to collaboration?

The course—motives and expectations

- What were your prerequisites for taking the course (time/resources)?
- How did you find out about the course?
- What was the reason you took the course?
- What were your expectations of the course?

Outcomes

- What did you get out of the course? (Contacts? Knowledge? Tools? Insights?)
- Do you have an example where you have applied what you have learned from the course in your work? E.g., developing your own course, strategy work, applications, skills development. If yes, what was particularly useful; what have you adapted?
- How well did the course match your needs?
- How well did the course match your expectations?

Experience of the course conduct and format

- How did you prepare for the course sessions?
- If you look at the different elements of the course, is there anything that particularly caught your interest?
- Is there anything in the course that was unexpected, that surprised you?
- How did you experience the course as a whole? What was good?

Experience of the course—Literature

- What did you think of the course literature?
- Were you familiar with any of the concepts/models from the literature before?
- Have you benefited from the course literature in your own work? How?

Experience of the course—other participants

- How do you feel that the contact with other participants worked during the course?
- Have you had contact with other participants, for example, outside the course, or after the course?

Is there anything you want to add (that we did not address)?

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Proximity and Inequality in Academia

Annika Ralfs

Introduction

Besides education and outreach, universities matter through the generation and dissemination of new knowledge. However, in the hierarchical global science system, not all universities and researchers can matter equally in the sense of being able to showcase their work and findings on a global scale. Depending on their positions in the persistent core–semi-periphery–periphery structure of science, the building of scientific capital and the dissemination of ideas will be easier for some universities and researchers than for others. In this context, collaboration between universities in core and peripheral positions of global academia is a strategy aiming to make more universities matter, yet it bears the risk of perpetuating existent inequalities. The aim of this chapter is to explore how and why universities collaborate to matter—not only with regard to their proximity in various dimensions, but in light of global inequality of scientific capital. Acknowledging that this is only one potential way of mattering which is not prioritized by every university or researcher, mattering will be understood here in the sense of the production and worldwide dissemination of knowledge.

To some extent, inequality appears to be inherent to academia. The production of scientific knowledge is a social enterprise whose organization relies on mechanisms such as peer review and markers of quality ascribed to journals, affiliations, and prices. In this system, resources and rewards are distributed based on the perception and recognition of the respective scientific communities. While these processes are in place to warrant higher degrees of quality and objectivity of scientific work, they simultaneously cement a stratified landscape and grant gatekeeping positions to the already eminent individuals and institutions. Consequently, systems of knowledge

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production mirror the mechanisms of inequality, asymmetry, and marginalization that exist in society as a whole. At the same time, science is understood as a public resource that should be social both in its practice and in the uses it serves. Therefore, a greater number of points of view represented in the scientific community promotes not only higher degrees of objectivity but also the societal relevance of scientific work (Dupree & Boykin, 2021; Hwang, 2008; Longino, 1990; Merton, 1968, 1973).

Unequal opportunities for researchers to build scientific capital prevail within countries, for example, based on gender, ethnicity, social class, or disability. Moreover, because of the mechanisms of concentration of scientific capital, geography is a crucial factor in determining an individual's or a university's potential to matter in global academia. While core–periphery structures can be observed on all scales, including regional and national, the focus of this chapter will be on inequality in global academia, specifically in collaborations between high-, middle-, and low-income countries. In this context, it has to be acknowledged that the inequality of scientific capital between countries today is to a large extent rooted in the colonial history of science and perpetuated by neo-colonial practices, including the systematic devaluation of non-Western forms of knowledge creation (Alatas, 2008; Connell, 2014; Mignolo, 2011; Radosevic & Yoruk, 2014). Largely in line with the overall economic and political power structures, the global scientific landscape shows a persistent core–semi-periphery–periphery structure. Just like in trade, exchanges between stronger and weaker countries in this structure can, on the one hand, lead to an accumulation of resources and surpluses in the core and on the other hand provide an opportunity to enlarge the group of participants and beneficiaries of the scientific enterprise (Schott, 1998; Wallerstein, 2004). The core areas, for the most part concentrated in high-income countries in Western Europe, North America, and East Asia, hold the lion's share of financial resources, host the most renowned universities and the majority of influential publishers, and attract the most human capital in the form of students and scholars. On the other hand, due to scarcer resources and opportunities in middle- and low-income countries, universities and researchers in more peripheral regions are often reliant on ties to the core in building their scientific capital. These ties and the centrality of the core can be observed in asymmetrical mobility patterns as well as asymmetrical citation and collaboration networks (Boshoff, 2010; Chinchilla-Rodríguez et al., 2018; Confraria et al., 2017; Demeter, 2019; Jonkers & Cruz-Castro, 2013; Martinez & Sá, 2020; Mêgnigbêto, 2013; Morley et al., 2018; Pasterkamp et al., 2007; Schott, 1998; Siekierski et al., 2018; Sweileh, 2022; Verginer & Riccaboni, 2020). However, a strict core–periphery dichotomy is overly simplistic and lacks nuance. Instead, a multilayered approach accounts for semi-peripheries that may perform core functions for the periphery while still being peripheral to the core. Furthermore, the scientific landscape is evolving dynamically and becoming increasingly multipolar with newly emerging science powers, most prominently China (Czaika & Orazbayev, 2018; Hwang, 2008; Oldac, 2023; Radosevic & Yoruk, 2014).

In the context of inequality in global academia, ties between high-, middle-, and low-income countries are particularly worthwhile to examine. These may form through mobility and collaboration decisions of individual researchers; however,

they are also subject to science diplomacy, incentive structures, and policies that shape the environment in which academic mobility and collaborations take place. International research collaborations between high- and low-income countries have become the main strategy in aiming to build scientific capacity in low-income countries and a major target of funding schemes of institutions in high-income countries (Bauder, 2015; Bradley, 2017; Flink, 2022; Flink & Schreiterer, 2010; Mattsson et al., 2010; Moyi Okwaro & Geissler, 2015; Wagner & Leydesdorff, 2005; Wagner et al., 2001, 2015). Scarcity of funding, lack of infrastructure, fewer employment opportunities, and fewer opportunities to publish are major factors prompting researchers in peripheral regions to relocate or enter collaborations with researchers in the core (Arocena & Sutz, 2001; Grieve & Mitchell, 2020; Muriithi et al., 2018; Wight et al., 2014). Despite the ubiquity of inequality in global academia and many empirical studies illustrating examples of inequitable collaborations between high-, middle-, and low-income countries, there is little consideration of inequality in science on a theoretical level (Hwang, 2008). Instead, one of the most prominent concepts aiming to explain why and how researchers collaborate is that of proximity.

There is abundant evidence showing that proximity is simultaneously an important precondition for and an outcome of scientific collaboration. This includes geographical proximity as well as cognitive, social, organizational, and institutional proximity in addition to other dimensions that will not be at the focus of this chapter (Boschma, 2005; Katz, 1994). Frenken et al. (2009) defined the dimensions of proximity for academic research collaborations as follows. Cognitive proximity is understood as the extent to which knowledge bases between two researchers overlap. Social proximity involves trusting relationships maintained with colleagues. Organizational proximity refers to a common hierarchical control two actors might be under. Ultimately, institutional proximity refers to similarity in the incentive structures under which researchers operate. Importantly, the concept of proximity, which originated in the fields of geography and business studies, is largely based on experiences in Europe (Hansen, 2015; Hoekman et al., 2010), North America (Saxenian, 1996), and more recently China (Scherngell & Hu, 2011). Only a few studies (Cassi et al., 2015; Gui et al., 2018) have considered the role of proximity in scientific collaborations beyond high-income countries. Hence, there have been calls for future research to investigate proximity in research collaborations across more continents and over larger geographical distances (Bergé, 2017; Werker & Ooms, 2020). While it has been acknowledged that proximity is not static and is potentially asymmetrical, implying that one party can be more proximate to a counterpart than vice versa (Balland et al., 2015; Boschma et al., 2016; Fiorini et al., 2021; Korbi & Chouki, 2017), inequality of scientific capital between collaborating researchers is barely touched upon in the proximity literature. However, considering the inequality of opportunities to build scientific capital along with spatial and non-spatial dimensions of proximity provides a more comprehensive picture of how and why researchers collaborate between core and more peripheral regions. Accordingly, the research question to be advanced in this critical narrative review is: how can the concept of proximity be expanded with notions of inequality of scientific capital between high-, middle-, and low-income

countries in order to gain a more thorough understanding of international research collaborations?

This chapter will be structured as follows. In the next section, inequality in global academia will be defined and exemplified using the concept of scientific and technical human capital. In the method section, the choice of critical narrative review and procedure will be described. The results section presents the findings of the narrative review as structured by five dimensions of proximity. The discussion section comprises a critical discussion of the findings. The final section summarizes the chapter.

Defining Inequality in Academia

The global scientific landscape constitutes an uneven playing field for researchers, depending among other things on their location in high-, middle-, or low-income countries. Scientific and technical human capital and opportunities to acquire it are distributed unequally within countries, for instance, based on gender, ethnicity, social class, or disability. Simultaneously, opportunities to acquire such capital are very unequally distributed between countries, depending on historically inherited advantages and disadvantages shaped by colonialism. Respective advantages and disadvantages tend to accumulate over time in the academic careers of individuals (Alatas, 2008; Dupree & Boykin, 2021; Martinez & Sá, 2020; Morley et al., 2018; Radosevic & Yoruk, 2014). In the following, different aspects of inequality in academia will be illustrated on the basis of the concept of scientific and technical human capital. The framework of scientific and technical human capital puts a focus on developing capacity at the individual, team, organization, or field level. Scientific and technical human capital has been defined as the sum of scientific, technical, and social knowledge, skills, and resources embodied in an individual. It further comprises a researcher's professional network ties, including links to institutions that produce, consume, and disseminate knowledge (Bozeman & Boardman, 2014; Bozeman & Corley, 2004). In the following, three levels of inequality of scientific and technical human capital in global academia will be outlined. These will be structured according to Bozeman and Boardman's (2014) distinction of material resources, capital embodied in people, and social structures and norms.

Firstly, inequality at the level of material inputs, both tangible and intangible, will be illustrated. These include financial resources, which arguably translate to time availability, and access to data or infrastructure. One of the most obvious issues of inequality between core, semi-periphery, and periphery is the access to financial resources. The bulk of scientific funding continues to be concentrated in a few countries in North America, Western Europe, and East Asia. Funding from high-income countries also makes up a significant share of the budgets of universities in middle- and low-income countries. While this enables more researchers to be employed locally, it always bears the risk of creating asymmetrical partnerships with success and desirable outcomes defined by the interests of those in the core. Closely linked to

the availability of financial resources is also the question of time availability in light of teaching responsibilities and other forms of employment researchers take on that are not related to their own projects and research priorities (Bradley, 2008; Collyer, 2018; Dean et al., 2015; Petersen, 2021). Besides financial resources, including funding and employment, there are other material forms of scientific and technical human capital that are distributed unequally. These include the access to costly databases such as Web of Science and Scopus, as well as to libraries, software, and communication technology. At the same time, the work of scholarship from more peripheral regions tends to be less accessible and not prioritized in university libraries and academic databases. Furthermore, laboratories and high-technology infrastructure have long been concentrated in high-income countries exclusively (Demeter, 2019; Moosavi, 2020; Muriithi et al., 2018; Rüland et al., 2023; Schmidt, 2020; Tetteh et al., 2020; Ynalvez & Shrum, 2008).

Secondly, inequality of human capital embodied in researchers and research support is distributed unequally. Most commonly, human capital is operationalized through formal training. In the academic system, education is symbolized by certificates, degrees, diplomas, and fellowships. The status of these markers largely depends on the location from which they are issued, underlining the significance of student mobility (Demeter, 2019; Morley et al., 2018; Tetteh et al., 2020; Wu & Zha, 2018). Moreover, researchers' human capital is frequently equated with their record of scholarly publishing. Worldwide, scientific evaluation is to a large extent measured by the number of articles published in recognized journals according to the international standards of each field. At the same time, 70% of the top publishers have their headquarters in North America and Europe, granting these private companies great influence on knowledge production worldwide and a potential gatekeeping function. As a consequence, these publishers have a major influence on defining the norms and standards of what is considered good science. This includes methodology, stylistic models, and the structuring of arguments as well as English as the main language of scientific publishing. Moreover, there is a general underrepresentation of peripheral, non-native English-speaking scientists in the editorial advisory boards of international journals, which has been shown to be coupled with the composition of authorship in terms of nationality of these journals. While there are also countries in core regions where English is not the native language, these are usually better equipped with training in scientific writing or have larger budgets available for specialized editorial staff (Arocena & Sutz, 2001; Collyer, 2018; Hanafi, 2011; Salager-Meyer, 2008).

Thirdly, social structures and norms define scientific and technical human capital, especially with regard to recognition, credibility, and research priorities. Although alternative metrics are being introduced incrementally, the most common form of recognition in the academic system continues to be citations. Scholars from both core and peripheral regions all tend to cite research produced in the core more frequently. This can be explained by the wide-ranging mechanisms of accumulation and concentration of recognition in science, also called the Matthew effect, which describes the systematic allocation of rewards and resources to the already eminent researchers. It has been shown that this effect also applies at the level of countries so that authors

from a few core countries are disproportionately cited compared to authors from other regions, even when published in the same journal. It is also worth noting that research conducted in middle- and low-income countries tends to be underrepresented in the most commonly used scientific databases and libraries (Bonitz et al., 1997; Collyer, 2018; Desrochers et al., 2018; Merton, 1968; Schmidt, 2020). These asymmetrical citation patterns are also rooted in notions of credibility, which are ascribed to individuals and institutions. As credibility assessment is typically based on the standards of good science as defined by dominant scholars and publishers in the core, other groups suffer a systematic credibility deficit in academia. As a consequence, credibility is often acquired through scientific mobility or collaboration. Collaborations with researchers in the core have been shown to serve as a kind of admission ticket for international visibility. Researchers in more peripheral regions of the science system frequently face a credibility deficit, making it difficult to even speak on issues of peripheral regions without an elite Western education (Bhakuni & Abimbola, 2021; Demeter, 2019; Martinez & Sá, 2020; Mohanty, 2003; Morley et al., 2018). Besides credibility deficits, actors in peripheral positions of the science system may also suffer from interpretative marginalization, meaning that they are not prioritized as recipients of processes of knowledge creation and they are excluded from the circulation of the knowledge produced. Clearly, social structures and norms also shape research priorities and agendas. To participate in international science, academic elites in more peripheral regions frequently adopt the research priorities defined in the core. For researchers in middle- or low-income countries, this can potentially cause conflict as they have to weigh locally relevant research problems against prospects of international publishing. Moreover, there appears to be a general understanding that theory generated in the core of the science system is universally relevant and placeless, while research from more peripheral regions is understood as case studies or merely context-specific. Research and theories developed in high-income countries are considered credible and receive more citations, whereas the role of low-income countries is often reduced to providers of raw data, case studies, and examples for application of the dominant theories (Ergin & Alkan, 2019; Hanafi, 2011; Mbaye et al., 2019; Nagendra et al., 2018; Pasterkamp et al., 2007). Furthermore, there is criticism regarding practices and terminology of fieldwork, extractive approaches to data collection, disregard of Southern Theory, and power imbalances in research partnerships (Boshoff, 2009; Connell, 2014; Gunasekara, 2020; Mawere & van Stam, 2019; Munung et al., 2017; Nhemachena et al., 2016).

In conclusion, scientific and technical human capital—in material forms, embodied in people, and in social structures and norms—is very unequally distributed across the world. Throughout scientific careers, these comparative advantages and disadvantages add up and usually solidify the status quo. Consequently, inequality prompts researchers in different regions of the global science system to pursue distinct strategies in aiming to build their scientific capital. Being internationally mobile and forming research collaborations can be a means to strategically build and deploy scientific and technical human capital (Bozeman & Corley, 2004; Jonkers & Cruz-Castro, 2013). In the context of geographical disparity in global academia, proximity is a highly relevant notion. However, the theoretical concept of proximity

barely touches on inequality in the context of scientific collaboration. Hence, in the following, these two streams of literature and their interconnection will be explored and synthesized.

Method

To approach the research question of how the concept of proximity can be expanded to account for inequality of scientific capital, a critical narrative review has been conducted. As opposed to a systematic literature review, this approach allows for more flexibility in the inclusion criteria of articles and the subjective focus on specific aspects—in this case the relation of proximity and inequality in research collaborations—while summarizing a stream of literature and conducting an interpretative analysis (Thomas et al., 2020). As the purpose of the narrative literature review is to highlight specific aspects of the literature, one cannot assert claims on completeness as one could with a systematic literature review. The literature search procedure will be outlined in the following.

Literature searches were conducted in the databases of Web of Science, Scopus, and Google Scholar between March 2021 and June 2023. As a first step, this was done separately for the literature on proximity in the context of research collaboration, on the one hand, and between-country inequality in academia, on the other hand, to become familiar with both concepts. Next, the articles were read and screened with a special focus on the notion of proximity in the inequality literature and vice versa. From there, further articles were included using snowball sampling as well as recommendations resulting from conversations with colleagues, research talks, or discussions. The first searches and consecutive screening of the literature revealed no apparent overlap between the two streams of literature.

Next, in order not to overlook research papers covering proximity and inequality in academia, the keywords were searched jointly, employing all combinations of terms displayed in Table 1. The search terms included "proximity" in relation to "inequality," "inequity," or "asymmetry." Because all of these terms are highly ambiguous and utilized in a plethora of fields and disciplines, the terms "research collaboration," "academia," and "scientific collaboration" were combined with the search terms. Nonetheless, the search yielded many articles not related to proximity in the context of scientific collaboration, and only the ones that did were included in the further analysis. Additionally, to specify the geographical scope of the search, terms such as "Global South," "emerging countries," "developing countries," and "periphery" as well as continents and selected individual country names were combined with the search terms. In the last step, searches for the terms "asymmetry" and "inequality" were conducted among some of the most widely cited papers on proximity, namely, Boschma (2005) and Knoben and Oerlemans (2006).

Table 1 Combinations of search terms

Search term 1	Search term 2	Demarcation	Geographical markers
"Proximity"	"Inequality"	"Scientific collaboration"	"Global South"
	"Inequity"	"Research collaboration"	"High-, middle-, low-income country"
	"Asymmetry"	"Academia"	"Developing countries"
			"Emerging countries"
			"Periphery"
			"Asia"/ "Latin America"/ "Africa"
			"India"/ "Nigeria"/ "South Africa"/…

Proximity and Inequality in Academia

In the following section, the literature on proximity in scientific collaborations will be summarized, placing a special focus on the coverage of the topic of inequality of scientific capital between high-, middle-, and low-income countries. As summarized in Table 2, the literature search did not show a big overlap of the streams of literature on proximity and inequality or asymmetry in academia, neither in terms of simultaneous use nor in terms of citations. Moreover, the geographical scope of the proximity literature appears to be limited to high- or upper-middle-income countries in Western Europe, North America, and East Asia. The proximity literature appears to be a comparatively structured stream with, of course, a focus on theory, as implied by the concept of proximity. Literature on inequality in academia, on the other hand, appears largely unstructured with plenty of empirical examples but typically no theoretical framing. Accordingly, the critical narrative review will aim to synthesize and show potential interlinkages of these bodies of literature in order to expand the notion of proximity as an explanation for research collaboration.

The most commonly used dimensions of proximity that characterize partnerships in scientific collaborations are geographical, cognitive, social, organizational, and institutional. These dimensions of proximity are interrelated in complex ways and

Table 2 Comparison of the literature streams on proximity and inequality in academia

Proximity in research collaboration	Between-country inequality in academia
Proximity as a theoretical framework	Typically case studies without a theoretical framework
Fairly structured stream of literature	Comparatively unstructured and unconnected stream of literature
Strong geographical focus on Western Europe, North America, and to some extent East Asia	Examples from diverse geographical regions, including Asia, Latin America, Eastern Europe, and Africa

are dynamic in nature. Proximity is typically conceptualized as a spectrum whose optimum is expected between the extremes. On the one hand, a high degree of proximity between two parties facilitates communication and reduces costs of interaction but can lead to lock-in with a low inflow of new ideas. On the other hand, a low degree of proximity offers more potential for learning while requiring more effort in communication and logistics. It has been recognized that proximity is not necessarily symmetrical in nature, implying that one partner can be more proximate to another in a certain dimension than vice versa (Balland et al., 2015; Boschma, 2005; Frenken et al., 2009; Hansen, 2015). In the following, the geographical, cognitive, social, organizational, and institutional dimensions of proximity will be discussed and related to inequality in global science.

Geographical Proximity

It is well established that the greater the geographical distance is between two researchers, the less likely they are to collaborate. Geographical proximity is assumed to increase the likelihood of serendipitous encounters and to facilitate face-to-face interactions, which ultimately contribute to the building of trust and the transfer of tacit knowledge. The importance of geographical proximity and the strong tendency to collaborate with researchers who are geographically close are two of the mechanisms that contribute to the highly concentrated structures in the global system of knowledge production (Frenken et al., 2009; Katz, 1994; Nilsson, 2019; Plotnikova & Rake, 2014; Ponds et al., 2007). Geographical proximity is to a large degree intertwined with non-spatial dimensions of proximity. Some of these are found to overlap with the effect of geography, whereas others can substitute for it and thus potentially compensate for the lack of geographical proximity. In previous studies, organizational and cognitive proximities were found to substitute for geographical proximity, while the effect of geographical proximity overlaps with institutional proximity (Hansen, 2015). The relation of geographical proximity and social proximity shows both overlap and substitution mechanisms.

Although more static than the non-spatial forms of proximity, even geographical proximity in global academia can be understood as dynamic (Balland et al., 2015). In fact, it is extremely common for scientists to relocate throughout their careers. Along with collaboration, academic mobility is a common strategy to acquire scientific capital, especially for researchers in more peripheral areas of the science system. To increase geographical proximity and opportunities for collaboration, researchers frequently relocate to different countries or cities. Globally, patterns of scientific mobility are asymmetrical, with the hubs in high-income countries being the most attractive to researchers worldwide. In turn, this potentially reinforces existing inequalities as the most scientifically advanced nations profit disproportionately from the achievements of foreign-born and foreign-educated academics (Bozeman & Corley, 2004; Jonkers & Cruz-Castro, 2013; Stephan & Levin, 2001; Verginer & Riccaboni, 2020). Arocena and Sutz (2001) describe migration as a

survival strategy for researchers in low- or middle-income countries, enabling them to access salaries and conditions for better academic productivity in the competitive science system. Resource constraints and limited employment opportunities in academia in the respective home countries are major reasons to be internationally mobile (Morley et al., 2018; Ynalvez & Shrum, 2008). According to Siekierski et al. (2018), the most important factor in making a location attractive to international academic mobility is the scientific and technological infrastructure it offers. Recognition as a center of excellence, presence of prestigious scientific journals, and opportunities to learn were rated as more important sources of motivation than a higher standard of living in the host country. Similarly, Franzoni et al. (2012) found that improving future career prospects, outstanding faculties and research teams, excellence of the foreign institution, and opportunities to extend one's personal network were the most important motivations for academic mobility regardless of the country of destination. On the other hand, personal or family reasons have been named as a major motivation to re-migrate, and for many, returning home is conditional on employment opportunities. Hence, the attractiveness of a location is largely defined by the opportunities it offers for researchers to build scientific and technical human capital (Jonkers & Cruz-Castro, 2013).

Generally, the reasons for academics to be mobile are manifold and highly individual; however, there is a structural dimension to many of them as there are unequal patterns as to who can be internationally mobile and which countries benefit from scientists' mobility. Opportunities to be internationally mobile—short-term or long-term—and thus to build scientific capital are distributed unequally within and between countries. Junior researchers tend to be more internationally mobile than senior researchers, and male academics tend to be more mobile than females. A financially stable background and few care responsibilities appear as enabling factors of international mobility, constituting an opportunity mostly for middle-to-upper class individuals, especially in middle- or low-income countries, and reinforcing gender inequality in academia (Bauder, 2015; Demeter, 2019; Morley et al., 2018; Tomassini, 2021). Opportunities for scientific mobility are distributed unequally between countries not only because of a lack of financial means but also because of visa and travel restrictions, which tend to affect researchers in middle- and low-income countries more than researchers with citizenship in many high-income countries (Chinchilla-Rodríguez et al., 2018; Orazbayev, 2017). In that sense, one could argue that even geographical proximity is asymmetrical.

The duration of labor mobility in academia is highly variable, ranging from permanent relocation, to short-term stays, to a transnational orientation with affiliations in multiple countries (Bauder, 2015). In aiming to reduce geographical proximity to build scientific capital, not only long-term relocation but also short-term stays should be considered. As the cost of travel decreases and remote communication is facilitated, the importance of permanent geographical proximity for the co-creation of knowledge is being reassessed. While some have speculated that the relevance of geographical proximity could diminish to a large extent, Torre (2008) emphasizes that face-to-face interaction is still necessary for the exchange of ideas. He presents the concept of temporary geographical proximity in potentially replacing the need for

permanent colocation. Specifically, certain phases in the collaboration might require more proximity than others, for instance, the exchange of tacit knowledge in early stages (Knoben & Oerlemans, 2006). In later stages of collaboration, communication across larger geographical distances is facilitated by other non-spatial forms of proximity between actors. Werker and Ooms (2020) find that the combination of temporary geographical proximity and modern communication tools allows for collaborations at larger geographical distances than were previously possible.

Generally, short-term colocation can offer a chance for serendipitous encounters between scholars from core and more peripheral regions, which large geographical distances often prevent. At the same time, opportunities to partake in short-term mobility are very unequally distributed among researchers from high-, middle-, and low-income countries, reinforcing inequality with regard to building scientific capital. For example, there are many potential barriers to attendance at conferences. Typically, potential attendees' abstracts must be accepted by the organizing committee in a peer review process, and the conference fees are often high (Chai & Freeman, 2019). Additionally, participants need to finance the travel costs, which are typically higher the farther away they live from the conference location. Moreover, their work schedules and personal circumstances need to allow them to be away for the given amount of time. However, researchers who have the chance to participate in such events potentially benefit from the access to new networks, enabling a greater integration of the global scientific community. Chai and Freeman (2019) have shown that attending the same conference can increase the likelihood of collaboration between two researchers who have not co-published before. Moreover, the distant ties that can form through temporary colocation are particularly important as they tend to be more diverse than local ties and thus counteract cognitive lock-in. According to Nilsson (2019), social ties between geographically distant researchers can be maintained through temporary geographical proximity or virtual proximity in technology-mediated interaction.

International mobility for the purpose of reducing geographical proximity can offer benefits to the individuals, organizations, and countries participating in it; however, it comes with a risk of reproducing social and national hierarchies and an unequal distribution of benefits across continents (Morley et al., 2018; Stephan & Levin, 2001; Wagner et al., 2001). Highly educated labor mobility generates unequal outcomes for different countries and contributes to the concentration of scientific capital in the core. Verginer and Riccaboni (2020) have found that certain countries, including emerging economies such as India, are negatively affected by international exchange. In turn, the United States has been shown to disproportionally benefit from the scientific achievements of foreign-born and foreign-educated researchers. China has benefited from international mobility of scientists by encouraging their mobility and successfully attracting them back. On an individual level, researchers who maintain professional ties to their country of origin while located in a scientifically more advanced country can contribute to the building of scientific capital by channeling resources or training young scientists in their home country. In conclusion, the outcomes of relocation from peripheral regions to the core are complex. There is evidence supporting brain drain and brain gain effects, on the one hand,

and evidence supporting the brain circulation hypothesis (Saxenian, 2005), which emphasizes simultaneous benefits for sending and receiving countries, on the other hand.

For researchers located in middle- or low-income countries, the lack of geographical proximity to the core and comparatively fewer opportunities to be mobile can constitute a disadvantage in building scientific capital. Consequently and along with other factors, geography can be a source of inequality for researchers that upholds barriers. These include access to the world's most eminent institutions and influential collaborators as defined by the social norms of the science system, as well as access to the material resources and infrastructure, which are most advanced in the core areas. This underlines the interconnectedness of proximity and inequality in aiming to understand scientific collaboration. Long-term relocation to core areas is a common strategy for reducing physical distance. As geographical distance between countries and continents can never diminish entirely, being geographically proximate on temporary occasions is an alternative strategy for researchers to create proximity.

Cognitive Proximity

In the context of building scientific capital and learning, cognitive proximity between researchers is a crucial dimension. Cognitive proximity has been defined as the extent to which two or more actors share the same knowledge base. It has been operationalized based on an academic's research field and subfields, educational background including university degrees, work experience, or nationality (Boschma, 2005; Hautala, 2011). Coining the term "absorptive capacity," Cohen and Levinthal (1990) have argued that prior related knowledge is a necessary precondition enabling the intake of new ideas at both the individual and organizational levels. To work toward a common goal, for example, in scientific collaboration, it is important that actors share a minimum of understandings to enable meaningful interaction. This includes interpretations, language, and codes, which researchers either share from the start or develop as they collaborate. Hence, cognitive proximity is closely intertwined with the social, institutional, and organizational dimensions of proximity (Frenken et al., 2009; Gonzalez-Brambila, 2014; Knoben & Oerlemans, 2006; Nooteboom et al., 2007).

There are arguments in favor of seeking partners with a certain cognitive distance. Especially the opportunity of creating knowledge through the combination of dissimilar knowledge bases provides much potential to build scientific capital. While a certain degree of cognitive proximity is necessary to ensure effective communication and coordination, too much cognitive proximity does not provide enough knowledge diversity, which, however, is needed to be innovative. Previous studies have shown an optimum degree of proximity observed at medium cognitive distance. Collaborating with partners who are more cognitively distant could potentially lead to bigger leaps in knowledge production (Boschma, 2005; Cohen & Levinthal, 1990; Frenken et al., 2009; Nooteboom et al., 2007). Cognitive proximity may be the most

dynamic dimension of proximity, as Balland et al. (2015) have exemplified with the process of learning. When novel knowledge is created, the knowledge base of individuals or groups transforms and mental models are rearranged or widened. As two or more actors start to interact and share ideas, their knowledge bases naturally become more similar even though this process is not necessarily reciprocal or symmetrical. Learning, as a part of acquiring scientific capital, is a common goal of global research collaboration. Thus, in striving for optimal cognitive distance in research groups, variety of backgrounds should be considered in collaboration decisions. This does not relate only to scientific disciplines but also to aspects of cultural diversity. Studies have found a positive impact on creativity and research productivity when introducing foreign scientists in research teams. Moreover, international research collaborations tend to receive higher citation rates. Furthermore, the inclusion of more points of view can ensure higher degrees of objectivity in science (Bauder, 2015; Georghiou, 1998; Hautala, 2011; Longino, 1990; Zhou et al., 2020). This provides strong arguments in favor of exchanges and collaborations between high-, middle-, and low-income countries.

Cognitive proximity can be created and maintained through mobility and collaboration. Relocation to more central regions in the science system and collaborations with researchers in core locations are strategies to acquire scientific capital for researchers in more peripheral regions. However, patterns of scientific mobility tend to be asymmetrical, and research partnerships between high- and low-income countries also bear many risks of asymmetry. Consequently, learning and the acquisition of scientific capital will often be unidirectional rather than mutual in these cases. This potentially reinforces power imbalances in collaborations between researchers in the core and periphery and manifests the dominance of norms of good science and research priorities defined in high-income countries (Bozeman & Corley, 2004; Collyer, 2018; Gunasekara, 2020; Jonkers & Cruz-Castro, 2013; Lehuedé, 2023; Martinez & Sá, 2020; Matenga et al., 2021; Nhemachena et al., 2016; Verginer & Riccaboni, 2020).

Cognitive proximity should also be discussed with regard to the critical discourse on decolonization of scientific practice. Because theory developed in the core tends to be the most widely used and cited, disciplinary fields and knowledge bases are often surprisingly uniform across different parts of the world. This is underlined by the finding that, in many cases, common disciplinary backgrounds are more important for effective collaboration than geographical proximity. However, it is increasingly criticized that these scientific domains are artificially homogeneous because of the systematic hegemony of Western-centric knowledge. Accordingly, cognitive proximity between researchers from different parts of the world who work in the same field can facilitate their collaboration because of a large overlap of knowledge bases. In the context of decolonization of academic discourses, however, allowing for more heterogeneity in the creation and diffusion of knowledge can be beneficial for many scientific disciplines. In this regard, it is important to highlight the self-interest and potential for building scientific capital for researchers from high-income countries in collaborations with researchers in middle- or low-income countries. While the mutuality of benefits is not always recognized, researchers from the core profit

from accessing new types of knowledge, under-researched cases, and alternative funding sources when collaborating with researchers in more peripheral countries (Connell, 2014; Ergin & Alkan, 2019; Frenken et al., 2009; Mawere & van Stam, 2019; Moosavi, 2020; Munung et al., 2017).

To sum up, the right amount of cognitive proximity is a crucial factor in collaborations between researchers from high-, middle-, and low-income countries. On the one hand, cognitive distance between researchers due to different experiences and backgrounds could hinder their propensity to collaborate in the first place. On the other hand, diversity in knowledge bases offers greater opportunities for creating new knowledge and ensuring scientific objectivity by incorporating more perspectives. Yet, collaborations between universities and researchers in core and more peripheral regions of the science system also bear many risks. Learning and the building of scientific capital should be mutual activities; however, when they are not acknowledged as such, it is likely that the dominance of norms and agendas of high-income countries will be continuously perpetuated.

Social Proximity

Social proximity is commonly defined as the trust and bonds between two or more actors and encompasses all of their relations as well as embeddedness in networks. Social proximity is understood to be built on past shared experiences, which are part of a gradual trust formation process. Closely related to social proximity is what Bergé (2017) defines as network proximity. Triads of researchers who share the same contacts are important for building and maintaining trust in social networks and preventing opportunistic behavior. At the same time, very dense networks with too much cognitive proximity can also slow down the creation of new knowledge, which emphasizes the benefits of openness in networks. The importance of network and social ties in the academic system is also reflected in that it is explicitly incorporated in the notion of scientific and technical human capital. However, in the global system of science, links with eminent institutions and individuals are unequally distributed across space, potentially constituting a disadvantage for researchers working in peripheral countries. In more resource-constrained settings especially, the building of networks through mobility and collaboration is a common strategy to acquire scientific capital (Boschma, 2005; Bozeman & Boardman, 2014; Gonzalez-Brambila, 2014; Hoekman et al., 2010; Knoben & Oerlemans, 2006; MacHáček et al., 2022; Ynalvez & Shrum, 2011).

The relationship between social and geographical proximity appears to be twofold, showing overlap as well as substitution. Firstly, being geographically proximate is beneficial or even necessary for building network ties and social proximity through increased likelihood of encounters and face-to-face interactions. Secondly, once social proximity and trust are established, it facilitates collaboration even at large distances. In a dynamic process, growing social proximity between two actors can

lead to a decoupling of this tie from its original context so that it persists regardless of a change of location or organization. Once trust is established between two actors, it proves to be relatively robust, not requiring permanent spatial proximity (Balland et al., 2015; Hansen, 2015; Jonkers & Cruz-Castro, 2013; Nilsson, 2019). Both long- and short-term academic mobilities ultimately contribute to the expansion of networks—or social ties—across larger geographical spaces. As such, mobility offers an opportunity for researchers to acquire scientific capital in the form of contacts, networks, and institutional ties, which tend to be stable over time. International mobility has been reported as an important factor in expanding and diversifying the professional networks of researchers (Bauder, 2015; Morley et al., 2018; Nilsson, 2019). For instance, Jonkers and Cruz-Castro (2013) showed that Argentinian researchers drew on professional ties they formed working abroad even after their return to their home country. The study of Brazil's highly cited researchers by Martinez and Sá's (2020) illustrates that mobility is most often the initiation of connectedness to global scientific networks. These examples illustrate that once social proximity is established, geographical proximity becomes less important.

As international co-authorship networks continue to grow, Wagner et al. (2015) state that a lot of the progress of more peripheral countries is the result of links to the core. The growth of research networks can largely be explained by factors endogenous to scientific work and by the self-organization of individual researchers who are driven by their own interests. However, the cementing of core–periphery structures through asymmetrical ties always bears the risk of expanding the dominance of interests of actors in the core at the expense of marginalizing interests of researchers in more peripheral locations (Collyer, 2018; Leydesdorff & Wagner, 2008; Mohanty, 2003; Wagner & Leydesdorff, 2005). Beyond the descriptive analysis of research networks, Verginer and Riccaboni (2020) call for future research to explore the causality behind their formation. In this context, it is crucial to consider an unequal distribution of scientific and technical human capital along with the distinct dimensions of proximity.

The importance of social proximity and network embeddedness for scientific mobility and collaboration constitutes a potential disadvantage for researchers in more peripheral regions of global academia. Because of geographical remoteness, it becomes more difficult to establish social proximity through joint experiences and mutual acquaintances. Because such experiences are important for the building of trust, one can expect networks to be relatively inert and to exclude new entrants. This potentially slows down the integration of more isolated areas in the global science system. However, once trust between actors is built and ties have formed, these prove to be relatively stable over time and capable of bridging large geographical distances. Accordingly, scientific collaboration as well as long- and short-term mobilities can contribute to the strengthening of social ties and be an essential part of building scientific capital.

Organizational Proximity

Opportunities to build scientific capital through mobility or collaboration can also depend on the organizational proximity between researchers in the core and peripheral regions of global academia. Different authors have quite different conceptualizations of organizational proximity. In an academic context, Frenken et al. (2009) define organizational proximity as "the extent to which two researchers are under common hierarchical control" (p. 228), which can imply working either for the same or different organizations. In a broader sense, structural definitions of organizational proximity relate to the distance between two actors in a network as networks themselves can be seen as a form of organizational arrangement (Boschma, 2005; Knoben & Oerlemans, 2006).

Essentially, the form of organization will define the autonomy and control of its members over the flow of knowledge. The hierarchical governance structure in organizational arrangements will also have an impact on intra- and interorganizational learning. Optimal organizational proximity combines necessary control to avoid opportunistic behavior with flexibility for new knowledge creation. However, Boschma (2005) points out the risk of asymmetrical exchange relations between partners with a power imbalance. Besides other factors that potentially cause power imbalances between researchers such as career stage or gender, resource inequality between researchers in high-, middle-, and low-income countries could also be an example of this. For instance, unbalanced authorship practices, role divisions, or data appropriation have been criticized in numerous case studies. More generally, organizational differences between universities in high-, middle-, or low-income countries can be found in the prioritization of teaching as opposed to research, academic calendars, or data sharing agreements (Boshoff, 2009; Gunasekara, 2020; Kontinen & Nguyahambi, 2020; Matthews et al., 2020; Munung et al., 2017; Nhemachena et al., 2016).

With regard to organizational proximity, there can be barriers to core–semi-periphery–periphery collaboration on both levels of examination. At the dyadic level, two universities in different locations can be organizationally distant as the result of distinct institutional environments and policies. At the structural level, they can be organizationally distant because of a lack of network ties between them. In both cases, being distant from organizations in the core can constitute a disadvantage for researchers in more peripheral regions. The likelihood of being internationally mobile or of collaborating is reduced when there are no pre-existing ties and no organizational proximity between universities, making it more difficult to jointly build scientific capital.

Institutional Proximity

Lastly, inequality in academia can be reinforced by the lack of institutional proximity between countries. Institutions are defined as the set of norms and incentives under which actors operate and include formal institutions such as laws and rules as well as informal institutions such as cultural norms and habits. The more these are alike for two partners in a collaboration, the more they can be considered institutionally proximate. Institutional proximity allows initial trust between partners who have never met because of their common understanding of the rules of the game (Balland et al., 2015; Boschma, 2005; Nilsson, 2019). Definitions of institutional proximity can vary between authors depending on the level of analysis. While some authors operationalize the institutional proximity of two partners by considering their respective countries of location, others focus on the organizational type. For instance, Ponds et al. (2007) defined institutionally proximate actors in research projects as those that belong to the same type of organization, for example, governmental, academic, or private. This definition of institutional proximity, however, might overlap with how others have conceptualized organizational proximity (Knoben & Oerlemans, 2006). Applying the concept at the level of countries or regions, institutional proximity appears to be closely related to geographical proximity as national borders frequently define the institutional environment for research projects (Bergé, 2017). Hoekman et al. (2010) categorize institutional differences based on three spatial levels: regional science systems, national borders, and linguistic areas. For scientific collaborations in Europe, they find that proximity at each of these levels increases the propensity to co-publish.

According to Frenken et al. (2009), the incentive structures under which researchers operate are important elements of the institutional environment and thus define the institutional proximity between researchers. In terms of their institutional environments at universities, there is considerable heterogeneity between countries, even at similar levels of income. The attractiveness of a national research system can be one of the factors that determines whether a country or a university tends to show so-called academic inbreeding as opposed to internationalization. Countries are frequently compared through the theoretical framework of systems of innovation, which makes it possible to analyze the cultural traditions and national research policies that determine the structure of science systems in different countries (Lundvall et al., 2002; MacHáček et al., 2022; Mattsson et al., 2010).

Boschma (2005) as well as Knoben and Oerlemans (2006) include cultural proximity, so the sharing of cultural values, beliefs, and language, in the notion of institutional proximity. Cultural proximity is used to refer to the similarity of patterns of thought, behavior, or interpretation between members of a group defined by a geographical region or an organizational unit. As pointed out by Fiorini et al. (2021), cultural proximity and trust relations can be asymmetrical when the cultural attractiveness of one country is not reciprocated by the other. According to Verginer and Riccaboni (2020), low cultural and linguistic barriers to international mobility have favored the formation of the major science hubs in the United States. Having or

building cultural proximity in the sense of being able to decode and utilize situational etiquette can be crucial to collaborate with academics in or from an unfamiliar institutional context (Morley et al., 2018). Accordingly, cultural proximity between two researchers can influence their propensity to collaborate, and cultural attractiveness might be an additional factor reinforcing the dominant position of countries in the core. The institutional proximity between two actors can change dynamically as their institutional environments change over time, on both the macro- and micro-levels. Balland et al. (2015) describe the process of institutionalization as such that occurs when two actors collaborate, build social proximity, and gradually align their values, practices, and goals. On a larger scale, institutionalization between countries occurs when they formalize the conditions of collaboration in order to facilitate collaborative projects. For instance, Hoekman et al. (2010) observed that the relevance of territorial borders has been gradually diminishing as the integration of the European science landscape proceeds. As similar processes can be expected to occur on a global scale, this once again raises questions regarding dominance of the core in defining social structures and norms in science (Collyer, 2018; Connell, 2014).

The institutional environment shapes not only scientific collaboration but also scientific mobility. For scientists, collaboration and mobility are characterized, on the one hand, by a high degree of self-organization and, on the other hand, by science diplomacy and policies through which governments and institutions aim to accelerate knowledge production across borders. The growth in international research collaboration has been largely attributed to bottom-up initiatives by individual researchers; however, there is also a growing number of formalized institutional arrangements promoting it (Bauder, 2015; Georghiou, 1998; Jonkers & Cruz-Castro, 2013; Mattsson et al., 2010; Wagner & Leydesdorff, 2005). Both the sending of researchers to the core and their return to their home countries might be subject to policies and incentives. Thus, institutions and incentive structures in both sending and receiving countries provide the framework in which academics' mobility takes place. For instance, private and philanthropic foundations, national governments, and supranational institutions such as the European Union aim to stimulate academic mobility. In this context, one can observe competition between countries at different income levels in trying to attract, retain, or re-attract talents. With regard to collaboration, Mattsson et al. (2010) found that projects funded by top-down initiatives in Europe show only limited involvement of non-Europeans in such research collaborations. Accordingly, it is important to note that, depending on how they are designed, policies can potentially encourage or discourage participation by researchers from more peripheral regions. Moreover, asymmetries and inequality in institutions can be observed in questions of immigration and visa regulations as researchers with, for instance, European passports will be permitted to travel comparatively easily, while others might even be banned from entering certain countries. This has recently affected collaboration and mobility of researchers between the United States and Iran, Iraq, Libya, Somalia, Sudan, Syria, and Yemen. Aside from drastic bans, regular administrative barriers can also limit the mobility of scientists and have been shown to impact mobility and knowledge flows asymmetrically (Chinchilla-Rodríguez et al.,

2018; Morley et al., 2018; Orazbayev, 2017). Furthermore, differences in the institutional contexts of countries can constitute a barrier to cross-border mobility as employment structures and typical academic career trajectories vary considerably, even between high-income countries (Bauder, 2015).

For collaborations between high-, middle-, and low-income countries, differences in the institutional environments can be a complicating factor. At the same time, there can also be institutions in the form of policy incentives that promote collaboration and mobility across borders and continents. Because opportunities to build scientific capital are unequally distributed between countries, collaboration and mobility are important strategies for researchers and universities aiming to matter in the sense of disseminating novel knowledge. The propensity of researchers from the core and more peripheral regions to collaborate will depend on their proximity in multiple dimensions. Generally, each dimension can embody enabling or impeding potential. It is theoretically possible to circumvent distance in one dimension with proximity in another. Asymmetrical proximities can be expected to exist on all levels in scientific collaborations, especially between high-, middle-, and low-income countries.

Discussion

Like any theoretical model, the concept of proximity is an abstraction and a simplification of the complex reality of scientific collaboration. It can provide the language and ideas to describe the favorable preconditions for or barriers to collaboration among researchers. This can be helpful in describing challenges faced by researchers who aim to collaborate between high-, middle-, and low-income countries, for instance, a lack of geographical, social, or organizational proximity. Furthermore, it can illustrate the opportunities of international collaboration, for instance, the potential for the generation of new knowledge that incorporates more diverse perspectives and new opportunities for remote collaboration thanks to short-term colocation and information technology. At the same time, increasing the proximity of actors in the global science system always also bears the risk of perpetuating the dominance of already eminent actors. In Table 3, aspects of how the concept of proximity can be expanded to include aspects of inequality between countries with different income levels are shown. Frequently, these come with both risks and opportunities, highlighting the importance of awareness of inequality in designing policies and incentive structures for research collaboration.

