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Introduction: behavioral expertization during COVID-19

- 1 An important study theme within the policy sciences concerns the changing relationship between the domains of science and policymaking. While this relationship has long been a topic of academic scrutiny, widely differing accounts are evident in the field, from those that foresee extreme “scientization” (Christensen, 2018), “technocratization” (Esmark, 2020), “expertization” (Holst, 2012) and related epistocratic forms of governing, to others that perceive policy to be increasingly “fact-free” and “post-truth” (McIntyre, 2018). Pierre and Peters (2020) in this light observe a key paradox of contemporary governance: that it is both affected by deeply technocratic *and* anti-scientific pressures at the very same time. Nonetheless, in the context of the COVID-19 crisis it would seem that the expertocratic, scientific approach has become a generally favored route. Worldwide, crisis responses have been characterized by a strong tendency towards strategies of depoliticization and (re)scientization, with public decision-makers making strong appeals to the authority of science and organizing their crisis management structures around assorted scientific advisory systems (Boin et al., 2021). The dominant governing mantra was thus one of “following the science”. Close collaborations were formed between public leaders and scientists from different disciplinary cadres – from epidemiologists and virologists to data scientists and behavioral experts. Ongoing appeals were made to the importance of relying on scientific knowledge and trustable facts, with at one point Dutch premier Mark Rutte labelling the advice of the Outbreak Management Team (the Cabinet’s main expert advisory committee) as “holy”.
- 2 Within the general push towards scientization, the upcoming field of Behavioral Public Policy (BPP) expertise has appeared to play a leading role (next to, of course, the fields of virology, epidemiology and medical care). BPP refers to emerging, and increasingly

formalized, interactions between the behavioral sciences (particularly behavioral psychology and behavioral economics) and public policymaking. This field is marked by a particular sensitivity towards the irrational, habitual, and subconscious drivers of human decision-making and a rejection of idealized accounts of *homo economicus* (see Strassheim & Beck, 2019; suppressed reference). It was not long after the COVID-19 crisis struck that behavioral experts in academia, government, and beyond claimed their space in scientific and political debates with an appeal to the urgency and relevance of using behavioral insights to address the pandemic. Inside academia, scientists soon produced new literature overviews, synthesizing existing knowledge about the effects of all sorts of pandemic-related behavioral interventions (e.g. Lunn et al., 2020). Within policy circles, renowned behavioral scientists became part of national and international crisis response teams and were consulted at key decision-making events. In the case of the UK, for instance, BPP protagonist and Director of the UK government's Behavioral Insights Team, David Halpern, acted as a member of the Scientific Advisory Group for Emergencies (SAGE) (the UK's main advisory committee of experts), facilitating a context in which behavioral science could come to play a vital role in the initial national crisis response. Beyond the consultation of particular BPP individuals, the institutional landscape has seen the rise of new specialised networks and units at the policy-science interface dedicated to understanding and tackling the pandemic. In the Netherlands, for instance, a Corona Behavior Unit [Corona Gedragsunit] was launched in April 2020. The unit was positioned within the National Institute for Public Health and the Environment (RIVM) and was designated to collect and bundle knowledge at the interface of behavior, psychology and health in order to inform and support government policy and communication (RIVM, 2020).

- 3 While the continuing popularity and institutionalization of BPP undoubtedly suggests that it has proven highly valuable for many policy issues including COVID-19, we deem it important to critically scrutinise this most recent wave of behavioral scientization. Perhaps especially as BPP is extending its influence, it is necessary to foster awareness of the limits, uncertainties and risks that are inherent in using behavioral insights for policy purposes (see e.g. Ewert, 2020; Mulderrig, 2018; Feitsma 2019). Indeed, beyond a rise in popularity there has also been an increase in a distinct type of criticism, most notably visible in the UK, arguing that the take-up of BPP has been rather hubristic. The claim is that behavioral science has been used in an ill-informed way, falsely taken to explain and predict phenomena beyond the field's epistemic boundaries (e.g. Ahmed, 2020; Sodha, 2020). In this article we understand this specific criticism as *behavioral expertise drift*, which occurs when experts transcend their knowledge domain or overstate the robustness of their knowledge. Taking the national crisis responses, and their institutional underpinnings in the UK and the Netherlands as our case-studies, we seek to trace the role and influence of BPP during the COVID-19 crisis¹. We argue that in the UK, BPP was highly influential and positioned at the heart of decision-making but also susceptible to instances of expertise drift, exemplified by the contestation surrounding the notion of "behavioral fatigue". BPP appeared to play a different role in the Netherlands, where it was less publicly politicized, exercised influence from a more peripheral position, and revealed a seemingly minimized, if not altered, approach towards BPP. In this article, we attempt to capture these diverging processes associated with the flow expertise by introducing the trichotomy of *expertise drift*, *thrift* and *shift*. Whereas "drift" refers to situations when epistemic bounds are transgressed, "thrift" links to instances in which epistemic bounds are well respected, going hand in hand

with a more minimalized use of expertise. The notion of “shift” refers to situations not of transgression but of a more fundamental *transformation* of expertise: when expertise practices are reinterpreted and modified to such an extent that the connection to the original epistemic bounds, ideas and practices is loosened (see Table 1 in the Discussion section for a more elaborate description). As we outline below, these concepts derive from and extend Nowotny's (2000) notion of *transgressive competence*. Crucially, while these terms provide us with fresh perspectives on the nature of the science-policy interface, we claim that their activations cannot be explained on the basis on the nature of the sciences and expertise they embody. We argue that expertise drift, thrift and shift are critically shaped by the institutional contexts within which science-policy interactions occur.