When trying to understand why researchers collaborate between high-, middle-, and low-income countries, it becomes obvious that proximity in various dimensions is not sufficient as an explanation. Instead, mobility and collaboration decisions are made by individual researchers in a science system that exhibits an incentive structure characterized by a persistent core–semi-periphery–periphery stratification. Inequality of scientific and technical human capital within and between countries can be seen on different levels—on a material level in the form of tangible and intangible resources, in human capital embodied in people, and in social structures

Table 3 Expansion of five dimensions of proximity for research collaboration, considering between-country inequality

	Risks	Opportunities
Geographical proximity	Unequal opportunities for researchers to be internationally mobile	New information technology can help to bridge distances
Cognitive proximity	Unidirectional knowledge dissemination, continuous perpetuation of research priorities defined in high-income countries	Opportunities for mutual learning and more diverse perspectives in collaborations
Social proximity	Social networks require initial interaction to form and can exclude new entrants	Social ties appear to be robust over time and stable in bridging geographical distances
Organizational proximity	Organizational differences and power imbalances between universities impede collaboration	Once established, organizational arrangements between universities facilitate mobility and collaboration
Institutional proximity	International policy incentives for mobility and collaboration frequently exclude peripheral regions	Collaboration and mobility are facilitated as universities and researchers align practices and goals

and norms. At the European level, heterogeneity between countries in terms of size, scientific quality, and accessibility has been considered by Hoekman et al. (2010). They found that researchers in peripheral regions tend to collaborate over larger distances more than researchers in the core, as the former may lack suitable partners in close proximity or may lack access to participation in funded projects. It can be expected that these dynamics between the core and peripheral regions are even more pronounced on the global scale, which exhibits even more disparity; however, there has so far been little research on this beyond Europe and North America (Bergé, 2017). The concentration of opportunities to build scientific capital in core areas creates uneven attractiveness and will influence mobility and collaboration decisions along with the dimensions of proximity (Bresnahan & Gambardella, 2004; Sorenson, 2005). These factors highlight another complexity around scientific collaboration, which is typically not at the focus of the proximity literature. Proximity in all of its dimensions will rarely be the only factor in making collaboration and mobility decisions. In a global science system that is highly unequal in terms of opportunities to build scientific capital, proximity can explain how rather than why researchers collaborate. Since power imbalances and the uneven distribution of scientific capital can be found in global collaborations and mobility patterns, these should be taken into account in future analyses of proximity.

Conclusion

As scientific capital and opportunities to acquire it are distributed unequally in the world, not all universities and researchers have equal chances to matter in the sense of being able to disseminate their ideas and findings on a global scale. In this context, scientific collaborations and mobility between high-, middle-, and low-income countries are strategies that individuals employ in striving to make their research matter more in global academia. The theoretical concept of proximity is helpful in describing benefits, challenges, and barriers associated with scientific collaboration even across larger geographical distances than the concept's original contexts in high-income countries. However, as has been shown with this critical narrative review, the concept of proximity can be expanded in a meaningful way by incorporating a stronger emphasis on inequality and asymmetry when examining how and why researchers collaborate internationally. While proximity and the lack thereof can be understood as facilitators or barriers to collaboration, the unequal distribution of academic capital will frequently be a crucial factor in the motivation to collaborate. Moreover, a theoretical framework will be useful to provide structure to the largely scattered literature on aspects of between-country inequality in global science. For instance, future research can shed light on the conditions under which research collaborations form between researchers in different countries, how they are shaped by policies and incentives, and the circumstances under which they may be mutually beneficial.

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Conceptualizing Scholar-Activism Through Scholar-Activist Accounts

Farzana Bashiri

Introduction

Scholar-activism has emerged as one of the ways to make scholarship matter. According to Buras (2021, p. 42), who examines their own role as a researcher in alliance with oppressed communities: "If research involves people and places, then it should matter to the people in the places where scholars conduct re-search." Buras emphasizes the importance of linking scholarship and activism as a pivotal approach to ensure that research has a meaningful impact.

However, the ideal relationship between scholarship and activism remains debated within both the social domain and the academic community. Praised by some and rejected by others, scholar-activism rouses emotions but is seldom carefully discussed. Despite extensive literature on the subject, there is a lack of a definitive or widely accepted definition or conceptualization of this phenomenon. Scholar-activism is often subjectively, loosely, and vaguely delineated, leaving the audience without a clear analytical framework to comprehend it. Recognizing this gap, the present chapter[1] aims to remedy the situation by exploring how self-identified scholar-activists have conceptualized their scholar-activism through their own writings.

[1] This chapter is part of a larger thesis project that examines scholar-activism as a phenomenon, which at this point, I broadly define as the pursuit of alignment between one's social and political ideals and academic responsibilities. Within my thesis, I explore the question of how scholar-activists navigate the intersection of activism and scholarship.

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In his monumental work on Persian mythology, *The Book of Kings*, Ferdowsi[2] mentions four distinct social classes during the reign of Jamshid Shah Pishdadi. These classes included the warriors, the farmers, the contented but ignorant group, and a unique group referred to as the "Katouzians"—the thinkers. Jamshid, the Shah, had arranged for this last group to live in the mountains, far away from people, and there they would think of good ways of life for people and provide solutions (IBNA, 2011). The mountains in this context bear a striking resemblance to the "ivory tower" often associated with academia. The dichotomy between deep contemplation and intellectual pursuits, on one hand, and the practical and experiential aspects of life, on the other, is not a recent notion. It has persisted for thousands of years. The pursuit of "impact" (Rhodes et al., 2018) and the call for thinkers to contribute practical solutions to enhance people's lives are not novel either. In our example, Jamshid also sought the guidance of intellectuals for societal improvement. However, these dichotomies beg the question: How wide is this divide capable of stretching? Is there a beneficial interplay between the ivory tower and society, or can they be integrated harmoniously?

Action-oriented research approaches have long advocated for an opposing viewpoint, asserting that the intertwining of scholarship and society is not only beneficial but also essential in addressing pressing and enduring societal and ecological challenges. Advocates argue that research agendas can be enhanced when societal actors actively participate in the research process. Such involvement can enhance the legitimacy of scientific knowledge, foster ownership of solutions among societal actors, and ultimately result in a greater impact of scientific endeavors (Apgar & Allen, 2021; Greenwood et al., 1993; Pohl & Hadorn, 2007), and thus make research matter more.

Within the field of Science and Technology Studies (STS), there has been extensive research and ongoing debate regarding the relationship between universities or science and society, as well as the emergence of a more "activist" trend in studying science (Waks, 1993). Scholars such as Woodhouse and colleagues (2002), with some caution, ask how such activist-oriented scholarship can effectively balance the goals of practical utility and scholarly rigor. Acknowledging the importance of including activist-oriented STS perspectives, they provide a rather limited definition of activist-oriented research, ranging from subtly normative problem-posing scholarship to the utilization of participatory action research (PAR) methods. In their work on the continuum of activist scholarship in STS, Woodhouse and colleagues develop a heuristic categorization of STS orientations toward three distinct constituencies: scholars, policymakers, and activists. They refer to the latter as "activist-oriented STS," which involves research that is primarily committed to promoting social change at the grassroots level (as illustrated in Table 1).

[2] In Persian literature, Ferdowsi is a prominent poet who lived in the tenth century C.E. He dedicated 30 years of his life to meticulously collecting and compiling Persian mythology in a book of poems called *The Book of the Kings.*

Table 1 Features of STS oriented to three types of constituencies (from Woodhouse et al., 2002)

	Scholar-oriented STS	Policy-maker-oriented STS	Activist-oriented STS
Researcher's primary commitment	Scholarship	Government and expert-adviser system	Social change, often at the grassroots
Key criterion for the choice of topic and method	Intellectual importance	Government officials' priorities	Social and environmental problems
Primary audience	Scholars	Policy-makers	Activists, publics
Typical style	Academic	Bureaucratic	Accessible
Typical communication channels	Scholarly journals, books, and conferences	Reports, policy briefings	Cross-over books, electronic media

Considering the vast diversity and the increasing trend within the scientific realm toward embracing activist scholarship (as observed in examples such as critical geography in the 1970s, popular education in the 1960s, and liberation theology in the 1950s), there remains a lack of a comprehensive definition for activist-oriented research, or what I choose to call from now on, scholar-activism. Barnett (2021) highlights the conceptual challenges in approaching the intersection of activism and scholarship, given the multitude of meanings and varied applications of the term both within academia and throughout history (Barnett, 2021). For instance, while STS scholars have distinguished between policy scholarship and activist scholarship, the term "scholar-activism" has been employed by Pain (2003) to describe policy research as well as methodological approaches such as participatory and action-oriented research.

Our understanding of what constitutes scholar-activism and its intellectual origins remains, at best, fragmented and lacking in any systematic review of conceptual contributions. This leads us back to the fundamental question: What are the conceptual frameworks and the intellectual roots of scholar-activism for those who identify as scholar-activists? How do they conceptualize it?

Next, I will discuss the method used in the study. Following that, I will delve into data analysis, where I will present the findings in two sections focusing on the defining features and concepts of scholar-activism and its intellectual influences. Finally, I will conclude with a discussion on the implications and draw some general conclusions.

Methodological Reflections

Method of the Study

This study aims to analyze the existing literature written by scholar-activists to uncover the intellectual foundations and conceptual frameworks of scholar-activism. It seeks to explore how scholar-activists define and understand scholar-activism, as well as the theoretical inspirations that shape their perspectives. Drawing on standpoint theory, it is recognized that insiders possess unique knowledge that may differ from that of outsiders (Crasnow, 2013). For me, this literature review functions as an interview with scholar-activists who have made efforts to conceptualize scholar-activism. The aim is to understand their backgrounds, sources of inspiration, and the theoretical frameworks they employ in their work.

Since the individuals under examination are scholars actively involved in activism, accessing their perspectives and approaches to defining and understanding the concept is best achieved through an analysis of their published works on the topic. There were two possible approaches for this task: identifying scholar-activists and investigating whether they have published relevant works, or selecting articles that conceptualize scholar-activism, focusing specifically on those written by scholar-activists. Considering accessibility and feasibility, the latter option was chosen, which entails a systematic conceptual review of the topic (Arksey & O'Malley, 2005; Durocher et al., 2014). After conducting a systematic review of over 800 academic publications, using keywords such as "scholar-activism," "intellectual activism," "academic activism," and related combinations, a selection of 25 papers was made that were (1) authored by scholar-activists, (2) examined scholar-activism as a central theme, and (3) provided conceptual analyses or discussions on the phenomenon. This decision was made to ensure alignment with the research questions and to gain insider perspectives directly linked to the experiences of scholar-activists.

The data were retrieved from Scopus in the spring of 2022 and subsequently analyzed and coded using NVivo. Additionally, VantagePoint was employed to assist in identifying co-wording patterns and co-citations, helping uncover potential concepts and references that might have been missed during manual analysis with NVivo. In certain cases, to follow historical and contextual clues, supplementary materials cited in the main texts were investigated.

Data Collection

This review encompasses 25 articles, published between 1999 and 2020, exploring the field of scholar-activism. Various disciplines have been represented, with prominent contributions from fields such as geography, education studies, sociology, and management and organization studies. However, certain fields have had a greater presence in the dataset, with geography being notably more prevalent. The dataset

primarily includes contributions from the UK and the US, with only one contribution from South Africa, indicating a lack of representation from "Global South" countries. Nonetheless, some authors have drawn on their experiences from the "Southern context" (e.g., Routledge & Derickson, 2015) or worked closely with marginalized groups within the Northern context. Scholar-activism, in this literature, covers a wide range of topics, including poverty, gender, LGBTQ rights, environmental justice, migration, ethnic and racial struggles, labor movements, classroom activism, and resistance against neoliberal politics within academia. In Appendix 1, an overview of the selected articles, with a brief description and the respective characteristics is presented.

Defining Features and Concepts

In the following section, I will introduce the defining features and concepts of scholar-activism, divided into four different categories. Firstly, I will discuss similar terminologies and conceptual inventions that have been used alongside scholar-activism, each invoking different intellectual and conceptual connotations and meanings. Then, I will outline the three main categories that have emerged in the 25 texts written by scholar-activists attempting to define scholar-activism. These themes were complemented by a co-wording analysis of all the titles, abstracts, and keywords, which is demonstrated in the word cloud in Fig. 1. The broader themes include criticality, active engagement, and normative orientation.

Criticality encompasses various critical aspects of scholar-activism, manifested in general theoretical approaches such as critical education and critical management

Fig. 1 A word cloud illustrating the co-occurrence analysis of the titles-abstracts-keywords (minimum occurrence: in three papers). Created by the author, using Vantage Point for the analysis and www.wordclouds.com for the illustration

studies. It also encompasses critical thinking as an intellectual activity. Active engagement refers to the various ways in which the "action" aspect of scholar-activism is enacted, such as through research methods, pedagogy, and participation in social movements. This section is crucial in understanding what the "scholarly" aspect of the definition entails when it comes to taking action.

Normative orientation is a final feature of scholar-activism, as many scholar-activists approach their definition by emphasizing certain values and directionalities over others. For example, *social justice* has been argued for as a defining feature, suggesting that other causes may not necessarily be labeled as "activism." However, some scholar-activists argue for a broader definition that includes all kinds of normative orientations and ideological invocations as part of scholar-activism, as long as certain modes of active engagement are utilized.

Parallel Concepts

Scholars and activists have long been engaged in developing terminologies to describe different forms of intellectual and scholarly involvement with social movements and the pursuit of social justice. Within this study, scholar-activists have drawn upon various existing concepts and terminologies to frame their own work as scholar-activists. Table 2 presents the key alternative concepts employed by scholar-activists in this review, which include "organic intellectual," "intellectual activism," "public intellectual," "tempered radical," and "liberation theologian." It is crucial to recognize that these terminologies are rooted in diverse intellectual traditions and sociopolitical contexts. For instance, the term "organic intellectual" was coined by Gramsci, a Marxist thinker and activist, to define a specific kind of intellectual who organically belongs to a particular movement or community of struggle. Cox (2015), in order to clarify his usage of the term "activism," employed the concept of "organic intellectual" and provided further elaboration:

> I am using it [activism] here to distinguish forms of intellectual practice which have an organic connection to social movements and collective action from those which do not. (p. 35)

Here, the emphasis lies on the activist aspect of scholar-activism. Another notable example is the concept of "tempered radicalism," which has been utilized by two scholars within the field of organization and management studies to conceptualize scholar-activism. Grosser (2021) and Contu (2020) employ this term to describe individuals within systems and organizations who strive to bring about change. These individuals leverage tools and strategies that enable them to do so (Meyerson & Scully, 1995). The term "tempered radicalism" was initially coined by Meyerson and Scully (1995), both professors in various business schools across the United States. It draws inspiration from feminist approaches to scholarly work that aim to promote

Table 2 Alternative terms and parallel concepts used by scholar-activists in this literature review

Alternative terminology	Meaning	Origin	Instances in the literature
Organic intellectual	Represents a group or class they belong to Not necessarily a writer or scholar Leads the ideas and aspirations of their group	1930s; Coined by Gramsci	Cox (2015), de beer (2015), Santos (2012) Pimlott (2017), Hern (2016)
Intellectual activism	Speaking the truth Many ways of enacting ideas for social justice (poetry, research, etc.)	1990; Patricia Hill Collins	Contu (2018), Contu, (2020), Deschner et al. (2020), Grosser (2021)
Public intellectual	Involved in public debates Represents personal beliefs while objectively arguing	1993; Popularized by Edward Said	Hern (2016), Santos (2012), Hales et al. (2018), Apple (2016)
Tempered radical	Works from within the organizations to change	1995; Coined by Meyerson and Scully	Contu (2020), Richter et al. (2020), Grosser (2021)
Liberation theologian	Works in solidarity with the oppressed through faith communities to alleviate suffering	1970s; From the South American context	de beer (2015)

equality based on gender, race, and class. This form of scholar-activism represents a distinct approach, involving efforts to effect change from within problematic organizations and institutions. Richter et al. (2020) further elaborate:

> Working at the hyphens of scholarship and activism, tempered radicals in educational settings balance their critical consciousness with institutional legitimacy to provoke change. (p. 1016)

Although these terms invoke different meanings and are often used interchangeably with scholar-activism (as shown in Table 2), scholar-activists go beyond these terminologies and provide their own definitions of scholar-activism as an independent concept. In the following section, I will elaborate further on its emerging features.

Criticality

Criticality can be perceived as a fundamental aspect that underlies and informs both the active engagement and the normative orientation in scholar-activism. It encompasses critical thinking, reflexivity, and a keen awareness of power dynamics, which

are integral to the practice of scholar-activism and guide scholars in their practical engagement and choice of direction. Hence, it is my contention that criticality should be recognized as a foundational element that influences both the engagement and the orientation of scholar-activists.

The term "critical" is consistently employed in various articles, often in conjunction with other words such as "engagement," "theory," and "analysis." Additionally, it is frequently utilized as part of the title of specific fields or disciplines, highlighting their critical perspectives, such as critical pedagogy, critical performativity, critical geography, or critical sociology.

When practicing criticality, scholars confront existing assumptions, question the prevailing norms, and challenge dominant beliefs, ideas, and discourses. It also involves grappling with issues of power dynamics and engaging in reflexivity. Each of these aspects, namely, hegemony, power, and reflexivity, will be explored in greater detail as key features of criticality. However, mere examination of existing assumptions, norms, power structures, and ideologies, without necessarily emphasizing action is criticized by scholar-activists like Alessia Contu:

> Think of all the critical work, for example, that has become known as CMS [Critical Management Studies]; […]. Collectively, we have created sophisticated analyses on the dark side of organizing/managing; the complex ways in which power works to subjugate and exploit individuals and communities; […] The need to 'walk the talk' of our refined critical theories and analyses to influence and change our societies has been the object of much discussion also in this journal. More work is needed to go from what Sarah Ahmed has called talking about the 'doing' to doing the 'doing' of critical work. (p. 283)

Here, Contu underscores the importance of bridging the gap between theory and practice, advocating for scholars to translate their refined critical theories into tangible actions aimed at influencing and changing societies. The reference to the concept of "talking about the doing" versus "doing the doing" of critical work underscores the need for practical application and real-world impact.

In some cases, action is implied by the term "critical," and "critical" is used in a more encompassing way that combines theory and practice, aiming for social change and transformation through engagement, collaboration, and action:

> In engaging in such critical analyses, it is vital that such critical analyses also point to contradictions and *to spaces of possible action.* […] This is an absolutely crucial step, since otherwise our research can simply lead to cynicism or despair. Cynicism and despair can only assist those who wish to remain in power. (Apple, 2016, p. 511)

Emphasized by this quote, critical scholarship must transcend mere critique and actively strive for positive change. Therefore, criticality is tied to active engagement, a pivotal component of scholar-activism expounded upon in Sect. 3.3.

Hegemony

Scholar-activism encompasses a critical examination and resistance against hegemony within academia and society (Askins, 2009; Grey, 2013; Hales et al., 2018).

By questioning dominant discourses and producing alternative knowledge, scholar-activists strive to dismantle the oppressive forces of hegemony and foster transformative change in both academic institutions and broader society. Scholar-activists engage in the analysis of current realities, exposing contradictions and identifying "spaces for more progressive and counter-hegemonic actions" (Apple, 2016; Deschner et al., 2020). They challenge the norms and narratives perpetuated by dominant structures and exploitative systems, such as marketization and managerialism (Grey, 2013), as well as dominant norms in academia, such as the way we write and publish:

> [W]e should also pursue the emotional in writing within hegemonic academia in order to shift what is 'acceptable'. (Askins, 2009, p. 11)

The question of hegemony, when entangled with "oppression" and "injustice," remains a critical aspect of scholarly activism. Contu (2020) argues that scholar-activism aims to rupture or revise norms, contesting the hegemony they impose. For example, one such hegemonic notion, contributing to epistemic injustice, can be what constitutes "valid knowledge" in academia (Hammelman et al., [2020] in Reynolds et al., 2020) and who has the power to speak and shape knowledge (Contu, 2020). Scholar-activism also involves engaging in struggles against exploitative relations of neoliberal capitalism, heteronormative patriarchy, authoritarianism, imperialism, neocolonialism, and white supremacy (Contu, 2020).

As part of the overlap between different components of the definition of scholar-activism (namely, criticality, active engagement, and normative orientation), hegemony can be constitutive of the orientation. In other words, although the critique of hegemony is identified as a defining feature of criticality, different forms of hegemony can inform the orientations that most scholar-activists put forth, such as the "hegemony of neoliberalism." However, some, like Pimlott, may have a different definition of scholar-activism that is irrespective of hegemony. Pimlott (2017) states that

> activism is potentially more ideologically encompassing […] The general bias that equates activism with anti-establishment or left-wing actions ignores right-wing activist academics and senior administrators […] Professors whose work supports the dominant worldview or status quo are no less activist than those who challenge the status quo. (p. 34)

While Pimlott points to an important and prevalent critique or debate on scholar-activism, the majority of the literature in this study, including Pimlott's contribution, utilizes means of scholarly activism (such as critical pedagogy for Pimlott) that are oriented toward the "deconstruction of dominant discourse and consideration of perspectives that question the status quo" (Pimlott, 2017).

Power

The concept of power is intricately linked to the notion of hegemony, where dominant norms, relations, and structures such as racism, sexism, and heteronormativity

operate as "systems of power" (Collins, as cited in Contu, 2018). Scholar-activism acknowledges that we exist within a network of relationships that are neither neutral nor equal. Therefore, a crucial aspect of scholar-activism involves questioning these norms and uncovering the hidden power dynamics. For example, Apple (2016), using a critical educational lens, raises pertinent questions about formal education: "Whose knowledge is this? How did it become 'official'? Who benefits from these definitions of legitimate knowledge and who does not?" (p. 510).

Some scholar-activists employ *intersectionality* as a framework to illuminate the intersections of power relations and how inequality is shaped across class, race, gender, and other dimensions (Contu, 2018; e.g., Richter et al., 2020; Santos, 2012). Hence, scholar-activism is highly attuned to power dynamics, but it also endeavors to take action based on that understanding in order to "destabilize" power imbalances (Maxey, 1999). This includes challenging hierarchies within the research process and knowledge production (Maxey, 1999) and striving to "reclaim" power by amplifying marginalized voices and ensuring that they are heard by those in positions of power (Mason, 2013).

Another way for scholar-activists to address the issue of power is by actively and introspectively navigating their various relational positions as scholars and activists simultaneously (Routledge & Derickson, 2015). This aspect, known as *reflexivity*, will be further examined in the subsequent section.

Reflexivity

Reflexivity is a form of critical reflection that involves examining one's own position within the context of engagement (Canaan, 2010; Cox, 2015; Hales et al., 2018), whether theoretical or practical. In scholar-activism, reflexivity plays a significant role by prompting scholars to critically assess their own identities, expand their understanding of themselves and others, and recognize the limitations of their prior knowledge. By embracing reflexivity, scholar-activists engage in a process of self-reflection and questioning that helps them navigate their positionality within social movements and academic settings. Reflexivity serves multiple purposes. One purpose is to become aware of power imbalances in relationships with others and to address them (Routledge & Derickson, 2015), whether in their interactions with students, research subjects, or fellow activists in social movements.

Reflexivity can also be used to achieve greater objectivity. Objectivity, often promoted as a norm in modern scientific models and associated with neutrality and impartiality, can pose a serious threat to scholar-activism. Scholar-activists make efforts to counteract this critique, and reflexivity is presented as a way to attain a higher level of objectivity. Rather than denying one's values and normativity, reflexivity enables critical engagement with one's positionality. Hales et al. (2018) acknowledge the expectation for scholars to maintain *pure objectivity* as demanded by external entities, but they argue against detachment from the world as a means to achieve objectivity, drawing on Bourdieu's perspective. According to Bourdieu, political reflexivity requires researchers to critically situate their interpretations and

be transparent about the political implications that may arise from uncritical and politically unaware interpretations. Similarly, reflexivity is invoked to achieve *strong objectivity* in feminist perspectives (Crasnow, 2013). Hern (2016) emphasizes the significance of reflexivity in promoting objectivity, suggesting that scholar-activists should examine how their efforts have influenced the movements in which they work and include their own reactions as data within their analyses. Through this process, scholar-activists strive to ensure that their final analysis is rooted in strong objectivity and free from biased results.

It is important to note that a significant portion of the literature reviewed in this study presents itself as a reflexive account of scholar-activist endeavors. For instance, Chatterton et al. (2010), Askins (2009), and Croog et al. (2018) offer reflexive perspectives on scholar-activism, rendering their writing as a part of their scholar-activist endeavor in its own right. Additionally, some scholars explicitly discuss the incorporation of reflexivity in scholar-activism as a conceptual framework. Maxey (1999), for example, describes reflexivity as an active and critical reflection on the world and our position within it, enabling us to challenge oppressive power dynamics through creative and constructive actions instead of perpetuating them.

However, Derickson and Routledge (2015) raise a challenge regarding the balance between reflexivity and active engagement. They caution against becoming "immobilized" by being overly analytical, reflexive, or cautious, suggesting that, while addressing questions of power and reflexivity in knowledge production is important, the current economic, political, and ecological crises demand urgent engagement. They highlight an important tension between reflection and action and emphasize the need for a constructive balance between the two.

Active Engagement

As mentioned earlier, action is a crucial component of activism, which can be defined as action undertaken in support of a cause (Pimlott, 2017). However, when it comes to defining and conceptualizing scholar-activism, there exists a wide range of engagements that differ in terms of their level of "activeness" and are not necessarily synonymous with praxis or hands-on practice. To account for the diverse practices involved in scholar-activism, I prefer to classify these engagements as "active engagement." This classification allows for the recognition of the multifaceted nature of scholar-activism as understood by scholar-activists themselves. The following section provides a brief overview of the prevalent forms of these engagements.

Engaging Emotions

Some scholar-activists have explored the significance of emotions in scholar-activism. The discussion on emotions in scholar-activism often references the works of Bondi (1999, 2005), who explores the intersection of human geography and

psychotherapeutic practice, and of Katy Bennett (2004) and Laura Pulido (2003), who shed light on the subjective and intersubjective dimensions of scholar-activism. Through engaging with emotions, scholars delve into the more nuanced and personal aspects of scholar-activism. Derickson and Routledge (2015) describe scholar-activism as a "deep emotional response" to the injustices witnessed in the world, highlighting the potential to transform these emotions into political action that forms the foundation of activism as a whole. This can be considered a departure from the traditional model of modern science, which stands on the idea of rationality and "disinterestedness" (Merton, 1973). Scholar-activists recognize the importance of emotions and the need to embrace and engage with their feelings as inseparable elements of their identities as both academics and activists. Askins (2009), in her reflexive work, eloquently expresses this interconnectedness:

> [W]hen I'm lecturing, facilitating seminars, seeing students as guidance tutor, dissertation supervisor, I have my body, my emotions, my subjectivity/ies with me too, as much as when I'm activist-researching. My passion for social and environmental justice isn't switched off in the classroom or office: as it feeds through my personal life so it feeds through learning and teaching approaches. (p. 10)

Emotions not only serve as the driving force behind scholar-activism (Askins, 2009; Routledge & Derickson, 2015) but also encompass a range of experiences, such as anger, discomfort, and fatigue, that arise throughout the scholar-activism journey. Quaye et al. (2017) draw attention to the emotional toll paid by scholar-activists, particularly Black faculty who, as they navigate academia, encounter "racial battle fatigue" stemming from the distressing mental and emotional conditions they face due to daily experiences of racism. Croog et al. (2018) also reflect on the emotion of "discomfort" as a significant aspect that must be navigated when operating within or challenging the boundaries of traditional research.

Engagement with Commitment

Scholar-activism is characterized by scholar-activists as a commitment to a cause, certain values, or specific communities and groups. Canaan (2010), with reference to Bourdieu (2003), describes it as "scholarship with commitment." This commitment encompasses moral dedication and the pursuit of values such as democracy and inclusiveness (Hales et al., 2018), as well as justice (Apple, 2016; Quaye et al., 2017; etc.). It can also manifest as a deep desire to engage with the "local" (de Beer, 2015), "indigenous communities" (Hales et al., 2018), the "on-the-ground" reality (Buras, 2021), or the "real world" (Askins, 2009). Each of these commitments represents a form of engagement that demands the investment of energy, time, and resources to bring about meaningful change. Scholar-activists recognize that this commitment goes beyond mere involvement; it requires them to actively engage with communities, prioritize their needs, and establish enduring relationships, as emphasized by Hales et al. (2018) and Mason (2013) in their call for "long-term commitment." As noted by Hales et al. (2018), the process of entering communities, meeting their needs, and

eventually exiting is time-consuming but crucial for fostering mutual empowerment, self-determination, and emancipation, especially in indigenous contexts.

Scholars also acknowledge that commitment may fluctuate due to constraints and tensions between the academic and activist worlds. The dual commitment of being both scholars and activists lacks a clear definition and support, which can impose tensions on scholar-activists' engagements. Apple (2016) illuminates the scholar-activists' role as someone who

> demonstrates through her or his life what it means to be both an excellent researcher and a committed member of a society that is scarred by persistent inequalities. She or he needs to show how one can blend these two roles together in ways that may be tense, but still embody the dual commitments to exceptional and socially committed research and participation in movements. (p. 512)

The dual commitment generates tensions that Chatterton and colleagues (2010) address in their engagement with activist communities and social movements. They explore the differing perspectives on capacity and the complexities of balancing multiple demands, providing further insight into the challenges that scholar-activists face (Chatterton et al., 2010).

From Resistance to Creation

As scholar-activists engage in their work, the need for resistance becomes apparent. Scholar-activists often find themselves participating in resistance movements and communities of struggle, as demonstrated in the works of Chatterton et al. (2010), who were involved in the anti-capitalist autonomous housing movement, and Mason (2013), who engaged with the Climate Justice Movement.

Resistance involves taking a stand against specific forces or conditions within academia that scholar-activists recognize as oppressive. These forces may include "the trappings or oppressions of the institution" (de Beer, 2015), manifestations of neoliberalism (Deschner et al., 2020), the erosion of autonomy and spaces of freedom (Canaan, 2010), or the detrimental effects of New Public Management (Grey, 2013). Scholar-activism is called upon as a means of resistance against these problematic forces within academia, perpetuated by the dominance of neoliberalism and New Public Management. As Canaan (2010) phrases it:

> Can we take it so far as to act as 'sand in the machine' […] encouraging students to work with us to critically explore and potentially progressively transform the beast whose belly we work within? (p. 204)

Scholar-activists have not limited themselves to using resistance as a reactionary measure against existing forces; they have also embraced a proactive approach that involves creation, transformation, and prefiguration, as highlighted by Deschner et al. (2020), Richter et al. (2020), Mason (2013), and de Beer (2015). This proactive approach is exemplified in Mason's (2013) reflections on planning and participating in an academic seminar blockade during the UN COP15 as part of the Climate Justice Action. Mason critiques the traditional strategy of merely reacting to global

capitalism by attending climate conferences and similar events, which they perceive as futile and lacking substantial impact. Instead, they advocate for a proactive stance, suggesting the following:

> In advance of future rounds of COP and the like, we could turn our backs, in theory and in practice, […] bringing all our considerable movement talents to bear 'locally' in favor of our comrades and their cause probably in a place other than that where the 'official' summit is held. Imagine, for instance, how twenty-thousand people could contribute during a week spent assisting a low-impact development, ecovillage or that refugee centre threatened with closure; Imagine how that number could literally remodel the cycling culture of a regressive British or Spanish city. (p. 39)

Teaching and Pedagogy

Within the scholarly literature, there are scholars who specifically emphasize education, pedagogy, and teaching as integral components of scholar-activism. Pimlott (2017), Canaan (2010), Apple (2016), and Richter et al. (2020) are among those who highlight this aspect. Additionally, other scholar-activists underscore the importance of teaching in conjunction with research as a means of engaging in activism (e.g., Contu, 2018, 2020; Cox, 2015; Quaye et al., 2017, among others).

Scholar-activists draw upon various theoretical frameworks to inform their pedagogy, aligning it with their activist pursuits. For instance, de Beer (2015) adopts Giroux's concept of a "pedagogy of wakefulness," which involves critically and actively engaging with the world to challenge oppressive structures and alleviate human suffering. Some scholars employ "critical pedagogy," inspired by Paulo Freire, and utilize diverse teaching techniques as a form of activism. Inspired by critical pedagogy, Pimlott (2017) combines "critical content" with a "student-centered, dialogic process" in the classroom to promote scholar-activism.

The fundamental principle underlying the view of pedagogy as a mode of active engagement for scholar-activism is the recognition that education is not neutral (Canaan, 2010). Traditional education perpetuates oppressive power dynamics both within and beyond the classroom, necessitating a more emancipatory approach to education for societal transformation (e.g., Freire and hooks). The goal of teaching and pedagogy as a means of scholar-activism is to strive for the betterment of humanity and the promotion of the common good, guided by principles of justice, human flourishing, and the alleviation of suffering (Hytten, 2017).

Another noteworthy example of an intensive activist educational program is the MA program in Community Education, Equality, and Social Activism developed and implemented by activist scholars at Maynooth, as described by Cox (2015). The program aimed to bring together participants from diverse social movements to foster mutual learning and advance social change. It employed popular education methods, emphasizing dialogue and reflection on participants' own practices. This is one mode of active engagement for Cox, which is complemented by other approaches such as participatory action research and active participation in social movements. These other modes of active engagement will be further explored below.

Participatory, Collaborative, Action-Oriented Research

In general, apart from teaching, research is another significant mode of active engagement for scholars. However, certain research approaches are more commonly utilized by scholar-activists as they align with the pursuit of scholar-activism, aiming for transformation, social justice, equality, and addressing power relations. These methods or approaches to research include action-oriented research, which involves opening up participation to non-academics, communities of struggle, and marginalized voices, as well as fostering the co-creation of knowledge. Participatory research, as described by Pain (cited in Chatterton et al., 2010), is one form of scholar-activism with multiple aims, including participation, practical outcomes, and knowledge production. Reynolds et al. (2020) further argue that the field of geography has witnessed calls for action-oriented research, addressing the theory–practice gap in academia and the need for relevance to the real world and practitioners.

Collaboration in the research process is also recognized as a valuable form of engagement for scholar-activism. Derickson and Routledge (2015) emphasize the significance of collaboration in their own projects, highlighting their commitment to working with communities and organizations to "coproduce knowledge with them as opposed to conducting research on them." They further explain that their academic work not only fulfills the requirements of their employment and intellectual communities but also specifically advances the goals of the community groups they collaborate with.

Through collaboration, scholar-activists are able to engage with diverse perspectives, challenge existing assumptions, and explore the multifaceted nature of issues such as food justice. Croog et al. (2018) emphasize the importance of collaborative work in their scholar-activism focused on food justice. By engaging in collaboration, they have gained insights into the various dimensions of food justice. They have come to recognize that food encompasses more than just an organizing tool; it is connected to nutrition, emotions, rights, desires, and ecological actions. This collaborative approach has allowed them to grasp the complexity and interconnectedness of food practices within social and ecological movements (Croog et al., 2018).

Collective or collaborative writing serves as a strategy employed by scholar-activists to bridge the gap between theory and practice, allowing academics to work together to generate new knowledge and insights. Chatterton et al. (2010) critically highlight the dominance of individualized accounts of academics "in the field" within the existing literature on scholar-activism. However, this study reveals a notable shift in recent years, with five out of the twelve published works since 2017 presenting collective narratives of scholar-activism. This trend suggests an increasing embrace of collaborative and multidisciplinary approaches within the realm of scholar-activism.

Collaboration, whether among scholars or extending beyond academia to engage with movements or organizations, can be viewed as a significant form of active engagement for scholar-activism.

Collective Action and Social Movement

Scholar-activists who engage in social movements recognize the value of working closely with the movements they support and belong to. They draw on personal experiences and reflections of actively participating in campaigns and movements that promote social and political change, to formulate a conception of scholar-activism as engagement in both worlds of the academy and social movements. According to their narratives, these scholar-activists assume various roles and capacities within social movements, including teachers, researchers, experts, narrators, and public intellectuals. They leverage their knowledge and expertise to further the goals and deepen the understanding of the movements they support (Chatterton et al., 2010; Hern, 2016; Santos, 2012, etc.). For instance, Hern (2016) perceives their role as that of a narrator or storyteller:

> [T]he scholar-activist also has another important role when working within social movements—as a narrator, or storyteller, within the narrative practice of the social movement. Narrative practice is the process through which social movement actors understand and construct opportunities in their environment in ways that serve to mobilize their constituencies. (p. 120)

Chatterton et al. (2010) see their role as sharing their resources as academics with the movement they feel they belong to:

> Our motivation as originally conceived was to enable us to work closer with the social movements we support and belong to. Using our privileged position to access research funding we resolved to engage in participatory research alongside the everyday struggles of a number of anti-capitalist or 'autonomous' political groups, networks and spaces in the UK. (p. 246)

What connects these scholars is the idea of inhabiting both the worlds of academia and activism, as separate worlds with separate forms of organization and norms. Here, scholar-activists are not merely social movement scholars who study movements; rather, they belong to them and support the movements and their cause and therefore have a commitment to advance the goals of the movement by sharing their capacities as scholars. This is not an easy task, as many issues and tensions of such double engagement are discussed in the scholar-activists' accounts (see for example Quaye et al., 2017 and Chatterton et al., 2010). However, there is a belief that such "double agency" has the potential to help "build and disseminate empirically grounded knowledge" (Santos, 2012), contributing to the improvement of the field of social movement studies (Cox, 2015) and more direct ways of contributing to social change.

Some argue that social movements and struggles are not confined solely to external contexts but also exist within the oppressive dynamics present within academia itself. McCann (2010), for instance, explores the rhetoric of bordering to discuss engagement outside of academia, while emphasizing the need for engagement within the academy where instances of "cruelty" occur. As such, scholar-activists draw on their own campaigns and collectives within the academic setting to address oppressive structures that persist within universities. Quaye et al. (2017), for instance,

formed their own collective called the Mobilizing Anger Collective as Black faculty in response to the #BlackLivesMatter movement:

> [W]e define scholar-activism as campus employees (e.g., faculty, administrators, and staff) who engage in efforts to bring about change on campus and/or in society. Scholar-activism is campus employees engaging in tactics for social change and weaving that activism into how they lead through their teaching, practice, and research/scholarly activities. (p. 385)

Normative Orientation

Social Change

Social change is a fundamental tenet in defining and conceptualizing scholar-activism as highlighted by almost all of the scholar-activist texts included in this study. The majority of the texts highlight that scholar-activism revolves around the pursuit of social change, encompassing various dimensions such as challenging oppression, advocating for social justice, collaborating with communities, and actively engaging in transformative practices and other forms of engagement that have been previously discussed (see as examples Contu, 2018, 2020; Croog et al., 2018; Grosser, 2021; Hales et al., 2018; Hern, 2016; Quaye et al, 2017; Reynolds et al., 2020).

The texts underscore the historical significance of scholars and intellectuals in driving societal change, establishing the groundwork for the role of scholarship beyond the confines of the intellectual realm, and actively addressing pressing societal issues beyond the confines of the "ivory tower." Hern (2016) highlights the scholar's role in social change by referencing historical instances, such as the contribution of critical race scholars in "understanding, critiquing, and, ultimately, changing systems of racial oppression," as well as the role of radical sociological studies in antiwar and antipoverty movements (Morton et al., 2012).

Hence, scholar-activism encompasses diverse modes of active engagement and critical perspectives aimed at effecting tangible change in real-world contexts. However, it is crucial to unpack the notion of change itself. What specific type of change is envisioned? What are the intended outcomes? Scholar-activists often express their aspirations in terms of "changing the world for the better" (Contu, 2020), which implies a normative stance regarding what is considered desirable and problematic. Yet, the question arises: What values underpin these judgments?

In other words, there are different forms of academic engagement that aim to bring about change. However, how does scholar-activism differ from these approaches? Contu provides insight on this matter:

> Intellectual activism is different from other forms of scholarship that aim in one way or another 'to change the world', such as public critical management scholarship, phronetic scholarship and engaged scholarship, because it addresses our academic praxis at 360° in the service to social justice, asking us to be accountable to it. (p. 284)

Here, the focus is on the direction of change, specifically the achievement of "social justice," which is emphasized as a fundamental defining characteristic of

scholar-activism. Contu is not the only scholar-activist who seeks this goal; others also emphasize the importance of values such as sustainability, democracy, equity, accessibility, distribution of power, and dissemination of knowledge. However, justice and resistance against neoliberalism have emerged as major themes within scholar-activism. In the next section, I will delve further into the significance of justice as both a value and a goal that shapes the normativity of scholar-activism.

Justice

The emphasis on justice in defining and conceptualizing scholar-activism, instead of solely focusing on social change as the goal, has been a recurring theme in this review. Contu (2020) highlights the explicit articulation of this focus on justice by Patricia Hill Collins (2012), stating:

> Social change *begs the question of what goals are desirable as well as the standards to move towards them.* (p. 241)

According to Cox (2015), the critical aspect of scholar-activism is intertwined with an awareness of social injustices. Engaging in reflexive "critical scholarship" entails recognizing systemic or structural injustices. Therefore, scholar-activism cannot be detached from the pursuit of social justice in theory. However, this commitment is not confined to theoretical discussions alone. Many scholar-activists examined in this review actively participate in various social justice movements and collectives. For instance, they are involved in the Climate Justice Movement (Mason, 2013), the Local to Global Justice collective (Richter et al., 2020), the global justice movement (Chatterton et al., 2010), the Ontario Coalition for Social Justice (Pimlott, 2017), and others.

It can be inferred that justice encompasses a broad spectrum of values, such as economic equality, human rights, sustainable environments, a pertinent research agenda, progressive politics, collective care, attentive listening, and equity. However, Contu (2020), building upon Collins's intellectual activism and Black feminist scholarship in the USA, endeavors to provide a more historically grounded understanding of social justice. In their words:

> [S]ocial justice [here] is understood as part of the intellectual and concrete history of radical progressive politics. The politics advocated here is a progressive democratic politics that constantly insists and returns on the value of freedom, equality and solidarity as they are embedded in the history of progressive radical politics, and must also include the history of thought. (p. 741)

Hence, social justice is not merely an abstract notion but rather possesses a rich intellectual, social, and political history that has become increasingly intricate at the intersection of various systemic challenges, including neocolonialism, neoliberalism, and contemporary ecological crises. As a result, scholar-activists pursue various strands of justice, such as environmental justice (Mason, 2013; Reynolds et al., 2020), educational justice (Apple, 2016), and epistemic justice (Contu, 2018, 2020;

Deschner et al., 2020). Deschner et al. (2020) draw attention to epistemic oppression as a form of injustice that silences certain voices, asserting that scholarship by women, non-white individuals, and non-heteronormative individuals inherently constitutes an activist practice.

Another strand of arguments on scholar-activism emphasizes the alignment between active engagement, critical perspectives, and the pursuit of social justice (Croog et al., 2018; Reynolds et al., 2020). In essence, scholar-activism is seen as a viable approach for advancing social justice. For instance, Croog et al. (2018), who delve into their scholar-activism within the realm of food justice, observe:

> [T]he reasons that scholar-activism has the potential to be so useful for food justice scholarship is its ability to enable food justice scholarship to be as broad, encompassing, and fluid as the food practices that are enacted in social and ecological mobilizations on the ground. This ability is in large part due to the collaborative mode of conducting scholar-activist research, which produces a multiplicity of perspectives, and which we have worked to cultivate as a research community. (p. 1028)

(Anti-)Neoliberalism

The most prevalent and recurring theme in this literature review is the influence of neoliberalism on contemporary universities, which is highlighted by 16 out of the 25 reviewed sources. Scholars in these papers argue that the adoption of a corporate model by universities has led to detrimental effects, as academic and professional staff face overwork, undervaluation, and unequal labor conditions (McCann, 2010; Richter et al., 2020). In such environments, politically engaged research is often discouraged and viewed as "unscientific" or "subjective" (Routledge & Derickson, 2015). Moreover, authors assert that the precarity and fear of job loss impede academics from engaging with contentious issues and challenging prevailing policies (Apple, 2016).

The theory of academic capitalism is utilized by scholar-activists (de Beer, 2015; Deschner et al., 2020; Pimlott, 2017) to support their arguments regarding the challenges faced by scholar-activists within neoliberal universities. Developed by Slaughter and Rhoades (2004), academic capitalism refers to the influence of neoliberalism on universities, resulting in the integration of the corporate sector into academia and the commodification of education as a service and lifestyle. Scholar-activists in this review draw upon this theory to underscore how the neoliberal shift impacts scholars, reducing them to mere academic bureaucrats (de Beer, 2015) and making it arduous to balance personal and professional responsibilities while meeting the heightened productivity demands of senior administrators, which include "publishing outputs and securing research grants, the teaching of larger class sizes…" (Pimlott, 2017, p. 38).

While neoliberalism is the most significant hegemonic issue presented by the contributions in this review, there are mentions of other historical forms of injustice and marginalization stemming from different types of hegemonic systems and discourses in the broader societal landscapes, such as slavery, patriarchy, fascism, racism, and colonialism, and their continual legacy within the academy (Buras, 2021; Contu, 2018; Deschner et al., 2020; Santos, 2012). The works of feminist scholars,

queer sociologists, and anti-fascist intellectual activists in the twentieth century are examples of a legacy of scholar-activism rooted in resistance toward different kinds of power struggles by and for marginalized and oppressed groups. Literature draws attention to the intersection of such historical structures of oppression within contemporary neoliberal academia, leading to increased pressure and precarity, workload, and mental and emotional tolls on marginalized academics and students (Dechner et al., 2020; McCann, 2010; Quaye et al., 2017).

Despite a widespread notion of the impact of neoliberalism, Contu (2020), inspired by Gramsci, argues that neoliberalism is experiencing a crisis of hegemony, which is "a crisis of the legitimacy and consensus around the moral authority and leadership of the ideas and values of the establishment" (p. 743). The crisis is viewed as conditions that move people from passivity to activity.

Scholar-activists in the literature widely agree on the need to challenge neoliberal conditions through their activist scholarly practices. As emphasized by Chatterton et al. (2010), "academic activism is driven, intellectually, through calls from radical academics for more 'direct action' against neoliberal education policies." It is a scholar-activism that prefigures academia and creates spaces for solidarity, mutual benefits, trust, learning, as well as creating "activist homeplaces" that serve as safe havens for activism, providing support and protection for those who engage in it as a form of resistance (Richter et al., 2020).

Intellectual Influences

In this section, I present the findings of the data analysis concerning theoretical frameworks, prominent figures cited in the conceptualization of scholar-activism, as well as the fields of study and theoretical traditions in which scholar-activists are situated or draw upon. Additionally, I employed a co-citation analysis as a complementary tool to identify the most frequently cited scholars and works. The following paragraphs delve into some of these fields, traditions, and figures that exerted a significant influence on the works of scholar-activists during the conceptualization of their work.

Critical Geography

In this review, the field of critical geography, or critical human geography, has exerted a significant influence, accounting for 8 out of 25 articles. The oldest article included in this literature review, Maxey (1999), also falls within this field. Another noteworthy contributor from this field is Paul Routledge, who has long been engaged in writing about scholar-activism (e.g., his contribution in 1996 about scholar-activism and third-space). Therefore, geographers have a longer history of conceptualizing the term "scholar-activism" compared to other disciplines in this review, and they have

prominent figures in their own field to refer to when conceptualizing scholar-activism (Routledge, Fuller and Kitchin, Harvey, etc.). However, the impact of prominent scholars such as Paul Routledge seems to be confined to the geography community, as evident from the citation pattern.

The field of critical geography itself is heavily influenced by feminist and poststructuralist theories, with a particular focus on the work of Foucault, Butler, and hooks (see Appendix 1). Most of the scholars writing on scholar-activism have referenced Marxist geographer David Harvey in their historical backgrounds, but they do not use his perspectives to explain their own understanding of scholar-activism. In fact, some scholars, such as Derickson and Routledge (2015), distinguish their approach from Harvey's perspective, emphasizing the importance of being accountable to community-based activism rather than being "critically distant" from it as Harvey has argued for.

The theoretical evolution of the field goes back to a few historical turns in the twentieth century. Fuller and Kitchin (2004), whose work has been cited multiple times in this review, in their book *Radical Theory/Critical Praxis: Making a Difference Beyond the Academy*, summarize the history of critical geography and its relationship with concepts such as activism, societal relevance, and critical praxis. The field of critical geography has its roots in the radicalization of geography in the 1960s, inspired by calls from geographers for a more socially and politically relevant discipline in response to the politically neutral and quantitative approach of the time. Over time, critical geography has incorporated Marxist, poststructuralist, feminist, and postcolonialist theories. However, it wasn't until the late 1990s that the field witnessed a shift toward action-oriented and activist-led scholarly work, as exemplified by the work of Maxey, Routledge, and Chatterton (their literature on scholar-activism is included in this study).

This increasingly reflexive and action-oriented turn in geography is also evident in the data in this review as power, reflexivity, emotion, and methodological reflections are the most recurrent themes running through the reviewed literature in geography.

The Feminist Perspective

Feminist scholarship has roots in the feminist movements that have fought against women's oppression from the nineteenth century until today. Therefore, it can be argued that the theories developed in feminist scholarship have been closely connected to real-world social movements and struggles. Deschner et al. (2020) state:

> Feminist scholars have dedicated a lot of attention to finding paths for resisting and transforming higher education. […] [F]eminism, as a social movement and a corpus of theory, has always relied on the entanglement of academic and social movement practices. (p. 330)

The majority of scholar-activists in this review incorporate a feminist perspective into their work, evident through references to influential feminist scholars and

activists such as Collins, Butler, Haraway, Harding, Crenshaw, and hooks. However, it is important to note that feminist perspectives encompass a wide range of approaches, methods, and epistemologies, and they have influenced the works of scholar-activists in various ways, intersecting with other fields and theories. Some authors explicitly draw on feminist perspectives, such as Black feminist thought, while others utilize specific frameworks such as Crenshaw's intersectionality or Haraway's *situated knowledges* to shape their understanding of scholar-activism.

The concept of *intellectual activism*, coined by Black feminist scholar Patricia Hill Collins, has been used in this review to refer to "the myriad ways in which people place the power of their ideas in service to social justice" (Collins, 2013). Contu (2018, 2020) and Grosser (2021), both scholar-activists in the field of organization and management studies, draw on feminist theory in their scholar-activism, believing that the feminist perspective can contribute to these fields by shedding light on knowledge production processes and policymaking.

Another example is Haraway's *situated knowledges*, which critiques the positivist approach and the norms of value-neutrality and universalism in modern science. Scholar-activists such as Richter et al. (2020) and Santos (2012) draw on Haraway's concept to challenge the notion of a "God trick" view of science and instead view knowledge as contextualized and situated. The theory of situated knowledge, rooted in feminist standpoint theory, recognizes the dual perspective of the scholar-activist as both an insider and outsider in academia and marginalized communities (Crasnow, 2013), allowing for a nuanced understanding of the scholar-activists' role.

Scholar-activists in this review have employed the framework of *intersectionality* to analyze power dynamics, inequalities, and the interconnected nature of oppressions within the realm of scholar-activism. They rely on the contributions of Black feminist scholars, including Kimberlé Crenshaw, and emphasize the significance of acknowledging and addressing the intricate intersections of identity in the pursuit of social justice and transformative change. Deschner et al. (2020) articulate this perspective, stating:

> Intellectual activism necessitates the use of "intersectionality" as [a] framework to engage [in] academic praxis, whether it is in doing research, teaching or administrative work. (p. 331)

Scholars who employ feminist epistemology to frame their understanding of scholar-activism often adopt specific research and writing methods and tools, such as reflexivity, collective writing, and narrative writing (Maxey, 1999; Richter et al., 2020; Routledge & Derickson, 2015). By utilizing these approaches, they aim to challenge the prevailing conventions of academic writing that may not accommodate self-reflexive, narrative, auto-ethnographic, or autobiographic accounts, including narratives of failure that are typically not embraced within the publish-or-perish paradigm.

Popular and Critical Education Influences

Theories of critical pedagogy, encompassing popular education and critical education, have been employed and referenced not only by scholar-activists in the field of education but also by various contributors in this review. Scholars such as Apple (2016), Canaan (2010), Grey (2013), and Buras (2021) within the education realm, as well as Pimlott (2017) in communication studies, Cox (2015) in sociology and social movement studies, and Derickson and Routledge (2015) in geography, have drawn upon and incorporated this theory into their work. This widespread adoption indicates the broad influence and relevance of critical pedagogy.

Critical pedagogy finds its roots in Critical Theory,[3] primarily associated with the works of the Frankfurt School during the early twentieth century (Abraham, 2014). Critical Theorists sought to expand upon Marxist ideas of class struggles, capitalism, and alienation by examining the role of art, culture, and individual subjectivities. They recognized that oppression was deeply ingrained and accepted within individuals, and the anticipated revolution predicted by Marx had not fully materialized. Paulo Freire, a prominent Brazilian scholar, further advanced Critical Theory's focus on education, particularly in the context of adult literacy, drawing from various other theoretical perspectives. As Kincheloe (2007) explains:

> Emerging from Paulo Freire's work in poverty stricken northeastern Brazil in the 1960s, critical pedagogy amalgamated liberation theological ethics and the critical theory of the Frankfurt School in Germany with the progressive impulses in education…. (p. 12)

Within the context of this review, which focuses on the intersection of education, pedagogy, and scholar-activism, there exists a shared belief among scholars that education should strive for greater social justice. They question whose knowledge is considered authoritative, who benefits from existing educational frameworks, and how these inequalities can be addressed and rectified (Apple, 2016). Rejecting the notion of education as a neutral process, these authors emphasize the presence of power imbalances and educational injustices within educational systems. Canaan eloquently expresses this viewpoint:

> Like Freire and others [here they mention Bourdieu and Giroux], I recognise that education is never a neutral process and therefore that HE [Higher Education], like other formal and informal educational spaces, is a political site like others. (p. 205)

The scholars examined in this review offer diverse approaches to address the aforementioned issues within educational institutions and the broader educational policy arena. These approaches include critical race praxis advocated by Buras (2021), which promotes a critical examination of race and racism in education. Another approach is the adoption of dialogic engagement between lecturers and students, as proposed by Apple (2016). Additionally, the concept of academic literacies, as discussed by Canaan (2010), is highlighted as a means to navigate and challenge dominant educational norms.

[3] Using capital letters in "Critical Theory" is intended to distinguish it from critical theory as the broader critical approach to social theory.

Critical pedagogy, central to these discussions, underscores the significance of practical experiences and their real-world relevance for students. This perspective gives rise to a range of methodologies, such as dialogical pedagogy, which fosters active engagement between teachers and students within the classroom. Furthermore, research methods such as participatory action research (PAR) are employed to challenge oppressive practices in both education and research (Canaan, 2010; Pimlott, 2017).

However, some scholar-activists express reservations about the complete applicability of critical pedagogy within their academic work, considering the institutional constraints they face (Canaan, 2010; Pimlott, 2017). For instance, Canaan elaborates on this viewpoint:

> I still find popular education somewhat dissatisfying because popular educators are primarily located outside the state sector which gives them more freedom (albeit fewer financial resources (Kane, 2007b) than state-based educators whose political agendas are consequently more muted. I find the concept of 'academic activism' helpful because of its focus on the university, recognising that our working conditions and relations within this institution, like those of others, are structured by the logic of neo-liberalism. (p. 210)

Critical pedagogy serves as a wellspring of inspiration and is employed to varying degrees by scholar-activists in their engagement within classroom settings. It is also harnessed in research endeavors, as exemplified by Derickson and Routledge (2015) and Cox (2015), who view the research process as a collaborative learning experience with social movements and activist communities. Notably, Freirian critical pedagogy has played a significant role in the resurgence of participatory action research (PAR) as a research methodology (Jacobs, 2016). Consequently, critical pedagogy blurs the boundaries between knowledge acquisition and knowledge production, fostering a dynamic interchange of ideas and perspectives.

Critical Social Theory

In this section, I aim to examine the influences of three prominent scholars in the field of what can be broadly termed "critical sociology": Antonio Gramsci, Pierre Bourdieu, and Michael Burawoy. Their contributions have significantly shaped the conceptualization of scholar-activism by scholar-activists. Within this context, critical social theory emerges as a comprehensive approach to social theory that encompasses the examination of power, domination, and hegemony.

Bourdieu: The book *Firing Back: Against the Tyranny of the Market* by the French philosopher Pierre Bourdieu has been cited in much of the literature in this review (Apple, 2016; Canaan, 2010; Hales et al., 2018), and his concept of "scholarship with commitment" has been discussed (Canaan, 2010). Serving as a manifesto, the book unveils the claims of neoliberalism and calls for decisive action to counter it (Pearce, 2005). Bourdieu identifies researchers and activists as agents of change, emphasizing the importance of collaboration among them. These ideas align with the

fundamental principles of scholar-activism explored in earlier sections, including the critique of hegemony, the active engagement through resistance and collaboration, and an anti-neoliberal orientation.

In his work *For a Scholarship with Commitment*, Bourdieu (2000) poses the question: "Can intellectuals, particularly scholars, intervene in the political sphere?" He acknowledges that scholars' political involvement may attract criticism, especially from within academia, and may face anti-intellectual sentiments. However, Bourdieu argues that scholars and intellectuals have the capacity to engage in political debates and social movements without neglecting their responsibilities as researchers. They can achieve this by cultivating critical reflexivity and subjecting themselves to critique. Bourdieu (2000) introduces the concept of the "collective intellectual" and highlights their role in liberating social critique from the constraints of academia's "small world," as well as in fostering the social conditions necessary for the collective production of realistic utopias. Drawing on Bourdieu's ideas, Canaan (2010), who operates at the intersection of scholar-activism and education, interprets "scholarship with commitment" as countering the increasingly dehumanizing working conditions by collaborating with others in a democratic manner.

Gramsci: Scholar-activists also draw upon the works of Antonio Gramsci, the Marxist intellectual activist whose theories have been utilized in social movements studies (Cox, 2015; Santos, 2012) as well as in the fields of education and pedagogy (Apple, 2016; Canaan, 2010; Pimlott, 2017) in the literature. Gramsci's concept of *cultural hegemony* and his distinction between "organic intellectuals" and "traditional intellectuals" have had a profound influence on the scholarship of scholar-activists. While Gramsci developed his ideas in the context of pre-World War II Italy and the fight against fascism, scholar-activists adapted this notion to the crisis of neoliberal hegemony (Contu, 2020).

Gramsci's view that "All men are intellectuals" (Forgacs, 2000; p. 304) challenges the boundaries between scholarship and activism. He argues that organic intellectuals have a unique opportunity to challenge dominant ideologies, shape new modes of thinking, and develop alternative theories rooted in history and sensitive to specific contexts. These intellectuals play a crucial role in fostering political emancipation (Strine, 1991). Therefore, Gramsci's theories align with the theorizations of scholar-activists discussed earlier in this chapter, including the critique of hegemony, the pursuit of social change and emancipation, and modes of engagement that involve creating counter-hegemonies within social movements or closely aligning with marginalized communities experiencing political oppression. Cox (2015) suggests that theorizing about social movements can occur from two distinct positions: the academic position (corresponding to the traditional intellectual) and the activist position (corresponding to the organic intellectual). In the field of education, Apple (2016), inspired by Gramsci, argues that the role of "counter-hegemonic education" was not "to throw out 'elite knowledge' but to reconstruct its form and content so that it served genuinely progressive social needs" (Apple, 2016).

Burawoy, in his last thesis for *public sociology* states:

> If the standpoint of economics is the market and its expansion, and the standpoint of political science is the state and the guarantee of political stability, then the standpoint of sociology is civil society and the defense of the social. In times of market tyranny and state despotism, sociology—and in particular its public face—defends the interests of humanity. (p. 24)

Michael Burawoy's concept of public sociology emphasizes a sociological approach that is more focused on societal issues, highlighting the public dimension of the discipline. However, the specific modes of engagement associated with this scholarship remain unclear until Burawoy distinguishes between traditional and organic public sociology. In traditional public sociology, the public is merely "addressed" but is otherwise "invisible" and "passive." In contrast, organic public sociology involves sociologists actively engaging with various counter-publics, such as "labor movements, neighborhood associations, and faith communities," through dialogue and mutual learning (Burawoy, 2005). This approach aligns with the ideas of Antonio Gramsci, emphasizing the importance of dialogue and collaboration between public sociologists and the public they serve.

While one might anticipate Burawoy having a significant influence on the conception of scholar-activism, this review primarily examines the engagement of two scholars with Burawoy's public sociology, particularly its organic variant (Apple, 2016; Santos, 2012). Santos (2012) explores the notion of queer public sociology at the intersection of public sociology and queer studies. They perceive in Burawoy's sociology a call for politicized action that necessitates the disclosure of one's political orientations as scholar-activists (Santos, 2012). The other scholar is Apple (2016), who incorporates organic public sociology, along with the ideas of Gramsci and Bourdieu, to shape his list of tasks for public intellectuals or scholar-activists in the field of education, emphasizing the importance of "engaging in the mutually pedagogic dialogues" with students.

Significant overlaps and similarities can be observed in the conceptual discussions presented by Gramsci, Bourdieu, and Burawoy. However, it is evident that there are varying levels of engagement in their propositions. For instance, while Bourdieu and Burawoy emphasize political and public engagement, they maintain a commitment to the academic realm and the sense of belonging within the academic community. In contrast, Gramsci argues for a more deeply embedded form of activism that is not necessarily constrained by academic affiliations. This difference in perspective can partly reflect the different lived experiences of these thinkers in engaging with both activism and academia.

Discussion

In this discussion section, I will consolidate our understanding of scholar-activism by synthesizing the key insights gained from the literature review. I will explore the implications of the findings for future research.

Scholar-Activism Conceptualized

As this study suggests, scholar-activism is a critical, reflexive, normative, and active scholarly engagement with a commitment to create social and political change within or beyond the academic realm and mainly in accordance with the principles of social justice. This definition aligns with various perspectives found in the literature. However, this study has further refined the understanding of each component of scholar-activism. Based on the findings, I have developed a conceptual framework (Fig. 2) categorizing the different components of scholar-activism as criticality, normative orientation, and active engagement. It is important to note that these components are interconnected and overlap with each other.

Criticality refers to scholar-activism arising from a critique of the present, including the status quo, prevailing norms, assumptions, and taken-for-granted discourses that perpetuate problems and marginalize certain discourses, perspectives, voices, or groups of people. Such hegemonies give rise to various forms of inequality and injustice, such as social injustice, environmental injustice, and epistemic injustice. Reflexivity, as part of criticality, involves the scholar-activist critically examining their own positionality in relation to the groups they engage with, their values and assumptions in their scholarly work and activism, and their role in addressing the problem, aiming to foster greater objectivity and self-awareness.

Scholar-activism, as indicated by this study, transcends a mere "doctrine of committed action" for any cause and is primarily defined by its normative orientation toward social change, particularly focused on social justice rather than efforts (e.g.,

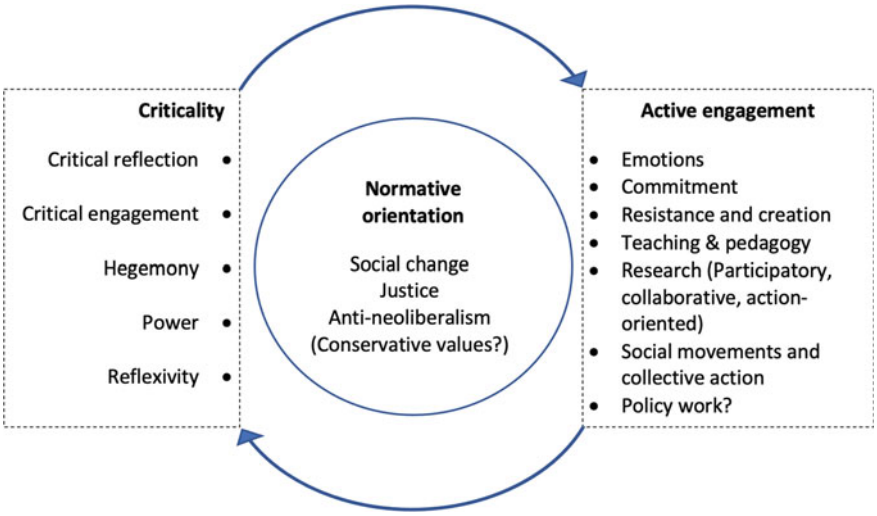

Fig. 2 A conceptual framework categorizing the different components of scholar-activism identified in this study as criticality, normative orientation, and active engagement (developed by the author)

by certain think tanks) aimed at preserving and maintaining specific neoliberal policies or hegemony. While some scholar-activists have sought to broaden this definition to encompass a wider range of causes not necessarily centered on change (Pimlott, 2017), all the articles self-identified as scholar-activist maintain an anti-neoliberal (often explicitly left-leaning) and social justice orientation and conceptualization. Hence, one could argue that activism has become associated with leftist ideals.

If right-leaning scholars engaging in committed action to maintain the status quo do not identify as scholar-activists, what might be the reason? One hypothesis could be that right-leaning conservative values do not align with the values upheld by scholar-activists. Thus, conservatives accuse liberal scholar-activists of promoting biased and distorted science, using such claims to oppose liberal activism, particularly in the social sciences (Cofnas et al., 2017). For instance, Cofnas et al. (2017), in their article on conservatives' lack of trust in scientists, argue that their diminishing trust reflects the increasing adoption of a liberal-activist stance by scientists in certain fields, particularly social science, as they seek to "influence public policy in a liberal direction."

I argue that the binary political framework restricts our capacity to envision progress beyond the left–right divide and perpetuates the continuous fragmentation and hostility within our societies. However, it is evident from the statements I have presented that conservatives perceive activism (specifically referred to as "liberal activism") as a threat to science, considering activist scholarship to be biased and distorted. Larregue (2018) views these conservative claims as a form of boundary work with various purposes, including upholding power and subverting liberal dominance in the field of social sciences. This debate represents a classic conflict between these two groups, ultimately influencing the use of language and differently shaping the understanding of notions such as objectivity and scientific norms from each side. My objective here is to illustrate how diverse value domains can influence language in unique ways, resulting in varying definitions from different perspectives. With this nuanced understanding, I return to my main goal, which is to understand the insider perspective of scholar-activism; by highlighting the influence of the liberal left on this conceptual field, it can be argued that social change and liberal progressive values are fundamental defining elements of scholar-activism.

Engagement, as defined here, encompasses a range of different forms, including emotional engagement, committed engagement, and practical engagements in teaching, research, and collaboration with social movements or collectives. Active engagement not only encompasses the types of activities and practices employed by scholar-activists to effect tangible change in the world but also emphasizes the quality of engagement. This allows for a spectrum of activities that may not necessarily be confrontational, loud, or visible. It includes emotional engagement involving feelings of discomfort, anger, or joy, as well as long-term commitment to a cause that extends beyond, for instance, one-time participation in collective action. Moreover, different modes of active engagement are interconnected. For instance, participation in social movements can involve various roles for the scholar as a teacher or researcher, as well as involving emotional engagement and long-term commitment.

It is worth noting that "active engagement" differs from the concept of "academic engagement" within university-industry relations (Perkmann et al., 2013). In that context, modes of engagement revolve around academic interactions with industries, such as consultancy, patenting, and co-authorship with industrial researchers, with a focus on accessing resources and learning opportunities relevant to research activities.

While active engagement shares similarities with the concept of "action" in action-oriented research (Wittmeyer et al., 2014), there are also differences. According to Wittmeyer et al. (2014), action in action-oriented research involves various activities such as facilitating and participating in processes, supporting policy formulation, and analyzing actions. These activities fall under the umbrella of "action-oriented research" and represent one of the modes of active engagement for scholar-activists that are illustrated in this study, among others. Therefore, the concept of "action" does not fully capture the diverse range of engagements described by scholar-activists. This means that scholar-activism as a concept is different from both academic engagement and action research.

Scholar-Activism's Intellectual Roots

In this study, I have demonstrated the common and significant intellectual influences on scholar-activists in their conceptual approach to their work. Firstly, a critical geography circle has been identified which has greatly influenced the literature included in this study (approximately one-third of the articles). Within this field, various intellectuals have made conceptual contributions and theorized scholar-activism. It is notable that there has been a shift from Marxist theories toward a growing influence from feminist and poststructuralist perspectives among these scholar-activists.

Feminist perspective and theory represent the second stream of intellectual influence shaping the works of scholar-activists in this review. Feminist thought, historically intertwined with on-the-ground social movements, has developed a rich body of theories that provide support for scholar-activist conceptualizations. Examples include Collins's intellectual activism, Haraway's situated knowledges, Harding's strong objectivity, and Crenshaw's intersectionality.

The third category of intellectual influence is centered around critical pedagogy and education. This category has shaped the works of scholar-activists across various disciplines, focusing on education and teaching as active engagement for scholar-activism. Participatory action research (PAR) as a mode of active engagement also shares theoretical roots with critical education. The main influential figures from this field of scholar-activism have been Paulo Freire, Giroux, hooks, and Apple.

The final category encompasses the contributions of three prominent scholars, Gramsci, Bourdieu, and Burawoy, within the field of critical social theory. These scholars have served as major sources of intellectual inspiration for scholar-activists, not only in sociology but also in other fields. Gramsci's notion of organic intellectuals, Bourdieu's scholarship with commitment, and Burawoy's concept of public sociology have all been influential.

It is important to acknowledge that there are additional perspectives worthy of exploration, although the scope of this chapter does not permit an in-depth examination of them. For instance, social movement theory has been referenced multiple times and has provided both an analytical framework for scholar-activists in relation to their organizations and a space for reflecting on the role of scholars engaged in social movement studies. However, due to limitations, it has not been extensively discussed.

Another area of influence that deserves attention is critical management studies, which is the field to which two of the scholar-activists belong. They draw on concepts from this field and traditions such as corporate social responsibility, yet there is only minimal reference to it in this study. Additionally, liberation theology, which informs one of the works, emerges as an important activist tradition that merits further exploration.

Concluding Remarks

I will now return to the story of the intellectual Katouzians, whom Jamshid secluded in the mountains to think and provide society with knowledge and solutions. The question arises: Can the pursuit of intellectual and social commitments be harmoniously linked? The findings presented in this text demonstrate that scholar-activism is not necessarily a haphazard combination of scientific and scholarly activities with activism and political partisanship. Scholar-activists in this study have actively engaged with their dual roles and commitments, drawing upon intellectual traditions and conceptually harmonizing their involvement with scholar-activism. An important aspect of this effort is the recognition of the tensions that arise from merging these two tasks, not necessarily from a conceptual standpoint, but from a practical one. The constructed boundaries between science and society have tangible consequences, particularly within an increasingly neoliberal academia where academic success is measured using criteria that are incompatible with activist engagements by academics.

Moreover, viewing science as a socially constructed process and product influences how we approach its definitions and norms, ultimately shaping its compatibility with other realms of society. For instance, the growing space for collaboration between universities and industries has been influenced by the framing of science and the pursuit of science in science policy, as well as the setting of priorities through an academic capitalist mode of governance. Thus, the incompatibilities between science and activism as social institutions do not stem from inherent differences between the two (as theoretical reconciliation seems plausible), but rather from the difficulties in navigating the "mountains" that lie between them when attempting to combine the two. In today's world, this challenge manifests as difficulties in securing sufficient funding and stability, which would enable scholars to focus on their activist scholarship without being forced to compromise their intellectual inquiries due to other pressing needs.

The scholar-activists examined in this study do not provide a straightforward answer to the dilemma of linking scholarship and activism harmoniously. Perhaps, the pursuit of "harmony" is not the ultimate goal, as these reflexive accounts show tensions, and contradictions are an inherent part of the scholar-activism experience. Instead, the pursuit of scholar-activism may lie in challenging the constructed boundaries between science and society in order to contest the hierarchy of knowledge, the power dynamics generated by these boundaries, and the problems that arise from such hierarchical structures and constructed boundaries, in order to make scholarship matter.

Appendix 1

The literature included in this review.

Authors	Title	Field	Cause	Geographical focus
Hales et al. (2018)	Academic activism in tourism studies: Critical narratives from four researchers	Tourism studies	Various	Multiple
de Beer (2015)	The university, the city and the clown: A theological essay on solidarity, mutuality and prophecy	Theology	Poverty and injustice	South Africa
Hern (2016)	Navigating the borderland of scholar activism: Narrative practice as applied sociology in the movement for single payer health care reform	Sociology	Single payer health care reform	US
Cox (2015)	Scholarship and activism: A social movements perspective	Sociology	Social movements	UK
Santos (2012)	Disclosed and willing: Towards a queer public sociology	Sociology	LGBTQ	Portugal
Deschner et al. (2020)	Prefiguring a feminist academia: A multi-vocal autoethnography on the creation of a feminist space in a neoliberal university	Multidisciplinary	Epistemic justice	UK/US

(continued)

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Authors	Title	Field	Cause	Geographical focus
Quaye et al. (2017)	Blending scholar and activist identities: Establishing the need for scholar activism	Multidisciplinary	Black faculty	US
Richter et al. (2020)	Tempered radicalism and intersectionality: Scholar-activism in the neoliberal university	Multidisciplinary	Neoliberalism in HEI	Multiple
Contu (2018)	'… The point is to change it'—Yes, but in what direction and how? Intellectual activism as a way of 'walking the talk' of critical work in business schools	Management and organization studies	Social justice	Worldwide
Contu (2020)	Answering the crisis with intellectual activism: Making a difference as business schools scholars	Management and organization studies	Business schools	Worldwide
Grosser (2021)	Gender, business and human rights: Academic activism as critical engagement in neoliberal times	Management and organization studies	Social justice	Australia
Routledge and Derickson (2015)	Situated solidarities and the practice of scholar-activism	Geography	Environmental movements	UK
Croog et al. (2018)	Real world food justice and the enigma of the scholar-activist label: A reflection on research values	Geography	Food justice	US
Mason (2013)	Academics and social movements: Knowing our place, making our space	Geography	Environmental movements	Europe
Maxey (1999)	Beyond boundaries? Activism, academia, reflexivity and research	Geography	Land ownership	UK
Derickson and Routledge (2015)	Resourcing scholar-activism: Collaboration, transformation, and the production of knowledge	Geography	Environment justice-resilience	Worldwide

(continued)

(continued)

Authors	Title	Field	Cause	Geographical focus
Reynolds et al. (2020)	Envisioning radical food geographies: Shared learning and praxis through the food justice scholar-activist/ activist-scholar community of practice	Geography	Food justice	US
Chatterton et al. (2010)	Beyond scholar activism: Making strategic interventions inside and outside the neoliberal university	Geography	Autonomous housing	UK
Askins (2009)	'That's just what I do': Placing emotion in academic activism	Geography	Migration and asylum	UK
Canaan (2010)	Sand in the machine: Encouraging academic activism with sociology HE students today	Education studies	Social justice	UK/US
Grey (2013)	Activist academics: What future?	Education studies	Changing academia	New Zealand
Buras (2021)	Education research and critical race praxis: Fieldnotes on "making it matter" in New Orleans	Education studies	Social justice	North America
Apple (2016)	Challenging the epistemological fog: The roles of the scholar/ activist in education	Education studies	Social justice in education	Worldwide
Pimlott (2017)	Cultural production in the classroom	Communication	Classroom engagement	Canada
McCann (2010)	Borders of engagement: Rethinking scholarship, activism, and the academy	Communication	Academia	US

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How Promotion Guidelines Reflect Swedish Higher Education Institutions' Societal Collaboration Strategies

Eugenia Perez Vico, Erik Joelsson, Pauline Mattsson, and Gustaf Nelhans

Introduction

Over the past two decades, there have been rising expectations on higher education institutions (HEIs) to matter in society by collaborating with different actors to generate societal impact (Benneworth et al., 2015; Trencher et al., 2014). These expectations stem from the prominent premise that HEIs should provide returns on public investments by playing a pivotal role in the knowledge-based economy, contributing to economic growth, welfare (Romer, 1990), and lately, sustainable development (Trencher et al., 2014). In light of these expectations, HEIs have introduced strategies that express organizational goals and intentions and provide guidance related to societal collaboration (Jongbloed et al., 2008). Although similarities exist, these strategies vary among HEIs regarding targeted activities, collaborative partners, and geographic coverage (Kitagawa et al., 2016). As such, the strategies signal the various ways in which universities aim to matter through collaboration.

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Since HEIs are professionalized organizations (Mintzberg, 1992), their ability to realize strategies depends on the willingness of individuals to act in line with the strategic intentions on an organizational level. In the HEI context, decisions on how and when to collaborate with external parties lie with individual researchers and teachers (Perkmann et al., 2013) since collaboration is established and conducted on a personal rather than a strategic level (Broström et al., 2019). However, despite strategic intentions, societal collaboration experiences are frequently undervalued among academics (Alperin et al., 2019; D'Este & Perkmann, 2011). Consequently, strategic intentions related to societal collaboration may be down-prioritized when strategies are to be translated into action on an operational level.

The capacity of HEI management to realize strategies depends on their ability to encourage and influence faculty by creating a supportive culture through socialization and by assessing the strength of their capacity (Thoenig & Paradeise, 2018). One way of steering on the individual level is through recruiting, promoting, and appointing academic staff (Alperin et al., 2019; Enders, 2001). Consequently, the realization of a strategy will depend on the alignment between expressed strategic intentions and promotion guidelines. While research has explored how the societal collaboration task is promoted through creating a supportive culture and socialization (e.g., Benneworth et al., 2015; Huyghe & Knockaert, 2015), less attention has been given to understanding the link between strategic intentions and how individual performances are assessed.

Against the above, we explore how the visions of societal collaboration put forward in HEIs' strategies are reflected in promotion assessment criteria. HEIs have guidelines for several different types of recruitment, promotion, and appointment. Given our research purpose, the promotion to docent (also known as a reader, associate professor, and, in the Germanic system, Doctor Habilitatus) stands out among these. In many countries, the criteria for promotion to docent have long been deregulated in higher education statutes, and it is thus up to specific HEIs to shape their standards. Additionally, each faculty within an HEI creates its qualification criteria, which can be highly specific to the discipline (Hammarfelt et al., 2023; Joelssson et al., 2019). This gives HEIs ample room to exercise their strategic intentions. Furthermore, the promotion to docent concerns mid-career academics in the formative stage of their profession and thus plays a vital role as a vehicle for strategic intentions (Enders, 2001). Even though docents frequently move between different institutions and thereby do not necessarily present the priorities of their current institution, promotion can be viewed as a means for retaining individuals by offering tangible career opportunities. According to requirements, the individual's link to the institution should be apparent. Thus it should reflect the university's spirit, including the quest and virtue of making the university matter.

We focus our analysis on Swedish HEIs since this population is relatively diverse and has long been under pressure to develop their strategies and distinct institutional profiles (Geschwind & Broström, 2015). In addition, in recent years, Swedish HEIs have been particularly incentivized to work strategically with their societal collaboration task (Wise et al., 2016). Thus, the Swedish context allows us to explore a diverse range of HEIs and paves the way for a rich understanding of the phenomenon in focus:

how societal collaboration strategies are implemented and assessed in recruiting mid-career academics.

Next, we offer an overview of the literature that makes up the background of this study. We then describe the empirical context for the study, followed by descriptions of the methods applied. After that, we present the analysis and provide a concluding discussion and implications of the study.

HEI Strategies and Promotion Guidelines Related to Societal Collaboration

This section reviews the literature on the strategy and governance of HEIs related to societal collaboration and accounts for conceptualizations that offer a structure for our analysis.

Societal Collaboration Strategies and Promotion

HEI strategies can be described as how HEIs define their position, given contextual conditions, and direct their organizational processes (Fumasoli & Lepori, 2011). However, strategies are not a given means of governance in academia, mainly for two reasons. First, strategies may be more or less formally declared and, while frequently adhered to by top-level management, they are seldom wholly endorsed by faculty (Thoenig & Paradeise, 2018). This reflects the nature of HEIs as professional bureaucracies with highly trained professionals demanding control of their work (Ferlie et al., 2009). They try to resist being steered by HEI management as their legitimation lies more with scientific peers than organizational identities (Paradeise et al., 2009). Second, a strategy is set at a certain point in time, reflecting particular priorities and intentions. However, these priorities change over time through the internal dynamics that follow implementation (Thoenig & Paradeise, 2018).

In recent years, policymakers have introduced initiatives targeting the strategic organization of HEIs related to societal collaboration, often advocating for ideal types based on top American HEIs. Examples include the entrepreneurial university (Clark, 1998), the triple-helix model (Etzkowitz & Leydesdorff, 2000), and the engaged university (Watson et al., 2011). Despite these ideals, HEIs differ in their understanding of and organization for societal collaboration and impact. One reason is that diverse higher education policy regimes hold varying expectations for HEIs to foster economic progress, democracy, innovation, and global competitiveness (Benneworth, 2014). HEI responses are also conditioned by regional characteristics, access to resources, research intensity, student population, the composition of disciplines (Jongbloed et al., 2008; Pinheiro et al., 2015), historical roots (Rose et al., 2013), and stakeholder composition (de la Torre et al., 2019). Consequently,

HEIs create heterogeneous societal collaboration approaches that combine answers to external isomorphic forces and diverse local institutional contexts (Kitagawa et al., 2016).

Despite the focus of policymakers and organizational agenda-setting on HEI management, societal collaboration is mainly realized by individual researchers and teachers (Perkmann et al., 2013), which emphasizes the importance of incentives. While extant research on societal collaboration has explored the role of institutional determinants (i.e., policy and national systems), organizational peer effects (i.e., support systems), and individual demographic characteristics (i.e., age, sex, productivity), less attention has been given to formal internal organizational-level incentives (Jonsson et al., 2015; Perkmann et al., 2013, 2021). One of these incentives concerns promotion guidelines for mid-career accreditation, referred to as docent, reader, or associate professor, that is applied in European countries such as Germany (Enders, 2001), Italy (Abramo & D'Angelo, 2015), Spain (Sanz-Menéndez & Cruz-Castro, 2019), Finland (Pietilä & Pinheiro, 2021) and France (Musselin, 2004), as well as in non-European countries (Allen, 1988; Rice et al., 2020). In contrast to competitive selection processes for a position, or non-competitive elimination processes in a tenure track, this accreditation is a promotion to a title where candidates do not have to leave their position if they fail (Musselin, 2004). While there are many similarities, such as the focus on research qualifications that correspond to an additional doctoral dissertation, there are variations between countries. For instance, the French system focuses on thematic continuity and depth, and the German system values thematic mobility and coherence (Musselin, 2004). To emphasize the distinction that docentship is not an employment in Sweden, we use the term *docent* in the paper instead of the more internationally recognized "reader" or "associate professor."

Since docentship accreditation guidelines signal how faculty should prioritize their efforts (Alperin et al., 2019; Enders, 2001), they influence the competence and activities of academia and the societal role of HEIs. Yet, to our knowledge, no studies have captured how societal collaboration is defined and assessed in these procedures and how these attempts to shape faculty actions align with strategic intentions.

Aspects of Societal Collaboration

Research on the societal collaboration of HEIs is highly diverse regarding definitions of the phenomenon, theoretical underpinnings, and applied methods. Below we provide an overview of a selection of this research according to four aspects that guided us in our analysis of how strategies and promotion assessment criteria vary.

The first aspect concerns stakeholders, including private actors, public organizations such as agencies and hospitals, and civic organizations and NGOs (D'Este et al., 2018). While research has focused chiefly on the effects of academics' collaboration with industry (see Perkmann et al., 2013, 2021), studies have begun to include more types of stakeholders.

The second aspect concerns interaction modes that relate to different aspects of academic work, such as research (e.g., collaborative, contract and action research, shared facilities and research infrastructure, mobility of persons and shared employments), education (e.g., contract and professional education, societal alignment of educative programs, student placements and case studies, external teaching and supervision), knowledge commercialization (e.g., development and diffusion of innovations, venture creation), and outreach (providing advice and expertise, participation in public events and popularization of research) (Perez Vico, 2018).

The third aspect concerns the extent to which societal collaboration is considered reciprocal in terms of emphasis on mutual knowledge creation and interactive learning. While reciprocity is key in studies on research collaboration and university-industry interaction (e.g., Bozeman & Boardman, 2014; Perkmann & Walsh, 2007), this is less obvious in third mission and academic entrepreneurship studies that more often focus on the one-way transfer and application of university capabilities outside academia (e.g., Bercovitz & Feldman, 2006; Molas-Gallart et al., 2002). For example, a researcher may conduct a third mission activity, such as writing a popular science book, with a negligibly small degree of reciprocal knowledge sharing and societal interaction. However, in practice, reciprocity is significant for successful collaboration activities (Molas-Gallart & Tang, 2011; Spaapen & Van Drooge, 2011).

The fourth aspect concerns whether collaboration is integrated into academic scholarship or whether it is seen as something additional. Many studies view collaboration partly as a task that is additional to traditional ones (e.g., Abreu & Grinevich, 2013; Bozeman, 2000) or even as, per definition, one that includes activities not covered by the core HEI tasks (e.g., Breznitz & Feldman, 2012; Trencher et al., 2014). In fact, many European HEIs have decoupled teaching and research activities from third mission tasks (where societal collaboration is usually included), which means that societal collaboration is considered peripheral to core activities (Benner & Sörlin, 2015; Pinheiro et al., 2015). Other studies have taken a transversal view of societal collaboration that underlines the embeddedness in other HEI tasks (e.g., Spaapen & Van Drooge, 2011).

As is apparent, the type of stakeholders and modes, as well as the extent of reciprocity and integration, make up different dimensions for capturing and distinguishing various perspectives on how universities can matter through societal collaboration. Thus, these aspects offer a perspective for our analysis of how strategies and promotion assessment criteria vary.

Empirical Context—Swedish HEIs, Societal Collaboration, and the Role of Docentship

At the point of data collection, the Swedish HEI sector included six Broad-based (comprehensive) established universities, six Specialized (often one-faculty) universities, five New universities that received university status after 1999, 15 University

colleges that have not received the full status of "university," and four Art, Design and Music Academies (Hansson et al., 2019). Broad comprehensive universities generally have a more substantial research focus than younger universities and university colleges. Recent developments in the Swedish sector include an increased proportion of competitive funding, decreased formal collegial influence as appointed (not elected) academic managers gain power, and strengthened organizational autonomy (Pinheiro et al., 2014).

Swedish HEIs have a strong tradition of societal collaboration since most were founded in response to practical local needs (Benner & Sörlin, 2015). Thus, collaboration has historically been rich, and early examples included extensive mobility of professionals, provision of expert advice, and collaboration in education. While collaborating with society was seen early on as integrated with the education and research activities in Swedish HEIs, it was enacted unsystematically, mainly driven by individuals and groups. Around the 1970s, a significant decoupling of the task commenced in Swedish HEIs (Perez Vico et al., 2017). In parallel, an enduring political will to increase HEIs' societal collaboration grew out of a perception that levels of collaboration were low (Benner & Sörlin, 2015). Consequently, policy initiatives addressing this perceived deficiency were launched. This included funding programs for university-industry interaction, building intermediary structures such as technology parks, incubators, and tech transfer offices, and introducing societal collaboration as a "third task" in the higher education ordinance in 1997 (Benner & Sörlin, 2015). However, HEIs have been unable (or unwilling) to integrate societal collaboration with core activities (Lidhard & Petrusson, 2012).

In 2013, the Swedish government assigned Vinnova (the Swedish Innovation Agency) the task of developing a framework for assessing the performance and quality of HEIs' interaction with the surrounding society (Wise et al., 2016). In response, 26 HEIs presented their strategic intentions, which comprise part of this study's empirical material. In light of this development, societal collaboration began to find its way into guidelines for assessment for appointments and promotions (Bergstrand et al., 2021). In 2019, the Association of Swedish Higher Education Institutions highlighted societal collaboration merit assessment as a strategic instrument for management (SUHF, 2019). However, there are clear signs of uncertainty about how collaboration should be defined and assessed in these procedures, and indications that societal collaboration skills are overshadowed by merits related to research, teaching, and leadership (Bergstrand et al., 2021; Hammarfelt, 2021). While a group of Swedish HEIs recently mapped societal collaboration merit assessments (Bergstrand et al., 2021), docentship assessment is not specifically addressed.

In Sweden, "docent" is an unregulated academic title mandated by specific faculties that decide upon guidelines for application, assessment, and approval (UKÄ, 2022). Thus, there are varying expectations for the approval requirements and duties of a docent, with some faculties requiring a research output equivalent to another PhD dissertation and others requiring at least twice that much, and the level and volume of pedagogical merits expected can also vary. The docentship is important for the holder's career progression and strengthens the reputation of the granting institution. The title is frequently required for involvement in PhD training activities

such as principal supervisor, external reviewer, and examining committee member, and may be required for appointments as an external expert and positions such as associate or full professor (UKÄ, 2022).

Methods and Material

This study involves a document analysis of two sets of material: the societal collaboration strategies of 25 Swedish HEIs and 57 guidelines from 28 Swedish HEIs for the application and assessment of docentship. An overview of the data is offered in Table 1. Not all Swedish HEIs are represented in our data. University colleges of fine, applied, and performing arts do not use the docentship (UKÄ, 2022) and are thus excluded. Further, not all HEIs presented strategies at the time of data collection, and not all HEIs' guidelines were available. However, our empirics include data from a significant share of the 32 Swedish HEIs with over 150 employees in 2021. These data sets were coded and examined separately and conjointly, and the analysis was guided by our aim to explore how societal collaboration intentions in strategies are reflected in promotion assessment criteria.

The societal collaboration strategies were submitted as part of a tentative assessment exercise conducted by Vinnova, where 26 out of 30 Swedish HEIs participated. One of these was excluded from our data since it was a university college of fine, applied, and performing arts. The remaining 25 documents present the HEIs' visions and intentions to strengthen and develop societal collaboration and describe their implementation work, and they give a contextual description of the HEIs' roles and conditions for collaboration. The documents included between 12 and 21 pages of text. Of the 25 HEIs, 5 were broad comprehensive universities, 5 were specialized universities, 6 were new universities, and 9 were university colleges. The categorization of university status follows the division at the time of collection, which means that Mälardalen University, which has since received university status, was categorized as a university college. The strategies were coded using NVivo in a coding approach. First, we conducted open coding according to the topic of the text in all retrieved documents. Second, we used the four aspects of societal collaboration outlined in the literature review to guide our construction of second-order themes for the first group of codes and discussed these to reach a consensus as regards the aggregation and naming of codes.