- 4 This article seeks to contribute to scholarly debates in several ways. Generally, we add to the fine-grained empirical (and comparative) analysis of contemporary science-policy interaction and the role of knowledge in policymaking (e.g. Strassheim, 2017; Fischer, 1990; Wesselink et al., 2013; Weiss, 1977; Jasanoff, 2004; Dunlop, 2017). Our scrutiny of science-policy dynamics during COVID-19 has direct links to the literatures on depoliticization (e.g. Flinders & Buller, 2006), technocratization (e.g. Esmark, 2020) and scientization (Saretzki, 2015). Theoretically, we connect our analysis to literatures further removed from orthodox policy debates, most notably those on expertise drift and transgressive competence in the STS domain (Nowotny, 2000). We center our analysis around this idea of drift as a species of transgressive expertise. We do, however, argue for an expansion of related conceptual vocabulary having observed occurrences of expertise thrift and shift. Empirically, we contribute to work tracing and analyzing BPP developments, both before (e.g. Strassheim & Beck, 2019) and during the COVID-19 pandemic (e.g. Sibony, 2020; Pierre, 2020; Zaki & Wayenberg, 2021). BPP has been popular and has been presented as the latest hallmark of evidence-based policy (e.g. John, 2018; Halpern, 2015), but a more critical camp has drawn attention to its (implicit) political, ethical and epistemological limits (e.g. Ewert, 2020; Leggett, 2014; Mulderrig, 2018). In line with this ambivalent reception of BPP, we seek to lay bare the context-sensitive role of behavioral science during COVID-19: used competently it produces unique value for policymakers, but when misapplied the value for policy is minimal if not negative.
- 5 In what follows, we first present the theoretical lens from which we assess the role of BPP during COVID-19. Then we discuss our research method and present two case-studies of BPP's role in national crisis response: one in the UK, the other in the Netherlands. The discussion then links the observations back to state-of-the-art theorizing on expertise drift and policy learning and provides recommendations for policy practice and future research.

Expertise in institutional context

- 6 In the wake of BPP's growing impact on the response of various nations to COVID-19, Susan Michie, a behavioral science advisor to the UK government, argued that “[w]e need to study the extent to which behavioral science has been applied in different countries and with what effect” (House of Lords, 2020). This article can be seen as a response to this call for comparative studies of BPP in response to the current pandemic. In our comparison of the respective uses of behavioral insights in the

Netherlands and UK, we are not as much concerned with particular behaviorally-informed interventions and their effects as we are with the broader questions of the flow and translation of expertise they reflect. Critical analysis of the operation of scientific expertise within public policy takes various forms. There are analyses which are concerned with the power dynamics which surround claims to expertise (Collins & Evans, 2008; Epstein, 1996; Fischer, 2009; 1990). Related work also considers how expertise influences the processes of democracy and political contestation (Swyngedouw, 2007 Whitehead et al, 2020) and more specific questions of advisory practices (Stilgoe, 2016). In the analysis we present here, our concern is more specific and relates to the nature of the institutional interfaces which facilitate science-policy interactions. Concerns have been raised about the (bounded) interdisciplinary form of much BPP (Feitsma & Whitehead 2019), and the dominant position that has been given to certain branches of the behavioral sciences within policy infrastructures Jones et al, 2013). We claim that the COVID-19 crisis provides a context within which it becomes possible to see more clearly the influence of institutional context in shaping the effects of behavioral expertise on public policy.

- 7 According to Nowotny (2000), it is critical to position claims to expertise within the contexts in which they emerge. These contexts may be interpersonal, cultural, institutional, or historical, or indeed various combinations of these. The author argues that understanding these contexts is critical to beginning to understand the ways in which claims to expertise exclude other competing claims to knowledge (from “non-experts” or competing scientific paradigms). In the context of these necessary exclusions, Nowotny claims that expertise is never truly scientific. The call for expertise inevitably means that the expert becomes employed in the service of politics. For Nowotny, who is primarily interested in how expertise transforms science, the demands of the political inevitably compromise the scientific. . Drawing on her insights, we focus on the ways in which institutional contexts influence the forms of behavioral expertise that have informed government responses to COVID-19, and, specifically, how these insights may inform future interfaces between public policy and the behavioral sciences.
- 8 We use the term *institutional context* in this article to refer to something more than just the power of formalized advisory institutions. Although we include named expert panels, committees, and units within our analysis of institutions, we also understand institutions in more informal ways. Informal institutional practices pertain as much to how organizations interact (or disengage), produce implicit customs, and share (often unwritten) understandings (see Coulson & Ferrario, 2007). Put succinctly, we understand institutional context to refer to the *formal and informal contexts of action (including bureaucratic structures and more fuzzy practices) that shape the policymaking process*. These formal and informal contexts are evident both within the structures of government but may also condition policymaking from outside of the state. Understood in these terms, institutional context is not only about the impact that individual organizations/unit/committees have on events but also the ways in which institutions coalesce, establish informal hierarchies, and intuitive codes of conduct. In geographical literature, these forms of institutional sensibility are often referred to as *institutional thickness* (ibid). Such a perspective does, of course, also build on a well-established tradition of institutional analysis within the study of public policy, administration, and expertise (e.g. Campbell & Pedersen, 2018; Jasanoff, 2004). Related works draw

attention to the formal and informal ways in which established and emerging institutional systems shape the flow of expertise and influence and shape emergent practices. Ultimately, what an institutional perspective offers is an insight into how scientific expertise is not only shaped by overt political interventions (see Nowotny, 2000), but also by more subtle and intangible organizational cultures, relations and histories. The call to expertise may reshape science but this reshaping process is determined by the institutional forms that condition expertise.

- 9 In exploring the flow of expertise during the COVID-19 crisis, we consider the degree to which behavioral expertise drifted into areas of limited competence. Expertise drift has been described by Nowotny (2000) as a form of *transgressive competence* whereby available experts make judgements on issues beyond the limits of their designated expertise. While we are interested in expertise drift (particularly in the context of the UK), our analysis seeks to complicate how we might understand the nature of this transgressive competence and the institutional processes which facilitate it. In addition to developing a novel institutional perspective on the notion of expertise *drift*, in this article we introduce the allied concepts of expertise *thrift* and *shift*, pointing respectively to processes in which expertise is used in a curtailed fashion, or in which it is drastically re-interpreted and to that extent disconnected from the original body of knowledge.² The processes of expertise shift and thrift are evident in the Dutch case study and offer a vocabulary to understand how responses to COVID-19 have resulted in flows of expertise that move in different directions to the forms of transgressive competence identified by Nowotny. While these expressions of expertise serve to militate against certain forms of transgressive competence, they are in no way unproblematic in themselves. Ultimately, while our analysis is informed by the work of Nowotny, we challenge the latter in two main ways. First, we develop a more diverse typology of the different ways in which scientific expertise connects to policymaking. Second, we broaden the contextual focus of Nowotny's work to consider longer-term institutional structures and practices that shape the flow of expertise within and beyond specific crisis moments.

Method

- 10 This article builds on explorative qualitative document analysis, undertaken during the period of January 2020 to June 2022. The analysis focused on two case-studies of sites in which behavioral science has been informing the government response to COVID-19. With a relative wealth of BPP-related activities focusing on the pandemic in both the UK and the Netherlands, these sites provide *revelatory cases* (Yin, 2009) to study the most recent behavioral science-policy interaction. Pinpointing the role of BPP in different national contexts helps us to discern the influence of institutional context on processes of expertise. From the start of the research process, Nowotny's (2000) theorizing on expertise provided a loose anchor for our empirical case-study work, helpfully introducing the notion of expertise drift/transgressive competence and the impact of context on expertise dynamics. We seek to further build on this thinking from our own empirical observations. Our explorative analysis relies on the study of a wide range of document sources: policy reports (including the summaries of Parliamentary Inquiries into COVID-19), prominent books, committee minutes, records of Parliamentary discussions (including Hansard), newspaper articles, social media

communication, peer-reviewed articles, and other relevant documents. These documents focus on developments (and their institutional underpinnings) in the UK and the Netherlands. We employed a form of purposive sampling in the evidence collected as part of this article. Rather than focusing on the broad sweep of BPP influence on COVID-19 policy, we focused on the particular processes that surround the mobilisation of a term (in the UK) and a government unit (in the Netherlands). Though focusing on different objects, both case-studies consider how expertise is shaped by institutional forces. Our analysis has been designed to offer a detailed analysis of the particularities of BPP expertise rather than a more complete policy picture.

BPP during COVID-19 in the UK: the issue of behavioral fatigue

- 11 The rise to public prominence of the behavioral sciences in relation to COVID-19 policy in the UK is connected, primarily, to one concept – *behavioral fatigue*. Positioned as both a “common sense” notion and “behavioral science” theory, behavioral fatigue first came to prominence when it was alluded to by the UK’s Chief Medical Officer, Chris Whitty, on March 9th 2020. In the context of the timing of a national lockdown, he stated that: “There is a risk that if we go too early people will understandably get fatigued and it will be difficult to sustain this over time” (Chris Whitty, 2020, quoted in Mahase, 2020). At this point you will notice that Whitty refers only to fatigue. The precise moment when this term transformed into *behavioral fatigue* is unclear. The notion “fatigue” as some *behavioral* scientists have suggested was raised and questioned by Jonathan Ashworth MP in Parliament 14 days later in a debate on the Corona Virus Bill (Hansard, 2020). What is certain is that the addition of this behavioral prefix gave the term a semblance of scientific credibility and associated it directly with the behavioral sciences. The fact that behavioral fatigue sought to authoritatively address a scientific question (namely how long would people comply with lockdowns and social distancing methods), to which behavioral scientists did not actually have a scientific answer, makes it a clear case of expertise drift (see Nowotny, 2020).
- 12 The concept of behavioral fatigue rose to prominence because it was one of the main public explanations that was given in the UK to justify the decision to delay a national lockdown. While there were, undoubtedly, other reasons that informed politicians’ decision to delay³, it is now argued that this action was, most likely, one of the key factors that resulted in the UK recording more COVID-19 deaths than many of its European neighbors (Abbasi, 2020). What is interesting about the notion of behavioral fatigue is that despite its close association with the behavioral sciences, it is a concept that most behavioral scientists in the UK quickly distanced themselves from. Consequently, in this section we do not use behavioral fatigue to tell a straightforward story of how, and with what effects, behavioral science informed public policy in the UK. Instead, we use the concept as a context through which to explore, and problematize, the notion of *behavioral expertise drift* and associated forms of *transgressive competence* that are associated with the behavioral sciences in the UK. We claim that the apparent influence of this concept exposes the lasting institutional impacts of certain branches of the behavioral sciences in shaping how government understands the human condition and reveals a narrowness in the science-policy interface in the UK.