The docentship guidelines were collected in June 2021. The inclusion criteria were that the HEI is a Swedish university or university college that can award doctorates, thus conducting independent research. We retrieved 57 guidelines, of which 32 pertain to broad comprehensive universities, 5 to specialized universities, 8 to new universities, and 12 to university colleges. Two HEIs—Jönköping University and Stockholm School of Economics—did not have docentship guidelines available at the time of data collection; either they could not provide such a document, or they failed to answer our request. The docentship guidelines were examined for the inclusion of criteria related to societal collaboration merits in academia, such

Table 1 Strategy documents and the number of guidelines that mention social collaboration per institution

#	HEI Category	HEI	HEI, full name	Faculty guidelines	Strategy present	Guidelines mentioning collaboration
1	Broad, established universities	GU	University of Gothenburg	EC, HU, JU, AR, ME, NA, SA, IT	1	7 of 8
2	Broad, established universities	LIU	Linköping University	ALL, ME, TE	1	2 of 3
3	Broad, established universities	LU	Lund University	EC, HU, JU, AR, ME, NA, SA, TE	0	5 of 8
4	Broad, established universities	SU	Stockholm University	HU, JU, NA, SA	1	4 of 4
5	Broad, established universities	UMU	Umeå University	HU, ME, NA/TE, SA	1	3 of 4
6	Broad, established universities	UU	Uppsala University	HU, JU, ME, NA/TE, SA	1	2 of 5
7	Specialized universities	CTH	Chalmers University of Technology	TE	1	0 of 1
8	Specialized universities	KI	Karolinska Institutet	ME	1	1 of 1
9	Specialized universities	KTH	KTH Royal Institute of Technology	TE	1	0 of 1
10	Specialized universities	LTU	Luleå University of Technology	TE	1	1 of 1
11	Specialized universities	SLU	Swedish University of Agricultural Sciences	ALL	1	1 of 1
12	Specialized universities	SSE	Stockholm School of Economics	–	0	–
13	New universities	KAU	Karlstad University	HU/SA	1	0 of 1
14	New universities	LN	Linnaeus University	ALL	1	0 of 1
15	New universities	MA	Malmö University	ALL	1	1 of 1

(continued)

Table 1 (continued)

#	HEI Category	HEI	HEI, full name	Faculty guidelines	Strategy present	Guidelines mentioning collaboration
16	New universities	MI	Mid Sweden University	HU/SA, NA/TE	1	2 of 2
17	New universities	ÖU	Örebro University	HU/SA, ME, NA/TE	1	1 of 3
18	University colleges	BTH	Blekinge Institute of Technology	ALL	1	0 of 1
19	University colleges	FHS	Swedish Defence University	ALL	0	1 of 1
20	University colleges	GIH	The Swedish School of Sport and Health Sciences	ALL	0	1 of 1
21	University colleges	HB	University of Borås	ALL	1	0 of 1
22	University colleges	HD	Dalarna University	ALL	1	1 of 1
23	University colleges	HH	Halmstad University	ALL	1	1 of 1
24	University colleges	HIG	University of Gävle	ALL	1	1 of 1
25	University colleges	HIS	University of Skövde	ALL	0	1 of 1
26	University colleges	HKR	Kristianstad University	ALL	1	1 of 1
27	University colleges	HV	University West	ALL	1	1 of 1
28	University colleges	MDH	Mälardalen University	ALL	1	1 of 1
29	University colleges	SH	Södertörn University	ALL	1	0 of 1
30	University colleges	HJ	Jönköping University	–	1	–
Total					25	39 of 57

as references to collaboration with the surrounding society, third mission activities, popularization, innovation, etc. The collection process included visiting the web page of each HEI to download the guidelines, accompanying material such as instructions for applicants and assessing experts, forms, and instructions for generating a CV or a merit portfolio. In some instances, other documents, such as the general appointment procedure of the HEI, contain information about the appointment procedure and are referred to in the guidelines. The inclusion criteria for additional documents were that if the policy refers to an external document (e.g., a merit portfolio), we identified

this document and used the part referring to the docent application in the analysis. Guidelines were issued in very different periods. The latest guideline was published in the same month (June 2021) that the data were collected, while the earliest was over 12 years old. With a few exceptions, the guidelines are written in Swedish.

Different Types of Societal Collaboration

While the aspects of societal collaboration relating to HEI *strategies* overlap to a considerable extent, we have identified three types of involvement in societal collaboration in the *guidelines*. These include the strength of collaboration involvement, that is, the *degree* of societal collaboration involvement requested in the guideline, ranging from merely mentioning it and mentioning it with examples to including criteria for what is considered successful collaboration. These are mutually exclusive. Furthermore, we assessed the *aspect* of the societal collaboration identified in the guideline, ranging from "research information" (one way), "collaboration having a societal impact" (two-way), to the societal collaboration entity being "integrated" in society leading to utilization and commercialization. Lastly, we identified that societal collaboration could be attributed to merits of one or more different *types* of collaboration. We classified the guidelines into scientific, pedagogical, own merit, and other merits (often linked to administrative or leadership skills). The latter two categorizations are not mutually exclusive, and a guideline can include more than one aspect of the collaboration type.

We also divided the guidelines into disciplinary categories. Some HEIs have only one guideline for the entire organization, while others have guidelines according to scientific areas. The broad, established universities were more likely to have one guideline per subject area. For instance, the universities in Lund and Gothenburg each have eight guidelines. Specialized universities are typically focused on specific areas, such as medicine or technology, so they often adhere to one guideline. In contrast, New universities use broader categories such as humanistic/social sciences or natural sciences/technology/economics. Lastly, the university colleges invariably only have one guideline each, regardless of the subject areas present, possibly based on their relatively smaller administrative sizes.

While analyzing disciplinary differences, we observed that differentiating guidelines into distinct subject categories is not straightforward. As a result, for analytical purposes, we have determined three main subject areas and one all-encompassing category covering the whole HEI (ALL). The subject areas are 1) The humanities (HU) and the social sciences (SA) (including education sciences, economics (EC), and law (JU)); 2) the natural sciences (NA), technology (TE), and information technology (IT); and 3) Medical sciences (ME).

The guidelines provided by specialized universities in the medical and technological fields have been classified into separate categories: the medical sciences and natural sciences/technical disciplines. However, the agricultural university (SLU), due to its extensive range of disciplines, has been placed in the all-encompassing

category. The topic of artistic research (AR) has not been addressed explicitly, as only one guideline in that area specifically included statements related to societal collaboration.

When referring to strategies and guidelines, we use the following terminology and abbreviations: document type (STR = strategy, GUI = guideline), abbreviation of the HEI name, and abbreviation of the disciplinary research domain (not applicable for strategies). Thus, a guideline about the social sciences at Umeå University receives the code GUI UMU SA. In some cases, HEIs present joint guidelines. It applies to humanities and social sciences (HU/SA) as well as to natural sciences and technology (NA/TE).

Analysis

We explored how the visions of societal collaboration put forward in strategies are reflected in promotion assessment criteria by comparing the patterns that emerged as we examined the data sets separately and in comparison. We present the findings from these analyses in the following subsections. All quotes have been translated into English by us unless noted otherwise.

Misalignment Between Strategies, Intentions, and Promotion Guidelines

To explore the alignment between strategies and guidelines, we first analyzed the strategies of HEIs. Some weak patterns emerged. First, the broad universities do not mention different actors in their strategies as often as new universities do, nor do they mention as many types of actors. Industry is the actor mentioned the most, except for broader universities, where public sector actors are most cited. Second, concerning the kinds of research activities, broader universities mention less diversity of research activities in their strategies. This university group mainly exemplifies activities such as large, formalized collaboration agreements and mobility as crucial for interaction with societal actors. Together with specialized universities, broad universities emphasize their involvement in technology transfer with activities related to commercialization, entrepreneurship, and patenting. Third, in terms of which type of HEI shows the highest degree of ambition in their strategy, we find that university colleges, such as Dalarna University and Halmstad University, as well as broad comprehensive universities, such as the University of Gothenburg and Uppsala University, and specialized universities, such as Chalmers University of Technology and the Swedish University of Agricultural Sciences, fit into this category. These HEIs often underline that collaboration is an integrated part of their core task (i.e., research and education), providing reciprocal learning. This quote highlights this goal:

> The aim is that the collaborative task should be an integrated and natural part of the educational and research activities. We call it "complete environments." This means that we want to take advantage of and strengthen the capability that our research and education already possess. (STR GU)

Only three HEIs (GU, HH, and SLU) align with expressed strategic intentions and promotion guidelines. One example is the University of Gothenburg, which highlights the importance of collaboration with an emphasis on offering spaces for interaction and networks across various actors and sectors. This university has different guidelines for different subject areas/faculties. Even if there are variations where, for example, the humanities do not mention collaboration, it is clear that the guidelines reflect the university's overall ambition for collaboration. For example:

> Contact activities and information activities in addition to pure teaching are one of the university's tasks. Effort to disseminate research results in [the wider] society is a merit when applying for docentship. (GUI GU NA)

Another HEI that stands out is Halmstad University. Their broad and integrated strategy focuses on industrial and public actors and teaching, commissioned research, and outreach.

> Community development and relevance are cornerstones of the strategy, and at the same time, the risk that a collaboration strategy is not in line with the higher education institution's overall goals is minimized. Even if collaboration has its own value, it is the positive effects from societal relevance in education and research that are achieved through collaboration that are important. (STR HH)

Such high ambitions are also found in the guidelines. See the following quote:

> Leadership and administrative skills concerning research and management of research staff as well as research policy assignments are meritorious. It is also an advantage if the applicant has demonstrated good ability to collaborate with business and/or the public sector, i.e., activities outside the higher education sector, and has contributed to disseminating and creating an understanding of research results. (GUI HU ALL)

At eight HEIs, there is an apparent misalignment between bold visions and intentions and how collaboration is treated in the promotion guidelines. One illustrative example is the specialized Chalmers University. As a technical university focusing on education and research that practitioners can use, there is a long tradition of collaborating with industry through research and education. This is also clearly stated in the strategy. However, collaboration is not mentioned at all in their guidelines. Another example is Karlstad University. Their strategy emphasizes the importance of collaboration and the long tradition of working with various actors, yet collaboration is not mentioned at all in their guidelines.

There are also cases of HEIs with bold strategies where collaboration is only mentioned vaguely in the guidelines. One example is Södertörn University, which describes how they collaborate extensively with public actors and civil society through networking and student internships. In the guidelines, however, collaboration is mentioned very vaguely, more as a subordinate clause in exceptional cases when the applicant is not an employee. The following quote demonstrates this:

> Only when the applicant is not employed at Södertörn University does an assessment by the head of the department need to be submitted [attesting] that the applicant's docentship benefits the university's education, research and collaboration [objectives] and that the applicant should be accepted as a docent at Södertörn University. (GUI SH ALL)

The last example is Dalarna University. Its broad vision statement highlights the importance of shared responsibility with societal actors regarding research and education. Despite the bold strategy, collaboration is only mentioned as a pedagogical merit concerning research communication.

Our analysis also reveals that there are two HEIs (Kristianstad University and Karolinska Institutet) that prioritize the experience of collaborating with different actors in their guidelines, but this ambition is not expressed in their strategies.

Of the 29 HEIs, only six show alignment between the ambitions and perspectives on collaboration as expressed in the strategies and the extent and form in which collaboration is included in the promotion guidelines. Among these six, we find the three previously mentioned HEIs with bold collaboration visions reflected in the promotion assessment criteria: GU, HH, and SLU. In addition, the university colleges of Borås and Gävle also reveal alignments but present strategies that do not stand out as particularly bold. Instead, these two HEIs offer a narrow view of collaboration in their strategies by mainly focusing on commercialization and employment connections. The promotion guidelines also reflect this comparatively modest strategic priority given to collaboration. To be eligible for a docentship at the University of Gävle, it is briefly stated that the applicant should have

> collaborated with the surrounding community to be able to utilize research results. (GUI HIG)

Stockholm University is the last HEI that reveals alignment between strategy and promotion guidelines. They present a rather pronounced strategy in terms of the diversity of forms. Yet, they offer a linear view of collaboration focusing on knowledge dissemination from academia to external actors rather than bilateral mutual learning. This is, however, very well aligned with how their promotion guidelines are formulated:

> To be accepted as a docent, a documented ability for independent research work, pedagogical skills, and documented experience in conveying scientific results to target groups outside the academic world are required. (GUI SU NA)

Our analysis shows that 18 HEIs reveal a misalignment between their strategy's vision for societal collaboration and how collaboration is treated in their promotion guidelines. This includes both HEIs that express higher ambitions in their strategy than those described in the promotion guidelines and vice versa. The misalignment between strategy and promotion guidelines indicates that the strategies are not used as a steering mechanism in the career policies.

Variation Regarding the Role of Societal Collaboration Merits in the Guidelines

Almost all HEIs' strategy documents describe collaboration as an integrated part of research and teaching. The three HEIs that do not explicitly describe collaboration as integrated with research and teaching (KI, LNU, and SU) still present formulations in their strategies that vaguely indicate such a view. However, there appears not to be a consensus on where collaboration qualifications should be reported in the guidelines. Given an integrated perspective, one expected place would be collaboration-related aspects both under educational and research qualifications. However, this is the case in only six guidelines.

In the strategy documents, societal collaboration is mainly described as having integrated scientific and pedagogical value. Here, the social sciences and humanities (including law) at broad comprehensive universities seem to represent this combination to a higher degree along with one specialized university and one university college.

> The societal collaboration task is part of the educational task, and experience can be validated through, for example, popular science lectures and seminars. (GUI GU JU)

> [As pedagogical merit]: The degree of ability and interest in disseminating research results out into society. (GUI SLU ALL)

> [As scientific merit]: The degree of ability to collaborate with industry and other organizations outside the university. (GUI SLU ALL)

Another variation is seen between the type of merit(s) described in the application instructions and the evaluation criteria given to the external referee. For instance, at the humanities faculty at Stockholm University, there are two guidelines—one for the applicant and one for the referee. Societal collaboration is mainly considered a scientific merit in the former, while in the latter, the referee is asked to focus on societal collaboration as a pedagogical merit.

However, many HEIs mention collaboration related either to education or research qualifications. As for education, one example comes from the Faculty of Arts and Sciences at Linköping University, where this merit is also considered to include "administrative efforts":

> The pedagogic qualification also includes administrative efforts such as planning and management of teaching, development of learning materials, supervision, research information, popular science activities, and cooperation with the surrounding society. (GUI LIU ALL)

There were, however, only two HEIs that exclusively mentioned collaboration related to research, namely, the Faculty of Science and Technology at Umeå University in a checklist for the reporting of publications, and the Swedish Defence University:

> In an applicant's production, emphasis is primarily placed on pure scientific works. Qualified investigation reports, research information, and valid popular representations, however,

> also have merit. In addition to their educational value, seminal textbooks can also have an independent scientific value. (GUI FHS ALL)

In some cases, including the example above, when considering societal collaboration as a scientific merit, it is connected to what types of publications are considered meritorious for docentship. The guideline from the Faculty of Science at the University of Gothenburg states "popular science works" under the heading "Complete list of publications." (GUI GU NA).

Another possible procedure for including collaboration qualifications from an integrated perspective would be to mention them with other generic transversal abilities, such as administrative and leadership skills. This often occurs under the heading "Additional merits." This is relatively common—14 examples from 10 HEIs are distributed over all types of disciplinary domains and HEIs. All guidelines from the new universities mentioning societal collaboration pertain to other/administrative merit and not to scientific, pedagogical, or own merits.

In six cases, collaboration was given its own section in the guidelines. For instance, the guideline related to the Faculty of Social Sciences at the University of Gothenburg contains the heading "External contacts and information about research and development work" (GUI GU SA). A more detailed description of where societal collaboration is considered a necessity for eligibility is given by the Swedish School of Sport and Health Sciences.

> To be accepted as a docent, the applicant must have proven experience of collaborating with the surrounding society, have communicated their research, and have worked to ensure that their research results are useful in society. Educational activities are directed to GIH's recipients and the general public. This applies to, e.g., participation in media (newspapers, radio/TV), popular science lectures/seminars/panels, or books/writings/articles. (GUI GIH ALL)

The example above is one of only two HEIs where societal collaboration is exclusively classified as a merit in its own right. The other case is the Faculty of Engineering at Lund University (GUI LU TE). Societal collaboration merits are usually considered in different categories, such as scientific, pedagogical, and administrative/other merits.

This analysis shows that collaboration skills are linked to various aspects of academic competence. However, most HEIs do not reflect an integrated perspective in their promotion guidelines since collaboration abilities are often linked to a particular skill, for example, an "additional or pedagogical skill."

Disciplinary Plurality Among HEI Categories

In addition to the partial integration of social collaboration as a merit in the guidelines, what other characteristics can we attribute to them? In this section, we aim to explore this issue in greater detail by analyzing the collaboration patterns among HEI categories and the disciplinary disparities between guidelines.

HEI Category—Societal Collaboration as "Other Merit" at New Universities

Broad comprehensive universities include societal collaboration as a basis of evaluation in their guidelines, while no clear pattern exists among specialized universities. At all universities, collaboration is predominantly linked to pedagogical skills. This is seen through the various ways collaboration merits are discussed and the degree to which they are used in the guidance. Broad universities highlight only one-way popularization (popular science texts or lectures) to a higher degree than new universities, which more often consider collaboration merits as "other merits." Additionally, they only mention societal collaboration in passing without any examples. Specialized universities are few, so it is impossible to draw any clear conclusions.

Several university colleges are bold in their guidelines and present societal collaboration as an important criterion for evaluating docent merits. Yet, only 3 out of 12 universities that mention collaboration do so explicitly and put forward innovation and deeper interaction with the surrounding society as relevant.

In general, pedagogical merits are highlighted, but many HEIs also bring forward administrative/other societal collaboration as a scientific merit. In contrast, the description of societal collaboration as a separate merit is somewhat rarer (see Table 2).

What stands out most regarding the HEI category and societal collaboration is that new universities exclusively list it as administrative/other merit. These universities ascribe less importance to societal collaboration and seldom specify which aspects of societal collaboration should be assessed. Furthermore, although the sample of specialized universities is small (n=5) and thus the basis for variations is limited, none of these HEIs present societal collaboration as a separate merit. This is a pattern that they share with the new universities.

Regarding the "aspects" of societal collaboration mentioned, they include Aspect 1: "research information" (one way); Aspect 2: "collaboration having a societal

Table 2 Type of collaboration merit per HEI category

HEI category	Scientific (n)	Pedagogical (n)	Own (n)	Administrative/ other (n)	Grand Total (n)
Broad, established universities	8	14	4	5	***31***
Specialized universities	1	4	0	2	***7***
New universities	0	0	0	4	***4***
University colleges	2	4	2	3	***11***
Grand Total	**11**	**22**	**6**	**14**	***53***

Table 3 Collaboration aspect per HEI category

HEI category	Aspect not stated (n)	Aspect 1: research information % (n)	Aspect 2:: societal impact % (n)	Aspect 3: fully integrated % (n)	Total (n)
Broad, established universities	0%	72% (21)	24% (7)	3% (1)	***29***
Specialized universities	0%	60% (3)	20% (1)	20% (1)	***5***
New universities	75% (3)	25% (1)	0%	0%	***5***
University colleges	7% (1)	43% (6)	29% (4)	21% (3)	***14***
Grand Total	**8% (4)**	**60% (31)**	**23% (12)**	**10% (5)**	***52***

impact" (two-way); and Aspect 3: "fully integrated" (leading to utilization and commercialization) (Table 3). University college guidelines often emphasize collaborative aspects which encompass both the utilization and integration of skills aspects of collaboration. This evaluation process includes a two-way interaction between the applicant and society. New universities again stand out by only mentioning the aspect of collaboration in one instance.

Disciplinary View—Variation in Degrees and Types of Societal Collaboration

When comparing disciplinary differences, there is notable variation in the extent of societal collaboration, with specific disciplines discerning distinct patterns. Moreover, the types of merits that are valued also demonstrate wide-ranging variations across disciplines. In the humanities, collaboration with the surrounding society, especially popular publishing, is frequently mentioned as an add-on (such as "in addition to," "as well as," "also") to the applicants' stated skills. In contrast, the social sciences have more elaborate evaluation criteria, often with a higher degree of involvement, mentioning which areas of the surrounding society and what types of involvement (both one-way and two-way activities) are included. In these areas, societal collaboration is mentioned as a scientific and/or pedagogical merit, emphasizing pedagogical merit in the humanities and scientific merit in the social sciences. In law, with three guideline documents, there is an emphasis on pedagogical merits. The sole economics guideline that addresses collaboration only mentions it in an unspecified manner within a checklist.

The degree to which societal collaboration is recognized within the natural sciences/technical areas and the medical faculties varies, from not being considered at all to being given rather elaborate attention. In one medical sciences guideline and

one technology guideline, specific criteria for what is regarded as a more elaborate collaboration are found. Furthermore, pedagogical and administrative/other merits are mainly emphasized in all the guidelines in these subject areas. Notably, societal collaboration is not considered a scientific merit in any of the medical guidelines and only in one of the natural sciences/technical guidelines.

In the guidelines encompassing the entire HEI ("ALL"), particularly university colleges, a diverse range of merit types is identified, with a notable emphasis on pedagogical merits. This aligns with the earlier observation that there is a shared emphasis on pedagogical merits for fostering societal collaboration across all disciplinary domains. At a specific HEI, the guidelines incorporate a criterion that assesses the quality of collaboration, establishing a scale to determine what is deemed "good" quality. The instructions provided to referees explicitly mention this criterion:

> Experience of collaboration with the surrounding society and/or other HEIs about research/ pedagogical/artistic/ or "other" skills" […] "is to be assessed on a 5-grade scale from 0= insufficient skill, 3=good skill [and] 5=excellent skill. The assessment must be commented on. (GUI HKR ALL)

Few HEIs Meet Explicit Intentions in the Strategy to Work with Collaboration in Merit Processes

Almost half of the HEIs (12) mention explicitly in the collaboration strategy that they intend to work with collaboration connected to academic merit. However, only four HEIs realize these intentions by clearly including collaboration features in their guidelines for docentship. Among these, the universities of Gothenburg, Halmstad, and Agricultural Sciences express well-developed collaboration visions and reflect upon these in the promotion assessment criteria. Stockholm University, the fourth HEI in this group, mentions that collaboration is considered when merit is awarded. This intention is fulfilled as collaboration is mentioned in the guidelines for all faculties at this broad comprehensive university.

Most of the HEIs (6) that mention collaboration related to academic merit in their strategies only briefly note collaboration in the promotion guidelines or reveal significant variation across guidelines for specific disciplines. One example is Dalarna University, which mentions research information as part of pedagogical qualifications:

> [I]t would be also be [sic] of merit for the applicant to have authored teaching materials or research information. (GUI HD ALL) (original in English)

Another example is Linköping University, which clearly states that collaboration should be merited. Three of the faculties at the university do mention collaboration connected to pedagogical merits, for example:

> Activities whereby scientific results have been made available to the wider public, the business sector, or other activities in addition to universities and colleges. (GUI LIU NA/ TE)

However, collaboration is not mentioned at all in the guidelines of the faculty of medicine at this university.

As for the remaining two universities, Karlstad and Uppsala, the strategic intentions are relatively weak. In the case of Karlstad University, there is no indication of collaboration-related features in the guidelines, although the strategy clearly states that collaboration is considered for merit. Uppsala University's strategy explicitly highlights that collaboration is connected to academic merit. However, this is not reflected in the guidelines, which do not mention collaboration at all. Societal collaboration is only mentioned briefly in the guidelines for the humanities faculty and as part of the pedagogical qualifications for the law faculty.

Concluding Discussion

In this study, we explored the alignment between the expressed intention of HEIs to matter and the assessment of individuals to matter. We approached this aim by comparing the societal collaboration strategies of the HEIs and the guidance for merits regarding docentship. Our analysis showed that strategies' visions of societal collaboration were rarely reflected in promotion guidelines. There was significant variation regarding how the guidelines dealt with collaboration merits. Only six of the 29 HEIs in our study showed alignment between the ambitions and perspectives on collaboration as expressed in the strategies and the extent and form in which collaboration was included in the guidelines. Although a great majority of the HEIs expressed bold strategies, only three matched these expressed ambitions with guidelines that reflected that ambition in terms of width and depth of perspectives on collaboration with criteria for what constitutes good collaboration.

The relatively infrequent acknowledgment of collaboration merits in guidelines and the misalignment of the strategies we reveal in this study may be attributed to various tendencies in the higher education system that the literature highlights. First, our results may be a consequence of the fact that the intentions in the strategies have been translated, interpreted, and negotiated by various individuals in different contexts and from different scientific disciplines whose priorities may differ from those set out in the strategies. For example, this may include the negotiation that takes place when the diverse institutional and collegial value systems are to be united in the guidelines. Indeed, despite existing notions that a strategy sets the organization's direction, the direction and strategic intent of an HEI change during the internal implementation process (Thoenig & Paradeise, 2018). Our results may also be a consequence of the significant decoupling between the task of collaboration that is chiefly assigned to administrative functions and the traditional duties of teaching and research that are more the direct concern of faculty (Perez Vico et al., 2017). Nonetheless, our study shows that societal collaboration is deprioritized in the guidelines compared to the strategies. It thus supports previous observations in Sweden indicating that collaboration is generally overshadowed by scientific and pedagogical skills in the criteria for employment and promotion (Hammarfelt, 2021; UKÄ, 2022),

and previous research from other geographical contexts showing that various actors within HEIs overlook collaboration on the operational level (Alperin et al., 2019; D'Este & Perkmann, 2011). Also, the infrequent acknowledgment of collaboration merits might be due to the perspective that the docentship should primarily reflect scientific merit, a widespread perspective among European universities (Musselin, 2004). However, this perspective contradicts the widely held view in Swedish HEIs that collaboration is an integral part of research activities. Hence, collaboration should be expected to be acknowledged even with a research-focused perspective on the docentship.

While these results can be seen as a sign that HEI management has failed to implement its strategic intentions, the governing function of university strategies is ambiguous (Thoenig & Paradeise, 2018). The patterns we uncover in this study are thus not necessarily unique to collaboration, nor do they essentially mean that collaboration is deficient. Drawing such conclusions would require further research.

Further, while significant variation exists in how collaboration merits are considered and in the degree to which they are employed in the guidelines, some patterns still emerge. Comprehensive and specialized universities emphasize the importance of societal collaboration in their guidelines by incorporating it as a basis for evaluation in various ways. Similarly, university colleges frequently highlight collaboration activities' significance in their guidelines as essential criteria for evaluating docent merits. In contrast, new universities tend to consider collaboration merits to a lesser extent; when they do, they more often see them as merits detached from research and education. This result may be a sign that newer universities in Sweden have a greater need to assert their research excellence. In contrast, university colleges have focused more on collaboration, and broad comprehensive universities can focus more on collaboration based on their more proven research excellence (Benner & Sörlin, 2015). This, however, needs to be further empirically investigated.

Moreover, we detected some disciplinary differences in how collaboration merits are considered. The humanities, social sciences, and law are more oriented toward everyday life. Therefore, it is not surprising that greater emphasis is placed on collaboration or third mission activities as scientific and pedagogical merits in our results. Their mission is also considered to be that of "public intellectuals" and thus also to have intrinsic (own) value. We also note that there are guidelines in the medical and technological disciplines that include criteria for what is considered a more elaborate collaboration. This could reflect that the nature of the knowledge in these disciplinary groups is more hinged on quantities (Becher, 1994), which might be echoed in the corresponding merit system in those fields. In these disciplines, societal collaboration is rarely considered a scientific merit. However, no disciplinary research domain stands out as particularly bold regarding promotion guidelines related to collaboration, nor as particularly aligned with their strategy.

Additionally, although nearly all HEIs emphasize collaboration as an integral component of their research and teaching strategies, we observed substantial variation in the specific sections within the guidelines that address collaboration. Certain HEIs incorporate collaboration criteria within education and research qualifications, while others include it in neither. Furthermore, some HEIs have a dedicated section for

collaboration in their guidelines, while others may group it with generic transversal abilities. This ambiguity reflects previous research suggesting that some tasks can be integrated and others cannot (Reymert & Thune, 2023).

This diversity may also indicate experimentation since collaboration merits are a relatively new feature in the promotion and appointment criteria in general, and no consensus on standardized guidance has yet been reached (Bergstrand et al., 2021). It also echoes previous research showing that HEIs have different understandings of societal collaboration shaped by local policies, regional characteristics, resources, institutional setups, and various stakeholders (de la Torre et al., 2019; Kitagawa et al., 2016; Rose et al., 2013). Since HEIs have been described as slow-moving (Gornitzka, 1999), we can expect that it will take considerable time during the assessment process, potentially resulting in collaboration skills being overshadowed by other aspects of academic qualifications that are accorded more substantial and tangible prominence in the guidelines. If HEIs are serious about their intentions to make collaboration a stronger and integrated part of HEIs and the academic task, considerable work remains to be done in determining how best to capture and assess collaboration merits. Such actions will better equip HEIs to meet society's increasing expectations to generate societal impact and to matter in the development of a more knowledge-based society and sustainable future.

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Will the Center Hold? What Research Centers Do to Universities and to Societal Challenges

Mats Benner and Anders Hylmö

Introduction: Centers and Universities

In this chapter, we analyze one specific aspect of how universities engage with societal challenges: through research centers. Centers represent variation and focus; they channel external engagement, and they work at the intersection of different interests, for instance, those of different disciplines and organizations. The research centers that we have studied for this contribution also represent external funding of universities, which brings another dimension to the activities of centers, namely, their role in attracting funding and providing outcomes within a given time frame. Thus, centers serve as one way in which universities articulate societal processes, marked by distinct, time-limited, concentrated efforts together with partners outside academia. How well, then, do centers function in relation to this ambition?

Universities are complex organizations operating with multiple goals and means in parallel. In their activities, universities combine the traditional organizational structure of faculties and departments with research centers and other ad hoc entities. While faculties and departments are easily distinguished and offer historical continuity—capturing defined areas such as medicine and the humanities, pathology, and history, and each one typically representing traditional disciplines or broad research fields (Hammarfelt, 2020; Hylmö, 2018)—centers are more fluid and multifaceted. Some may comprise just a few scholars with a delimited common interest—Dutch history, for example—while others may be the size of a department, or larger, in areas such as migration or nanoscience. Many are funded externally, supported by

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large-scale funding or endowments to meet societal expectations, whereas others are of internal descent, reflecting initiatives and engagements from within the university to diversify activities and focus on novel topics. Some are virtual—"centers without walls", with no common physical space—while others will have their own facilities. What centers have in common, irrespective of scale and scope, is timing. They are time-limited and therefore reflect a delimited and delineated mission. Centers, in their enormous variety, thus perform a transversal role in universities by adding to the existing organization an element of specific focus and a specific time limit. In addition to timing, they add focus by showcasing ambition around specific issues rather than disciplinary boundaries. They may also be part of the bridging between universities and the external world and spearhead alignment with forces beyond the university. They span disciplinary boundaries and engage with external funders and stakeholders, and they direct activities into specific avenues such as academic excellence, industrial alignment, or particular societal challenges. In all of these aspects, they widen the university and open it up to forces and ambitions that the regular organization purportedly does not produce in itself. The opening of the traditional university organization—both internally to break up disciplinary specialization and externally to foster collaboration with societal actors—has also been one of the common, overarching goals of the wave of center funding witnessed in various research systems during at least the last two decades (Aksnes et al., 2012; Hylmö, 2019; OECD, 2014).

But what do centers do? How do they affect how universities operate and how knowledge is created and disseminated? Are some centers more successful than others in their mission to affect universities, and, if so, why?

These are the issues that this contribution aims to illuminate by means of an analysis of a center program run in Swedish universities. The center program was a 10-year scheme to develop centers that fostered excellence in both research and innovation (VINN Excellence Centers) run by the Swedish Innovation Agency, Vinnova, between 2007 and 2016. The program funded 16 centers with annual support from Vinnova at 7 million Swedish crowns (around 600.000 Euros), with similar financial commitments from universities and partners, respectively. The aim of the program was to form internationally competitive centers with networks for needs-driven (Vinnova's own term) and multidisciplinary research. In addition, a related scheme with similar aims (Berzelii centers) was included in the study. This initiative was launched by the Swedish government in the 2005 research policy bill to stimulate the development of centers with strong scientific profiles, large industrial networks, and innovation potential—with a stronger focus on research quality than Vinn Excellence but with a similar orientation to corporate partnerships. Funding of the four centers in the Berzelii center program was larger than for Vinn Excellence, ranging from 7 to 30 million SEK annually during its 10 years of existence, but the share of partner funding was lower, ranging from 1 to 4 million SEK annually.

In this contribution, we therefore focus on centers that have been instigated by research funders to perform and profile specific functions of a university, or a conglomerate of universities, namely, to stimulate scientific excellence and societal value through new forms of collaboration. We look particularly into centers that have

been established to foster specific functions as models of engagement, looking at how they have been set up in relation to other parts of the university and what types of engagement and activities they foster.

What is a Center?

Analytically, we start out with the assumption that centers are intended to inject variation into university operations. Centers are formed around notions of efficacy and transformation of university operations, and specific procedures for accounting for their activities. They are structured around models of recruitment into and out of them. They are managed and given specific directions. They are informed by external influence through evaluations, contacts with funders and patrons, and advisory boards. They thus operate at the intersection of different interests and inject variation and differentiation into the matrix of activities in universities.

We have three analytical purposes. One concerns the structuration of universities and the significance of centers for universities as organizations. In centers, goals and means are formed in a way to respond to specific issues, as opposed to self-initiated activities whose end results are not specified to the same extent nor in the same format but rather derive from the social structuration of academic fields (Whitley 2000). This issue refers to the identity and structure of universities and how these are affected by centers, especially how centers, with their often interdisciplinary and practice-oriented focus, interact with the disciplinary structure of academia.

A second analytical purpose relates to the impact of funding schemes on work modes in academia and how center grants affect internal and external relations, between different academic fields, between academic researchers and partners outside universities, and between societal partners themselves. This aligns with theoretical debates on research steering and the impact of funding on work modes and the cognitive orientation of academic research depending on the organizational settings (Franssen et al., 2023; Gläser, 2019; Gläser & Laudel, 2016).

The third analytical purpose relates to research funding and the role of external funders and their remit and role in scientific development (Whitley & Gläser, 2010). One of the functions of research funding agencies is to instigate organizational change within universities, and this is done by many means, with research centers as one of the more prominent and invasive forms. The impact of other types of funding on an organization is less discernable or even expected, as it entails little in the way of expectations on an organization or networking. For this dimension, we highlight in particular how funders operate in relation to centers in terms of interaction forms, contracts, and assessment and monitoring of activities, and how that steering is enacted and absorbed in the centers.

With this, we aim to contribute to the analysis of the nature of centers and their role in and for universities. We also have an ambition to illustrate the effects of center funding and the conditions for center grants to fulfill their goals. We therefore assess the impact of centers and relate it to different properties of centers, their

funding, organization, and governance. Clearly, if based on the assessment of center evaluations, not all entities succeed in their work. Hence, we ask why some centers realize their missions and why others do not, or only partially succeed. In addition, we aim to highlight what success consists of, and what makes a center efficient and fit with the purposes of center schemes, especially when their ambition is to foster linkages between companies and universities.

Centers in Their Settings: Summary Points

We therefore understand centers as expressions of the steering mixture of universities. The university is understood as a steering arena, with multiple directions and activities available depending on resources and mandates. This mixed governance has been noted and viewed as both a propelling and constraining factor in the search for a stronger organizational fit between universities and their patrons (Musselin, 2006).

Universities are conditioned by a combination of resource flows and historical mandates (Clark, 1983). In themselves, universities have limited motives for transformation as they are organized to contain external change—the traditional forms of collegiality and organization in the form of departments and faculties ensure continuity over time. However, the path dependency and stability enacted by these organizational templates are challenged in different forms. One form of challenge is external evaluations, which open up the organizational matrix and allow for comparisons between units. Another and related form is performance-based funding, which is intended to trigger competition for prestige and resources between universities and their constituent parts (Hicks, 2012; Thomas et al., 2020). A third, and the most dominant, form comes from external funding (Stephan, 2012). External funding sometimes—especially if channeled through center support—entails conditions of various kinds, in the form of tangible deliverables, work modes, and organizational formats. This includes a historical dimension of research governance. Special arrangements for individuals and groups are nothing novel to universities—they followed from the introduction of project support to principal investigators that accompanied the introduction of research councils in the early postwar period (Stephan, 2012). Centers, however, represent a further extension of that tendency. If project support was primarily introduced to point to the selectivity of research—not all proposals succeed, and not all academics are given the opportunity to expand their project ideas—the centers' format takes this a step further. Centers are based on the presumption that universities are flexible and can be remolded to respond to changes in the expectations of academic research. This does not necessarily entail that centers will succeed the traditional format of universities (even though that has sometimes been argued; cf. Pestre, 2003), but rather that centers add a transversal dimension to academic organization, linking different fields and organizations in time-limited constellations formed around specific themes that span several fields and organizational settings.

How, then, can centers and their impact on universities, work modes in academia, and funder-university relations be analyzed in more detail? This is what we turn to now.

Empirics: Six Centers and Their Evolution

For the purposes of this investigation, we studied six centers funded under the Vinn Excellence and Berzelii schemes. The analysis, which is part of a broader impact analysis of the Vinn Excellence and Berzelii center schemes (Benner & Hylmö, forthcoming), is based on a broad palette of data, including center applications, reports, and other archival material, and 45 interviews with center directors, researchers, and external actors, including funding agency managers. It is further based on an interpretation of the three mid-term evaluations of the centers (see O'Kane et al., 2016a, 2016b; Reeve et al., 2007, 2009a, 2009b, 2013a, 2013b). The evaluations and their outcomes also served to indicate how and to what extent centers achieved the goals of the center programs. Thus, we use the assessments done in evaluations as the organizing principle of the empirics. The evaluations provide a well-informed estimate of center success as they were done by panels that included experts on center-based research as well as area specialists for the respective areas of the centers. The six centers were chosen as illustrative cases representing more and less successful centers across different research fields.

The main task is to gauge the impact of centers on how universities function and operate according to the following six dimensions:

Organizational foundation highlights the evolution of the center and the relationship to earlier collaborative structures. This dimension points to the significance of cumulative advantages and how they apply to centers. It also points to the organizational ecosystem of a center—whether it is a stand-alone center or part of a larger environment—and how that impacts a center's viability.

Network and partnerships includes the number of partners, the historical evolution of partner networks, types of contributions from partners, and vertical and horizontal relations between partners. Together, these aspects characterize the form and function of partnerships for the centers and the functions partners provide for the center, for academic research, and for and between partners themselves. This dimension therefore points to the relational qualities of centers, how they have evolved, and what functions they serve over time for the partners.

Leadership and organization includes the formalization of center tasks and responsibilities, boards and other governance mechanisms, the recruitment and designated role for a center leader, methods for allocation of resources, setting up and assessing activities within the centers, and models for managing relations within the center and between the center and other organizational entities. This further includes how intellectual property rights are managed and deployed in relation to partners.

This dimension pinpoints how centers are managed and how their identities are developed and maintained over time, including forms of interaction, collaboration, and identification of means and goals for the center.

The relationship with universities showcases how the organizational demarcations of a center align with the formal organizational structure of the host institution and other partner universities. This dimension therefore points at how centers affect and are affected by university organization and resource distribution, including university support of centers, the position that centers play in the organizational matrix of universities, their impact on education and research activities, and their alignment with university strategy and identity more broadly.

Personnel and competence transfer looks at the forms of personnel exchange within center partnerships, including the recruitment and outplacement of PhDs, shared positions between partners and academic environments, and other forms of mobility into and out of centers. The mobility aspects aligns with the relational aspects outlined in the first dimension (organizational foundation) and pinpoints how centers function to access and distribute competence in the wider systems in which they develop.

The epistemic effect of a center stresses how centers shape work modes and relations between different scientific areas. Most centers are constituted of a multitude of research traditions and adjacent work modes, and for this dimension, we identify specific effects when it comes to redefined relations between these traditions, changes in validation and publication patterns, and changes in the forms of interaction with corporate and societal partners.

Together, these dimensions point at the specific form of centers and how they evolve in relation to the ideal–typical center role outlined above, which is to affect relations between academic and societal entities and shape relations and processes around them by committing time and resources from the partners. This moves us to the empirics of our contribution, where we briefly outline the constitution of each center along these dimensions and summarize case descriptions by profiling the factors that explain why some centers emerged as "successes" (with positive assessments and prolonged funding) while others received more modest assessments or had their funding terminated.

The Electronics Center: A Center in a Network

This center is the outcome of a long-standing interaction between its parent university and companies in the area of microwave technology, an industry with a long historical presence and networks in the region. The center forms a core part of activities in a large department at the university along with another center funded through the Vinn Excellence scheme, and it also forges ties with another department at the university, in electrical engineering. Thus, it serves as a node for interaction within the parent university and creates coherence, interaction and flexibility between increasingly convergent areas.

Not only does the center function as a node for related activities in its parent university; it also connects industrial parties with similar but not identical profiles. The network approach shows in the mode of operation within the center, where industrial problems set the direction of research activities. After researchers and partners agree on the content of research, the center board formalizes the agreements. Hence, the center operates with a trust-based relationship, with research projects identified from the bottom up and led by industrial partners in collaboration with academic researchers, whereas the formal organization primarily plays a facilitating role.

Intellectual property is similarly devised to create an interactive, yet neutral, work mode, where the university owns intellectual property that partner companies can purchase for a fixed sum, and where individual researchers are compensated for this. This ensures that no bilateral agreements are made and that partners can remain committed partners over time.

There is a culture of "give and take," where all matters are seen through complementary perspectives to ensure inclusion and trust between partners and between the academic and industrial researchers engaged. Teamwork and clear demarcations—shown in the intellectual property example above—ensure the center's identity.

Centers also have organizational ramifications. As mentioned, the center was instrumental in bringing about cooperation between two different environments in the area, as well as creating dynamic interactions within the university. Cash commitments are very important, and the center was used to ensure that funding was obtained from the partners.

This operational model is enabled by the orientation of the companies: they themselves do research and interact on a regular basis with the academic environments, which creates an often seamless integration between the two, but with, as mentioned, formal bodies ensuring and approving the project proposals.

The corporate value varies between types of companies, but for the large companies that form the backbone of the center, it lies with the exploration of research frontiers and potential applications in the future. In addition, centers allow companies a simplified way to recruit engineers with PhDs, a highly risky recruitment otherwise. Companies are also enabled to interact between themselves as members of the centers, with complementary and non-proprietary knowledge flowing between them.

As to the relationship with the funder, the center has developed a mimetic relationship with Vinnova, where the successful leadership experience of the center was translated to conditions and support for other centers. It thus emerges as a "model center" for the funder. The center and its management disseminate the notion of a center and its epistemic and organizational meaning, creating a narrative around the work mode.

Epistemic effects are visible in the focus on issues that are negotiated—and funded—with companies, focusing efforts on a delimited set of issues. This is also visible in resistance to quantitative measures of impact—the impact is validated and enacted primarily through collaboration. Other evaluations, such as those done by

the funder, are seen as necessary and "sharpening," but the ultimate evaluation lies with industry interaction.

To sum up, the center had several properties that contributed to its successful development over time. It focused on a small number of projects to avoid overstretch. It empowered researchers to form projects in collaboration with corporate partners. It exemplified organizational flexibility as a neutral space for companies to share knowledge between them, and as a platform for exploration of technical opportunities for companies with scientific value for the researchers. In this sense, it functioned as a portal for corporate networking for the university, and for the reproduction of networks between academic and corporate partners.

More generally, the center emerged as a sustainable platform for academic and corporate interaction for the identification of common interests, the formulation and validation of projects, the transfer of human capital between them, and the management of common interests. It emerged as an organizational platform recognizable internally—to lessen the internal frictions and centrifugal forces of the academic system—and externally—to create long-term, mutually reinforcing relations with companies.

The Biotechnology Center: The Assisted Linear Model as Ideal

If the electronics center emerges as a successful center—bridging academic and corporate cultures and ideals in intertwined projects—the biotechnology center represents another strand. It instead derives its strength from the bridging between basic inquiries and corporate needs.

The center form has been strategically used throughout its existence. When its first large center grant came in the early 2000s, the model involved interacting groups with different but related interests and the ambition to transgress the organizational boundaries of universities to allow for the interaction between complementary competencies. Hence, when center grants emerged, the biotechnology center was prepared to reap the benefits, including from the grant it received in 2006.

The center is part of a complex structure of many center grants and other large-scale projects, and its identity is therefore somewhat understated. The two main functions of this center grant are to provide support for critical personnel (research engineers for the platform) and an industrial reference group. On the other hand, the complexity also gives rise to one of the challenges of center support, namely, that it often emerges in combination with other support forms.

The center was formed to address the limited capacity to absorb biotechnology in the forestry industry, but also the weak linkages between academic research and practical knowledge interests. It is based on seven technical platforms, which form its foundation. Each platform is managed by one group, but they are open for use by other research groups, thus forming a matrix organization.

In addition to the platform, the center has also developed three model systems for the genome-wide screening of trees. At least one of the genomes selected was identified through industry collaboration via the center. These platforms serve as integrating mechanisms for the main constituent part of the center, its research groups. Research groups are devised to hold complementary competencies and are nurtured by that and by the platforms available. This, in turn, enables them to thrive in the competitive funding landscape.

The model of recruitment is elaborated: it should be open, and all members are expected to spend time abroad after completing their PhDs. International inspirations abound and are in particular enlightened by experiences in leading US laboratories.

This center functions as a bridge not only between two departments but also between two higher education institutions. It has also provided an organizational roadmap to bring together complementary competencies between the two universities. This points to the proactive management of the center, with a highly developed capacity to bring together different parties and interests—and to trigger the interest of complementary funders. A key orientation of the center management is therefore to relate basic inquiries to strategic opportunities for industry, thereby relating research to applications and also, in that process, widening funding opportunities.

The organizational culture reflects this, with a high degree of trust between partners, as well as a capacity to create opportunities and potential solutions for them. The culture is non-hierarchical and draws on common academic training that has successfully complemented the needs and interests of the forestry industry. The key orientation is to reap the opportunities that biotechnology offers for both the researchers and for industry.

The center's networking approach also applies to partner companies: the center bridges different companies with complementary but different interests, as the center encompasses four large firms in different ownership networks as well as one public research institute and a spin-off company from the center. The spin-off company plays an integral role, as it links the academic research with industrial interests. It is semi-integrated into the center but also contains core industrial interests in its governance. Another key complementary aspect is the supply of industrial PhDs via the program, where companies and Vinnova share the cost of PhD training.

To sum up, this center is deemed a success for several reasons, in particular because it integrates academic interests with industrial ones, but also—as in the first case—it is run in a manner that creates cumulative advantages to all interested parties, where companies extend their planning horizons and get access to qualified scientists, while academia overcomes some of the organizational constraints of universities. The remaining constraints are scale-based—given the multiple center funding sources, the specific impact of each of these center grants is limited, and significant efforts are needed in order to match the demands and expectations of each funder. The center grant under study is no exception and is viewed as "artificial" for this center. Nevertheless, it adds an aspect not specifically covered by other funding sources, namely, industrial partnerships. In this sense, this center, like the previous one, represents a major path-shaping element in universities by breaking

organizational and epistemic boundaries and by integrating a mixed form of planning in the daily academic work with the interaction of academic and corporate interests.

The Working Life Center: A Center Without a Center

The working life center is based on an ambition to bridge between multiple interests: between social science and engineering in the area of working life research, and to combine a focus on solutions with a critical and explanatory stance.

This center is quite distinct from the two earlier constellations. It is basically social scientific in orientation and has a very different form of societal articulation—based less on a stable set of corporate partners and more on a fluid set of stakeholders. With some exceptions, the partnership consists of public sector organizations and trade unions, with a very low level of absorptive capacity compared to the more research-intensive engineering firms of most centers.

In lieu of common technologies and platforms, the center is instead based on the cohesive impact of concepts and frameworks. The one originally adopted was "mobility"—a broad concept covering everything from workplaces to the labor market. This conceptual foundation was, following evaluations and interactions with the funder, later changed to "sustainable working life" to better indicate the framework and direction of activities. Altogether, the center aims to function as a coherent center rather than a loose umbrella of activities, and given the lack of a specific corresponding sector or technological platforms, it instead aims to use a conceptual foundation that is useful to academic researchers as well as social partners.

The most distinctive, and arguably most successful, aspect of the center is its fundamental orientation to interaction, not merely as a process but also as an intellectual phenomenon with practical utility. All of its activities were processed through a model that located "research system" and "practical system" separately and at the same time, integrated. Conceptualization and interpretation align the two, whereas the validation of the "research system" and the "practical system" are distinct from one another—the first is global and collegial, and the other is local and pragmatic. But concepts and interpretation are what unite them, and these create coherence for the center and its constituent parts.

Given the rather flexible nature of the center, the role of collaborative partners is central to enable long-term collaboration, interaction, and learning. The center therefore operates with a rather small set of collaborative partners, which are regionally clustered to ensure compatibility and trust, covering both public and private organizations to maximize inputs and mutual learning across boundaries.

Networking is therefore the key to the center's vitality and also its main challenge. The personal connection to a visionary member of any of these organizations is critical to its success, and collaboration is therefore never given; it needs to be constantly redefined and rejuvenated.

The center, accordingly, has a work model that is based on short interventions with immediate feedback to ensure that collaborative partners experience that they

are getting something in return for their collaboration. Thus, the center is based on its activities rather than, as for other centers, its networks, or its platforms. Collaboration is both the means and the end of the center.

The center fulfills yet another function, similar to those in other centers, namely, to serve as a neutral arena for the sharing of experiences and sometimes even conflict resolution between the different parties (for instance, trade unions and companies). A very important role for the center is therefore to maintain the interaction between collaborators and ensure that the partnerships are balanced and mutually reinforcing.

Center leadership is tied to personal qualities, in this case, specifically the ability to mobilize different interests in the network and ensure that all constituent parts are aligned. Even though formal leadership mechanisms exist and are sometimes deployed, the informal qualities of leadership appear to be of greater importance.

Given the limited size of the center, its preferred meeting format includes the center as a whole. The division of labor is less marked than for other centers, and more of its activities are discussed and planned with the entire center. This includes the centerboard, which plays a very active role in setting directions and priorities, sometimes on a detailed level. This is again in contrast to the other centers, which are more decentralized and use common forums only selectively.

This center has also stretched and transformed relations within the academic system, not only by the sheer complexity of the center—spanning four departments in four different faculties at the parent university and one at another university—but also by organizing courses across departments, affording seed funding for new projects across the universities and buyouts of small shares for researchers, including those outside the core group.

Funding is used primarily to enact projects within the themes of the center. These were selected in a process that spelled out specific criteria, in particular concerning how the suggested projects relate to the overarching theme of the center. One of the challenges identified was the cross-fertilization between themes, which proved more difficult than expected.

The center's identity was more fluid and had to exist in parallel to departments rather than as a superstructure. This was seen as important to avoid conflicts with departmental and disciplinary interests. Unity was instead enacted through a common location where all engaged in the center could interact, and also through the aforementioned ambition to establish a conceptual core.

Another integrative mechanism was that funding allowed the center to recruit PhDs. PhDs primarily functioned as academic recruits with very little in the way of mobility between centers and partners. The absorptive capacity among the collaborating organizations is low, which has hindered mobility between academia and partners. Instead, most of the PhDs stay in academia, whereas interaction continues to be based on interactive projects rather than personal connections via alumni. This center is therefore highly dependent on its relational work with partners, which needs to be maintained over time.

Overall, the effects of center funding were marked for the following reasons:

The center grant challenged and bridged university boundaries and created a tension between traditional academic demarcations and center direction and identity. The center also enabled and maintained a network of partners that would not be possible without a center identity and center activities. The center gave—and received—additional value to the university via research concentration and a large PhD program, which was part of the profiling of the university as a collaborative environment.

The mode of operation, with dense interaction with partners and a broad-based set of internal members of various degrees of engagement, proved difficult to establish without center status and funding of integrating projects and activities. The center's status also created durability and resilience over time, which extended beyond the committed pioneers of the center. The long-term support contributed to the rejuvenation of the center, with new leaders emerging. The backdrop is that the mode of operation is not always seen as compatible with center expectations, for instance, in terms of scientific impact or, for that matter, common platforms. The center is based on a looser, conceptual, foundation, and its network is more flexible and transitory than is the case for some of the other centers. Thus, the very format of centers may be difficult to align with the work mode and epistemic foundation of this center, but it successfully manages different expectations—among partners in search of a platform for interaction on critical issues related to working life and workplace organizations and among scholars from a variety of backgrounds with a common interest in working life and labor market dynamics. The critical issue is whether the center can leverage in both directions and whether the practical deliveries (localized and often specific to one organization) can be translated into academic publications. However, the development of this particular center shows that it is possible for centers to thrive without a technical core.

The Transportation Center: Localized Success

This center represented a case that was largely successful over time but also had some challenges. The center specialized in transport research, in particular public transportation, integrating three disciplinary domains (psychology, management, and economics) and a wide range of societal partners.

One of the success factors of this center was that it was embedded in a larger center, which already existed as a framework for interdisciplinary work with dense partnerships and strong university support. The center therefore had a very strong fit with the overall university organization, and models already existed for the development of work along the lines of the center application. The novelty primarily lay in the focus on public transportation, hence, the center built on a model and concept that only needed to be aligned with the particular expectations of the call for a center specialized in transportation.

The profiled identity of the center showed in the recruitment of PhDs—including from partners—which was highly successful, and the environment emerges as an

attractive location for PhD studies, with half of the PhDs recruited internationally and only a few from the parent university. However, the center has been less active in recruiting post-docs and senior researchers, and thus it emerges as a somewhat localized environment, highly dependent on the parent university's location rather than international recruitments. This interpretation was reinforced by the partial use of an international advisory board and limited interaction with similar centers internationally, a missed opportunity to profile the center as an international environment in terms of impact, work mode, and recruitment.

Financially, the center was highly dependent on center grants and support from the university, with very limited financial support from partners. This decreased the ambitions of the center and forced it to maximize the benefits of this particular funding scheme rather than relating it to other funding opportunities.

This center's primary challenge resided in its scientific impact; it mostly produced practice-oriented publications with limited effect on the research frontier of its constituent disciplinary subjects. This pattern evolved despite its partner-driven model and dense contacts with Swedish public transportation, which is described as internationally unique in its citizen-centered approach. This points to a weakness in centers with a social scientific orientation, where disciplinary expectations and center properties (interdisciplinarity, partnerships, focus on interaction) do not always blend easily.

Notwithstanding this, the center had many strengthening properties, including an elaborated model for center support (proposals anchored with partners and then selected by the board) and a consistent and enthusiastic center leader. It emerges as a center constrained by a localized culture and work mode, but nevertheless with a major impact on the sector and the academic environment, in a model that was supported by the center format. It also had a reciprocal relationship with the parent university and had a clear impact on the university's organization, priorities, and direction by reinforcing an environment dedicated to interdisciplinary and partner-driven collaboration.

The Vehicle Center: A Moderate Success

This center specialized in vehicle research—a major industrial area in Sweden—at one of the leading technical universities in the country. For the purposes of the center grant, the traditional strength in vehicle design incorporated another element, environmental aspects of vehicle development. Given its orientation to one of Sweden's dominant industries, and its location in one of the leading environments of the area, it could reasonably be expected that this center would be as successful as the electronics center in creating a platform for interaction and learning between academic fields and corporate partners. The outcome was less pronounced, however, which opens for reflections on why some centers fail to meet their expectations. The center did receive full funding throughout its existence, but it had difficulties in establishing

itself as the core of vehicle research at the parent university and instead existed in parallel to several other organizations in the area.

One reason for this was failed complementarities. In reality, the profile of the center entailed only a small addition to an existing constellation rather than a full-blown merger between engineering and sustainability. Another constraint was the limited set of partners—excluding suppliers and small and medium-sized enterprises—and the overly national profile of the partnership, making the constellation more vulnerable to changes in the industry which was affected by large international transformations.

Leadership was both a strength and a weakness of the center. It was a strength in the sense that it developed a rotating and learning model between different organizational and epistemic backgrounds. It was a weakness in the sense that the role of the leader was weakly defined and changed several times during the existence of the center. No clear-cut role and identity as a leader emerged, but instead, an administrative approach to leadership was adopted.

There were positive elements with the center model, not least that it expanded beyond a binary relationship between companies and academic environments to take on a complementary role that included more partners and a widening of the networks.

Given that the center was a novel construct that coincided with the establishment of another initiative—a platform for vehicle research at the parent university—the center's lack of a specific identity became a liability; its identity could, evaluators argued, have been stronger and more clearly communicated. This was also reflected in the funding profile of the center, where partners afforded substantial in-kind support but only a little in cash. Hence, the commitment of the partners was significantly lower than for the more successful centers. However, the center's ability to function as a platform for a relatively large group of complementary partners, the organizational format that expanded beyond binary relations, and the flat leadership model with opportunities for variations and learning throughout the center's duration, indicate that it, in its own way, had some degree of success, even though it was not as durable as the centers that proved to be more robust over time.

The Logistics Center: The Center that Never Was

The last center outlined here represents a more clear-cut failure as a center, with funding withdrawn before the end of the center grant. This center, for logistics at one of Sweden's largest universities, was highly successful in terms of scientific publications and networking partnerships, but it was weakly integrated, with only minimal and inefficient integration between the constituent parts.

The center was founded on three departments within the same university. The departments had complementary profiles, but for various reasons, they never gained collaborative traction despite their epistemic similarities and similar orientations.

Another critical element of the center was its disintegrated model of partnership. It was based on a flexible membership structure with different levels of alignment and commitment, ranging from discussion partners to integrated partners with full

financial commitment, including exclusive intellectual property rights. Partners were therefore highly complementary in theory, but in reality, they had very different abilities to engage in research. Thus the partnership failed to function as an integrative mechanism. Rather, the network's fragmentation further compounded the weak integration of the academic fields.

The lack of cohesion showed in the organization. For being a relatively small center, with only some 20 members, it had a very complex organizational structure, with a board of external representatives in majority set up to manage issues of project selection. This was not adequate to meet the integration challenges, according to evaluations. In addition, the center had a plethora of managing mechanisms—a research team leader forum, a program advisory board, a scientific advisory board, and several other forums to set directions—but overall, it was marked by an unclear chain of command.

Evaluations also pinpointed limited effects on university structure; differences between constituent parts were reproduced via the center, and there emerged few examples of new commitments to the center (shown in weak internal identity and commitment to the strategy among members).

Overall, this center deployed organizational flexibility instead of integration to compensate for weak alignment between academic and industrial partners, and the lack of interaction between the academic partners. It emerged as a network of related activities and partnerships rather than an integrated whole, and therefore it dissolved over time. It never became a center despite the ambitions, which shows that centers are not easily enacted, even if the conditions seem conducive to complementarities evident in the center design. The road from design to practice is more complicated. In sum, the combination of organizational embeddedness within parent universities, extensive and durable networks, mobility from the centers to adjoining partners, and "real" collaborative projects engaging both academics and practitioners seem to be what distinguishes successful centers from those with more mixed outcomes. This may sound truistic as a conclusion—successful centers are those that resonate with the goals expressed when there are calls to establish a center—but it points to the challenges of centers. Ideally, they serve as mechanisms to renew universities and connect them with societal problems and partners—making universities matter—but in reality, they often fall short of these ambitions. Centers may be one way to propel universities' contributions to the resolution of societal challenges, but they often fail in that endeavor.

Conclusions: The Impact of Centers

What, then, can be concluded from this study of a specific form of centers, centers founded to develop academic-industrial collaboration with the aim of fostering both academic and societal excellence?

First, a theoretical contribution of this study is that it clarifies the variegated processes by which universities are affected by external steering. Hence, there is a

duality here, where universities are not as exposed to external steering as might be theoretically assumed, but rather show varying degrees of responsiveness to external steering. Arguably, when external steering aligns with internal processes of profiling, centers are the most successful. However, this is not the most common pattern, and most centers develop in relative isolation from university strategy and resource allocation.

Second, centers vary in success depending on the connection between the field and the societal environments around them. In short, centers that operate in dense corporate networks enjoy the greatest benefit of support, as activities in academic and industrial environments share ideals and work modes. They are both fully in an exploitive mode and there are only marginal differences in the operations of academic and corporate partners. Another type of center that benefits from this type is linear centers, where the industry is exploitive and the academic research is explorative, as exemplified by the biotechnology center. Here, radical differences in orientation do not preclude strong interaction, as the logic of the academic and corporate partners are so different. Another successful mode of operation is that of the working life center, which also starts out from practical knowledge interests and combines them with academic explorations, in parallel processes. This also applies to the transportation center, which derives its strengths from the unicity of Swedish public transportation, which translates into an empirical and analytical underpinning in academic work. Both of these centers focus on their interdisciplinary profile and how it might be aligned with the fixed structure of academic environments in the social sciences. Such boundaries are more porous for the centers in the natural sciences and engineering, which showcase a more pragmatic relationship between different academic fields. Thus, center work is variably oriented to the management of internal relations. As for the external relations, the degree of partner contribution is also more limited for the centers anchored in the social sciences, where partners are more important as empirical co-producers, whereas partners for the centers in the natural sciences and engineering share considerable resources over extended periods of time; their planning horizons allow for this, and the networks in which they operate are more robust.

Finally, centers that are successful are those that integrate societal and university ambitions into their strategies and can draw on university support for center profiling and funding. Hence, there is a match between internal and external ambitions, and even when there are internal frictions between fields or partners, they are managed in forums that communicate center identity and direction to all members.

When centers fail to realize their ambitions, the main reason is that practical interests primarily serve as legitimizing devices for academic ambitions. The centers are not fully anchored in their societal settings, and partner commitments are limited. The lack of articulation with real problems among partners leads to unclear and fragmented relations within the centers and even less commitment from partners.

The conclusion that can be drawn, then, is that societal challenges thrive in academic environments in which there is a fit between work modes, university strategy, and partner orientation—and when there are complementarities between (academic) exploration and (societal) exploitation among academics and partners.

The centers that developed less successfully were marred by coordination issues between the academic and societal partners.

Center support therefore reinforces existing patterns—if integration is weak or partners are fragmented at the onset of programs, this will only show more strongly during the center's time of existence. The reverse is also true; if the underpinnings are strong and there exist mutual and/or complementary interests, a center status only reinforces those underpinnings. Centers are therefore no panacea but work best if there is a fit between collaboration, strategy, and ambitions. If not, centers seem destined to have only a limited overall impact on societal challenges.

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Governing by Organizing: The Context of Universities in Sweden

Ulrika Bjare

Introduction

In May 2023, the Swedish government took a sudden decision to significantly reduce the term of office for board members at universities in Sweden, alongside initiating a reform of the existing process for appointing board members. The decision stands as a vivid illustration of the organizational dimensions of governing, wherein the government exercises control over the internal organizations of universities to address a new political situation. The appointment process that is thus currently under review, and is regulated by the Higher Education Ordinance, was explicitly formulated to strike a balance between the political sphere's need for influence and control over universities as governmental agencies and universities' need for academic autonomy.[1] The government has referred to the increased threats to Sweden's national security as the primary rationale behind the decision, asserting the need to change the board's profile to align with security policies. However, this explanation has faced substantial scrutiny, being perceived as a pretext for allowing the nationalistic far-right party, the Sweden Democrats, to exert influence over the appointment process. The decision has specifically received strong criticism from representatives of universities as they fear an encroachment on the autonomy of universities by political forces. The development has been described, both nationally and internationally, as a departure from the government's longstanding tradition of seeking a balance by, on the one hand, recognizing the state's political interests in steering higher education and research, and on the other hand, respecting universities' autonomy.[2]

[1] See the reasoning in the preparatory documents: SOU (2015:92); prop. 2015/16:131.

[2] See for example The European Students Union (ESU) (2023); University World News (05.20.2023); SUHF (2023).

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This balancing act, and its current rupture, underscores the interplay between the government's perceptions of the significance of universities—ideas about how universities should matter—and the principles of academic autonomy and self-governance. It is inherent in the nature of politics to seek control over governmental agencies; such control constitutes an integral part of the governing framework. However, the context diverges when considering universities, given that they have traditionally enjoyed a greater degree of autonomy. This autonomy has been partly substantiated by the rationale that academic autonomy is essential to the conduct of innovative and high-quality research, wherein academic self-governance is pivotal for the universities' contribution of knowledge to society.[3] The relationship has been approached in diverse ways by policymakers—spanning various organizational dimensions of governing—persistently striving to create a setting conducive to the desired ways of mattering.

Through political science theory on *metagovernance* (e.g., Jessop, 2002; Peters, 2010; Sørensen, 2006; Sørensen & Torfing, 2009; Torfing & Triantafillou, 2011), the government's decision to alter the term and appointment process of university board members can be understood as a form of "setting the stage" and "governing by organizing" (Jacobsson et al., 2015). These concepts are used by Jacobsson et al. (2015) as they identify five strategies used by the Swedish government to achieve a responsive state administration. In this chapter, I apply their theoretical framework to analyze the governmental steering of the Swedish university sector since the late 1970s. The five strategies are illustrated through empirical examples given in the text. The chapter focuses on three significant reforms within the sector, which are used to identify organizational dimensions of governing higher education and research. To enhance the analysis, relevant examples from contemporary literature on the governance of higher education and research are also included.[4]

Metagovernance and Governing by Organizing

Over the past few decades, a significant body of literature has emerged on the evolving governance structures of and expectations of universities (e.g., Christensen, 2003; Christensen & Lægreid, 2001; Christensen et al. 2007; Gornitzka et al., 2017; Maassen & Olsen, 2007; Ramirez, 2010; Thoenig & Paradeise, 2016; Wedlin & Pallas, 2017). The majority of this literature underscores the growing prevalence of steering mechanisms, including management techniques, strategies, New Public Management (NPM) practices, greater emphasis on research utility and innovation, and alignment with societal challenges. Simultaneously, scholarly work illustrates

[3] This relationship between policy and academia can be related to the metaphor of the social contract for science (e.g., Baldursson, 1995; Bragesjö, 2001; Byerly & Pielke, 1995; Gibbons, 1999; Guston, 2000; Martin, 2003, 2012).

[4] The chapter draws on and summarizes some of the empirical findings of my doctoral dissertation; see Bjare (2023) for a comprehensive account.

that universities have adopted diverse "strategic" approaches in response to external change and, to some degree, have adopted formal frameworks employed by business corporations. Consequently, universities have increasingly been characterized as "organizational actors" (Krücken & Meier, 2006) or "strategic actors" (Whitley, 2008). A corresponding development can be said to characterize the Swedish university sector, but in the Swedish context, one also needs to consider the fact that the majority of universities are government agencies, that is, they have the state as their principal and are accountable to the government. The government therefore plays a significant part in deciding upon financing, regulations, missions, and the overall organization of the universities.

In the literature on public administration and the role of the state, scholars have stressed that the model for state influence has changed from *government* to *governance* (e.g., Jessop, 1997; Pierre & Peters, 2000; Rhodes, 1997; Salamon, 2001; Sundström et al., 2010). The term "government" pertains to conventional hierarchical modes of steering, characterized by rule-based regulations in which the state holds a dominant position. Governance, on the other hand, describes an administrative framework that prioritizes the role of networks, decentralization, and self-regulation. The governance perspective acknowledges a shift toward greater abstraction of the state's controlling role. This is attributed to the increasing fragmentation and specialization of public activities as well as the heightened interdependence and collaboration between actors at various levels, including those from non-state entities. Scholarship on governance emphasizes the emergence of more fluid modes of control, which encompass informal governance mechanisms and public–private partnerships, among other forms. The governance model implies that crucial elements of public authority are shared with a host of non-governmental or other governmental actors (Salamon, 2001).

The development has varied in extent across different countries. The transformed role of the state does not necessarily imply that its influence has diminished but rather that it has changed. Scholars argue that even with the progression toward governance, the state continues to exercise control (e.g., Capano, 2011; Montin & Hedlund, 2009; Koch, 2013; Pierre, 2000; Pierre & Peters, 2000). Thus, in the literature, governance has been supplemented by metagovernance. Metagovernance serves as a complement to conventional and hierarchical administrative control. It builds on governance theories while also highlighting the state's continued influence despite the shift toward governance. Metagovernance describes the ways in which the state exercises control within the framework of governance (Jessop, 2002; Peters, 2010; Sørensen, 2006; Sørensen & Torfing, 2009; Torfing & Triantafillou, 2011).

Jacobsson et al. (2015) argue that metagovernance concerns steering actors that have a high degree of autonomy within a governance context. The high degree of self-governance derives from a situation where the object of steering—in this case, universities—operates in circumstances characterized by ambiguity. The issues addressed and actions taken by governments are numerous and diverse, and they evolve in unforeseeable ways as society undergoes continuous political, social, technological, and economic changes (Jacobsson et al., 2015). This poses a challenge for decision-makers, especially for politicians, to formulate clear and consistent goals

and strategies. In order to achieve a flexible and responsive administration that is capable of addressing political issues and implementing appropriate measures, the government recognizes the inadequacy of detailed top-down steering. Consequently, in areas with a high degree of autonomy, the administration is generally delegated to organize and decide upon suitable measures.

Swedish universities have traditionally enjoyed a greater degree of autonomy in comparison to other governmental agencies. As noted above, this stance derives from acknowledging that knowledge production is a nonhierarchical endeavor and assumes scientific autonomy. In organizations with a high degree of self-regulation and autonomy, the norms and values of the organization are central. This is particularly true in the realm of higher education and research, where academic practices and the evaluation of quality and excellence are based on academic norms and values. However, this distancing can also present challenges for the government, as the administration may become too far away and difficult to control. In the following, I will use parts of the theory on metagovernance to illustrate how the government uses different organizational strategies to handle such challenges. The foundation of this chapter is the interplay between the theory of organizations and governance theory with the aim of adding to research policy and higher education literature.

Governing by Organizing—the Swedish University Sector

Three Major Reforms in the Swedish University Sector

Universities are stable organizations, maintaining a consistent structure internationally for a considerable period of time. Nevertheless, as noted above, it is evident that the higher education sector has undergone significant transformations in the past 50 years or so. In the Swedish context, universities have transitioned from being subject to extensive regulations to becoming decentralized entities, increasingly governed through performance-based management and resource allocation driven by competition, for example, through rankings and bibliometric models (e.g., Hammarfelt et al., 2016; Nelhans, 2013).

The **Higher Education Reform (H 77)** of 1977 introduced the first Higher Education Act (1977:218), which regulated the mission, internal organization, and responsibilities of higher education institutions.[5] The **Freedom Reform** was passed in 1993 and resulted in the repeal of the 1977 Higher Education Act and the adoption of a new law by the parliament, the Higher Education Act (1992:1434), which is still in effect.[6] The **Autonomy Reform** in 2011 took a further step in deregulating universities' internal organization and in phasing out provisions regarding the internal

[5] See the government bills: prop. 1975:9; prop. 1976/77:59.

[6] See the government bills: prop. 1992/93:1; prop. 1992/93:231.

organization, with the exception of the boards and the president.[7] All three reforms have been subject to analysis by other scholars (e.g., Askling, 2012; Benner, 2001; Gerad Marton, 2000; Lindensjö, 1981). This chapter adds to previous research by analyzing the reforms through the lens of metagovernance, where different organizational dimensions of governing are identified. All three reforms involved assessments of the extent to which the internal organization of the universities should be regulated by the state (i.e., the parliament and/or the government), as reflected in the legislative framework. The parts of the reforms presented in this chapter pertain to how the state has governed the internal organization of universities by regulating or deregulating provisions in the higher education legislation concerning the institutions' internal structures. The analysis specifically highlights how the government has used the policy instrument "regulations and deregulations of the internal organization" as a way to organize HEIs in alignment with national policy objectives. These objectives were formulated based on the notion of heightened societal engagement by universities and their amplified impact on society, that is, on embedded ideas of mattering.

Five Strategies of Governing by Organizing

According to Jacobsson et al. (2015), metagovernance entails setting the stage, that is, establishing the fundamental organizational structure of a policy domain. This organizational structure endures over time, yet occasionally, political actors perceive a need to reorganize a particular area or sector, resulting in a resetting of the stage (Jacobsson et al., 2015, pp. 45–46). Based on governance theory and organization theory, Jacobsson et al. identify five various steering strategies to bring about an administration that is able to orient and adapt to changing conditions while remaining loyal to the government's objectives. The strategies are: (1) *storytelling,* (2) *creating formal organizations*, (3) *fostering competition*, (4) *positioning*, and (5) *distancing* (Jacobsson et al., 2015, pp. 44–76). In the upcoming analysis, I will outline the five modes of governing by organizing proposed by Jacobsson et al. and demonstrate their utilization in governing the Swedish university sector. Additionally, the text will provide examples of the five strategies, along with an analysis of the various forms they have taken. Naturally, the text constitutes *one* way of analyzing policy development within the field; as mentioned above, other scholars have studied the same reforms from different perspectives. The analysis serves as a way to broadly identify how various forms of organizational governance have influenced the university sector, thereby providing a modest contribution to both higher education and research policy literature, as well as to the governance literature.

According to Jacobsson et al., governing by organizing is supplemented by a relatively informal approach known as *microsteering* (Jacobsson et al., 2015, pp. 129–142). However, in my perspective, this supplementary governance approach does

[7] See the government bills: prop. 2008/09:50; prop. 2009/10:149.

not characterize higher education and research to the same extent as the practice of governing by organizing does. Microsteering entails various informal methods through which politicians and policymakers engage with administrative officials. Due to the relatively autonomous position of universities, this form of close collaboration and control between politicians and representatives of universities is not as applicable in the analysis as it might be in other sections of administration.

Storytelling

Storytelling encompasses the narratives with which a reform or policy initiative is associated in order to justify the purpose of and need for reform. Politicians require narratives to initiate reforms. Reform arises from a longing for rationality and progress, particularly when faced with perceived ambiguities and disconnections. The stories associated with reforms assure that existing problems will be resolved or at least handled sensibly. As Jacobsson et al. emphasize, organizational theorists and public administration scholars have stressed the importance of storytelling as a way to inspire performance, create legitimacy, and control the administration (e.g., Christensen, 2003; Czarniawska, 1997; Rhodes, 2005; Weick, 1995). Storytelling includes images, partly of the problems that the reform aims to solve and partly of future improvements. The narrative provides direction in policy and conveys a positive change that is motivational for those subject to the policy. Policymakers can use both text and speech to create and disseminate narratives. The most central bearers of political narratives are government bills. Within the narrative, winners and losers, as well as heroes and opponents, can be distinguished, which creates movement in the narrative. Positive value-laden words with a high level of abstraction are also present (Jacobsson et al., 2015, pp. 66–73).

In the 1970s, higher education and research became increasingly crucial for national development and emerged as a distinct national policy domain. Consequently, the comprehensive reform in the late 1970s included policy initiatives aimed at the internal organizational structure in order to exert control over university operations. Thus, official documents such as government bills, public inquiries, and other preparatory work include examples of storytelling where the new "unified" higher education sector governed by the same principles would contribute clarity, uniformity, and democratic decision-making.[8] In the political narrative, obstacles to achieving these goals were primarily attributed to universities' potential lack of engagement and ability to adapt to the changing demands of politics and society. The lack of trust in the universities' capabilities prompted the constitutional provisions

[8] See, for example, the government inquiry: *Högskolan. Betänkande av 1968 års utbildningsutredning* (SOU 1973:2), *Sammanfattning av förslag av 1968 års utbildningsutredning* (SOU 1973:3), Högskolan (U 68), and the government bills: prop. 1975:9, *Regeringens proposition om reformering av högskoleutbildningen.*

m.m.; prop. 1976/77: 59, *Regeringens proposition om utbildning och forskning inom högskolan m.m.*

concerning internal organization. The governance assumed a more planning-oriented role, drawing closer to what has traditionally been considered the internal affairs of universities, reflecting a new perspective on the autonomy of science (Bjare, 2023, p. 91). It was emphasized that a restructuring of the internal decision-making bodies was necessary to "better meet the rapidly changing needs of communication and interaction associated with scientific development."[9] Consequently, in order to meet these new demands, universities needed to adapt to changes occurring in other areas of public administration through the introduction of the concept of *administrative democracy*.[10] Administrative democracy was characterized by the basic premise that all stakeholders within an organization should be given influence over decision-making. The discourse surrounding administrative democracy was associated with the continuous development of state administration as a whole.[11]

The idea of administrative democracy was connected to reform narratives that encompassed "inclusivity" and the need to "open up" the universities both internally and to external influences. Opening up the organization from within meant that the decision-making authority in internal boards and preparatory committees should no longer be predominantly held by the academic staff. Instead, these internal bodies, such as the Departmental Board, were to include representatives from the academic staff as well as from the administration and the students.[12] The rationale was based on the notion that traditional academic structures required a reformed composition and mission through the development of a new, more inclusive, and corporative, collegiality:

> *…establishing the collegial governance model at the department level represents a significant step toward broadening the influence of employees and students over the work environment and working conditions.*[13]

In the narrative of the reform in 1977, the internal organization thus played a pivotal role in driving social change—to direct the university sector toward a new form of mattering to other parts of society. The aim was to replace the traditional and meritocratic "authority of professors" with a more democratic system and thereby become aligned with administrative policy developments in other governmental

[9] Free translation from government bill, prop. 1975:9, p. 524.

[10] The term "administrative democracy" is my free translation of the term *förvaltningsdemokrati*, which implied the inclusion of administrative staff, union representatives, and students in the internal governing university boards as well as the influence of external stakeholders; this was expressed in the government bill (prop. 1975:9, p. 98).

[11] See, for example, the Swedish Government Official Reports: *Högskolan. Betänkande av 1968 års utbildningsutredning* (SOU 1973:2), pp. 472, 477, 492, & 502; *Förvaltningsdemokrati: Delegationen för.*

förvaltningsdemokrati (DEFF) 1969–1976: promemoria/av Inflytandeenheten, Budgetdepartementet.

[12] Section 13 of Chapter 15 of the Higher Education Ordinance (1977:263), issued on May 5th, 1977.

[13] Free translation from government bill, prop. 1975:9, p. 521.

domains. The primary focus of the reform was on higher education; however, its positive values of inclusion and openness were also intended to influence research activities. For instance, the higher education regulations introduced provisions stating that the Faculty Board, the central decision-making body within universities responsible for ensuring research quality, could include representatives from research and development work *outside* the university, thus representing "public interests."[14] While not mandatory, this provision allowed for a composition that included external representatives on the Faculty Board. The prevailing narrative suggested that the traditional collegial bodies, primarily consisting of professors, had grown excessively conservative, rendering them incapable of adapting to societal changes. According to the reform narrative, by incorporating external perspectives into the internal structure of universities, new viewpoints, as well as innovative research ideas, would catalyze transformative changes from within:

> *The research freedom that has so far been one of the characteristics of universities will also shape the new higher education institution* [sector]*, as research collaborations expand to encompass diverse educational programs and societal interests beyond the institution. It is my conviction that this will lead to an education that is more firmly grounded in scientific principles and foster a fruitful exchange of information and ideas between society and research.*[15]

The rationales were used to portray the old structure as conservative, resistant to change, and unwilling to address the new challenges faced by universities and society as a whole. These narratives served as the driving force behind the constitutional provisions governing the internal organizations of universities. The narrative connects the internal organization to the metastory of the crucial role of education and research in shaping the nation's future. The reform narrative, emphasizing the importance of internal organization in achieving sociopolitical objectives, functioned as a means of governing by organization and setting the stage for the university sector as a whole.

The *Freedom Reform*, on the other hand, focused on the importance of autonomy and gave a renewed emphasis on scientific self-governance, primarily by altering the regulations regarding the composition and responsibilities of the Faculty Boards. The narrative had shifted; now the internal systems with too many stakeholders were regarded as the source of the stagnation. Once again, inefficiency was deemed to characterize the internal decision-making bodies, but this time, the solution was believed to lie in deregulation, and in granting professors most of the power within the academic institutions:

> *However, the system has become cumbersome and appears to distort the missions of higher education institutions. The multitude of bodies with partially overlapping responsibilities, the difficulties for external representatives to fully engage in the operations, the rigid structures of decision-making bodies, and the fact that the academic staff have been in the minority have led to problems.*[16]

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[14] Section 24 of The Higher Education Act (1977:218), issued on May 5th, 1977.

[15] Free translation from government bill, prop. 1976/77:59, p. 23.

[16] Free translation from government bill, prop. 1992/93:1, p. 15.

The notion of self-governance and deregulation was intertwined with performance-based management and the need for decentralized operations, reflecting broader administrative policy trends. Emphasizing decision-making closer to those directly involved in teaching and research was seen as necessary for ensuring quality, representing a key value within the narrative. The reform also conveyed the idea of universities emancipating themselves from state control, leading to greater flexibility and efficiency in adapting to external needs and contextual conditions; "freedom, flexibility, and institutional diversity" were to be combined with "incentives, evaluations, and quality competition."[17] The concept of competition was portrayed as a positive transformative force, explaining the shift toward reduced regulation in policymaking alongside the growing importance of external funding of research. The narrative underscored the need for universities' internal organizations to adapt to competition, while the notion of self-regulation in science encompassed the internal organization's capacity for adaptability.

In the preparatory documents for the 1993 reform, the government emphasized the distinct role of universities within the public sphere, justifying a higher degree of autonomy compared to other public organizations. The texts initially presented universities as "unique" and "special" organizations within the public sector, indicating policymakers' awareness of norms that emphasize the importance of academic self-governance. This way, the policymakers demonstrated an understanding of the academic norms when shaping the reform. While the policy highlighted the universities' exceptional position in the public sphere, there were also acknowledgments of the need to align with ongoing reforms in the public sector. This rationale indicates the policymakers' efforts to exert increased control within the higher education sector, all the while maintaining the image of upholding the long-standing autonomy principles that have traditionally governed academia. Here existed a balancing act as the policy sought to include universities in the state administration reforms—characterized by ideals of accountability, efficiency, and unity—while at the same time purporting to defend academic freedom and the self-governance of science.

All three reforms encompass storytelling narratives characterized by *opponents* and *winners* as well as positively charged abstract values. In the 1977 reform, there are examples of the former, where the internal processes of professorial control were depicted as opponents, as barriers to desired change. Simultaneously, administrative democracy was portrayed as enabling the opening up of universities. In the Freedom Reform of 1993, the slow internal processes of administrative democracy were portrayed as sources of resistance. On the other hand, teachers and researchers were depicted as winners and, ultimately, as the guarantors of quality and efficiency. This also applied to the Autonomy Reform, but this time deregulation was presented as having intrinsic value through the increased freedom it provided to the university as an organization; the reform entailed an expanded decision-making mandate delegated to the governing board and the president. Through the delegated mandate given to universities, the activities were expected to develop in the desired direction. Values such as efficient resource utilization, mobility, organizational diversity, and

[17] Free translation from government bill, prop. 1992/93:1, p. 21.

individual responsibility were interwoven into arguments promoting Swedish education and research internationally. In both the Freedom Reform and the Autonomy Reform, the values of freedom, autonomy, and quality were closely linked to the concepts of competition, efficiency, and accountability. Deregulating the provisions of the internal organization was presented as a central part of this endeavor.

Creating Formal Organizations

Creating formal organizations is the second form of governing by organizing. It describes a basic strategy that the government uses to establish and shape formal organizations, which involves creating bodies such as government authorities or councils. This includes deciding on instructions regarding authority, goals, and resources. Creating formal organizations sets a clear location for issues within a policy area and provides a structure for the organizational body that sets the agenda. This includes deciding *which* organizations (such as councils or authorities) should exist and *how* they should be organized. When creating formal organizations, specific institutional conditions are established for gathering information and developing knowledge about the issues that the organizations are responsible for addressing. Additionally, the organization can recruit experts with a specific interest in and knowledge of the policy area (Jacobsson et al., 2015, pp. 47–50).

The 1977 reform was a way to govern the formal organizations of universities by determining *which* institutions were to be included in the public higher education sector (*den nya högskolan*) with related mandates, funding, and authorities. In the reform, specific universities (designated as universities) were granted the authority to conduct research and also serve as research resources for other universities lacking research capabilities and resources. This organizational arrangement exemplifies a mode of organizational control by regulating objectives and resources based on the vision of sector-wide coordination and central planning. The comprehensive provisions concerning the internal organization of universities represent a form of control achieved through the creation of formal organizational structures. Decisions pertaining to the establishment and mandates of Regional Educational Boards (*regionstyrelser*) and internal decision-making bodies within universities, such as Line Councils (*linjenämnder*), were shaped by conceptions of how utility and societal relevance could be integrated into academic endeavors.

The reforms introduced in the 1990s and onwards, involving the establishment of two foundation-based universities alongside strategic research foundations, served as governance strategies through the creation of formal organizations. The two foundation universities were to foster "organizational diversity" (*organisatorisk mångfald*) within the sector and address part of the rigidity and uniformity that policymakers believed had characterized the sector.[18] While the Freedom Reform and

[18] See, for example, the Ministry Publications Series Ds 1992:1 and the government bill prop. 1992/93:1, p. 21.

Autonomy Reform entailed the deregulation of certain aspects of the formal organization, they concurrently introduced novel forms of governance through regulations on performance-based management and increased external funding. This represented a relatively novel governance approach, where the stage was set to align with the interests of external funders. Such organizational restructuring affected both universities as organizations and intensified the dependency of university researchers on external research funding.

The regulation and deregulation of the internal organization reflect divergent perspectives on how to use regulation as a policy instrument when steering universities and university research. This assessment is intertwined with a valuation of risks involved in deregulation together with the norms that govern the specific policy domain of higher education and research. In the case of H 77, the motivations for regulation stemmed from the idea of exerting influence on academic activities through the implementation of administrative democracy, with the aim of power sharing among various stakeholder groups within universities. The legitimacy of this approach relied on an organizational model wherein representatives were appointed through a cooperative and participatory process. During the Freedom Reform, the Faculty Board assumed a clear role in bearing scientific responsibility within the framework of the organizational professional model, encompassing competence, ethics, and norms. Legitimacy was ascribed to the Faculty Board as a representative of the research activities. Concurrently, elements of market-oriented models emerged, and increased cooperation with industry and intensified competition for resources were emphasized:

> *However, there is a need to develop organizational solutions within higher education institutions, or in close connection to them, to facilitate collaboration among researchers from different fields as well as between researchers and the business sector. Within higher education institutions, it is important to better recognize the unique conditions of industry-oriented research, such as problem identification and interdisciplinary approaches.*[19]

Today, the organization of public research funding constitutes one form of steering through creating formal organizations with mandates and allocation of resources. The government distributes research resources directly to universities, research councils, and other research funding agencies. This way of "setting the organizational stage" for higher education and research influences universities' internal management, strategies, and priorities. It also influences the actions and strategies of individual researchers in their pursuit of external funding (Bjare, 2023; Laudel & Gläser, 2014; Leisyte et al., 2010; Luukkonen & Thomas, 2016; Miller & Neff, 2013).

The current organizational structure for public research funding was introduced over 20 years ago with the aim of better coordinating and simplifying a system that was considered excessively fragmented. The reform can be regarded as a way of setting the stage through the establishment, consolidation, and dissolution of agencies in order to create an overall sector that is aligned with policy goals. Today, the goals set by the policy level primarily focus on quality and societal relevance,

[19] Free translation of government bill, prop. 1992/93:170, p. 423.

which are reflected in the directives to the latest governmental inquiry on the organization of research funding, whose overall purpose is to establish a clear division of roles between universities and state research funders to "promote high-quality and socially relevant research."[20] Thus, the organizational dimensions of governing research funding aim to create environments that emphasize the mattering aspects of universities.

The current organizational structure for research funding, characterized by the presence of multiple public funding sources, imposes a considerable demand for in-depth knowledge of the system among researchers in universities. This knowledge is effectively employed in establishing networks and cultivating relationships, and in research practices. Researchers, however, express concerns regarding the potential risks associated with funders prioritizing similar subject areas, which may result in a state of scientific stagnation. Nonetheless, the ability to seek funding from diverse sources is perceived as a means of fostering researcher autonomy, mitigating reliance on the evaluations of a single funder. Moreover, the reliance of university research on external nonpublic research funders exerts a significant influence on the governance system. Researchers navigate interactions with both public and private funding entities within the overarching governance framework (Bjare, 2023, pp. 158–188).

Even within universities, there are organizational dimensions of governing in relation to the formal decision-making structure, as the university management determines the governance model for each university. The design of the internal organization, including the establishment of decision-making and advisory bodies, reflects a way of creating a formal organization within the institution. Research reveals a relationship between the chosen governance model and researchers' perceptions of steering in research activities. Researchers at universities with a high degree of line management perceive a higher degree of influence in their research activities from the internal university management compared with researchers at universities with a low degree of line management and a more collegial management model (Bjare, 2023, pp. 135–157). Thus, there is a correlation between researchers' perceptions of room for autonomy in the research process and the internal management model of universities. This implies that the ways in which decisions are delegated and distributed within the institution, that is, the formal organizational setting, can impact researchers' perceptions of the scope of scientific autonomy. Yet, the majority of Swedish HEIs have adopted a line-management structure at the departmental level (Ahlbäck Öberg & Boberg, 2022; Boberg, 2022; Sundberg, 2013, 2014; SOU 2015:92).

[20] The assignment of the inquiry: *Kommittédirektiv* 2022:85, p. 4.

Fostering Competition

The third aspect of governing by organizing, fostering competition, involves implementing steering mechanisms that incentivize competition and specialization. In the public sector, this can involve establishing evaluation functions whose results affect resource allocation or authorizations. The social welfare system demonstrates an example where services with "user choice" have been introduced. This allows the users, or "customers," to choose private instead of public providers. User choice can be supplemented with open comparisons, where actors are ranked by other users. Competition can be introduced at different stages and levels within the public sector: nationally, regionally, and locally. It can be encouraged between public organizations as well as between public and private ones. Jacobsson et al. use the higher education sector as an example of an area where governance is based on competition for students (Jacobsson et al., 2015, pp. 57–60).

Even with regard to fostering competition, there are clear signs of governing by organizing within the Swedish university sector. It can be observed through the focus on competition within and between universities that was put forward in both the Freedom Reform and the Autonomy Reform. The norm of competition was also applied to the question of organizational forms, not only by expecting institutions to develop the best possible organization based on the new conditions but also through the initiative to transform two universities into foundations. In conjunction with the Freedom Reform, Chalmers University and Jönköping University were transformed into foundation universities. As foundations, they are no longer government agencies. One of the goals of this initiative was to increase competition between universities as organizations; the government explicitly stressed the initiative as a way to foster "competition through organizational forms" (*konkurrens genom organisationsformer*) with the aim of creating more flexible organizational structures with efficient management.[21] In the preparatory documents, it was put forward that being government agencies placed constraints on the institutions' ability to find flexible solutions for their operations, thereby hindering competition between organizational forms and limiting efficiency. Thus, the transformation from government agencies to foundations was part of a vision of creating a variety of organizational forms within the university sector. This example also illustrates how the various aspects of governing by organization and setting the stage intersect with each other; the establishment of university foundations involves both fostering competition and creating formal organizations as a means of governance. In the preparatory work for the Freedom Reform, competition, in conjunction with deregulation, was presented as the path away from the problems of rigidity, uniformity, and inefficiency inherent in centrally planned systems (Bjare, 2023, pp. 98–115). Competition within the governance system was intended to serve as a catalyst for usefulness and quality in research. Competition was seen as a natural regulator within the contractual relationship, characterized by information asymmetry.

[21] See, for example, Ministry Publications Series Ds 1992:1 and the government bill, prop. 1992/93:231, p. 12.

Recent governance initiatives have incorporated elements of competition, whereby policy instruments are employed to stimulate competition between universities. This is achieved through governance mechanisms directed toward universities, aiming to incentivize "strategic action." Illustrative examples of this include the government's endeavor to foster "profile areas," where universities engage in a competitive evaluation process that is connected to the allocation of research funding.[22] In such performance-based models, rankings and bibliometrics are often addressed as "neutral" indicators of quality, fostering university competition (Hammarfelt et al., 2016). Similarly, the mandate of the Swedish Higher Education Authority (UKÄ) to assess the quality assurance efforts of universities, which since 2017 has encompassed both higher education and research, serves as a means of comparing different institutions while concurrently holding each institution accountable for ensuring and enhancing the overall quality.

However, today competition in the research landscape extends beyond the interorganizational, manifesting itself among researchers when they compete for external funding. The centrality of competition for external funding within the governance framework is evident, indicating that governing by an organization, through the promotion of competition, plays a pivotal role in steering research within the university sector. Particularly noteworthy is how this form of governance is perceived by individual researchers. The competition for research funding significantly shapes the actions researchers take in order to create space for autonomy in research. It has been demonstrated that competition primarily impacts the trajectory of research through adjustments in research areas and questions (Bjare, 2023, pp. 144–151). Consequently, competition determines the nature and scope of research endeavors undertaken. Moreover, competition influences researchers' strategies, encompassing their establishment of networks to shape research policy through advocacy or manipulation, engagement in commissioned research endeavors, and creation of opportunities for autonomy in collaborative research projects with external entities, including corporations and non-state actors (Bjare, 2023; Gläser et al., 2010; Laudel & Gläser, 2014; Leisyte et al., 2010; Luukkonen & Thomas, 2016; Miller & Neff, 2013). Consequently, competition assumes a central role in researchers' negotiations for autonomy, spanning the selection of research topics, formulation of research questions, and even publishing strategies. This establishes the current framework for scientific autonomy, wherein discussions regarding researchers' societal responsibilities, the utility of research, and its advancement—aspects of mattering—occur at the level of individual researchers. Analogously, the internal management landscape of universities is also influenced by competition, particularly when negotiations for autonomy predominantly occur between individual researchers, research groups, and external entities, often non-state actors (Bjare, 2023, pp. 209–210).