Behavioral fatigue: an intuitive, associative, yet ultimately orphan concept

- 13 Before discussing the nature and impact of the concept of behavioral fatigue, it is important to understand the formal institutional interfaces that exists between the behavioral sciences and COVID-19 policymaking in the UK. The behavioral sciences have informed pandemic response in the UK via two main routes. The first is the *Independent Pandemic Influenza Group on Behaviors* (hereafter SPI-B). According to the UK Government SPI-B “[...] provides behavioral science advice aimed at anticipating and helping people adhere to interventions that are recommended by medical or epidemiological experts” (SPI-B 2020). This group of independent academic experts draws on representations from the fields of behavioral science, health and social psychology, anthropologists, and historians⁴. The scientists on SPI-B provide expert advice to the Scientific Advisory Group for Emergencies (SAGE), which in turn advises government ministers and policy officials⁵.
- 14 The second route for behavioral expert influence is through the Behavioral Insights Team (BIT). The BIT was established under the David Cameron Administration to enable the latest insights within the behavioral sciences to inform the design and implementation of public policy in the UK (See Halpern, 2015; Jones et al, 2013)⁶. While it is unclear precisely how BIT has informed COVID-19 policy, there appear to be at least three routes through which it can wield influence. The first is through its membership of SPI-B and the SAGE advisory groups. The BIT’s Chief Executive David Halpern sat on both SPI-B and SAGE, and there are two other BIT employees who participate in SPI-B. The second is directly through the Cabinet Office. Third is through the longer-term impacts which the BIT’s understanding of human behavior and how best to influence it has had on government policy over the last ten years. While the precise power of this third form of influence is difficult to quantify, we claim that it may be important in helping us to understand the institutional traction which the idea of behavioral fatigue was able to achieve.
- 15 Given the role of the SPI-B Group and the long-standing influence of BIT at the very center of government, it is clear that the behavioral sciences have been informing government responses to COVID-19 in UK. In oral evidence presented at the House of Lords Select Committee on Science and Technology on June 9, 2020, behavioral experts from SPI-B and BIT suggested that they should provided advice on public communication and the likely *compliance effects* of messaging (placing particular emphasis on issues of consistency, clarity, and the use of trusted/relevant messengers) (House of Lords, 2020). It was also stated that they give advice on the implications of the results of ongoing surveys of public attitudes concerning various aspects of the COVID-19 crisis. While the influence of these groups on COVID-19 policy in the UK is difficult to determine precisely, what members of SPI-B and BIT seem to unequivocally agree upon is that they did not propose the notion of behavioral fatigue. Richard O’Brian, who is the head of communications at BIT, told the *British Medical Journal* that:

The notion, idea, of ‘behavioral fatigue’ absolutely, categorically, did not come from us or anyone at BIT [...] We did not propose fatigue as grounds to delay or shorten social distancing or any other measures aimed at COVID-19. However the phrase entered the public or policy discourse, it was not from us. (Mahase, 2020).

- 16 Writing in the same journal, Susan Michie and Robert West, both members of SPI-B, stated that “the commonsense idea of ‘behavioral fatigue’ and concern that locking down too early may lead to widespread non-adherence later, was invoked in the UK for justification of the catastrophic delay of strict social distancing measures in the UK. Behavioral fatigue was an ill-defined new term that had no basis in behavioral science [...]” (Michie & West, 2020).
- 17 It does appear that behavioral scientists were asked to gather evidence and advise on the behavioral implications of quarantine measures (House of Lords, 2020). SAGE minutes from March 13, that is four days after the Chief Medical Officer’s public use of the term fatigue, stated:
- There is some evidence that people find quarantining harder to comply with the longer it goes on. The evidence is not strong but the effect is intuitive. There is no comparable evidence for social distancing measures, but experience suggests it is harder to comply with a challenging behavior over a long period than over a short period (SAGE, 2020).
- 18 This statement would seem to contradict the suggestion that the behavioral scientists advising government were not endorsing some version of a behavioral fatigue hypothesis, even if not using that precise term. However, minutes of the same meeting also state:
- Difficulty maintaining behaviors should not be treated as a reason for not communicating with the public about the efficacy of the behaviors and should not be taken as a reason to delay implementation where that is indicated epidemiologically (SAGE, 2020).
- 19 Although this statement is somewhat ambiguous, it suggests that on March 13, that is 10 days before the UK’s full lockdown came into force, behavioral scientists had found some evidence to support the idea that there could be a form of behavioral fatigue associated with long-term compliance with a national lockdown (in the more specific, but still relevant, context of quarantine). But it was recommended that this evidence should not be used to delay the implementation of epidemiologically required measures. There are three citations that are noted on the SPI-B Evidence List published on March 6 that may have offered evidence for behavioral fatigue (see Webster et al., 2020; Brooks et al., 2020a; Brooks et al., 2020b). All these papers focus on questions associated with compliance with and the effects of quarantine measures, and two were still under review. While there are similarities between social lockdowns and quarantines, the two are clearly not the same thing⁷. Ultimately, the behavioral evidence that emerged from these sources emphasized the importance of limiting quarantine periods to a minimum to enhance compliance. While none of these papers refers to the notion of behavioral fatigue, the recommendations that they make would obviously support core aspects of the theory. The critical issue here, however, is that these sources did not offer scientific evidence that is directly pertinent to the behavioral consequences of societal lockdowns. Furthermore, it appears that the evidence base on March 6 could not even countenance a phenomenon such as a total lockdown. In their “rapid review” of how to encourage behavioral compliance with quarantine, Webster et al state: “[A]s compulsory quarantine on any large scale is almost certainly not practicable in a democratic society, public health officials must do everything they can to encourage voluntary adherence to quarantine protocols” (2020, p. 167). This view on the political implausibility of lockdown in the UK is echoed by

Jeremy Farrar, Director of the Wellcome Trust and member of SAGE. In his first-hand account of the UK's response to COVID-19 *Spike: The Virus Versus the People*, he observes,

At the end of February 2020, there was a disbelief, including from me, that it (a national lockdown) was possible. We now know differently [...] I wish Sage had drawn on a wider group of experts with first-hand insights from China and the surrounding region (Farrar, 2021, p. 95).

- 20 It is not unreasonable to speculate that, in the absence of direct behavioral evidence, SPI-B and then SAGE used insights into the deleterious consequences of quarantine and the associated forms of non-compliance, and an underlying sense that lockdowns were inconceivable in modern democracies, as bases for indirectly endorsing the principles of behavioral fatigue, if not the theory itself. This form of expertise drift or *transgressive competence* is surely to be expected, and may well be necessary, in times of unprecedented crisis and uncertainty. It is our contention in this article, however, that transgressive competence is not just an act of expediency but needs to be interpreted in the institutional contexts within which it emerges.
- 21 To better understand how these transgressive competencies may have inadvertently enabled, if not directly supported, the intuitive concept of behavioral fatigue, it is important to have a clearer sense of what the term actually means. One of the reasons that behavioral fatigue was able to achieve some degree of policy influence is that it is an under-determined concept. According to Susan Michie (SPI-B member), behavioral fatigue is best thought of as a *muddled concept*, which covers aspects of loneliness, isolation, depression, and boredom which are associated with quarantine and lockdown (BBC, 2020). While a quintessentially fuzzy concept, there is still something quite behaviorally specific in the term. Unlike other notions of behavioral non-compliance (habituation, confirmation bias, hyperbolic discounting), it does not suggest immediate forms of behavioral resistance. Instead, behavioral fatigue intimates a gradual loss of capacity and a steady erosion of willpower to comply with a desired conduct. Interestingly, this vision of limited human willpower, resonates strongly with the insights that are associated with the more politically influential branches of the behavioral sciences in UK. Since its inception, the BIT has brought renewed emphasis to the behavioral flaws that characterize the human condition and highlighted how these can be addressed by well-designed policies (Jones et al 2013; Whitehead et al, 2017). The scientific insights that the BIT have sought to bring to the policymaking process derive primarily from the interdisciplinary field of behavioral economics. According to behavioral economics, human behavior is guided by two interconnected operating systems. System 1 is automatic, easily activated, and often guided by emotions (Kahneman, 2012). System 2, on the other hand, is more laborious to maintain and is characterized by calculation and deliberation (ibid). Behavioral economics, and the behavioral insights it has promoted, argue that while policies have historically focused on System 2, it is actually System 1 that has the more powerful influence on human behavior (see Thaler & Sunstein, 2009).
- 22 System 1 policy thinking is helpful when it comes to addressing long-term problems such as climate change, investing in pension schemes, or organ donations, because these are things that naturally tend to be deferred and forgotten about. But, and this is critical, while behavioral economists emphasize System 1 approaches to policy problems, they do not suggest that humans cannot be deliberative, rational, and strong willed in other circumstances (Kahneman, 2012; Thaler & Sunstein, 2009). Indeed, work on the psychological impacts of disasters (such as earthquakes or floods) suggest that

while System 1 behavioral responses can occur (often in the form of panic), it is more common for System 2 processes to produce rational and orderly processes of response (in the form of pro-social behaviors, collective action, and rule compliance).⁸ While this perspective may not explain where behavioral fatigue came from, it does provide one possible explanation as to why it appears to have been accepted as expert opinion (even in the absence of evidence). This indicates two main things about the role of the behavioral sciences in the UK response to COVID-19. First, that in the absence of directly relevant scientific evidence, behavioral and medical scientists may have practiced expertise drift as they advised UK politicians on areas where expertise was in short supply.⁹ Second, that, at least in the case of concepts such as behavioral fatigue, processes of transgressive scientific competence may have been enabled by established institutional norms. It may well be in this instance that in the absence of sound evidence, an intuitive concept was able to gain indirect scientific kudos from established behavioral assumptions about the human condition (Farrar, 2021, p. 136; Reicher, 2021; Sibony, 2020).