[22] See decision taken by the Swedish government: *Regeringens uppdrag (U2022/00168) till statliga forskningsfinansiärer att utveckla en modell för kvalitetsbaserad resursfördelning av universitetens och högskolornas anslag för forskning och utbildning på forskarnivå.* See also the Swedish Research Council (2021): *Kvalitetsbaserad resursfördelning – förslag till ny modell.* Stockholm.

Positioning

The fourth form of governing by organizing is referred to as positioning. It concerns the relationships and connections that organizations have with other parts of the sector and/or society, depending on the policy area. This governance strategy involves the deliberate linking of organizations within a given area. The linking requires that the organizations position themselves in relation to one another, both to external actors (i.e., nonpublic actors) and internal actors within the state. Essentially, it is about *which* actors an organization is exposed to within the governance area. As an example, the Swedish forestry policy is mentioned, where the government decided that the Swedish Forest Agency should include external stakeholders in the work on the goals of the Forestry Act. This meant that the agency collaborated with 17 other actors, both external and internal, in developing detailed goals for forest management (Jacobsson et al., 2015, pp. 50–57).

Organizational positioning in relation to actors can occur at different levels and can be expressed through work methods, the level within the organization at which contacts are made (i.e., who is subject to governance through positioning), and the frequency and proximity of contacts. Thus, positioning involves both, which other actors an organization needs to relate to and which actors within the organization manage the positioning. It may involve organizations within a given area having different goals and missions, but through governance, they are "forced" to meet and relate to each other, which affects how their operations are shaped (Jacobsson et al., 2015, pp. 50–57).

The strategy of positioning can also be applied to comprehend the interrelationships among actors within the governance system. In the context of the university sector, it becomes apparent that both universities and individual researchers strategically position themselves in relation to other actors within the system. The implicit regulations of governance shape the timing and nature of interactions among actors in the system, thereby influencing the behaviors of researchers and their positioning efforts in pursuit of autonomy. Within this governance system, university researchers are compelled to navigate the perceived expectations of research funders regarding the relevance and direction of their research. These positioning endeavors occur at various stages of the research process and to differing degrees. Furthermore, they are contingent upon the nature of the external funder. Researchers who receive funding from government research councils, particularly the Swedish Research Council, perceive less need to align the research process with the interests of external funders in comparison to researchers funded by external sources such as companies or industries (Bjare, 2023, pp. 158–188).

Moreover, the act of positioning serves to highlight the inherent interdependency in the sector where universities, in their internal governance, need to position themselves in relation to the governance system as a whole. Universities are required to establish relationships with other actors within the governance system or the sector and strategically plan and organize their operations accordingly. This includes considerations of external funders, who impact the direction of research

conducted within the university, and regulatory bodies that evaluate higher education and research activities; it also entails adapting to bibliometric means of governance at different levels within the institution (Hammarfelt et al., 2016; Nelhans, 2013, 2022). Additionally, it encompasses international relations, where the universities position themselves within international collaborations and rankings. The strategy of positioning can provide insight into why the internal management strategies at times serve as buffers against external steering initiatives; for example, management may make efforts to minimize the impact of the way that external funding is distributed across different disciplines and departments within the institution. In other cases, the external steering mechanisms become incorporated into the management by, for example, including external funding as an "excellence indicator" that is rewarded in the internal allocation of resources. Notwithstanding the variations in behavior across different universities, the internal management dynamics underscore their strategic positioning in relation to other actors operating within the governance system that take part in "setting the stage."

Further examples of positioning can be observed in the 1977 reform, where, as noted above, external representatives were appointed to "represent public interests" (*företrädare för allmänna intressen*), and administrative staff were incorporated into the decision-making structure with the principle of administrative democracy.[23] Through regulation, the external representatives were included in the collegial bodies within the universities. The introduction of administrative democracy entailed a form of positioning within universities where teachers and researchers needed to consider the interests of other groups in the planning of internal operations. However, this form of internal positioning was abolished through the Freedom Reform and the Autonomy Reform. In the preparatory work, it was stressed that the power of contributing new and fruitful perspectives within research belonged primarily to the academic staff. Adding to this, both individual researchers and Faculty Boards were positioned in relation to external funders; Faculty Boards were encouraged to introduce peer-review processes for the allocation of internal research funds, similar to how the research councils were organized.[24] Throughout the various reforms, the policy level has consistently assessed which actors the internal decision-making bodies within the university should be positioned against in order to fulfill the sociopolitical objectives.

Distancing

The fifth and final form of governing by organization, distancing, concerns delegated decision-making. The delegation of mandates involves finding a balance between democratic principles, as represented by the parliament and government, and the efficiency of control. Delegated decision-making assumes that the administration responds to control while maintaining a certain degree of autonomy. The extent of this

[23] Section 31, last paragraph of the Higher Education Act (1977:218), issued on May 5th, 1977.

[24] See government bill, prop. 1992/93:170, p. 39–44.

autonomy depends on the assessment of implementation risks. In order to maintain democratic legitimacy, the government must have the ability to influence decisions for which it may be held accountable. This requires a vertical responsiveness within the control system.

One approach to ensure that the administration aligns with the government's objectives is to regulate decision-making authority within an organization. In contrast to positioning, control through distancing primarily concerns the vertical relationships between organizations within a system. Thus, governing by organizing through distancing pertains to the vertical relationship between the government and agencies. Through control mechanisms, the government can choose to maintain a certain distance from an agency, granting it a higher level of autonomy. As a result, responsibility is further delegated within the administration, based on the principle that the greater the autonomy an organization possesses, the less likely it is that the government will be held accountable for any failures that may occur (hands-off approach). Conversely, when control is closer (hands-on approach), the aim is to increase the influence of the policy level over the organization's operations, which also entails a higher risk of accountability (Jacobsson et al., 2015, pp. 60–66).

The university sector also provides examples of distancing as a form of governing by organizing. The assessments made at the policy level regarding the extent and level of control have shown variation over the past five decades. Furthermore, the delegation of decision-making authority has entailed considerations of *which actors* are best suited to make decisions within a university. In the case of H 77, a certain degree of delegation and decentralization of administrative and financial decisions occurred, granting autonomy to the universities. A prerequisite for such delegation was the establishment of rules governing the composition of decision-making bodies within the universities. The overarching objective was to enhance societal accountability. Notably, a clear hierarchical structure was in place, emphasizing obedience, and the introduction of a new corporative collegial form of governance was regarded as a significant element in the allocation of mandates.

The delegation of decision-making authority to universities regarding their internal organization has increased since the 1990s. However, certain fundamental regulations are still outlined by the government and/or parliament. This pertains to the manner in which decisions concerning core activities, such as the direction, quality, and organization of education and research, are entrusted to teachers and researchers within the universities. Similarly, the categories of teaching staff and the decisions pertaining to the appointment of professors are regulated to be made by the institution's president, without delegation within the university. Despite the increased decision-making authority over internal organization and resource allocation, it appears questionable whether the reform has translated into increased autonomy for individual researchers in practice. Instead, governance has taken on a different form, focusing on both central capacity and control, as well as coordination and networks. Notably, researchers perceive a stronger influence over the research process from external funding than from internal management (Bjare, 2023, pp. 144–151). This observation suggests that positioning and competition play a more significant role in governing higher education and research practices than distancing.

Concluding Remarks

Although universities are generally regarded as stable organizations, significant changes have occurred within the sector since the 1970s. These changes have resulted in a shift from heavily rule-governed institutions to decentralized organizations that rely increasingly on performance management and competitive allocation of resources. As underlined by Gornitzka et al. (2005), the ideological or normative foundations of a policy are often ambiguous or inconsistent, and policymakers frequently prioritize conflicting rationales during the policy formulation process. The government's capacity for intervention and the complexity and uncertainties of the policy area are crucial factors in this decision-making process (Howlett, 1991). This is particularly interesting in relation to the governance of the semi-autonomous university sector. To understand the governance of this sector, it is necessary to consider a range of aspects, including traditional hierarchical planning (vs. self-regulation), control mechanisms, and soft governance.

Analyzing policymaking through the prism of governing by organizing gives insight into the use of different policy instruments and how they are combined in the specific context of higher education and research. The empirical examples in the chapter show that the governing capacity of the state has depended on organizational factors. The organizing strategies in practice are used together in complex ways and, as stressed by Jacobsson et al. (2015, p. 75), the ways the government steers are strongly dependent on, and explained by, institutionalized ideas and practices. Policy areas entail goal conflicts and embedded tensions (Gornitzka et al., 2005) and the organizational structure does not entirely determine outcomes within a field. Yet it is clear that the organizational dimensions of governing play a pivotal role in shaping the dynamics and interactions within a policy area.

Thus, in this chapter, I have used the theory of metagovernance—through governing by organizing and setting the stage—to contribute to the understanding of the development of governance in the university sector since the late 1970s. The analysis has taken a broad approach, highlighting examples from major reforms and current developments. Reforms in the university sector have included storytelling through reform narratives, which in turn have led to the creation of formal organizations. These two aspects of governing by organizing establish the fixed conditions for universities, through regulations and other governing documents, forming the formal organization of the university sector.

In addition, competition, positioning, and distancing have influenced the relationships within the system. These are different ways of governing that also include relationships to non-state actors within the research system. As demonstrated, these relationships exist between multiple actors within the system, both vertically and horizontally. The trend of fewer regulations on university organization, increased reliance on external research funders, and more policy instruments designed to emphasize the university management as "strategic," have resulted in changed forms of state governance that can be connected to competition, positioning, and distancing strategies.

Throughout the process of policy formulation, varying degrees of consideration have been given to the special position of higher education and research within society, while there has been a push to utilize universities as vehicles for achieving social policy objectives. The level of trust in the academic community's ability to construct, safeguard, and develop a functional organization in accordance with the societal needs has varied depending on how policymakers have perceived the internal organization's efficiency and capability. Hence, the policy instruments have been used in various ways. This contributes to the understanding of why policymakers choose a specific policy instrument; to some extent, it opens up the black box of government practices with relation to the circumstances in the university sector.

The starting point of this chapter was the recent decision by the Swedish government to reduce the term of office for university board members and initiate a reformed appointment process for board members. This decision has been regarded as a significant policy shift, where the government has been criticized for moving too far away from the previously observed distancing approach in governing universities. In this chapter, I have demonstrated the Swedish government's attempt to strike a balance between various demands and values inherent in the university sector through five organizational dimensions of governing that operate both horizontally and vertically. Regarding the board members, both vertical (distancing) and horizontal (positioning) strategies lie behind the decision, although they fail to tell a story that is perceived as legitimate and trustworthy by university representatives. Instead, it is considered an ignorant approach to managing the delicate balance of governance, neglecting both the unique position of universities among the government agencies and the inadequacy of detailed top-down steering in a policy area that requires self-regulation and autonomy. How this form of governance will unfold and its effects are key questions for universities.

The organizational dimensions of governing have been motivated by a persistent endeavor to align the relevance of universities with political objectives, to determine how universities should matter, alongside ambivalent positions toward academic autonomy and self-governance. The government consistently seeks novel approaches to enhance its governance, while many governing instruments recur. In the case of the board members, however, it is conceivable that we have witnessed a shift in the contractual relationship that to various degrees has characterized the organizational dimensions of governing. In this instance, the government has crossed a boundary, proceeding without the conventional dialogue and grounding and on ambiguous premises, becoming too close and detailed when regulating the process. The development has led to an increasing number of actors advocating for a transformation in formal governance of universities, whereby the organizational structure of universities would be reconfigured into an alternative public legal framework, endowed with a heightened degree of autonomy akin to that of the Swedish courts.[25] Even this could be perceived as a manifestation of governing by organizing, albeit one

[25] See, for example, recent publications from The Association of Swedish Higher Education Institutions (2023), Ekberg (2023), and Ahlbäck Öberg (2023).

that would ultimately curtail the government's ability to continue its current practices, wherein universities themselves define the requisite organizational structures to make universities matter.

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Responsive Research Quality Articulations of the Humanities

Klara Müller

Introduction: Narratives of Neglect

Does quality in research affect how universities matter? Expectations of how universities should matter to society have increased over time. This is particularly true with regard to the so-called "knowledge society" of the 1980s and 1990s and its subsequent research policy (Benner & Widmalm, 2011; Gibbons, 1999), wherein knowledge production was increasingly recognized as the future basis of the economy. These ideas had a major impact on Swedish research policy, particularly during the 1990s, when the ideal of global competition in knowledge production as a recipe for economic growth (Benner & Holmqvist, 2023) led to increased funding for research and higher education. However, the increased funding came with strings attached. Within the new "policy regime" (Ekström & Sörlin, 2022) of the 1990s, research quality was increasingly perceived as something that could—and should—be constantly improved and assured (de Miranda, 2003; Gulbrandsen, 2000). Problem formulations of "quality and relevance" were connected to an idea about investments in research yielding specific returns (such as citations, innovation, or internationalization) (Ekström & Sörlin, 2022). Previous research has concluded that this period marked a shift in perceptions about research quality in general (Langfeldt et al., 2020; Schwach, 2022; Sörlin, 2018). The research policy of the knowledge society was occupied with, among other things, enabling quality, but we do not know much about how quality was articulated and how it changed over time.

Important to the understanding of how research quality articulations developed is that notions of quality did already exist, notably in specific disciplinary cultures (Becher & Trowler, 1989), which meant that an enhanced situation of "coexisting" quality articulations (Langfeldt et al., 2020) was emerging. Such policy changes

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affected disciplines in different ways (Borlaug & Langfeldt, 2020; Söderlind & Geschwind, 2020).

According to previous studies on Swedish research policy, one particular area, the humanities, has been relatively disregarded in policy discussions (Ekström & Sörlin, 2012; Salö, 2021). A review of research bills in Sweden revealed a consistently low articulation of the humanities (Ekström & Sörlin, 2012, p. 42). Influences from the "entrepreneurial turn" and New Public Management (NPM) have been understood as particularly unfit for the humanities (Benner & Sörlin, 2007), and quantitative performance indicators, academic capitalism, and the "publish or perish" culture, often connected to neoliberal reforms, have also been recognized within the debate as having particularly severe impacts on the humanities (Benneworth et al., 2016; Hammarfelt & de Rijcke, 2015; Rider et al., 2013). This discursive neglect, combined with the normative accounts of neoliberal influences on the humanities, has resulted in a distorted account of the recent history of research policy and the humanities. Given that discussing *how universities matter* involves the whole university, why should scholarship not pay due attention to the humanities?

In public and academic debates, scholars have reacted to this neglect of the humanities (Bod, 2020; Holm et al., 2015; Nussbaum, 2010). This is illustrated, for example, through certain narratives on the so-called crisis of the humanities (Östh Gustafsson, 2022). A recurring issue of debate has been the inadequacy of evaluation procedures and, more specifically, how research quality is evaluated (Sörlin, 2018). Recent work on the Swedish history of humanities shows how marginalization in policy and a protective attitude have led humanities scholars to view themselves as being primarily engaged in "defensive and reactive modes of critique" (Ekström & Östh Gustafsson, 2022). Thus, to some extent, humanities scholars have been understood as outsiders to the system, uninterested in complying with the conditions of the policy regime (Ekström, 2022; Östh Gustafsson, 2020a, 2020b). Historical accounts of the humanities in Swedish policy have also largely been occupied with the reactive critiques of scholars, providing an understanding of the humanities as perceived by society (Tunlid, 2022).

The following study builds on a line of recent work on the history of humanities (see Bod et al., 2016; Ekström & Östh Gustafsson, 2022; Östling et al., 2022; Paul, 2022) but aims to contribute to this field with a new focus, namely, how research quality articulations circulate between various contexts and what sorts of articulations might emerge through this movement. The chapter thus offers a historical contribution to how particular articulations of quality came to matter as part of the reformed research policy regime that was starting to take shape in Sweden in the 1980s.

The aim is to understand the changes in research quality articulations related to more general developments in Swedish research policy, and how these developments in turn shaped research quality articulations in humanities policy spaces. The chapter concerns how research quality articulations of the humanities changed between 1980 and 2010. It focuses on the interactions of policy layers, and on the quality articulations these interactions generated. The chapter aims to answer the following questions: How have research quality articulations coexisted, interacted,

and changed in Swedish research policy spaces between 1980 and 2010? Why did certain articulations of research quality become established and used from, within, and related to the humanities?

Co-produced and Responsive Research Quality Articulations

A premise of this study is that quality articulations are shaped through interaction and can therefore be studied by tracing their development and circulation between different contexts and over time (Lamont, 2009; Langfeldt et al., 2020; Wouters, 2019). This differs from the notion of research quality as an inherent trait, possible to detect by a sorting process.

Previous studies have primarily examined research quality as something that is articulated externally or internally (Langfeldt et al., 2020). While these approaches have been very useful in grasping such an elusive phenomenon as quality, this study takes a different approach. The recent developments in theorizing research quality, which are followed here, suggest that research quality should not be studied as something fixed but should instead be understood as contextually contingent (Langfeldt et al., 2020; Schwach, 2022). Internally and externally defined articulations on quality are thus always intimately co-developing, and with different relations of dominance. The suggested approach of studying research quality as coexisting and conflicting, formulated by Langfeldt et al. (2020), is used in this chapter as a theoretical framework; however, the framework is also developed to empirically examine the interaction, coexistence, and development of quality articulations as responsive. A historical approach is therefore used to uncover changes over time.

In focus of the study are changing quality articulations in separate but still intrinsically interwoven layers of policy. In order to describe these relations, I make use of the concept of co-production, referring to how a new type of knowledge is generated in the meeting between policy and science (Jasanoff, 2004). A recent contribution to theorizing these interactions has suggested the term "co-production space" to explain the knowledge exchange arenas, with their intricate networks (Thune et al., 2023). Salö et al. (2024, this volume) study a similar process that they label "knowledge brokering"; however, they focus on how science is taken up into policy.

The empirical analysis stems from documents and publications from Swedish research policy spaces. The central material used to study the overarching national developments in research quality articulations is the Swedish research bills, which can provide an understanding of the research and higher education policy carried out by the government at the time (Bjare & Perez Vico, 2021). The Swedish research bills have been described as where discussions about knowledge are turned "into flesh" since these are where research policy discourse is turned into reality through political decisions (Widmalm, 2016). Also, humanities research policy spaces have been studied, through disciplinary evaluations initiated by the central university and higher education authorities and carried out by the Swedish Research Council for the Humanities and Social Sciences (HSFR) and, since 2001, by the Swedish Research

Council. I also draw on reports on the humanities and internal university evaluations on the humanities.

The research policy layers in focus in the present study serve as good examples of co-production spaces, and quality articulations become examples of what the knowledge exchange generates. Humanities policy spaces are captured primarily through policy documents from the HSFR and disciplinary evaluations that refer to the humanities. Research councils have been theorized as "semi-independent agencies" that are, on the one hand, closely linked to research communities, and on the other, to the government, leading to a situation where the loyalty might be bi-directional, having to balance the interests of both researchers and policymakers (Slipersæter et al., 2007, p. 401). Guston (2001) described research councils as "boundary organizations," and Rip (2000) referred to them as "aggregation machines" due to the increased pressure on them to take in proposals and convert them into decisions. Thus, research councils are placed "at the nexus of contemporary demands of the NPM and growing expectations over the social and economic benefits of scientific research" (Sá et al., 2013, p. 106).

I make use of these descriptions in understanding the humanities policy spaces as a sort of "mid-layer," where quality articulations are negotiated and adapted in order to work in a bi-directional way. These policy spaces thus work to co-produce the interests of scientists and policymakers, and this is how they create responsive quality articulations. Since quality is here taken to be both interactive and contextual, it is here understood to be primarily articulated neither within a particular scientific disciplinary community nor by policy governance. The co-production takes place in both spaces at the same time, constantly reconnecting and renegotiating internal and external values and criteria when articulating quality.

Responsive Research Quality Articulations in the Knowledge Society

In the following sections, I move back and forth between an analysis of the governmental research bills and the humanities research policy spaces in the different sections. I trace research quality articulations in Swedish governmental research policy during the 1980s, as expressed in the recurring research bills. I focus on how quality has been articulated in response to surrounding changes in the research policy regime, drawing on previous descriptions of a policy regime as the priorities of research as stated in policy documents and practices such as the research bills (Ekström & Östh Gustafsson, 2022, p. 18; Ekström & Sörlin, 2022). I further trace how the articulations found in the research bills coexisted with and/or co-produced those found in the humanities research policy spaces, and follow the responsive research quality articulations in different policy layers of the Swedish knowledge society.

Research Quality as a Matter of Disciplinary Expertise

The first research bill was finalized in 1982, and in it, the concept of research quality was linked to evaluations. However, *how* the evaluations were to be carried out was not clearly specified; according to the instructions, it was up to the research councils to carry out evaluations within their areas of expertise.

Societal use of the knowledge produced was also underlined as a key component of research quality, and this would be guaranteed through quality evaluations organized by the researchers themselves. With regard to policy in the early 1980s, it was assumed that researchers knew best what type of knowledge would benefit society.

However, there were also attempts to introduce systems to standardize quality assessment, particularly of doctoral theses. Suggestions on how to standardize previously ad hoc methods for evaluating quality marks the turn to a more elaborated research policy in terms of involvement in research (*prop. 1981/82:106*, p. 3).[1] The succeeding bills during the 1980s followed similar patterns in terms of how research quality was articulated. There was, for example, a focus on strengthening basic research in order to improve quality, and on further strengthening quality control within the community of researchers (*prop. 1983/84:107*, pp. 1–2). Improving work conditions for researchers would enable them to produce research of quality, and it was described as a necessity to continue these efforts to make sure that the upcoming generation of researchers would have the support they needed (*prop. 1986/87:80*).

Translating scientific quality standards and ventures was recognized as the responsibility of the research society; however, it was more specifically stated that this happened through international research collaborations and their ongoing evaluation of earlier and ongoing research to assure its quality (*prop. 1986/87:80***,** p. 35).

During the 1980s, the bills highlighted the agency of researchers, and the role of research policy was largely formulated so as to improve conditions for researchers in order to improve the quality of research. For humanities scholars, the bills favored the quality articulations of the Swedish Council for Research in the Humanities and Social Sciences (HSFR). However, there are many indications in the research bills of how the space for discipline-specific articulations started to change, such as the processes of standardizing the assessment of doctoral theses. Also, the 1989 bill brought up the contradiction of leaving a significant measure of "social responsibility" for researchers, while also leaving them largely free to increase the "common knowledge" on their own (*prop. 1989/90:90* p. 5). However, such a "division of labor and responsibility" was supposedly possible in a "genuine democracy," thus, creating the right conditions for trust between research and the public was understood as one of the main tasks to be carried out in order to increase research quality (*prop. 1989/90:90*, p. 5). This indicates how research quality was increasingly becoming a matter of interest beyond researchers.

The research quality articulations changed in many ways over this early period of the research policy regime, connected as it was to the ideas of the knowledge society; however, they still maintained some of their previous meanings. The changes did

[1] All translations from Swedish have been done by the author, unless otherwise stated.

affect all policy spaces in the same way, why humanities policy spaces are further studied in order to better understand the changing, coexisting, and responsive research quality articulations in other layers of the Swedish policy landscape.

Responsive Evaluations in the Humanities

HSFR, the Swedish Research Council for the Humanities and Social Sciences, was founded in 1977 by a merger of the Governmental Council for Societal Research (*Statens råd för samhällsforskning*) and the Governmental Council for Humanities Research (*Statens humanistiska forskningsråd*) with the main task of stimulating as well as financing basic research and scholarship within the humanities and social sciences. HSFR members interpreted the task as involving quality evaluation of research, and in its early days, this quality evaluation was primarily understood to be carried out in connection with the yearly applications for funds from the research community (*HSFR-nytt*, 1981). However, HSFR started to commission evaluations of its disciplines in 1985 in response to what had been stated in the governmental research bills in the early 1980s. The first disciplines that underwent this type of evaluation, starting in 1985, were history and sociology. Later on, in 1989, economics, linguistics, and cognitive and biological psychology were also evaluated by HSFR (Härnqvist et al., 1997, p. 11). The disciplinary evaluations were contrasted with the continuous scrutinizing processes of research communities, which usually would concern individual scholars or research projects. At this time, the HSFR members described an emerging pressure to establish a "comprehensive overview of the state of the art of Swedish research in an international perspective" (Härnqvist et al., 1997, p. 5).

However, when the idea to carry out disciplinary research evaluations of quality was first raised, it was "not met with particular enthusiasm by the HSFR members" (Härnqvist et al., 1997). The reason for this skepticism was that such evaluations were understood to be difficult to carry out within the cultural disciplines. In the first edition of HSFR's own journal in 1981, *HSFR-nytt* [HSFR-news], the chief secretary Pär-Erik Back wrote that the public debate indicated that something was wrong with the humanities, but a more precise diagnosis was lacking, why the government had commissioned the HSFR to investigate the conditions for bringing about improvements in the field of research in the humanities and social sciences and research relating to cultural expressions and cultural issues (*HSFR-nytt*, 1981). HSFR was thereby assigned to carry out an analysis of the state of the humanities and social sciences in preparation for the next research bill, and to propose measures to improve the quality of research and working conditions of researchers in the field (with an emphasis on research in the humanities).

While accepting the idea of disciplinary research evaluations, suggested by the government, HSFR themselves did initiate a report in the early 1980s where researchers in the humanities got to write personal observations from their own work environment. It was titled "Six voices about the everyday life in science", and the aim

of this initiative was to complement more standardized forms of evaluation that had been initiated from a top-down perspective (Löfgren, 1982, p. 7). Thus, there were various attempts to formulate how and why research quality where to be evaluated.

Experimenting with "Top-Down" Humanities Quality Evaluation

In 1988, the report on history that had been initiated in 1985 was published, setting out to evaluate the state of historical research in Sweden but also to test the "opportunities and problems inherent to research evaluation at a national level" (Danielsen, 1988). This evaluation involved six historians giving their views on the state of the field while also reflecting on how and why evaluations of history and other humanities fields were to be carried out. In the preface, the HSFR director reflects on the process of evaluating research quality as something neither new nor uncommon—critical assessments of scientific practice were constantly present in academia. However, the usual ways of assessment were only focused on individual scholars or individual research projects.

The report starts with reflections by the historian and principal secretary of the National Research Council Committee Hans Landberg under the headline "An Experiment in Evaluation." There had been a desire to extend systematic evaluation efforts beyond the natural sciences, since the Natural Sciences Research Council (NFR) had been making systematic, and what were considered successful, efforts since the late 1970s to also include the social sciences and humanities (Danielsen, 1988). The considerations of how to carry out an evaluation of historical research entailed discussions with a representative group of Swedish historians, particularly since the experience was lacking—it was, after all, an "experiment." In the case of humanities, this was the first attempt at a major evaluation at the national level in the Nordic countries.

However, Landberg thoroughly problematized the very practice of evaluating research on this scale, stating that evaluations were never unproblematic, regardless of disciplinary area. He described how the humanities were compared to the natural sciences, where methodological, theoretical as well as "other quality criteria" were understood as both internationally established and "fairly unambiguous and well-defined," with a majority of the scientific community broadly adhering to the same criteria. Altogether, it was perceived as more manageable to evaluate the quality of natural science research compared to humanities research. But even in the natural sciences, questions had been raised as to what the additional evaluations actually provided. With this in mind, Landberg felt compelled to raise the question of whether a discipline such as history would actually benefit from a "top-down" evaluation.

Despite this general critique of national evaluations, the evaluation group decided to evaluate history on their own terms with the aim to stimulate a concrete and positively critical evaluation discussion at the collegiate level. This evaluation was

based on analyses by Nordic historians in a few thematic areas and the historians had been assigned to evaluate the general direction, development, and quality of research in a Nordic and, if possible, wider international perspective. The intention was not to "make a grading comparison between institutions or research groups, let alone to try to make an individual top ten list" (Danielsen, 1988, pp. 14–15). There was, in these statements, also a critique of making comparisons based on methods that were seen as too "simple."

Bibliometric methods were, at this time, perceived as particularly ill-suited for the field of history. Historical research was understood as "too widely-branched in terms of content and method, the research groups too loosely-knit, and the institutions by their very smallness too susceptible to changes in personnel and other shifts in research conditions to make such exercises meaningful" (Danielsen, 1988, p. 15). The evaluation was therefore structured so that four historians from Norway and Denmark, as well as one historian of science and ideas from Sweden, got to evaluate Swedish historical research on their own terms in five different thematically defined areas.

Production Results and Citations for International Comparisons

The discussions on making comparisons between research groups and between countries, including with bibliometric tools, were lively in the research bills during the 1990s. In the 1989 bill, it was stated that an analysis of research policy could not focus solely on the financial and organizational aspects; one also needed to learn about the results of the investments in research (*prop. 1989/90:90*). But how would the quality of results then be evaluated, as suggested by the bill? Two methods of evaluation were presented: one entailed regular assessments by international experts, and the other looked at the number of publications and citations of research results (*prop. 1989/90:90*).

The focus on results rather than on planning anticipated the restructuring of universities and higher education that took place in 1992, when the governing structure was changed in order to correspond to demands from the government for a more independent organization and increased power for each university to decide on the use of its resources (Lundberg, 2007). This happened in parallel with increasing demands for evaluation of the results, a direction that could be described as freedom under research quality evaluation.

Now, it was argued that, when evaluating the quality of results, the most important thing was that they be presented to other researchers internationally. This was best accomplished through publication in scientific journals. These arguments were considered to refer mainly to the natural sciences and medicine—even though it was "also important in some social sciences and humanities disciplines" (*prop. 1989/*

90:90, p. 16). Despite recognizing the unequal measure of international journal articles as a sign of research quality between disciplinary fields, bibliometric methods were introduced as a good way to get a picture of Swedish research quality in comparison to other countries. Citation numbers were thereby connected to national research policy articulations of quality, even though this was understood as unfavorable for the humanities.

The 1992 research bill was coupled with the introduction of performance management to research and higher education. The bill stated that the future of Sweden depended on investments in knowledge, and that "systems for resource allocation and evaluation must be designed to stimulate the emergence of creative research environments and promote high quality" (*prop. 1992/93:170*). It was no longer enough for research just to be of "scientific quality"—it had to be of *high* quality to have any value! This was the first bill where a focus on excellence—beyond solely research quality—was heavily pushed in order to ensure that Swedish research could compete in a global arena. One suggested way of achieving this quality was to create centers of excellence that could integrate research of the highest quality of a "different but complementary nature within a subject area, thereby generating synergies leading to better performance and use of resources" (*prop. 1992/93:170,* p. 35). It was hoped that this would contribute to the development and competitiveness of Swedish industry. Thus, the highest possible research quality was articulated as something that would make Swedish industry more competitive internationally. Research was thus formulated as a resource for economic growth in global competition; the excellence of these centers would be guaranteed through reoccurring quality evaluations with international participation, and the results would also guide the allocation of resources (*prop. 1992/93:170*, p. 35).

The following bill further increased societal relevance as a criterion of research quality, for example, by highlighting the benefits of a funding structure based on other criteria than intra-scientific quality criteria (*prop. 1996/97:5*). The *production* of scientific articles was commonly used as an indicator of research quality, and Sweden was in second place among the OECD countries, "with more than 1500 published articles per resident" during 1994 (*prop. 1996/97:5*, p. 32). Only Switzerland was ranked higher in this regard. In general, international auditing and competition were seen as key to achieving high quality—and quality assurance procedures would have to increase even further, including within areas where they were still uncommon (*prop. 1996/97:5*, p. 37). Now, it was stated that research quality could only properly be valued from an international comparative perspective, and when it came to quality, all research funders should base their decisions on reviews that international experts had contributed (unless there were some particular circumstances making a national evaluation better suited) (*prop. 1996/97:5*, p. 47).

A Range of Views on the Humanities and Quality

The government's research advisory board launched a series of seminars in 1996 with the aim to "provide an overview of the direction and quality of Swedish research" (Forskningsberedningen, 1997). The context was that the increasingly central role of research and knowledge in society, and Sweden's membership in the EU, was accompanied by new demands from society. The first seminar, held in May 1997, focused on the humanities. The seminar, according to the instructions, addressed issues such as the development and quality of humanities research, the benefits of humanities research, and patterns of resource allocation (Forskningsberedningen, 1997).

The contributors were of quite diverse backgrounds, though the majority were professors in humanities disciplines. Inge Jonsson, professor in literature as well as chief secretary of HSFR 1987–88, problematized what he saw as a fixation on the present in humanities and research policy. To exemplify this fixation, Jonsson referred to a recent doctoral thesis on a contemporary Swedish author; he observed how it used "foreign theories" that the doctoral student did not entirely comprehend, and Jonsson also noted that almost no doctoral student these days would go further back than the nineteenth century (Forskningsberedningen, 1997, p. 12). He concluded with the observation that, over his active years as a researcher, something had "changed in the very core of the valuation of the humanities" (Forskningsberedningen, 1997, p. 12). This statement by Jonsson referred to how the talk of research being of societal use had, over these years, come to be about the natural sciences, excluding humanities—which was not how it had been when he started out in academia.

Another contributor, Aant Elzinga, focused on summarizing an evaluation of the humanities from Switzerland. Elzinga stated how the evaluation focused on research quality and made use of a wide range of sources for analyzing the state of Swiss humanities. The Swiss evaluators tried to make use of the Arts and Humanities Citation Index (A&HCI), but it proved not to work well for the humanities, and they stated that it should not be used unless with complementary instruments. Even then, the Swiss advice stated that it should be used only as a "diagnostic tool to develop a dialogue between representatives of research fields" and not as a basis for deciding on how to allocate resources (Forskningsberedningen, 1997, p. 16). The A&HCI was also discussed in a contribution by Olle Persson, a sociologist influential within the field of bibliometrics, in a text on Swedish publication patterns in international humanities journals. Despite all of the limitations of the A&HCI, Persson thought a study of the Swedish humanities would be useful while stressing that publishing activity should *not* be perceived as a measure of quality. He argued that, instead of being related to quality, international publishing was mainly about contributing to a wider dissemination of results. In other words, the main purpose of the publication was the exchange of information. The results from Persson's study showed great variety between areas, but he argued that this had to do with varying publication cultures and therefore little to do with the "volume or quality of research activity."

Research quality in the humanities was therefore not to be evaluated using citation measurements, according to these responsive quality articulations. Instead, citation measurements would only be suitable for information gathering. Thus, research quality at this point in time was articulated as unrelated to citation indexes within humanities research policy—but there was a general push to further engage with the possible uses of these databases.

Humanities Quality as Something Particularly Complex

The University of Gothenburg's humanities department commissioned a "strategic evaluation" of their research during the 1990s by a Nordic group of evaluators, which was finalized in 2000 (Sörlin et al., 2001). The evaluators' initial understanding of research quality was that:

> …quality is not a simple, one-dimensional and measurable thing, hardly in any field of knowledge, and certainly not in the humanities. At the same time, it is clear that humanities research, like other research, is subject to increasing demands to report on the results of its activities. Even if the most important long-term outcomes are "insight" and "knowledge", the client, the state and citizens, have a right to know whether the resources, as used, really serve these purposes. (Sörlin et al., 2001, p. 18)

Research quality was here articulated as something complex, which was valid for all fields, but in particular when discussing the humanities. However, due to the increasing demands for reporting research results, this group of evaluators decided that they were not satisfied with solely explaining quality as something particularly complex. They, for example, described the abstract concepts of "insight" and "knowledge" as the most valuable long-term results when reporting on the results of research, but stated that this was not enough to explain the use of the resources to the non-academic world.

Due to general use of quality articulations, which included explainable results of the resources spent, the evaluators highlighted how the "output" of humanities research was also of importance. One task was understood as to more precisely learn about how research with "high productivity and strong publication patterns" correlated with insight and knowledge (Sörlin et al., 2001, p. 18). The third chapter of the evaluation, for example, used a number of dimensions that were to be understood as central to research quality: the production of publications, production of PhDs, external funding, and international contacts (Sörlin et al., 2001, p. 42).

However, the overarching work of the evaluators was described as focused on quality rather than quantity, in terms of their methodology, and they used a combination of qualitative and quantitative means, combining interviews, questionnaires, peer review, bibliometrics, and more. The evaluators understood their task as a qualitative assessment of the existing work at the faculty but at the same time also an attempt to value the more general developments in humanities research "in the light of the transformation and changing needs of society" (Sörlin et al., 2001, p. 19). Their task was to evaluate humanities research "for the society we will live in tomorrow,

not humanities for the time we have left behind," though this would not discount the fact that "many of the meanings of the humanities have existed for a long time and will continue to exist as long as we can envision" (Sörlin et al., 2001, p. 19).

This group of evaluators had a more positive stance toward the relationship between citation indexes and quality compared to the seminar reports described in the prior section, from a few years earlier. The evaluators stated that the quality of humanities research had to be evaluated with qualitative criteria but found that quantitative measurements of research productivity and quality could constitute a useful complement to the qualitative analysis (Sörlin et al., 2001, p. 7). Thus, compared with, for example, Olle Persson's opinion in 1997, it was here understood as a possibility to use bibliometrics to evaluate research quality.

The responsive research quality articulations expressed in this evaluation of the humanities in the 1990s at Gothenburg University were thus shaped in interaction with notions about how societal usefulness should be expressed, responding to the surrounding changes in knowledge politics.

Resources for Quality in National Research Policy

The 2000s were characterized by growing investments in research, with almost a doubling in governmental funding during one decade, landing at about 4% of the total state budget (*Vetenskapsrådet*, 2018, p. 31). This was reflected in the following bills, from 2000 and 2004, where the policy goal was to encourage high quality in all areas of research and to make Sweden a "leading knowledge nation." This demanded great investments by the government as well as industry (*prop. 2000/01:3*, p. 10). The discussion on research quality was centered on international competition in the 2004 bill, where citations were used to compare how frequently Swedish publications were cited and how different areas were "doing" internationally in terms of quality (*prop. 2004/05:80*, p. 24). Thus, quality was clearly articulated as something to find in comparison with other countries, preferably by studying citation numbers. Since its presidency in the EU during the spring of 2001, Swedish policy was also working for a European research council that would have scientific quality as its leading star, which would work to strengthen European research globally (*prop. 2004/05:80*, p. 11).

Achieving the *highest* scientific quality was the direction set out for the reorganization of research funding in 2001, when the Swedish Research Council (*Vetenskapsrådet*), *Fas* (later renamed *Forte*), *Formas*, and *Vinnova* were formed with the goal of making Swedish research interdisciplinary to make it successful, competitive and "world-class." Sweden would be one of the most research-intensive countries in the world—and all Swedish research was supposed to be of high quality—which would contribute to making Sweden Europe's most "competitive, dynamic and knowledge-based economy" (*prop. 2004/05:80*, p. 9). However, in this context, this meant prioritizing medicine, technology, and sustainability (*prop. 2004/05:80*). In 2007, the governmental reports *Resources for Quality* and *Career for Quality* were

placing quality at the center, primarily articulating it in terms of something to further enhance through competitiveness among Swedish institutions as well as in a global research landscape. According to *Resources for Quality*, the increased international competition had been the strongest external factor in creating strategies for universities, helping to identify priorities and niches in competition with a global research landscape. This also meant that composing university-wide strategies was "generating resources for quality" (Resursutredningen, 2007, p. 21). Thus, quality here encompassed adaptation on a university level to an international research landscape.

A small proportion of the funds allocated for universities by governmental means were exposed to competition, and this was articulated as a way to further increase quality (*Vetenskapsrådet*, 2018, p. 31). Further, quality indicators were supposed to be used for allocating resources, and the universities' ability to attract external funds would also serve as an indicator of quality (*prop. 2008/09:50*, p. 1). This was described as a "quality-driven reform that strengthens research and facilitates the institutions' internal quality work" (*prop. 2008/09:50*, p. 1).

Concluding Discussion

Over the period studied here, research quality shifted from being primarily a matter for the research society to articulate and the individual research communities to decide on, to something that became important to govern through policy tools such as bibliometric indicators and resource allocation. In the national research policy arena, quality articulations shifted from an emphasis on the self-defined quality standards of a scientific community to a generally acknowledged benchmark that in turn was supposed to generate other values—primarily in the form of economic gain, and more generally what was understood to be of societal use. Research quality became an increasingly important matter for policymakers. The new research policy regime that developed in Swedish knowledge politics during the period here studied entailed that previously silent, ad hoc knowledge on research quality became increasingly articulated with the emergence of a cross-university research-policy-oriented regime that involved a focus on articulating quality. This is, for example, exemplified in the standardization of doctoral education through the national research policy bills during the 1980s.

By studying the coexistence of research quality articulations in different research policy spaces, this study has contributed to an empirical examination of coexisting quality notions, which was sought in a recent study by Langfeldt et al. (2020). But by also studying the historical developments and changes in research quality articulations in different spaces, the study has, in addition, shown empirically how research quality articulations *develop* over time. This is what the historical approach, combined with the concept of responsive research quality articulations, helps us see. The humanities research policy spaces have proven to respond to the changes in research quality articulations observed in the national research policy spaces while also contributing their understanding of how research quality should be articulated.

This then prompted new articulations. And responsive quality articulations were not only a matter for the disciplinary research councils such as HSFR; the governmental research bills can also be understood as an arena where research quality was articulated in response to changing knowledge politics.

Responsive research quality articulations differ from the previously defined framework of coexisting since they point to how quality articulations not only coexist, as suggested in the 2020 article by Langfeldt et al., but also develop into something new—thus, they might both coexist and co-produce. Within science studies, separation between internal and external research quality articulations has usually been assumed. Internal quality articulations are then understood as those emerging within particular fields over time, often tacitly, and knowledge gets legitimized through one's specific discipline, or "tribe," which decides whether it should make it through quality approval (Becher and Trowler, 1989). These internal evaluation procedures have also been a central theme in the sociology of science, for example, in the well-known works of scholars such as Fleck (thought collectives), Kuhn (paradigms), and Bourdieu (scientific authority), and also within more recent work on quality cultures in academia such as in Lamont's *How Professors Think* (Lamont, 2009; see also Bourdieu, 1988; Fleck, 1935/1979; Kuhn, 1962). Internal quality cultures or articulations have been relatively well investigated, including in Swedish academia (Ganuza & Salö, 2023; Gunvik-Grönbladh, 2014; Hammarfelt, 2017, 2021; Hylmö, 2018; Joelsson et al., 2020; Nilsson, 2009; Salö, 2017). A common trait of these studies is their examination of meriting processes, where peers articulate why someone should get a position, and thus an understanding of quality emerges through negotiation.

Articulated external demands developed as a consequence of a coherent research policy in the postwar period, even though different forms of external quality articulation to some extent have always been present in research. These entailed more explicitly describing quality as something to be governed by means of organizational tools (Dahler-Larsen, 2012, p. 139; de Miranda, 2003; Gulbrandsen, 2000), since expectations of societal use of research increased and implied an increasing presence of research quality articulations connected to the social contract between science and society (Gibbons, 1999).

Other studies have focused on how researchers behave in relation to the changing external evaluation procedures, where a "misalignment between valuation regimes" has been recorded by Wouters (2017). The consequence of the misalignment is that researchers perceive that they have to behave in ways that do not match their internal quality articulations, which in practice might mean that they are adapting their publications and overall disciplinary norms to meet what they understand as the expectations of the research evaluation systems (Fochler & Rijcke, 2017; Hammarfelt & de Rijcke, 2015; Nästesjö, 2021; Robinson-Garcia et al., 2023). These types of studies have all been much-needed additions to research on how governance structures shape research content. However, they have still been focused on the actions of the individual scholar who is part of a disciplinary culture and is thus situated in the context of the "internal" being governed by the "external."

Based on the findings, it is clear that both research policy spaces can be understood as affected by an overarching process of increased presence of quality articulations, but that the process had different consequences due to the responsive quality articulations. We learn, however, that quality became increasingly prevalent in research policy during this period and changed understandings of how knowledge would be valued. This adds to the historical knowledge about the Swedish knowledge politics of this period, c. 1980–2010, where it seems to be feasible to argue for an increased presence of quality articulations in research policy in general. As recently illustrated in the history of Norwegian research quality articulations, it seems as if a similar change in the perceptions of the relationship between research quality and societal relevance also took place in Sweden during this period (Schwach, 2022). Quality went from being a result of societal relevance to being what was expected in order to result in societal relevance.

The findings made here have been possible to detect only through historical analysis, which provides tools to study change over longer periods of time, making it possible to detect both finished and ongoing trends and processes, compared to normative policy work. The approach used could, however, be compared to previous studies on Swedish research evaluation, where hiring reports by individual universities have been studied to understand how quality practices correspond to the policy framework they are faced with—this also illustrates responsiveness, however, on another level (Hammarfelt et al., 2020; Nilsson, 2009). A recent study of Norwegian sociologists' understandings of their societal impact also uses a similar empirical entry point, drawing on evaluations created by the Norwegian Research Council, making it a study at the intersection of policy affecting researchers' self-understanding (Tellmann, 2022). However, the focus of this study, has not been the individual researchers and their practices of quality evaluation but the interactions between layers of policy, the "co-production spaces." This study has focused on research quality articulations in policy documents on a policy level. Thus, it does not aim to explain, for example, how individual researchers have reacted and responded to changing research quality articulations—that would require other methods, such as interviews or ethnographic approaches, as used by Mufic (2022), for example, when studying the micro-politics of quality in Swedish adult education.

The neoliberal influences of universities have been central in the prevailing narrative on changes in evaluation procedures since the 1980s, and there are many previous studies on policy and the neoliberalization of the university sector (Bulaitis, 2020; Nicholls et al., 2021; Rider et al., 2013). In this chapter, the aim has not been to show how the university was influenced by neoliberalism, but rather to highlight the history of how certain quality articulations came to matter, how they coexisted with other articulations, and how they interacted.

A recent study on the neoliberalization of the Swedish university sector observed that even if neoliberalism is a strong and central ideology, it is still "met and confronted by local practices that are fuzzy and eclectic and outcomes that do not satisfy the neoliberal maxim of 'value for money'" (Benner & Holmqvist, 2023, p. 15). Another study has highlighted the interplay between the global and the local, looking at how global developments in research policy have been feeding into local

configurations, creating new forms of variety, while at the same time forcing local actors to respond (Simon et al., 2019, p. 475). In the context of this chapter, these observations can be compared with how the processes of quality articulation were not set in motion by humanities scholars, while they still might have led to counter-intuitive effects. These are visible only when empirically tracing the research quality articulations throughout the historical developments.