The authorization of behavioral fatigue in the wider institutional context

- 23 In some ways, the question of where the notion of behavioral fatigue came from, and how it was able to influence policy, is less significant than the question of why it was not questioned more (see Oliver, 2020). In the context of behavioral fatigue, it appears that certain views of the human condition (particularly its System 1 orientation) had established a consensus status at the heart of the UK government. In this context, Stephen Reicher, a social psychologist who sits on the SPI-B Group¹⁰ observed,
- [...] beneath all the confusions, there is an important point here. Is one view of human behavior overly dominating in No.10 [the home of the UK Prime Minister] and has it led to bad decisions? Is there a need to broaden the input and give more weight to other views (Tweet 23 June, 2020).
- 24 The implication here is that behavioral economics thinking may have had a disproportionate impact on government thinking about human behavior through its connection with the BIT and the Cabinet Office. While SPI-B clearly embodies a much broader sweep of behavioral science expertise than BIT alone, it seems likely that SPI-B scientists, and the ways of thinking they advocated, were not close enough to decision-makers to effectively contest the subtle insinuations of the notion behavioral fatigue to which those decision-makers were intuitively sympathetic. In this context Farrar observes that,
- Behavioral fatigue seems to have been a peripheral idea promoted beyond any merit or evidence. Behavioral scientists on SAGE had acknowledged that people might struggle to comply with restrictions, but had also, importantly, cautioned this was an intuitive observation, not one based on evidence (2021, p. 136).
- 25 If SAGE had intuitive sympathies with the ideas of behavioral fatigue, it appears that they were clear about the lack of scientific evidence that existed to support the notion. In this context, expertise drift may be less about the transgressions of science as the existing epistemological cultures of government. According to Reicher, the transgressive power of behavioral fatigue derived from an overall individualized and psychologized view of human behavior that had taken seed in the UK government (Reicher, 2021).

26 This perspective does raise other questions about the institutional structures associated with SAGE and SPI-B. In a recent interview, Professor Neil Fergusson (a key member of SAGE who was instrumental in recommending a social lockdown in the UK) provides important insights into the workings of the SAGE committee (Cowley, 2020). According to Fergusson, SAGE works on the basis that its experts do not, generally, come into direct contact with government Ministers. Rather scientific consensus (such that it is) is communicated from the Group to Ministers through the government's Chief Scientific Advisor and Chief Medical Officer. Fergusson compares this system of scientific advice to the situation in France where experts had direct access to politicians. Insulating politicians from charismatic scientific advisors seems sensible, ensuring as it does that those advisors do not have undue influence on the policymaking process. However, in the context of a novel coronavirus, and untested plans to impose a social lockdown, it is evident that there was no clear consensus emerging from the behavioral sciences on the notion of behavioral fatigue or a delayed social lockdown¹¹. The exposure of Ministers of State to alternative ways of thinking at this point may have made it easier for them to dismiss the idea of behavioral fatigue as just one among many relevant concepts. According to Reicher (2021) though, the exclusion of alternative ways of understanding human behavior (particularly those that emphasize the social as well as the individual determinants of behavior) may relate to broader political norms and assumptions. Reicher thus observes how notions of behavioral fatigue reflect neoliberal assumptions around personal responsibility and blame in relation to complex social issues:

Instead of addressing these issues [such as the need to go to work, or the inability to work from home] and helping people to avoid exposing themselves and others, the individualistic narrative of personal responsibility blames the victim and, indeed, further victimises vulnerable groups [...] The government's psychological assumptions have, in fact, squandered the greatest asset we have for dealing with a crisis: a community that is mobilised and unified in mutual aid (2021)

27 For Reicher, then, the notion of behavioral fatigue is not just problematic in and of itself. It is problematic because it reflects a deeper distrust of UK citizens by the UK government, and a failure to recognize and support the development of the power of social forces, solidarity and community influence as part of a pandemic response.