Current descriptions of what has happened in the Swedish university sector since the 1980s have thus been insufficient to explain the multiple and changing logics of research quality. Drawing on an understanding of the complex and changing nature of interaction between various layers of policy and internal logic has made it possible to understand changing research quality articulations as more complex than, for example, solely a result of neoliberal ideology and its auditing systems. It entails taking the agency of humanities policy spaces seriously while also acknowledging the shifting power relations within these.

Since this study encompasses responsive quality articulations of humanities policy arenas, rather than primarily the reactive critique on what quality in the humanities *was not*, we now have a more nuanced understanding of how the perceived marginalization of humanities quality evaluation developed and might have changed the direction of humanities research. The focus on responsive quality articulations also might have implications for the understanding of the role of the humanities in research policy today, since this study has contributed to the history of humanities with examples of how humanities researchers have been acting responsively rather than reactively. As argued by humanities scholars before me, critique is never enough (Ekström & Sörlin, 2022). In this sense, this is a contribution drawing on the history of humanities to better understand how humanities might be able to contribute to the research policy discussions of today.

However, the findings also create new questions for further research. If humanities scholars did not fully subordinate themselves to the quantitative or neoliberal regime, as the public debate might sometimes lead us to believe, the question of what quality articulations are actually leading humanities scholars of today remains.

The chapter has been driven by a desire to move away from the binary theoretical framework commonly used to understand the implications of research policy, particularly in terms of research quality as either/first internal quality or/then performance-based and NPM-driven. This has enabled a shift in perspective, from a narrative of humanities as a field of neglect, crisis, or decline, and toward a new narrative of humanities based on historical analysis and agency. The shift in perspective thus also entails a simultaneous reckoning with past debates on the crisis state of the reactive humanities, as well as opening up for further considerations of the implications of drawing on humanities thinking in the history and future of research policy. What research quality is and how it develops thus proves to be more complex than previously thought and, above all, has an open and challenging future.

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Sources of Policy: Knowledge Brokering in Governmental Reports

Linus Salö, Björn Hammarfelt, and Gustaf Nelhans

Introduction: Forms of Impact, Ways of Mattering

Social studies of science have long taken an interest in the use of science in policymaking, including efforts among researchers to have the knowledge they produce taken up in settings where political decisions are made (Camic et al., 2011; Pielke, 2007; Weiss, 1980). Recognized as a pivotal way for universities to matter, this feature of science–policy interaction is increasingly conceptualized in terms of "knowledge brokering," understood as a practice that unfolds at the science–policy interface and through which knowledge is made actionable (e.g., Bandola-Gill, 2023). Fertile soil for knowledge brokering to prosper is found in ad hoc commissions and the governmental reports they produce, used as they are to substantiate political reforms. This interface, then, provides a golden opportunity for universities to matter by mediating, linking, and connecting stakeholders of knowledge, but also by crafting or recrafting knowledge objects in ways that increase their prospects of impacting policy. This is the general theme of the present study.

In the reasonably specific culture of Swedish national policymaking (see Pierre, 2016), the information on which policy is based is readily available since the stock of knowledge in any given subject area is regularly presented in governmental reports, known as *Statens offentliga utredningar* (SOUs). It follows that the reference lists in SOUs are sites at which knowledge uptake is rendered salient. Among other things, SOU reference lists flag the extent to which national university-produced research contributes to knowledge creation relevant to national policymaking. This question, which is explored at length in this chapter, can also be framed as follows: Do Swedish

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universities produce policy-relevant knowledge and thereby have an impact on—or matter to—Swedish policy?

Conspicuously, mattering-through-brokering in this context can be tangible, as is the case when researchers are practically engaged in institutionalized processes of knowledge production and uptake. For example, as members of or experts in commissions, they may play roles as mediators and as intellectuals traversing science–policy boundaries (Osborne, 2004). However, this form of knowledge brokering is not the focus of the present chapter (but, see e.g., Thune et al., 2023; Salö, 2021a; Wisselgren, 2008). Instead, here we take an interest in forms of knowledge brokering that do not require direct, in-person involvement on the part of researchers. We take stock of the fact that brokering may also be found in events of uptake and occurrences of knowledge utilization where agents involved in commission work draw on knowledge objects—here texts—to craft policies and buttress political action. Here, as it were, the texts are doing the brokering without any practical engagement of their authors.

As we seek to highlight here, it is a fallacy to assume that the first, direct mode of engagement is rife with agency, whereas the second, indirect one is merely a question of passive knowledge uptake that the knowledge producer cannot influence in any way. This insight is crucial because it breaks with the image of the impact lottery wheel, which suggests that mattering lies entirely beyond the control of the knowledge producer (see also Perez Vico et al., 2024, this volume). On the contrary, as we hold, scholars who seek policy impact as an indicator of mattering can increase their chances by endorsing indirect, text-based knowledge brokering as a feature of their publishing practices. This entails, in short, producing impactful text types, which requires knowledge of the qualities of texts that are taken up in policy.

To make this point, this chapter presents a study of Swedish governmental reports (SOUs), focusing mainly on their reference lists and the items they contain. The objective is, firstly, to present an analysis of language use and reference type in the reference lists of Swedish SOU reports and, secondly, to discuss the dynamics of knowledge production and uptake as revealed through the lens of the concept of knowledge brokering. To this end, we present an analysis based on a sample of recent reports (2018–2021) from 10 government ministries. Empirically, we seek to interrogate the characteristics of the SOU reference list in terms of language use and type of sources cited. In so doing, we additionally seek to advance a discussion on how the study of SOUs may inform contemporary debates on the societal impact of research, particularly vis-à-vis questions of agency in knowledge brokering, production, and uptake.

Ultimately, our interest in issues of reference type and language serve to problematize the conception among researchers—real or perceived—that English-language journal articles are all that matter in scholarly production. On the contrary, as the chapter shows, governmental reports across the ministries, dealing with nationally embedded matters as they do, base their claims and subsequent policy recommendations on expert agency reports, public works, and academic works, the vast majority of which are so-called gray literature published in Swedish. In this regard, using national languages for written academic purposes is a brokering device—the same

goes for producing reports and other forms of literature defined as gray. Some implications of this insight will be discussed in the present chapter, supported by old and new insights on agency in processes of value creation. In addition to the analysis of language and reference type, we provide an example of a more explorative in-depth approach in which machine reading and citation analysis are used to study the knowledge base of one particular governmental report. Such detailed analyses—although still limited in scope due to data availability—may open possibilities for further inquiries into the actual knowledge claims that support policy.

We begin by providing contextual background on regimes of knowledge politics, increasingly uniform patterns in scientific production, and the tradition of science–policy interaction in Swedish political culture. Then we present our methodological procedure and findings. Toward the end of the chapter, we discuss the implications of our results as they relate to the concepts of agency and knowledge brokering. We close by presenting concluding remarks.

The Politics, Uniformation, and Interaction of Knowledge

Successive Regimes of Knowledge Politics

As knowledge-political regimes gain and lose currency, the tasks of universities are reimagined, reappraised, and accordingly, reformulated. Notably, while regimes of knowledge politics may supersede each other, they standardly coexist side-by-side, leading to situations where friction is unavoidable (cf. Langfeldt et al., 2020). As a case in point, within the politics of science globally, the pendulum has long swung between competing ideas about universities' purposefulness, usefulness, and entire raison d'être. On the one hand, there is the commercial side of innovation, through the logic of which science is envisioned chiefly as a lever for growth and a participant in international competition (e.g., Benner, 2018). On a par with the "excellence regime" hailed within this vision, impact is for the most part conceived as intra-scientific recognition, where productivity measures and citations by peers, for example, are used to gauge the impact of scholarly work and, by extension, the importance of such work (e.g., Aksnes et al., 2023; Langfeldt et al., 2020; for Swedish developments, see Nelhans, 2022, as well as Müller, 2024, this volume).

On the other hand, there is the broader and arguably irreconcilable vision of knowledge usability, where the quest for commercialization is deprivileged in favor of a social emphasis: one within which universities are called upon to matter in new ways and in relation to publics beyond their own realm. Indeed, in the meta-scientific debates surrounding the academic realm, there has been a call to reimagine the subsistence of university life, to reorient toward extra-scientific modes of knowledge exchange, and to make research accountable to end users rather than to scientific peers only (e.g., Burawoy, 2005; Sarewitz, 2016). Reappraising the bottom-line value of universities' knowledge production also entails reappraising how research

is evaluated. Initiatives such as the Coalition for Advancing Research Assessment (CoARA), the Declaration on Research Assessment (DORA), the Metric Tide, and the Leiden Manifesto have emerged as part of a more significant movement for broadening how research is evaluated and valued (Rushforth & Hammarfelt, 2023). Alternative metrics (including social media metrics) as well as the launch of "impact stories" in the UK are additional signs of how a broader discussion on the assessment of academic research is gaining ground (Bornmann, 2014; van Noorden, 2015). In these accounts, the broader influence of academic research is emphasized at the expense of narrow performance measures, such as citations or impact factors.

Features of such global dynamics have also seeped into Swedish science policy. By the 1990s, science policies had become increasingly entangled with growth policies; the direction thus chosen was founded on global and regional competition and subsequent attempts to maximize the worth of the universities' research activities. Among other things, under the pressure of "evaluative neoliberalization" (Benner, 2023), these processes ushered in a culture of quality managing, auditing, and measuring designed to bolster excellence as gauged through the increasing use of metrics.

Since the 2010s, however, there have been reasons to suggest that much of this was fundamentally upset by a new knowledge-political regime (Sörlin, 2015, 2021). Among the buzzwords signaling the government's prioritizations in the area, "excellence" was saliently replaced by "collaboration" (*samverkan*) between 2012 and 2016 (Hammarfelt, 2021b; see also Benneworth et al., 2015). Scholarship has followed suit, as made evident by work seeking to rethink old conceptions of what impact might mean, particularly in the human and cultural sciences (e.g., Benneworth, 2015; de Jong et al., 2022; Muhonen et al., 2020). Several Swedish studies have been able to show empirically how ideas stemming from humanities research practices have gained broader circulation in society to eventually become more or less direct sources of policy and change these societies in fundamental ways (Bertilsson, 2021; Salö, 2021a; Salö & Karlander, 2022; see also Perez Vico et al., 2024, this volume).

The reliance on evidence-based research to ground decision-making is perhaps more commonly related to other professional areas, particularly technological, medical, and environmental sciences (Youtie et al., 2017). In evaluating the societal impact of research, government agencies, and funders have sought to identify and measure references in policy documents and patents as indicators (Bornmann et al., 2015; Hammarfelt, 2021a; Lewison & Sullivan, 2008; Wilsdon et al., 2015). These have been proposed as professional metrics to distinguish this form of societal impact from that measured in social media, often under the heading of *altmetrics*. In contrast to the altmetrics, which often fail to differentiate between various types of traceable activities, whether they occur on the internet, within policy realms, through patents, or in clinical settings, the concept of professional impact centers on references within documents published by reputable professional or governmental organizations. This attribute lends these references a degree of permanence and stability, enhancing their reproducibility (Nelhans, 2016). Insights yielded from this research are that referencing in national guidelines is relatively local, with a high share of references to research published in the same country, but, at the same time, that there is a distribution of references to research published by smaller units and centers outside of the

metropolitan regions where traditional citation impact is more considerable (Nelhans, 2016).

Two Kinds of Scientific Uniformity: Text Types and Languages of Publishing

The extent to which the most recent developments within the politics of science have influenced the practices of scientific communities is unclear. Many within those communities still seem inclined to engage in knowledge exchange chiefly with their peers. This is evident through the types of texts they produce. Even by the early 2000s, Kyvik (2003) had shown how the publishing behavior of Norwegian scholars changed between 1980 and 2000, displaying an increased focus on publishing directed toward international audiences and a greater preference for scientific articles in international journals to achieve such ends. Although text types such as monographs and edited volumes still predominate (Engels et al., 2018), the journal article is doubtlessly the predominant text type for scientific exchange in the contemporary age (e.g., Kaltenbrunner et al., 2022; Savage & Olejniczak, 2022).

The standardization of publication types is, in turn, tangled up in an older trend of linguistic uniformity, which currently presents itself as English language dominance in scientific production (e.g., O'Neil, 2018). Across the language sciences, a general critique against "the spread of English" gained currency from the 1970s onwards (e.g., Fishman et al., 1977; Pennycook, 1994; Phillipson, 1992) and eventually came to center on "global English" in science and higher education, more specifically (e.g., Ammon, 2001). More recently, these have become debates to which scholars from many fields contribute (e.g., Gordin, 2015; Sivertsen, 2018). The prevalence of English in scientific production is by now well established.

Combined with the enhanced international orientation, then, it is more accurately English-language journal articles that increasingly prevail internationally. While there are major disciplinary and regional differences, the English-language journal article stands out as the current era's supreme way of packing and subsequently communicating scientific knowledge (Kuteeva & Airey, 2014; Lillis & Curry, 2010). In the human sciences, too, there is a strong preference among scholars in the Nordic region to publish journal articles in English (Kulczycki et al., 2020). Notably, it may well be that this "preference" ought to be viewed as a form of compliance with schemes of knowledge valorization. Across national contexts, studies have pointed to the ways in which the use of metrics-based research evaluation systems impacts on scholarly agendas, inducing scholars to adopt international dispositions toward scientific communication and prodding them to orient increasingly toward producing journal articles published in English (Feenstra & Delgado López-Cózar, 2022). As an effect, as Swedish studies have shown, some publishing behaviors have been encouraged—particularly the production of peer-reviewed English-language articles in indexed journals. In contrast, little profit has been ascribed to other text

types and languages (Hammarfelt & de Rijcke, 2015). Critical concerns about such matters have been raised first and foremost by humanities scholars, whose traditional academic behavior has begun to be perceived as no longer desirable (Salö, 2017).

Again, however, regimes of knowledge politics are subject to change. Recently, driven by a stronger focus on societal impact, The Helsinki Initiative (2019) presented a plea for scientific multilingualism that includes scholarly communication in national languages. While the debate is almost as old as science itself (Gordin, 2015; Salö, 2017), the fact that this call is re-energized now is probably not a coincidence. As described earlier, there is currently a push for making universities matter, with ripple effects in science policies as well as across the sciences, stressing how mattering has deep societal ramifications. As highlighted by The Helsinki Initiative (2019), issues related to language choice in scientific production play a prominent role in such dynamics because of the value held by local languages in processes of impact creation. Even though the role of language in processes of science–policy knowledge utilization remains under-researched (but see Droz et al., 2023; Ringe, 2022), debaters have long argued that, despite its benefits in transnational communication, the use of English can in fact pose obstacles when it comes to national communication, particularly vis-à-vis processes of national policymaking. In the Nordic region and elsewhere, observable patterns in language choice reveal a gap between scholarly knowledge production and, among other things, policy knowledge demands (e.g., Hultgren et al., 2014; Salö, 2018). Accordingly, actors such as the Nordic Council of Ministers (2007) have advocated so-called parallel language policies as a remedy (see Holmen, 2017; Gregersen, 2018). Such policies seem welcome. For instance, mapping the users of national open-access journal articles in Finland, Pölönen et al. (2021) showed that students, citizens, and politicians favored Finnish-language publications compared to researchers, who preferred foreign-language articles. This would indicate that scientific articles published in national languages have a broad audience extending to the policy sphere.

Nordic Modes of Science–policy Interaction

The Nordic region is interesting not only because of its firm embrace of English in science but also due to its widespread use of scientific expertise in policymaking (Lundqvist & Petersen, 2010). In fact, the region is known for its well-established, even institutionalized, traditions of knowledge brokering. Sweden, the context for this chapter, exemplifies this well insofar as it has long been internationally known for its rational procedures of grounding political reforms in research-based knowledge (e.g., Anton, 1969; Castles, 1976; Eyerman, 1985). While pivotal conditions have changed over time, this reputation lingers to this day. Tellingly, *The Oxford Handbook of Swedish Politics* (Pierre, 2016) devotes several chapters to more or less Sweden-specific modes of policymaking, focusing on traits that remain as well as those that have been forsaken (e.g., Mattsson, 2016; Pettersson, 2016). Among many foci, a central component of such discussions has been the Swedish system

of governmental commissions as a distinctive art of knowledge-infused state governance (Johansson, 1992; Premfors, 1983). In short, Swedish reform politics have long relied on an institutionalized procedure of reaching consensus by appointing expert-led commissions prior to making major political decisions. Commentators have differed in their characterization of this system and the agents involved in it, ranging from depictions of expert trust (Lundqvist & Petersen, 2010) to more critical perspectives on welfare state strategies of realizing aims through the utilization of reform technocrats (Lundin & Stenlås, 2015). Irrespective of divergent views, it is a well-established viewpoint that governmental commissions have played, and continue to play, a vital role in policymaking and processes of knowledge uptake in Swedish politics (e.g., Trägårdh, 2007).

As viewed here, the commission system, and the writing of SOUs within it, is an example of a "science–policy interface" (Bandola-Gill, 2023). The engagement of experts, policy intellectuals, or reform technocrats has provided university-based scholars with the opportunity to transgress the science–policy boundary (Wisselgren, 2008). Indeed, governmental commissions have often recruited expertise from the universities, not least from the humanities (Dahlberg, 2021). It follows that ad hoc commissions make up paramount knowledge arenas that create what de Jong et al. (2022) call "enabling conditions" for researchers to matter. Yet, if researchers are interested in having their knowledge taken up in processes of commission work, they have to present it in ways that yield impact—hence the questions posed in this study. These dynamics, as we will outline presently, pertain to questions of agency.

Key Conceptualizations: Agency in Knowledge Production, Uptake, and Brokering

Human agency, briefly put, has to do with the capacity to act and, more specifically, the acting agent's power to exert control over actions and their effects. It often concerns the acting subject's ability to act deliberately, freely, or purposefully and is thus pitted against the view of action as constrained by the force of structure. In science studies by the mid-1970s, Gibbons and Johnston (1974) drew attention to matters of agency in knowledge exchange processes. Focusing on technological innovation, they argued that scientists do not passively add knowledge to a pool of knowledge but can

> play a vital role in perceiving the application of particular knowledge to specific problems, and translating and transforming the results of scientific research into a form in which they are directly usable in the industrial environment. (Gibbons & Johnston, 1974, p. 242)

Through the seminal work of Gibbons and colleagues, the same emphasis later became a feature of so-called mode 2 knowledge production, characterized among other things by how knowledge develops in the context of application (Gibbons et al., 1994). While later critically debated and revisited, the same basic point also remains valid regarding the role of science in social innovation (e.g., Camic et al., 2011).

Increasingly, scholarship stresses how researchers create their own "acting space" (Perez Vico et al., 2024, this volume) and are thus involved in influencing the market conditions that value their own knowledge products (Salö, 2021b).

On the flip side, uptake, too, is an agentive activity. As Rip (1998) noted, paraphrasing Gibbons and Johnston (1974):

> *Eventual take-up of knowledge ("application") is an activity by itself, not the effect of a knowledge push.* And even more important, it is almost always indirect: knowledge products are delivered into a knowledge reservoir, carried by what one might call an epistemic community, and knowledge users pick up their own new combinations from the reservoir. (Rip, 1998, p. 14, italics in the original)

Decades ago, Weiss (1980) was able to demonstrate how "creeping" social knowledge slowly informs policymakers, who more or less selectively and deliberately make use of it in decision-making processes. Knowledge, accordingly, is not passively taken up but instead actively utilized and fed into decision-making processes. Recently, such perspectives have gained salience and currency. Notably, a focus on "productive interactions" (Spaapen & van Drooge, 2011) brought forth novel views on social impact assessment and spurred further thinking on the dynamics of impact pathways (Muhonen et al., 2020). Often, questions of agency have occupied a central place. For example, drawing on interviews with civil servants, Tellmann and Gulbrandsen (2022) depict the users of research as strategic actors entrenched in the productive science–policy interactions that yield societal impact. The fact that users of knowledge are not passive recipients of knowledge, following de Jong et al. (2022), is in itself an enabling condition for productive interactions—and thus impact—to occur.

In sum, then, attention to agency has often served to problematize the view of the recipient of knowledge as passive and unable to exert influence over knowledge production. By the same token, proponents of agency are prone to critique the view of producers of knowledge as active but nonetheless unable to steer conditions of desirable knowledge reception. On the one hand, emphasizing the agency of researchers, it is clear that scholars can direct their efforts toward a specific context of application or act to render their knowledge policy-relevant, visible, and actionable. On the other hand, policymakers and other knowledge users are positioned to strategically select what knowledge to draw and act upon (Pielke, 2007). Arguably, these dynamics largely pertain to tangible forms of interactive engagement. Discussing productive interaction, Tellmann and Gulbrandsen (2022) make a fruitful distinction between direct, personal interactions between researchers and stakeholders and indirect interactions through text between the same set of agents. Both of these modes of interaction require knowledge brokering, broadly understood as a process of transferring research-based knowledge into action (Ward et al., 2009). The process as such incorporates several steps, including the identification and redistribution as well as the rescaling and transformation of knowledge (Meyer, 2010) whereby knowledge brokers "link the producers and users of knowledge to strengthen the generation, dissemination and eventual use of that knowledge" (Bielak et al., 2008, p. 203). Following Meyer (2010), brokering renders knowledge more robust, usable, and accountable throughout such translational activities.

As understood here, following Bandola-Gill (2023), knowledge brokering comprises a wide set of mediating practices enacted by researchers in order to make academic knowledge useful in policy settings, thus encompassing not only the firsthand involvement of animate brokers but also—obliquely—the intermediary text artifacts they produce. This conceptualization is ultimately important because it invites us to explore whether some types of published works—brokering text types—are more impactful on policy than others. Swedish SOUs, the textual outcome of governmental commissions, provide a context concerning such questions.

Methodological Procedure

In Sweden, governmental commissions are appointed and subsequently published by the responsible ministry, each of which is headed by a minister and responsible for several government agencies. Each government is free to create, remove, or merge ministries, meaning their composition varies over time. In the period when the present study was conducted, the government office housed 12 ministries. Apart from the Prime Minister's Office, these were the Ministries of Culture, Defense, Employment, Education and Research, Enterprise and Innovation, Environment, Finance, Foreign Affairs, Health and Social Affairs, Housing, Infrastructure, and Justice. Whenever issues arise within their respective areas of responsibility, commissions are thus appointed.

We selected two recent governmental reports from each of the 10 ministries. This choice was made as we suspected that different policy areas might employ scholarly sources to various degrees and in different ways. Regarding the selection criteria, we chose reports published between 2017 and 2021 with reference lists. In cases where we had several SOUs to choose from, we selected those that contained a reference list rather than those using footnotes or endnotes. Hence, our sample for the analysis was not chosen randomly. The ministries of Foreign Affairs and Enterprise and Innovation did not have two SOUs that matched these criteria and were therefore excluded. The resulting material thus consisted of 20 SOUs containing 2787 references. Hence, the chosen dataset was purposely selected for the explorative approach of this study, and it cannot be automatically assumed that it is representative of SOUs in general. Given the small sample, two per ministry, and the significant variation in how the different SOUs are structured, it is difficult to draw firm conclusions regarding how representative they are for the knowledge uptake of each ministry. A description of the complete dataset, including the title of each report, can be found in Appendix 1.

Analyzing sources used in SOUs poses challenges that do not occur with more fixed text types, such as journal articles, due to variations in style and completeness. References might be given in various places, and there might be multiple, partly incomplete lists for each SOU document. Such inconsistencies make the automatic detection of references difficult. We therefore opted for a semi-automated approach in which parts of the material were identified using software capable of matching Digital Object Identifiers (DOIs) to the reference lists in the SOUs. However, this

method only allowed for identifying scholarly works that had a DOI, mainly journal articles and scholarly reports and, to a lesser degree, monographs and chapters in edited books. We therefore supplemented this method by manually detecting and categorizing references using a predefined set of characteristics. This methodology required us to limit our analysis to a few key features—language and scholarliness—of the extrapolated references that jointly determined their text type.

By "text type" we refer to what is elsewhere termed "academic genres" (Berkenkotter et al., 2012) or "literatures of science" (Hicks, 2004). Thus, we use this notion to differentiate between text families based on their envisioned uses and publics as well as the conventions they consequently adhere to. A vital factor here is the degree of "scholarliness" they display, where scholarliness is taken to be an effect of their procedures of production, intended readership, aspirations of scientificity, et cetera. As opposed to their non-scientific counterparts, scientific text types are characterized by their adherence to methodological and theoretical standards of the scientific communities. Their degree of scholarliness is thus estimated to be high.

For the present study, based on such assumptions of text types and their degree of scholarliness, we classified the references into two *reference types*: scholarly and non-scholarly. Assessing the degree to which references are to be regarded as scholarly was not without difficulties. Obviously, articles in scientific journals and books by academic publishers are considered scholarly. Dissertations belong to this category as well. What is evident in this type of document, however, is the importance of what is often defined as "gray literature," which refers to various documents, often published or unpublished reports, that are not considered scholarly but may nonetheless contain content that has been academically produced (Börjesson, 2015). "Gray literature," consequently, is notoriously difficult to define. Reports of various kinds are a common text type within this category. Here, we defined reports published by academic institutions (e.g., universities) as scholarly, while reports commissioned by government agencies or NGOs were defined as non-scholarly. Hence, the definition used here matters if the sender or producer can be identified as a legitimate source of academic knowledge. Overall, this implies that our estimate regarding scholarly influence is probably lower than the actual "academic" impact (if this is possible to estimate).

Items included in the reference lists that were identified as scholarly literature, usually English-language journal articles and possibly including a DOI, were submitted to the Simple Text Query Form [https://apps.crossref.org/SimpleTextQuery]. This service by CrossRef uses heuristics to match plain text references to the publication's persistent DOI and attaches an identification code to each matched publication. The results were then further analyzed using descriptive statistics and were checked using the bibliographic database Web of Science. The DOI matching was not exact, and SimpleText could not find a match for every reference. This was particularly seen when instead of a publication year it said "forthcoming" or when comments in Swedish were intermingled with the reference text. Therefore, the reference lists used for matching were manually scanned, and all entries that looked like a reference that could include a DOI were singled out. Examples are a reference to an article in a scholarly journal, a cited document with a title in English with vague or no

publication information, and a preprint that was cited and subsequently published. The DOIs for these entries were subsequently searched for manually using Google. This resulted in a reasonably low number (~10–15) of "extra matches" included in the analysis.

Findings

In what follows, we present the study's findings. This is done in two steps: first, we outline the broader patterns of language choice and degree of scholarliness in the SOU reference list, then we take a closer look at their occurrences and networks of scholarly references in one particular SOU.

Variations in Language Use and Reference Type

We began by classifying the items of the SOU reference list in terms of language and, adopting a binary approach: whether they were scholarly or not. Regarding the language of sources, we found a clear dominance of Swedish-language titles (Fig. 1).

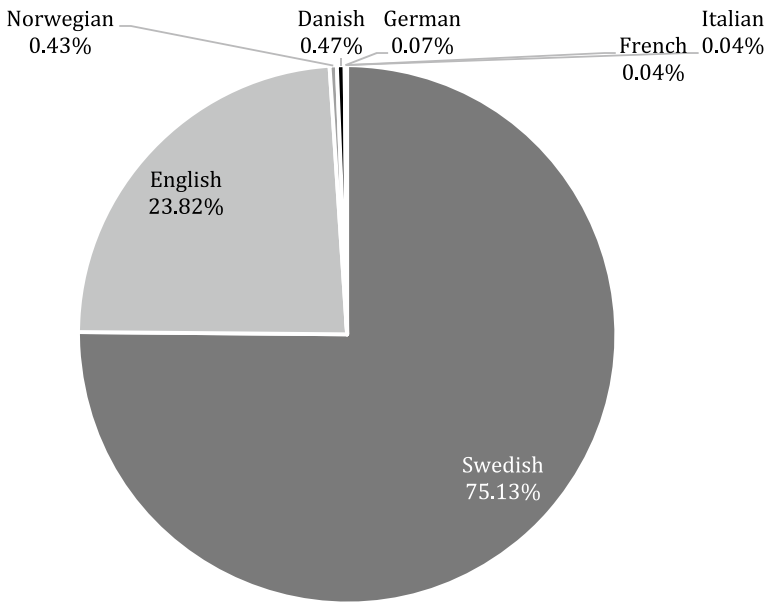

Fig. 1 Language use in cited sources

Notably, there is a great variation across governmental reports regarding language (see Appendix 1). In *Sverige och bankunionen SOU 2019:52* [Finance], 77% (117) of the references were in English, and in *Vägen till en klimatpositiv framtid* [Environment] SOU 2020:4, 48% (125) were in English, while all 95 references in *Ersättning till brottsoffer*, [Justice] *SOU 2021:64* were in Swedish. Law is indeed an interesting field as the definition of what a "scholarly publication" is (e.g., a law commentary) is an item of discussion (cf. Kaltenbrunner & de Rijcke, 2017). Moreover, it is a field that, for obvious reasons, is dominated by publications in the national language (Salö & Josephson, 2014, pp. 281–282).

Next, we analyzed the types of sources cited, focusing on whether they were scholarly or not. Our analysis shows that a majority of sources were deemed non-scholarly (78%). Such infrequent citing of scholarly publications may be interpreted as a rather low uptake of academically produced knowledge in policy. However, it should be noted that the number of scholarly publications cited in SOUs (22%) might not accurately estimate the actual influence of academic sources. One reason is the frequent citing of other SOUs and various reports from government agencies and NGOs. While these sources are not scholarly in themselves, they often build on academically produced knowledge. Hence, we suspect that reports and summaries may be a text type that is more easily translated into a policy setting. Overall, we postulate that academic knowledge might be nested, or brokered, in such a way that its actual influence is not fully reflected in the citing of scholarly publications. As brokering involves more than a simple transfer of knowledge—Meyer (2010) uses the concepts of "travel" and "transformation"—the original sources for a claim might not be readily recognizable when traveling across contexts. Hence, reports and summaries of various kinds which are frequently cited in SOUs may in turn build on scholarly sources, and academics rather often write them. Therefore, the whole chain of knowledge translations and brokering that precedes the use of academic knowledge in SOUs needs to be investigated further. It might be suggested, for example, that the closer we come to the actual policy decisions, the more "hidden" the specific sources for the claim will be. Yet, such a hypothesis would require a more thorough analysis than the one provided here.

However, the overall result hides large variances in terms of both language use and use of scholarly sources. For example, the governmental report *För flerspråkighet, kunskapsutveckling och inkludering—modersmålsundervisning och studiehandledning på modersmål,* SOU 2019:18 [Education] stands out with 60% (146) of references being classified as scholarly. However others, like *Immunitet för utställningsföremål,* SOU 2021:28 [Culture] (0 out of 55 references) and *Sveriges säkerhet—behov av starkare skydd för nätverks- och informationssystem,* SOU 2021:63 [Defense] (1 out of 77 references), barely make any references to scholarly sources at all. At the SOU level, the share of scholarly references varied between 0 and 60%, with an extensive spread between documents (Standard deviation = 0.15, Median value = 12.2%). This variation makes it difficult to draw generalizable conclusions regarding the general use of scholarly sources in SOUs from this selection. Instead, it seems to suggest that how academic knowledge is used—if it is used at all—differs considerably depending on both policy area and the specific topic of each

SOU. Moreover, it should be highlighted that a substantially larger study, involving considerably more SOUs for each department, would be needed to draw any generalizable conclusion regarding the degree to which specific policy areas rely on scholarly publications when writing SOUs.

Detailed Analysis of Scholarly References

Above, we have used the bibliographical data provided by the SOUs to discern general patterns in their use of sources. However, focusing on Digital Object Identifiers makes it possible to perform a more detailed analysis of cited materials. The DOI gives each document a unique identification number, making it traceable across platforms and databases. Such markings allow for tracking publications across social media (altmetrics), or as in this case, constructing a network analysis of citations. This type of analysis can help us grasp the characteristics of the sources displaying a high degree of scholarliness.

As indicated above, 612 of the total 2,787 references identified were considered scholarly. Of these, 338 references were matched with a DOI. Aggregated at the ministry level, some general aspects can be outlined. The SOUs were derived from 10 different ministries, with two SOUs being analyzed for each. The highest share of scholarly references was found in Education and Research (49%) followed by Finance (24%), with Culture (3%) and Defense (7%) recording very few references to scholarly work (Table 1). As noted above, these percentages are based on a small sample, and larger studies would be needed to substantiate these findings.

In the next step, we tested whether references, matched through DOIs, could be used to visualize the academic knowledge base of a particular SOU. For this purpose, we selected one of the two SOUs from the Department of Education and Research: *För flerspråkighet, kunskapsutveckling och inkludering—modersmålsundervisning och studiehandledning på modersmål* [in English, For multilingualism, knowledge development and inclusion—mother tongue instruction and mother tongue study guidance], SOU 2019:18. This SOU was chosen because it had a relatively large share of documents with a DOI. Moreover, one of the authors (LS) could provide us with insights that would make it possible to interpret the findings. Without such contextual knowledge, bibliographical mapping tends to be reduced to a bunch of names across a colored background.

Using the Dimensions citation database (https://www.dimensions.ai/), we produced a citation network out of 45 references found in the SOU that had a DOI and were indexed in the database. These were then mapped using the VOSviewer software (Van Eck & Waltman, 2014) based on direct citation between documents (e.g., a link between the two is registered if document A cites document B) (Fig. 2).

The arrangement of this visualization relies on a citation network based on 45 identified articles, resulting in a citation map. In this map, each article serves as a "magnet," attracting other articles based on the number of citations linking them. The size of each node corresponds to the number of citation links, and a clustering

Table 1 Share of scholarly references at the ministry level, two SOUs analyzed for each department (see Appendix 1 for a full list of SOUs, including titles)

Ministry	Number of references (total)	Scholarly references	Swedish language	English language
Culture	117	3 (2.6%)	114	3
Defense	152	10 (6.6%)	146	6
Education and research	560	273 (48.8%)	353	194
Employment	426	81 (19.0%)	365	54
Enterprise and Innovation	174	30 (17.2%)	152	18
Environment	357	62 (17.4%)	205	152
Finance	211	50 (23.7%)	91	117
Health and social affairs	246	41 (16.7%)	191	54
Infrastructure	370	43 (11.6%)	307	62
Justice	174	19 (10.9%)	170	4
Total	2,787	612 (22.0%)	2,094 (75.1%)	664 (23.8%)

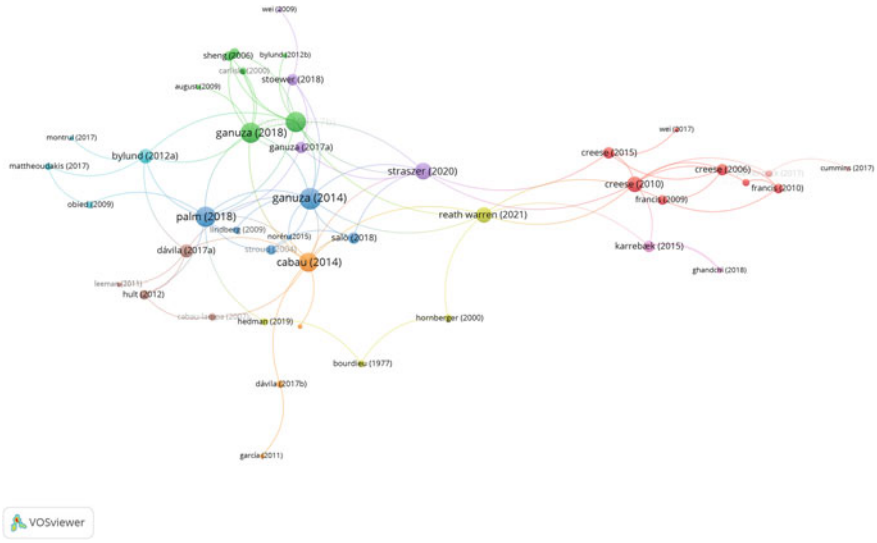

Fig. 2 A network of 45 identified references in the Dimensions database (Digital Science, 2018) using VOSviewer (Van Eck & Waltman, 2014). Clustering based on direct citation (e.g., references from one document to another document in the same set. Based on references with DOIs from SOU 2019:18)

algorithm has been utilized to differentiate related documents based on their citation patterns distinguishing thematic similarities. In this cluster of references, we find several national and international authorities within the areas of multilingualism and education, language learning, and language policy. While many names are active in contexts other than Sweden, their research can be seen as theoretically relevant and sufficiently general to relate to the Swedish case. Several nodes in the cluster are made up of studies produced by Sweden-based scholars interested in mother tongue instruction; that is, the object at the center of the SOU in question. These studies, like those produced elsewhere, are relatively recent. This trait is in itself interesting, as mother tongue instruction has occupied a place in the national curriculum over the course of almost 50 years despite initially having a scant stock of knowledge to stand on (Salö, 2021b). As we will discuss critically below, this may serve as a reminder that the role of knowledge in state policy is far from a clear-cut, innocent affair (Benner, 2021). On the contrary, knowledge brokering involves power with effects across every stage, and on multiple scales, of science–policy interaction processes. Therefore, policy often moves faster than science (Salö, 2021b, p. 169).

Implications: Mattering Through Agentive Brokering

The reference lists of governmental reports (here, SOUs) are of interest because the work referenced in them forms part of the knowledge base used to support the various reforms and propositions presented by the government. This fact notwithstanding, questions relating to such forms of knowledge uptake seldom linger in debates about impact. To the extent they do, in scholarship and elsewhere, Swedish researchers sometimes complain that their possibilities for impacting policy have changed for the worse (e.g., Pettersson, 2013). Often, the reasons for this are placed on some perceived knowledge-receiving end and are explained by an increasingly marginalized commission system or other dynamics that seem to render science less important to draw on. While there is a kernel of truth in such accounts, it is striking that researchers only occasionally acknowledge the interlinkage between their modes of production and conditions for knowledge reception. Overtly resigned accounts also downplay their own agency in the process of science–policy interaction. Yet, as a wide range of studies have shown over the last half-decade—from Gibbons and Johnston (1974) to Tellmann and Gullbrandsen (2022)—agency deeply permeates the work of agents engaged in knowledge production and uptake. Because brokering is an interactive process—a practice locked in between production and uptake—the centrality of the agency is undeniable. Be it the result of direct or indirect interaction, this essentially means that policy impact and the knowledge on which it is founded is the outcome of a collaborative process that relies on the agency of all parties involved.

How might these insights gel with the account we have presented here? Admittedly, our findings do not speak straightforwardly to the question of agency as the analysis can only render broad patterns visible. In contrast, the study of real-life

action requires other forms of inquiry. However, at some general level, we nonetheless hold that agency is a relevant lens through which to view matters of text-based impact. In this light, we hope that our findings will contribute to rejigging dominant understandings of impact and help signpost productive modes of interaction. While the case of personal interactions may involve brokers as a particular role in science–policy interplay (Osborne, 2004; Pielke, 2007), brokering in indirect and text-based interactions necessarily revolves around particular text types that mediate knowledge exchange between stakeholders in science–policy interactions and thus determine impact. In this latter sense, the patterns revealed here ought to be of interest, and possibly practical interest, among scholars concerned with impacting policy.

As we have sought to show, inquiries into governmental reports provide a way to empirically map processes of knowledge uptake and subsequent impact. The question at the heart of the chapter has revolved around the extent to which governmental reports rely on academic knowledge as observable through the sources in their reference lists. We asked, firstly, about the characteristics of SOU reference lists in terms of language use and type of references cited and, secondly, how such insights may inform contemporary debates on impact and the questions of agency they bring to the fore.

Overall, we have found that scholarly work on average makes up one-fifth (22%) of the total number of references cited. A salient pattern in our findings is the strong presence of gray literature, the vast majority of which is in Swedish, in the reference lists. Within this somewhat vague category, reports make up a large share. Reports typically compile existing knowledge within a given subject area; the task of writing them, accordingly, involves processes of selecting and interpreting research, and then repackaging such knowledge into a new text type, often produced in another language and aimed at another kind of audience. This process—which Meyer (2010, p. 123) describes as knowledge being "de- and reassembled"—can be understood as one of knowledge brokering, whereby the text type itself constitutes an affordance for political action. Gray literature is often brokering literature. Yet, as an actionable affordance, text types do not function alone, as language plays a part in the equation. In a country such as Sweden, where legislation and bureaucracy operate in Swedish, reports in Swedish can be said to constitute a brokering text type vital for knowledge-political aims.

Suppose there are clear patterns in terms of what text types and languages of publication are taken up in governmental reports. In that case, scholars who seek policy impact can adapt their publishing practices to fit such patterns. As an added value, there are possibly applied virtues in contemplating the implications of the patterns revealed. Exploring governmental reports might answer the question: What types of texts, defined at the interface between language and text type, are most likely to appear in the reports used to underpin the political decisions of the government and other state agents? Although we have used Sweden as a case, much of what we have dealt with here pertains to issues and developments of international reach.

While English-language journal articles doubtlessly facilitate scholarly exchange, other text types are significantly more impactful in science–policy interaction processes. The account we have presented here could be interpreted as one that says: If

you want to impact policy, write reports in Swedish. This, however, would be a simplified imperative. Science–policy interaction, and the knowledge brokering it requires, is far more complex. For example, reports need knowledge with a high degree of scholarliness to draw on, and if the latter is not produced—often in English—there is little for reports to compile. Moreover, the impactfulness of reports might not reside so much in the text type as such as it does in the organization behind it, or, at times, in the scientific credibility of its author.

Moreover, junior scholars are likely acutely aware that reports are of less worth on their list of publications compared to other types of texts, and "brokering" initiatives may generally receive little recognition as an academic merit (Turnhout et al., 2013). However, what we are saying, harshly perhaps, is that it is a fallacy to assume that English-language journal articles will easily find their way into processes of policymaking and have an impact there. While our analysis shows that this may indeed happen, it is significantly more common to find knowledge-brokering text types in the reference lists of governmental reports. Given that Swedish-language reports make up a large share of the knowledge supporting political decisions, scholars seeking to matter politically might want to rethink their own publication agendas. By the same token, to the extent that the production of policy-relevant work is deemed desirable, institutional systems of evaluation may want to change evaluation schemes in which scholarly work is hailed as important, particularly in the social sciences and humanities (Sivertsen, 2019).

Based on the low share (22%) of scholarly text types in the SOU reference lists, one might conclude that the impact of academically produced knowledge on policy is marginal and rather restricted. Interestingly, however, our sample shows that the degree to which scholarly publications are cited varies considerably. Although other circumstances may have an influence, it appears that some areas of government tend to make extensive use of scholarly literature. In contrast, scholarliness is a less salient characteristic in others. Moreover, we suggest that the ample citing of gray literature (reports, reviews, etc.) may hide the influence of academically produced knowledge. If so, we might view the SOU as the endpoint of a process of translation through which knowledge is brokered to eventually enter the realm of policy. It might also be the case that the closer knowledge claims come to actual political decisions, the more invisible the origins of these claims become. This is one of many reasons why knowledge brokering ought not to be embraced uncritically; clearly, there are many potential problems and challenges linked to taking up intermediary positions (e.g., Kislov et al., 2017).

A conclusion would then be that SOUs are a good start for studying science–policy interactions. Still, to actually produce insights into how these interactions happen, we need to proceed beyond the SOU and tap into processes and relations that precede the production of these documents. We acknowledge that the ministries likely house distinctive policy cultures, where some are time-honored and nationally anchored (e.g., law), whereas others (e.g., climate and multilingualism) are newer and more closely interwoven with global networks of knowledge circulation. Likewise, we grant that the use of knowledge probably depends on the individual who assembles it and the mechanisms through which the ones producing these reports are

chosen. While some things are known about procedures and practices of knowledge utilization in SOUs (Bringselius, 2021; cf. Thune et al,. 2023), the need for more research is pressing. In short, in anticipation of future research, there are reasons to maintain a critical gaze on how state agents control policy processes in ways that make their ostensible knowledge base a mirage (Bourdieu, 2005, pp. 104ff.; see also Benner, 2021, for a comment on the Swedish case more specifically).

The understanding of such dynamics requires the use of multi-methodological research. Within such an agenda, where ethnographic fieldwork is warranted, a range of other concealed modus operandi with clear implications for the present study may also be explored. For example, what characterizes the processes through which letters of instruction, so-called commission directives, are crafted and agreed upon, and to what extent do they have a steering impact on the policies that are eventually presented in SOUs? How are SOU commissioners selected? How do they roam or probe into the stock of knowledge concerning the topic at hand? To what extent do their cross-field movements involve the university realm, and to what extent do competing stakeholders such as think tanks play a role in policymaking processes?

One reason why questions of knowledge uptake and use seldom linger in debates about impact has to do with the lack of established methods for systematically analyzing policy impact. While we have sought to contribute to this end, we have at the same time strived to highlight that knowledge uptake and impact are complex processes, the study of which is rife with analytical challenges. Our study points to many of the difficulties of analyzing SOUs, with the unstandardized use of references being a major hindrance for larger systematic studies. Yet, our detailed example of mother tongue instruction shows that it might be possible, at least in selected cases, to find traceable links that can be used to study the uptake of scholarly publications in policy text quantitively. At present, such analysis is dependent on the existence of machine-readable DOIs, but the rapid development of software for detecting references may open possibilities for more detailed analyses of SOUs in the future. For example, one might analyze the age of the sources cited to grasp whether or not policies have been based on recent knowledge. It might also be interesting to study which researchers and institutions are cited by SOUs, and whether patterns in fields, institutions, or countries can be detected. Moreover, since all SOUs from 1922 to 1999 are available in digital format, there might be opportunities to study the influence of research (and researchers) over extended periods of time. At any rate, there is potential in studying governmental reports. Our ambition is to see the approach outlined, including its theoretical assumptions, applicable on a larger scale and to prod colleagues to develop it further.