28 If the UK government's decision to delay social lockdown in March 2020 may be a case of expertise drift in the behavioral sciences, it is not a straightforward one. It appears likely that the notion of behavioral fatigue was an intuitive creation of a behavioral principle from outside of the behavioral sciences. Notwithstanding this, it is clearly a concept that resonates strongly with the core principles of a powerful behavioral science framework that had become influential within the British government and aligned with established political orthodoxies. What is also clear, given that SPI-B argued that there was no directly relevant behavioral evidence to delay lockdown, and that nearly 600 behavioral scientists questioned the notion of behavioral fatigue, is that at least in the short term, there was insufficient opportunity to contest the operational behavioral rationales of the UK state. What is also apparent is that the story of behavioral fatigue is a case of transgressive scientific competence, which necessitates a complex understanding of the nature of expertise drift in policymaking. In this case it is not just a question of behavioral scientists using their expert status to speculate on things that are beyond their epistemic range. Here, the rise to prominence of a

particular set of scientific perspectives on the human condition appears to have been facilitated by a set of institutional norms and organizational structures.

BPP during COVID-19 in the Netherlands: the role of the Corona Behavior Unit

- 29 Similar to the UK case, within Dutch policymaking there has been a rapid and formalized take-up of BPP during COVID-19, most notably represented through the work of the national Corona Behavior Unit [in Dutch the Corona Gedragseenheid, abbreviated CGU]. We now trace the activities of this particular unit during the pandemic as an avenue for understanding the ways in which BPP expertise has been employed within public decision-making and how that process is shaped by existing institutional configurations. As will be put forward, rather than a transgressive dynamic of expertise drift, we observe other types of dynamics of expertise use in this case-study, i.e., thrift and shift¹².

The Corona Behavior Unit: influencer from the institutional edge

- 30 The CGU was launched in April 2020 and designated to look at the unfolding crisis from a behavioral perspective, extract relevant insights from the existing behavioral science literature, monitor public health-related behaviors and opinions, and formulate advice about government communication. The unit is positioned within RIVM and ultimately responds to the director-general of the Ministry of Public Health and the Environment (VWS). It was funded through a grant commissioned by the Dutch Research Council (NWO). The unit initially had a core team of five people, with a wider circle of about 50 people and an independent advisory council consisting of approximately 15 professors with behavioral expertise. It gradually expanded its activities and began to work with parties within and outside of government (RIVM, 2020). Since its launch, it has conducted various research projects including: literature studies; in-depth interviews; surveys; social media monitoring; ad hoc research; and research syntheses (RIVM, 2020). Many of these outputs are published on the unit's webpage. The motivation to start this unit (e.g. Keulemans, 2020), reflects typical BPP discourse: the unit believes that tackling the pandemic requires gaining insight into the behaviors, motivations, and needs of people. The more government policy and communication is attuned to those aspects, from a behavioral science perspective, the better the virus can be controlled. It is frequently mentioned that the essence of managing the pandemic at this point in time comes down to a matter of behavior change, and that in the end it is "our behavior" that determines whether the spread of the virus is halted (RIVM, 2020).
- 31 In terms of how CGU was institutionally positioned and how it exercised influence on decision-making processes over time, there are clear differences with the UK case. In the public eye, BPP in the UK was represented by specific people, with for instance David Halpern, CEO of BIT UK, being part of the UK's national crisis response team in multiple roles, and thus able to easily feed decision-making with behavioral insights. In the Netherlands, BPP exercised influence in a less personified manner. BPP seemed to be represented on the CGU mostly as a *collective*. There was no clear Dutch variant of a David Halpern figure. The Dutch crisis discourse did feature experts who became key government advisors and "public faces of science", notably the director of RIVM's

Center for Infectious Disease Control, Jaap van Dissel, but none of these were *behavioral* specialists. There have been incidental instances of behavioral specialists being consulted and taking part in top-level meetings. Before CGU's launch, the cabinet had ad hoc consultations with social psychology professor Reint Jan Renes, and later health psychology professor and CGU-member Marijn de Bruin attended a top-level meeting in het Catshuis. Following this Professor Marijn de Bruin was asked in November 2020 to engage in discussion with parliament during an official technical briefing. Besides such incidental moments where behavioral specialists were at the heart of decision-making, CGU mostly seemed to operate at greater distance from principal decision-makers, influencing policy decisions mostly indirectly through the publication of syntheses, advice and monitoring reports. Still, the mere fact that a formal CGU was established to represent the behavioral science perspective, and given initial signs from CGU-members themselves that the unit's thinking has indeed shaped the government's response (Issuemakers 2020), suggests that, at the least, it had *some* influence on decision-making. Nonetheless, it did so from the institutional edge.