Final Remarks

This chapter has explored indirect, text-based knowledge brokering through a study of Swedish governmental reports, analyzing their reference lists in terms of language use and reference type. We found that 78% of references were to non-scholarly literature, and that around 75% were Swedish-language references. This finding is interesting given that, for contemporary universities, the English-language journal article stands out as the predominant text outlet. While such uniformity has its advantages, the situation it yields requires knowledge brokers and brokering to navigate what we might call the language–knowledge–text type nexus. Insofar as mattering entails meaning something to someone, furnishing the sources of policy stands out as a fundamental way for universities and their scholars to serve such ends. The uptake of their research is an indicator of their knowledge products buttressing political decisions—good or bad—that potentially affect the lives of many in society. Policy impact, then, is also societal impact. While we have studied the impact *on* policy, there is also the impact *of* policy as the impact aftermath or extended way in which universities matter. None of this happens simply by chance; on the contrary, there is ample agency in matters. Policy impact—and the production, brokering, and uptake of knowledge on which it is founded—is the outcome of a collaborative process that requires agency on the part of all involved. As we hope to have argued convincingly and demonstrated empirically, exploring impact through governmental reports provides an effective approach to understanding these dynamics further, particularly as it allows for a view of the text as brokering interaction between researchers and stakeholders. In science–policy interaction, a space between science and policy is waiting to be filled with knowledge-brokering texts. Herein lies an invitation for universities to matter more.

Appendix 1. Studied SOUs

Sou title	SOU-ID	Department	Refs. (N)	SCHOL	DOI-MATCH	SE	EN	NO	DA	GE	IT	FR
En moderniserad arbetsrätt	2020:30	Employment	185	51	58	138	41	4	2			
Ett ordnat mottagande—gemensamt ansvar för snabb etablering eller återvändande (language only among scientific sources)	2018:22	Employment	241	30	15	227	13			1		
Näringslivets roll inom totalförsvaret	2019:51	Defense	75	9	0	74	1					
Sveriges säkerhet—behov av starkare skydd för nätverks- och informationssystem	2021:63	Defense	77	1	0	72	5					
För att börja med något nytt måste man sluta med något gammalt	2018:90	Health and social affairs	141	7	1	113	28					
Att bryta ett våldsamt beteende—återfallsförebyggande insatser för män som utsätter närstående för våld	2018:37	Health and social affairs	105	34	15	78	26		1			
Utvinning ur alunskiffer–kunskapssammanställning om miljörisker och förslag till skärpning av regelverket	2020:71	Enterprise and innovation	74	20	3	55	18		1			
Mer biogas! För ett hållbart Sverige	2019:63	Infrastructure	296	39	0	238	57			1		
Moderna tillståndsprocesser för elnät	2019:30	Infrastructure	74	4	4	69	5					
Ett modernt belöningssystem, de allmänna flaggdagarna och redovisningen av anslaget till hovet	2021:74	Justice	79	13	1	75	4					
Ersättning till brottsoffer	2021:64	Justice	95	6	0	95	0					

(continued)

(continued)

Sou title	SOU-ID	Department	Refs. (N)	SCHOL	DOI-MATCH	SE	EN	NO	DA	GE	IT	FR
Högre växel i minoritetspolitiken stärkt samordning och uppföljning	2020:27	Culture	62	3	0	62	0					
Immunitet för utställningsföremål	2021:28	Culture	55	0	0	52	3					
För flerspråkighet, kunskapsutveckling och inkludering—modersmålsundervisning och studiehandledning på modersmål	2019:18	Education and research	242	146	66	144	95		3			
En tioårig grundskola	2021:33	Education and research	318	127	79	209	99	7	2			1
Om folkbokföring, samordningsnummer och identitetsnummer	2021:57	Finance	53	1	0	52	0	1				
Sverige och bankunionen	2019:52	Finance	158	49	55	39	117		1		1	
Vägen till en klimatpositiv framtid	2020:4	Environment	258	58	37	133	125					
Producentansvar för textil—en del av den cirkulära ekonomin	2020:72	Environment	99	4	4	72	27					
Bostäder att bo kvar i—bygg för gemenskap i tillgänglighetssmarta boendemiljöer	2015:85	Enterprise and innovation	100	10	0	97	0		3			
Total			**2787**	**612**	**338**	**2094**	**664**	**12**	**13**	**2**	**1**	**1**

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Valorizing the Humanities: Impact Stories, Acting Spaces, and Meandering Knowledge Flows

Eugenia Perez Vico, Sverker Sörlin, Linnea Hanell, and Linus Salö

Introduction

One of the most common ways to grasp the extent to which research and researchers matter is to examine, gauge, or otherwise evaluate their activities in terms of impact. Universities are expected to produce knowledge that effects the societies that surround and sustain them. Accordingly, the extent to which—and the ways in which—humanities knowledge matters to society is a classic topic of debate. How is this time-honored, yet vibrant and polycentric research area useful to the surrounding societies that sustain it? How does humanities knowledge become what Latour (2004, 242) called "matters of concern?".

The answers to such questions are of course multifaceted, but they have also been resting on limited research and have often been quite poorly articulated. Few would deny that humanities—pivotal for the understanding of language, culture, religion,

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arts, values, media, politics, and ideas in societies—matters significantly for the development of a well-functioning, democratic society (e.g., Nussbaum, 2010). A significant portion of the most influential, and most cited, scholars consists of philosophers, anthropologists, linguists, or others who represent the humanities. Michel Foucault, Judith Butler, Bruno Latour, and Noam Chomsky tower high in the citation tables. Apparently, research in these fields is essential to what societies think and know about themselves, and hence, is citable to a wide array of disciplines over long periods of time (Myrdal, 2009). Yet, what else might be worth foregrounding in debates on the impact of the humanities?

The notion of mattering in society elicits two perspectives: *societal impact*, which focuses on the outcomes of humanities knowledge production, and *knowledge valorization,* which concerns the process of creating value from humanities knowledge and thus involves engagement and activities from scholars and societal actors. Although these perspectives are frequently employed interchangeably, they are, in fact, distinct concepts that are intertwined in the sense that research valorization serves as a means to attain research impact (Benneworth & Jongbloed, 2010; Molas-Gallart, 2015). While valorizations may have economic value connotations, they are not limited to commercialization, technology transfer, or conventional innovation but extensively involve informing policy changes, improving societal processes, and educating the general public. We thus understand the term *valorization* in the humanities context as broader and more inclusive than the STEM-appropriated terms *knowledge transfer* (which says little about what the transferred knowledge actually does) and *commercialization* (which covers very little of the impact the humanities offer).

In this chapter, we focus on the valorization of humanities knowledge with the aim of comprehending the manner in which this process engenders societal impact.[1] Against the examples of Foucault, Butler, Latour, and Chomsky, one would expect new knowledge in these areas to be considered of first-rate importance and its performance and uptake in society monitored closely and constantly researched with great intensity across a range of knowledge fields. However, that does not seem to be the case. With few exceptions, the impact and valorization of humanities knowledge tend to play a marginal part in scholarly work on research policy. Thus, this is not a much-studied subject, at least not if we think of the kinds of analyses that endeavor to chart impacts systematically in pursuit of understanding scholarly behavior, inform policy, and direct investment in research. This kind of research has been conducted for the most part vis-à-vis the STEM fields (science, technology, engineering, and medicine) for almost a century (e.g., Bernal, 1939; Lotka, 1926; Merton, 1938, 1942). It has subsequently matured and become thematically streamlined and methodologically sharpened, especially since the 1980s, through a range of specialized journals, vast collections of book-length studies, and several handbooks and companion volumes by a substantial community of scholars (e.g., Martin, 2019) without paying much

[1] Consequently, we leave out additional impacts that do not relate to the valorization attempts of scholars, such as educational and intra-academic impacts.

attention to the particular character of knowledge production in the humanities and its significance for society.

The humanities have hence remained a black box of undisputed presence but unclear significance. Subsequently, the understanding of value flows from the humanities is in dire conceptual straits, with merely occasional attempts being made to theorize and empirically pinpoint the ways in which humanities research matters to societies at large. As a result, the impact stemming from this area of research is not very well known, nor is it strongly acknowledged in politics and public discourse. Consequently, the level of investment in humanities knowledge and enrollment numbers in humanities programs rarely stand out as acute policy concerns, in stark contrast to the almost omnipresent engagement in STEM fields.

For a long time, not many seem to have cared much about this state of affairs, bar ritual tirades about the "crisis of the humanities" or demonstrations of their neglect by governments or university leadership (Collini, 2012; Plumb, 1964). Recently, however, policy interest in the impact of the humanities has increased substantially, as evident, for example, in the 2020 strategy for the Humanities at the University of Oslo.[2] This state of affairs reflects a more searching, probing, and embracing approach to knowledge in an era marked by an increasingly significant interest in societal challenges, mission agendas, and deepening crises of trust, truth, and even democracy—for which STEM knowledge is clearly insufficient (Sörlin, 2018). Strong calls have been voiced for greater contributions from the humanities in dealing with challenges related to climate, environment, and even "the planetary" (Chakrabarty, 2019). In this light, the lack of a comprehensive and nuanced impact and valorization analysis of the humanities is highly problematic (Abreu & Grinevich, 2013; Ekström & Sörlin, 2012, 2022). Another concern is that the lack of analysis may result in an undervaluation of humanities knowledge and, hence, skewed and misinformed investments and priorities in research and education.

The fragile and sporadic nature of the data, combined with the deeper and more demanding complexity of the challenges, should motivate a deeper engagement and a richer repertoire of methodological approaches to understand the valorization and impact of the humanities (Cassity & Ang, 2006). Previous studies have underlined the limited ability of simple output measures based on economic growth imperatives to capture the broader role of the humanities (Belfiore, 2015; Molas-Gallart, 2015). They have also shown how impacts from different fields of knowledge manifest themselves in quite diverse ways (Reale et al., 2018). This hard-to-capture and refracted nature of impacts from the humanities has prompted many scholars (e.g., Molas-Gallart & Tang, 2011; Oancea et al., 2017; Olmos-Peñuela et al., 2014a, b) to instead concentrate on valorization. Identifying and explaining what humanities scholars have been doing to put knowledge into practical use is more tangible and accountable than tracing the impact in terms of societal value.

While such efforts to understand the valorization and subsequent impact of humanities knowledge are informative and useful, they fall short of tracing and understanding the impact in terms of *how* the societal effects of humanities unfold and

[2] https://www.uio.no/english/about/strategy/humanities-strategy/index.html.

create value, often in a complex sequence of linked processes. Voices have therefore been raised, calling for a more substantial understanding of the nature and breadth of impacts from humanities research (e.g., Pedersen et al., 2020) and of the complex feedback from "the social ecology" in which valorization of humanities research plays out (Benneworth, 2015). There are good reasons to take this call seriously. Previous research, covering multiple research areas both in STEM and the humanities, suggests that the impact that unfolds from valorization is not solely conditioned by the actions of academia but also by external actors who offer resources, infrastructure, and networks (Jacobsson & Perez Vico, 2010; Molas-Gallart & Tang, 2011; Perez Vico & Hallonsten, 2017; Spaapen et al., 2011). While this work has enriched the understanding of "the social ecology" of impacts, that is, the complex network of social and institutional factors that shape valorization, there has been little scholarly attention paid to how valorization of research is enabled or hindered by such social complexities. We posit that this enabling and hindering is conditioned not only by scholars themselves but also by societal agents who mandate the *acting space* in which scholars can put their knowledge to use. Acting space refers to the arena or environment that offers access to various means, such as collaborators, audiences, and channels that in turn enable researchers to make their knowledge useful to society. While this space is conditioned by others, researchers are not merely passive onlookers, and some may actively seek to create such space. However, as we will stress in this chapter, given the hard-to-predict nature of *meandering knowledge flows* from humanities research, which does not always hold a clear direction or preset purpose, it is of particular importance to pay attention to how and why researchers are (or are not) given access to space for valorization. Through the concepts of acting space and meandering knowledge flows, we wish to provide a richer insight into how knowledge valorization unfolds in the humanities and, by extension, how to understand the impacts that may follow from them.

Objective, Approach, and Organization of the Chapter

Set against the backdrop sketched above, the objective of the present chapter is to produce an account of how the value of the humanities can be explored empirically and grasped theoretically. To this end, we bring together the insights from three previous empirical studies that have investigated the impact of the humanities. These are Hanell (2021), Salö (2021a), and Kotljarchuk (2020)—all to be outlined in some detail in the sections to follow. Taking stock of the features highlighted through these studies, we seek to tease out an account of how humanities knowledge flows through spaces—yet interact with these spaces—in ways that enable impact. This account leads us to a two-pronged argument. Firstly—and pervasively—we argue and make the case for *historical impact stories* as an apt methodological inroad for the understanding of value flows from the humanities and, by implication, the societal value of humanities research. Historical impact studies are proposed as a fruitful empirical approach for investigating the contextual premises and outcomes of knowledge

valorization. This approach is deemed ideally suited for this purpose, and it presents an untapped opportunity to understand these processes in a novel way. Secondly, we introduce and put to work a conceptual prism related to valorization—acting space and meandering knowledge flows—through which the dynamics brought forth by historical impact stories can be grasped. Jointly, as we shall hold, these concepts make up a useful heuristic through which to view and understand value flows from the humanities as a distinct modus operandi. The concepts thus provided prod us to recognize the meandering nature of humanities research. Moreover, it allows us to see how researchers in the humanities actively seek and are given access to an acting space, or rather spaces in the plural, that in turn enhance the societal value of their work. It also allows us to see how such acting spaces can, under certain circumstances, be closed down.

Our approach takes its cue from what has been identified as "an important next step when developing SSH [social science and humanities] impact studies" (Pedersen et al., 2020). Three cases of humanities research in Sweden pave the way for our conceptual framework. Two cases (1 and 2) are based on a wider ongoing research project on the societal effects of the human sciences (Salö, 2021b), whereas the third (3) is an independently produced study. Our cases are selected from long-term humanities research in Sweden of relevance to the politics of language and population and cover almost a full century, from the interwar period up to the present.[3] All three cases are historical; hence, we know the outcome and can gauge the impact, or importance, of the underlying humanities research much more clearly than we could in contemporary cases. They have been selected because they exemplify the phenomenon we are interested in and there is rich documentation on how the process is conditioned by external circumstances. In our rendering here, the cases are somewhat stylized to pave the way for theorizing efforts.

The chapter is organized in the following way. Firstly, we briefly review research hitherto undertaken to understand the impacts of the humanities with a particular emphasis on knowledge valorization. Secondly, we present our three cases of impact from twentieth-century humanities research in Sweden. The cases show how access and non-access to an enabling acting space conditions the valorization process as impacts unfold over time. They also demonstrate the drastic disparities in societal impact that can follow from different lines of humanities research. Thirdly, we make a case for historical impact stories as an apt methodological inroad for capturing value flows from the humanities. We argue that such an approach allows us to illustrate how impacts of the humanities unfold as meandering knowledge flows over time, conditioned by societal agents that mandate the acting space for valorization.

[3] Research behind the cases has been conducted in the Swedish Vinnova platform Making Universities Matter and the international R-Quest project, hosted by the Nordic Institute of Research Policy, Education and Innovation (NIFU), and their research lines on research quality and impact from the humanities. See also comprehensive case presentations in Hanell (2021) and Salö (2021a, b).

Research on Humanities Valorization and Impact—A Brief Review

While the structural understanding of knowledge production as part of a value chain of impact and return on investment in research is largely absent in the humanities, many realize and acknowledge a priori the importance of the vaguely delineated field of inquiries that we call "the humanities." This becomes obvious not just by looking at formative minds working in humanities knowledge fields, such as John Rawls, Hannah Arendt, and Julia Kristeva, or on fundamental topics such as the understanding of society, justice, knowledge, and power. Evidence is also overwhelming when it comes to the general impact of humanities research on knowledge, history, language, and other phenomena without which modern societies would not be possible. The same is true if we look at the attempts that exist to assess the workings of humanities on the level of states and nations. The University of Oslo, founded in 1810, has played an outsize role in the formation of Norway as a modern nation after its secession from Denmark in the early nineteenth century (Myhre, 2011). A study of the uptake of humanities knowledge in the Danish state found that humanities scholars were the single most active category of researchers to communicate with the different branches of the state. The study also found that the humanities was the most widely used category of expertise; virtually all branches of government and state were, in one way or another, supported by humanist knowledge (Gøhler Johansson et al., 2018). Yet, for most work in the humanities, the kind that gains ordinary attention and visibility, we have very little theoretical reflection on, and empirical data about, how it travels beyond academia and what role agents outside of academia play. This profound flaw in the social understanding of knowledge inhibits the development of rational policy for research and innovation, not just in the humanities but across the full spectrum of knowledge fields.

Lacking more original and context-specific approaches, impact studies of the humanities often apply innovation imperatives developed from STEM perspectives. These have typically black-boxed and concealed the empirical detail of the multifaceted work that paves the way for the societal uptake of knowledge and ideas from the humanities, as demonstrated by Belfiore (2015) and Benneworth (2015). Beneficiaries of humanities research tend to be broader, more amorphous, harder to categorize, and less articulate and demanding in their relation to knowledge production compared to, for example, branches of industry or the medical and pharmaceutical sectors. Some may partly overlap with STEM beneficiaries, but they also include completely separate domains such as the creative and publishing industries, museums and media, popular and political movements, government bodies, and the way entire societies think and act (see, e.g., Benneworth, 2015; Cassity & Ang, 2006; Gulbrandsen & Aanstad, 2013).

The multiple differences between humanities and STEM knowledge valorization have implications for the nature of the societal benefits that unfold. Impacts stemming from humanities research are typically much broader than those conventionally captured by the STEM-focused literature, such as contributions to technological

innovation and economic growth (Perez Vico, 2018). Since humanities knowledge is not often turned into a new technology or product to which a quantifiable market value could be attributed, we need other methodological approaches to explain the valorization process and assess its impact, different concepts to theorize it with, and a new meta-language to articulate it.

On the latter note, "impact" may not be the right term to denote what the humanities do and achieve; "influence," "bearing," or "effects" may arguably better capture their significance (see e.g., Salö (2021b), where "workings" (*verkningar*) is used to such ends). Nonetheless, we principally utilize the notion of impact in this chapter to speak of the way in which humanities research matters. A reason for doing this is that the bolstering of humanities exceptionalism may detach the research area from other areas in nonbeneficial ways. Another reason for holding on to the notion of impact is that it allows us to profit from what is already known—albeit based on conditions of other areas. Moreover, despite being far fewer than their STEM counterparts, frameworks aimed at identifying broader impacts of the humanities have been offered. For example, Reale et al. (2018) distinguish between three types of impact from social science and humanities research—scientific, social, and political—and Pedersen et al. (2020) develop a typology of academic, policy, social, educational, cultural, and economic impacts. Some of these impact types are particularly important since they are unique to social sciences and humanities research. For instance, they include increasing cultural and historical awareness (Reale et al., 2018), stimulating critical thinking, emancipating marginalized groups, and enabling a more comprehensive understanding of complex societal problems (Pedersen et al., 2020).

In this study, we are concerned not only with identifying impacts but also deciphering how those impacts are enabled or hindered by societal actors as they are, actively or inadvertently, offering or denying acting space. That leads us to look deeper into the valorization activities that scholars perform to ensure that knowledge from research adds value beyond the scientific domain (Benneworth & Jongbloed, 2010; Molas-Gallart, 2015). We are inspired in our approach by several recent valorization initiatives in humanities institutions aimed at strengthening interactions with policy, media, and the broader public under labels such as integrative, postdisciplinary, and transformative humanities. Notable examples can be found in more than 70 Humanities Centers around the world (Holm et al., 2015) and in special initiatives to pursue medical, digital, environmental, and other integrative humanities, at Oxford, Cambridge, LMU in Munich, KTH in Stockholm, and elsewhere (Ekström & Sörlin, 2022; O'Gorman et al., 2019; Sörlin, 2018).

Studies of valorization so far show that humanities researchers interact with actors outside of academia to at least the same extent as researchers in other fields (D'Este & Patel, 2007; Olmos-Peñuela et al., 2014a, b), and often more so (Gulbrandsen, 2016; Pedersen et al., 2018). However, the *collaboration patterns* are different. Humanities researchers in Spain tend to not use *formal* kinds of societal collaboration to the same extent as STEM researchers do. On the other hand, they are more often involved in popularizing research that reaches a broader public and in other forms of collaboration with impacts that may be substantive but less traceable (Olmos-Peñuela et al., 2014a,

b). Similar patterns were found in studies of British, Australian, and Norwegian humanities research. They reveal frequent collaborations through popular science books and public appearances (talks, consultations, advice) and less often through product-oriented and commercial technology transfer (Abreu & Grinevich, 2013; Gascoigne & Metcalfe, 2005; Gulbrandsen, 2016; Hughes et al., 2011). On the other hand, there are certain countries where humanities scholars are frequently used in formal roles in government and the public sector (e.g., the United States and Sweden).

A framework for understanding valorization introduced transformation-circulation-consolidation processes that set out to capture how individual pieces of arts and humanities research are translated upwards through first-order users, circulated through networks, and consequently create societal improvements. This study contended that valorization is mostly non-linear with disordered and complex feedbacks in a "social ecology" (Benneworth, 2015). Similarly, Bozeman and Sarewitz (2011) present a flexible case-based approach to map the public value of research through value analysis chains. These observations of contemporary or relatively recent interactions echo historical accounts suggesting that scholarship from the humanities, at least in some countries, hold multiple formal and informal links to public agencies, media, and societal institutions of many kinds, sometimes with pervasive influence on society through education, media, or politics (Myhre, 2011; Sörlin, 2021).

To investigate how this conditioning plays out for the humanities is a research endeavor of central importance. Our premise is that the impact downstream depends on whether external actors upstream endorse and support the research and valorization process and, consequently, on how desirable they judge the potential benefits of interaction to be. The intention and willingness to offer such acting space to knowledge from the humanities have not been much studied in previous research.

Based on their comprehensive literature review, the study by Pedersen et al. (2020) identifies a number of methods for research impact assessment in the social sciences and the humanities. The methodological procedures they describe range from interviews to surveys, expert review, bibliometrics, and user evaluation—as well as a number of other methods described in the literature. However, a method that is rare in that literature (but see Bod, 2020) is *the historical impact story*, here understood as case studies tracking the ways in which knowledge production and exchange eventually affect policy or in some other way yield change. Such studies detail the impactful pathways of mobile ideas of the humanities that, under favorable social conditions, morph into actionable or otherwise useful knowledge in decision-making processes and thus render policy impact visible (Salö & Karlander, 2018; see also Bertilsson, 2021). In the following, we aim to explore how historical impact stories can help us gain a comprehensive understanding of the premises of valorization of humanities knowledge, and consequently, its impact on society.

Three Historical Impact Stories

In this section, we present three *historical impact stories*. At its heart, the approach aligns with seminal work within the history of science and historical epistemology, particularly work geared toward addressing the slow and culturally conditioned production and reception of scientific knowledge (e.g., Fleck, 1935/1979; for a useful overview, see Rheinberger, 2010). In a similar vein, more recent work has opted for a historical approach to explore how humanities knowledge "travels" (Howlett & Morgan, 2011) and how the effects thereof have brought about societal and technological change (Bod, 2020).

As applied here, historical impact stories involve examining the prehistory of tangible outcomes such as steering concepts, policies, and the like with a view to tracing the conditions under which impact was able to emerge. It explores the often-unnoticed labor of central entrepreneurs who have contributed to the development of new concepts over time, highlighting how the concepts were launched and dispersed, and how they morphed and fused with other concepts, eventually to become impactful—or to be rejected (Ambjörnsson & Sörlin, 1995, p. 7). Notably, however, the three studies we present mobilize their own approaches to historical impact stories, and fleshing out a comprehensive methodological procedure is beyond our objectives here.

Case 1: "Cultivated, Simple and Comprehensible": Plain Language in Sweden

The language of the public sector in Sweden is required by law to be "cultivated, simple and comprehensible." This is stipulated in what is commonly called the "Plain language section" of the 2009 Language Act of Sweden. In the first case study, by Hanell (2021), this juridical requirement is analyzed as a product of a process that stretches more than 100 years back. In this process, the notion of "plain language" (Swe: *klarspråk*) was established as a particular ideal for language use which, in turn, was bound up with specific academic expertise. Hanell demonstrates how the plain language ideal emerged from the common-sense idea that the core function of language is to transmit information between people, and that the best use of language, therefore, is that which transmits information with as little disturbance as possible, rendering clarity a prime communicative-ideological virtue (cf. Hanell, 2017). As Hanell's study shows, this common-sense idea was appropriated in the late nineteenth century by Swedish linguists, most notably Adolf Noreen, who successfully claimed that linguistic expertise is necessary to fulfill this ideal (Noreen, 1885). In the late nineteenth and early twentieth centuries, linguistic expertise was commonly acknowledged as necessary for the education of school pupils, and several academic

linguists wrote handbooks on the use of the Swedish language for such an audience. However, for a long time it was entirely unheard of that linguists might have something to say about language used by adults in the public sector.

This state of affairs was upended as the Germanist, public intellectual, and former student of Noreen, Erik Wellander, wrote a report about language use in public inquiries, published as a public inquiry itself in 1950 (Wellander, 1950). Wellander's work paved the way for further engagement by linguists in language use in the public sector. Hanell's study shows how Wellander became a key agent in the establishment of a Swedish infrastructure for what came to be known as *language care* (Swe: *språkvård*; the phenomenon is also known as *language policy and planning*), most notably by shaping the institution *The Board for Swedish Language Care* (*Nämnden för svensk språkvård*), founded in 1944. Through Wellander's public inquiry, the language of the public sector gradually came to be seen as a central object for such "language care," the core purpose of which was to modernize the written language of the state by making it more similar to everyday speech. This idea resonated well with progressive ideas in the formative years of the Swedish welfare society; accordingly, over a period of several decades, it became implemented in a cautious, yet determined and institutionally solid fashion, step by step.

In the 1960s and onwards, the modernization argument was complemented with arguments for democracy: a clear use of language was thought to help bridge the distance between citizens and government agencies. Several books and booklets from this era propagated a clear use of language, among them a booklet in 1979 that started using the term *klarspråk* (plain language) to refer to the ideal. The infrastructure for implementing this ideal continued to grow in the 1980s, after which it became common for public institutions to employ language experts who received standard training at the Language Consultancy Programme at Stockholm University. In the 1990s, the concept of "language politics" emerged as a contender to that of "language care." A number of key agents became involved in formulating a politics of language in Sweden; here, the plain language ideal was included among the key issues. Therefore, as the idea was formulated to legislate linguistic issues such as the right to use Swedish in contacts with public officials, the plain language ideal was also granted space, resulting, in 2009, in a Language Act that declared that "The language of the public sector is to be cultivated, simple and comprehensible."

There are several observations to make from this brief summary of a profound change in public language norms and practices in Sweden. The first is that it has been a reform of immense significance that has likely speeded up the modernization of society and indirectly rendered the state and all its institutions a partner and a change agent in the process. The impact was rooted in close interaction between individual linguists and a long sequence of public agencies and commissions—many more than those mentioned above. In the 1980s the issue had become mature enough to be conducted mostly within state agencies and government departments, without much push or effort from the linguistic community, although they remained involved. Another important factor is that individual scholars were, more than once, assigned to rather loosely defined inquiries where the scholars were expected to work for the betterment of the nation and its democracy by focusing on language.

A further characteristic of the main protagonists of this story, chiefly Erik Wellander, is that their roles as experts and advisors lasted over a very long time. They were persistently valuated by peers and influential agents as significant contributors. This positive valuation was assisted by the institutionalized system of public inquiries that allowed the generous time necessary to arrive at a satisfactory and useful result that most actors in society could agree on. We may also note that this profoundly successful impact of linguistic knowledge was not about the application of a particular research "result" or "innovation." Rather, it was an entire social philosophy of language that made its way from common-sense, ideas, through scholarship, to a more specific social norm. In retrospect, it seems instrumental that these developments took more than a century to unfold. Contrary to a fast and direct process from knowledge to impact, the slow, meandering route of knowledge was allowed acting space for a thorough construction of societal infrastructures that could both legitimate and execute the Language Act as it was put into place.

Case 2: Bilingualism Research and the Introduction of Mother Tongue Instruction

Salö (2021a) offers a second example through a study of the formation of mother tongue instruction (MTI) in Sweden. Since the 1970s, municipalities in Sweden have been required to provide linguistic minority children and adolescents education in and about their mother tongues. As a school subject in its own right, MTI is currently offered to speakers of more than 160 languages. The school subject is, as the study posits, an educational innovation.

From the late 1960s, the MTI policy was realized through an interwoven process of scholarly knowledge valorization that emerged under favorable contextual conditions. The immigration policy of postwar Sweden had been characterized by more or less explicit assimilation efforts. Immigrants were expected to adapt to Swedish culture, language, and ways of living, and scant efforts were made toward catering to the particular needs of minorities. However, from the mid-1960s, a critical debate on assimilation brought about a new climate of opinion in which the quest for assimilation was considered to be irreconcilable with that of equality. The public and political stance was gradually characterized by a will to acknowledge and support categories of difference—including the rights of immigrants and minority groups—in Swedish society at large. Throughout this process of mobilization, activists, politicians, and scholars from the budding field of international migration and ethnic relations—notably social psychologist Arne Trankell and sociologist Harald Swedner—were united in the task of bringing about change. Among others (see Schwartz, 1966), the Swedish linguist Nils Erik Hansegård contributed by pointing to the purportedly detrimental effects of disallowing the teaching of minority children in and about their mother tongues. More specifically, Hansegård's (1968) theory on so-called semilingualism became a particularly impactful policy driver in the years to come, although

the concept as such was unequivocally rejected only a decade later (see Karlander & Salö, 2023; Salö & Karlander, 2022).

In 1968, the Swedish government launched an ad-hoc "Immigrant Commission" (IC) with the task of compiling and producing relevant knowledge on the matter. Its mandate also included the presentation of policy recommendations within immigrant and immigration-related areas. Throughout the next six years, the commission served as a platform for mutual knowledge diffusion between politicians, bureaucrats, school representatives, and enrolled experts, many of whom were scholars who had previously shown an interest in the questions at hand (e.g., Trankell, Swedner). The inquiry also served as a means to build collective legitimacy for a shared vision and goal—the rights of minorities and a pluralistic immigration policy. Identifying solutions within the area of bilingual education was one of the critical issues discussed in the commission's work. This opened up a space for the valorization of an emerging group of bilingualism researchers, among them Hansegård and Tove Skutnabb-Kangas. Some of these scholars had previously acted as opinion leaders and thus played a part in enabling their own valorization by creating a market—or acting space—for their expertise.

Nevertheless, many arguments put forward were underpinned by early research pointing to the value of immigrant children's right to maintain and cultivate their multilingual repertoires through state-mandated teaching. These efforts, in combination with aligned input from other stakeholders, contributed to establishing a policy for so-called "home language instruction" for immigrant children, launched as a national policy since 1977.

The case illustrates how a valorization process encompasses mutually reinforcing knowledge diffusion and legitimation. Through emerging consensus, the different actors involved in the process legitimized and enabled each other's actions in terms of knowledge valorization and policy development. The importance of contextual conditions is salient. However, the case also lays bare a logic through which producers and users of knowledge co-contribute to each other's rise and success.

On the one hand, the shifting climate of opinion to some extent came about through the scholarly efforts of linguists, whose perspectives were increasingly seen as policy-relevant (Widgren, 1982). The IC might not have launched without the push of scholarly agendas; at least, it would not have embarked on the progressive directions it did without the signposts provided by research accounts produced within the humanities. On the other hand, it appears that the visions embedded in burgeoning fields such as bilingualism research could not have been valorized, if developed at all, a couple of decades earlier. The actors who jointly made up the IC, in this regard, created the conditions for the scholarly agenda to gain salience by making the field's thus far rather rudimentary findings actionable.

Case 3: Allan Etzler and the Demise of Racist Roma Studies

We could also find instances where the same innovative institutional structure produced problematic results with less, or a less lasting, impact, although failure is sometimes also a kind of a blessing in disguise, as we will see. The point to make here is on *the restricting of acting space* for valorization. We will use the example of Allan Etzler, a Swedish historian originally focused on medieval history who later, partly following his fieldwork in prisons, took up an interest in the Roma people and also learned the Roma language. Etzler's winding career from the 1920s through the 1940s has been carefully researched by historian Kotljarchuk (2020), whose inquiry we mainly follow below.

Etzler was a doctoral student at Stockholm University who, at the age of 42, defended his dissertation in 1944 after protracted study. He had used his newly acquired knowledge of Roma to gather information from Roma prisoners. Combining his prison research with extended travels to Finland, Norway, and Denmark, he studied penitentiary systems and especially how these countries dealt with the so-called "gypsy problem" (Montesino, 2001). He also studied the German Nazi system and found inspiration in the work of Robert Ritter, who was the leading state official responsible for Roma policies in the Third Reich and was later sentenced in the postwar trials. At first, Etzler's work had a considerable impact in its own right. His valorization included liaising with key public officials in the penitentiary system and in legal circles, and building networks among museum intellectuals and in academic circles of race biologists in Sweden (Wiklander, 2015). His articles for the news media were printed and circulated widely, and his policy recommendations to limit personal freedom for Roma and separate them from other parts of the population in special camps drew a lot of interest (Montesino, 2001).

By the end of the war, at the time of his doctoral defense, the previous, generally favorable climate for his ideas in wide official circles in Sweden had turned around. His research and his policy advice in particular became increasingly unpopular, explained by the demise of the German war effort and the growing awareness of the Nazi extermination camps, including the atrocities that affected the Roma people. The "pseudo-scientific racism" (Kotljarchuk, 2020) that had previously been largely accepted in academic circles was by now swiftly going out of fashion across the entire political spectrum, whereas in the past it had been criticized mostly by liberals and the left.

Kotljarchuk presents Etzler as "a clear example of *déformation professionnelle*." Using his network, which covered both academia and law enforcement agencies, Etzler contributed to anti-Roma discourse. On further scrutiny, however, his research was methodologically weak and easy to critique. The evidence he had presented in support of regarding the Roma as inherent criminals did not stand even elementary critical, empirical examination. His downfall as a trustworthy scientific expert and advisor, however, lay chiefly in the fact that the value structure of society changed, and so his acting space for valorization became restricted. This also comprises several social institutions, which had an interest in linguistic, historical, and social science

knowledge of the Roma in Sweden. One can say that precisely the kind of progressive, welfare-state-oriented public machinery that facilitated the success of plain language reform in this particular period also worked effectively to halt the career of Etzler and stop his favorite ideas of anti-ziganism.

Meandering Knowledge Flows Through Acting Spaces

What do the examples we have presented tell us about the processes in which scientific knowledge—aligning with the core theme of the present book—comes to matter? In this section, we draw out some of the features found in the three historical impact studies and discuss them—first individually, then jointly—through the two concepts of acting space and meandering knowledge flows. This will lead us to a discussion on how the winding features of knowledge flows form an essential part of the conditions that allow value to be ascribed to humanities research and enables it to matter.

Meandering Knowledge Flows: The Winding Features of Valorization

As noted earlier, like the human sciences more generally, the humanities benefit from developing their own ways of conceptualizing the impact of the knowledge they produce—based on the ways in which such knowledge moves. In this spirit, Carol Weiss (1979, 1980) invoked decades ago the idea of "knowledge creep" to capture the slow-moving tempo that characterized informed decision-making in mental health care. Her argument was, essentially, that decision-makers often do not know why and how humanities and social science knowledge came to influence their way of reasoning, ultimately because of the diffuse ways it had been absorbed. Weiss's work has since developed (e.g., Weiss, 1995) and proved inspirational for new generations of scholars seeking to account for knowledge utilization in the interaction between the human sciences and policymakers. For example, Meagher et al. (2008) proposed a method to assess science–policy interaction by utilizing the notion of "flows of knowledge" so as to capture the long-term, indirect, and serendipitous character of the impact stemming from social science research.

Following this line of thinking we ask: What do the cases we have briefly recounted tell us about the ways in which humanities knowledge moves? Without a doubt, the argument in Weiss's (1979, 1980) work gels nicely with the slow pace and twists and turns evident in the impact stories recapped here. We take from Weiss, accordingly, the idea that knowledge valorization in the science–policy interaction of the humanities is often creep-like; it is slow and easily goes unnoticed. However, based on the three examples we have provided it would seem that knowledge creeps into the empirical realities not in a sense of advancing within a neutral space but rather

in a vein where the space itself had a decisive impact on the direction and speed of that knowledge. As such, the cases pinpoint that a flow of knowledge depends on the surrounding "terrain" or space as a conditioning feature of knowledge use in and of itself.

Accordingly, through our three historical impact stories, we consider it apt to depict the ways in which humanities knowledge moves in terms of *meandering*, taking up the image of the meander from natural watercourses such as creeks and rivers. In these natural contexts, the winding, or meandering, course that water takes is instrumental for natural processes that allow water purification and the absorption of vital nutrients. By drawing on the image of the meander we do not suggest that knowledge functions like water in the sense that it becomes "purified" as it streams, nor that there is a general force of gravity that propels it forward. However, we do suggest that what characterizes the exchange between the humanities and society is that knowledge "runs unevenly" rather than as a steady flow (Salö & Karlander, 2022, p. 134). In precisely this vein, meandering knowledge may move slowly at times and faster at other times, and sometimes it is cut off from the mainstream in what becomes a blind alley oxbow lake of still-standing water. Just as for natural watercourses, the unpredictability and the "shaping" character of this meandering process of knowledge flowing through institutions and communities can be instrumental in building fruitful exchanges with users and partners in impact-making. This insight renders necessary another set of reflections on how impacts come about or how research comes to matter. Because even if humanities knowledge is constantly flowing in a meandering way without being utilized, valorization will always encompass meandering knowledge flows.

Acting Space: Conditions of Value Ascriptions

Against the unpredictable character of the meandering process in which knowledge flows and impact unfolds, one might assume that it's "shaping" is autonomous. Yet, the insights from the three cases tell us in concrete terms about how actions and inactions of valorization partners and beneficiaries shape the meandering process. One may be tempted to say about Etzler's case (3) that it was the low quality of his pseudo-scientific racist research that ultimately toppled it. In reality, that is only part of the explanation; after all, racist research had remained hegemonic for decades across the Western world despite severe and justified criticism. We need to look instead at the institutional structures *that ascribe value to the research* and based on that valuation open a space for valorization. As long as the established societal institutions and the "ethical environment" (Blackburn, 2001) of language and communication allow it, a particular kind of knowledge can continue to hold sway. Both case 1 (Wellander) and case 3 (Etzler) should rather be seen as examples of *instrumental expertise*. The term has been proposed by Steven Shapin, who has observed the ever-closer connections

during the twentieth century between the state and expert-based knowledge: "instrumental expertise, not knowledge but knowledge-power, not truth but competence in predicting and controlling" (Shapin, 2008, p. 40).

Talking of instrumental expertise is useful because it leads away from the notion of the universal virtue of applying "knowledge" to society, as if knowledge is inherently and always a good thing that brings desired outcomes. In all three cases, the scholars representing the "new knowledge" receive moral encouragement and institutional support from significant actors external to the knowledge production itself that allow them to make their knowledge useful. In cases 1 (plain language) and 2 (mother tongue instruction), the linguists continuously enjoy this support. The support creates repeated spirals of success, similar to the "internal credibility cycle" in the sciences (Latour & Woolgar, 1979/2013), where valuation (peer appreciation) is positively linked to increased material support, which in turn enhances opportunities to create more knowledge, enabling further research for more positive valuation, etcetera.

Correspondingly, understanding how the impact of research unfolds thus requires an understanding of the processes through which a diversity of societal actors *attribute value* to a piece of tangible or intangible knowledge, a research activity, or an individual scholar, and consequently provide or deny acting space. The societal view on the research is thus closely linked to the potential of valorization, and, ultimately, of impact. The ability to generate the impact of research through changing public perceptions will depend on the acting space given to a scholar by various societal actors, such as through the granting of access to advisory boards for public inquiries, interview occasions, and public debates. Whether an acting space will be granted will in turn depend on how desirable a societal actor judges the knowledge, the action, the potential benefit, or the scholar to be. Some decisions to grant or deny such space will, ultimately, be political.

Although these cases reveal how acting space and valorization intertwine, their connections have not been acknowledged in the study of research impact. It is already increasingly established that research quality must be understood according to the particular mission of the institutional framing and purpose of the research under evaluation and consequently the outlook of the agents that valuate the research (Langfeldt et al., 2020). In the same spirit, we argue that understanding the societal impact of research requires accounting for how agents mandate the acting space based on their valuation of the scholar or knowledge. Hence, we need inquiries and methodologies that can systematically identify, analyze, and make sense of the impact of the humanities.

The dynamics highlighted through the three cases resonate with impact frameworks that account for the interdependence between a wide set of effects that unfold in sequences over time (e.g., Benneworth, 2015; Spaapen & Drooge, 2011). One example of particular relevance to the concepts of acting space and meandering flows of knowledge is the framework of sequences-of-impact (Perez Vico, 2014; Perez Vico & Hallonsten, 2017), which captures value flows as long-term, unpredictable impact sequences where the valorization of academic research is highly dependent on the actions of others. This frame highlights that the impact of research unfolds depending on whether external actors, whether public, private, political, or

governmental, have the intention to participate, support, or in other ways enable such a process (Perez Vico & Hallonsten, 2019). By conceptually linking valorization to a market where value is assigned, our approach connects to the emerging field of valuation studies and the ambitions of previous scholars to explore the relationship between valuation and valorization in order to gain a coherent fine-grained understanding of how value is created from knowledge (Vatin, 2013).

Concluding Discussion: Humanities Matter

Our focus on the valorization of humanities knowledge, with the aim of comprehending the way this process engenders societal impact, teaches us that there is a social logic according to which research *comes to matter*. Our three cases add to the existing literature by emphasizing i) that valorization does not necessarily unfold in a straightforward or even manner, but rather in what we have here called a *meandering* way, and ii) that this meandering process is significantly conditioned by societal agents that mandate what we have called the *acting space* of valorization.

There are three critical implications of this insight for the study of impacts of the humanities, but also arguably for the study of the impact of all types of scholarly knowledge. *Firstly*, this means a shift in perspective regarding *who* we want to direct our attention to when we search for the effects of research. Rather than just focusing on the actions and non-actions of academics, this perspective shift obliges us to look at the external actors, how they valuate a certain piece of scientific knowledge, its promise, or its originator(s), and whether the outcome of this valuation hinders or enables the propulsion of impact by mobilizing different types of spaces and resources. For example, influential voices in research and innovation policy rather counteract humanities knowledge and seek to replace existing networks between humanities knowledge and public beneficiaries with ones that better serve their purposes. In Sweden, such a strategy has been pursued by the Confederation of Swedish Enterprise (e.g., Fölster et al., 2011). Impact is not just about applying new knowledge in a constantly benevolent social environment. It is also a competition among societal actors for values they wish to see realized, and these actors select knowledge that they believe offers favorable conditions according to their interests. Nevertheless, rather than being a passive actor whose ability to create benefits depends entirely on the enabling actions of others, scholars contribute substantially to creating their own acting space. As all three cases signpost, researchers have been able to exert an influence on those contexts, not least by equipping those who act therein with "tastes in harmony with the products these producers offer them" (Bourdieu, 1996, p. 252).

Secondly, this leads to a more serendipitous view on valorization, and consequently, on impact since timing becomes a significant conditioning element. Academia and scholarly knowledge are in many respects slow-moving institutions. Thus, society's values will change at a pace that academic endeavors struggle to sustain. What is highly valued today will be less valued tomorrow, and this will

influence the conditions for valorization. Given this circumstance, it is hard to judge the usefulness of scholarly knowledge only from its impact at a certain point in time. As apparent in all three cases, but most evidently in the case of Allan Etzler, this interactive valorization process unfolds in an acting space that is provided or denied as a consequence of a climate of opinion that conditions the market, ascribing value to mutually created knowledge.

Thirdly, our historical take on impact and effects implies a shift of responsibility for impact from academia. Rather than appraising the usefulness of research based solely on the traces of impact we can observe, we instead need to understand effects as a mutual process where both sides bear responsibility. We need both research that provides new knowledge, and societal agencies that allow acting space for knowledge to become used, affective, and effective. Considered jointly, the three historical impact stories invite us to grasp a multidirectional set of relations involved in directing the value flow from the humanities. Notably, to invoke the direction "from" the humanities ought not be used to suggest that knowledge simply moves from research to society. On the contrary, interaction lies at the heart of valorization, ultimately because it requires some part that is positioned to impart value to the knowledge produced.

To fully perceive and do justice to the profound impact that humanities research has on societies and cultures, a historical modus operandi is necessary. We show how the use of historical impact stories is an effective method for short- and middle-range periods alike. The cases we offer illustrate the ways in which impacts of the humanities unfold as meandering knowledge flows over time, conditioned by societal agents that mandate the acting space for valorization. We argue for the need for an approach that captures such hard-to-predict, nested, long-term, and complex value flows, and makes the case for historical impact stories as a methodological inroad. We thus propose that historical impact stories provide an apt addition to the literature on methodological approaches to mapping the impact of the humanities (e.g., Benneworth, 2015; Pedersen et al., 2020). We hold that exploring impact historically provides a way of detailing knowledge effects as undisputable facts—"witnessing their birth, their slow construction, their fascinating emergence as matters of concern" (Latour, 2004, p. 242).

In all, the inclusive, context-dependent, and long-term framing and methodology we suggest is particularly useful from the perspective of humanities research that is characterized by slow, diffuse, and multifaceted ways of societal uptake of scientific knowledge and ideas (Belfiore, 2015; Benneworth, 2015). Nevertheless, we also see a significant opportunity to leverage the humanities' views to capture many of the long-term and less visible impacts that appear in other disciplines.

By observing the impact of the humanities through the concepts of acting space of valorization and meandering knowledge flows, we find that the influence of humanities scholars is profound through "generic ideas" on fundamental issues such as how human culture and societies are conceived and how they work and function. We find it rather remarkable that the prominent position of humanities scholarship is hardly acknowledged within innovation research, science policy, and the broader debates on how universities matter. However, we also acknowledge that it is in the hands of

humanities scholars to address the current lack of perspectives thereof. Humanities scholars ought to find ways of articulating their own modes of mattering, for if they cannot do it, who can? Through this chapter, we hope to have contributed to this end.

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