- 32 When we look at the role of BPP in the public media and debate, in comparison to the fierce public debate and critical journalism in the UK (Sodha, 2020; Ahmed, 2020), there has been less discussion and resistance against BPP regarding COVID-19. With regards to CGU, the media's interest has been limited to asking basic questions about what the unit is doing, who comprises it, and what its policy advice entails (e.g. Van Kempen, 2020; Keulemans 2020; Issuemakers, 2020). Occasionally, members of CGU have been interviewed and they have also written about the unit's contributions to crisis management (e.g. De Koster, 2021). Few critical questions have been asked about the unit's activities and its influence has not been studied in depth. The moderate level of attention for CGU might relate to the type of ideas, observations and research results that it published. In the UK, behavioral expertise gained early prominence by means of very concrete ideas, with behavioral science being associated with the idea of "behavioral fatigue". The Dutch case shows no equivalent take-up of *specific* behavioral science (associated) theories as essential elements of the national crisis response. CGU delivered many relevant pieces of information through its research and monitoring endeavors, but nothing crucially significant. Dutch BPP seemed to be represented by CGU more as a generic set of ideas, methods and goals rather than as, more narrowly, *one* particular concept, or theory, or strategy that was crucial to controlling the pandemic. Or, at least in the open political and public debate, BPP did not get publicity through specific theoretical insights¹³.
- 33 Beyond its institutional positioning and media attention, it is important to look at the type of tasks conducted by experts from CGU to understand its impact. BPP has typically been described as an interventionist field, aiming to produce concrete and direct behavior change strategies, comparable to Salamon's (2002) notion of *effectuating* policy instruments. CGU's practice, however, seemed much less geared towards building interventions, and more towards gathering and analyzing information, which ties better with Salamon's notion of the *detecting* mode of policy instrumentation. The unit's detector role is clearly reflected in the type of projects it undertook, e.g. synthesizing literature, monitoring social media and trends, collecting research data for third parties, and conducting surveys and in-depth interviews. It is telling that the RIVM (2020) webpage, where official information about CGU can be found, is entitled

‘Behavioral Science *Research* on COVID-19’ [italics added], emphasizing the more exploratory, monitoring and non-interventionist nature of the unit.

- 34 A task that *did* have a more effectuating and interventionist outlook was CGU’s consultation on the government’s crisis communication. CGU gave direct ad hoc advice and organized training for local government communication departments (de Koster, 2021), conducted literature reviews of effective communication strategies (e.g. regarding handwashing) (CGU, 2020a), and developed step-by-step action plans of behaviorally-informed crisis communication (CGU, 2020b). Nonetheless, CGU’s effectuating role appeared far less prominent than its monitoring role. Most of its projects and related reports are concerned with detector-related inquiries about how people are responding to crisis measures, what they are saying on social media, and how the pandemic is affecting their daily social lives. Developing and testing behavior change interventions was not a key task.
- 35 Overall, while in the UK BPP was in a leading role pushed by relatively influential behavioral specialists and very concrete behavioral science (associated) insights, in the Netherlands, it appeared to play a less influential role. The key player was a formally launched policy unit with incidental access to top-level decision-making. CGU delivered a wealth of insights and recommendations but no crucial insights for key decisions (e.g. on whether and when to lockdown). The unit’s added value was mostly restricted to synthesizing existing research and tracing current behaviors and opinions within society so as to get a sense of effective measures and how these affected people. Unlike the UK case, the use of behavioral science in the Netherlands appears to have stayed well within the epistemic bounds of BPP. There was a certain “epistemic modesty” to how BPP ideas and methods were employed, which was accompanied by a moderate influence of BPP on COVID-19 crisis management as compared to the UK. It is this type of curtailed, minimalized approach to using BPP that we refer to as expertise thrift.
- 36 Besides thrift, there is another interpretation of the Dutch case, namely as a case of behavioral expertise shift. The shifty nature of CGU’s adoption of BPP could be inferred from the observation that core aspects of standard BPP practice and norms – particularly the resolute intention to *design* and *test* interventions and *change* behaviors instead of merely monitoring them – were by and large absent in CGU’s work. It can be debated how this practice then still connects to the original field of BPP, prototypically geared towards changing behaviors and not just monitoring them. The shift here thus follows a logic of transformation, modifying expertise to such an extent that it becomes alienated from a field’s core ideas and norms.

The shifty and thrifty nature of the Corona Behavior Unit in wider institutional context

- 37 To better understand these processes of expertise thrift and shift, and the absence of drift, within the Dutch BPP scene during COVID-19, we argue once again that it is important to consider the wider institutional context in which BPP is operating. Roughly speaking, Dutch BPP started to flourish a few years later than in the Anglosphere. This might be explained ideologically, with the BPP agenda fitting well with the UK’s strong Anglo-Saxon neoliberal outlook centred on individual behavior change – whereas Dutch ideological culture is less influenced by this Anglo-Saxon neoliberalism. Dutch BPP has nonetheless been very much influenced by activities in

the UK and the USA, which is reflected in the inheritance of many practices, beliefs and rhetoric (Feitsma & Schillemans 2019). Compared to the rapid and centralized uptake in the UK, behavioral science had a slower adoption within the Dutch policy scene. The Dutch BPP field is less deeply institutionalized and has developed in a more fragmented manner, with various agencies autonomously experimenting with ways to embed behavioral science in their working processes (ibid.). It is plausible that this developmental style and status has impacted how BPP has been taken up during the COVID-19 crisis. The fact that it was still searching to become fully authorized, and still firmly competing with other knowledge traditions, may have facilitated a more curtailed, thrifty approach to BPP expertise.

- 38 Another contextual factor of interest may be that, compared to the critical journalism and fierce societal debates around BPP in the UK (e.g. Dunt, 2014), Dutch BPP has found itself in relatively calm water –during COVID-19 as well. This calm water might explain part of the absence of processes of expertise drift in the Netherlands, unlike in the UK, where behavioral science got misused within public and political debate without experts being able to counter it. As BPP was relatively less prominent and less an object of public and political debate in the Netherlands, it was automatically also less susceptible to misattribution and to linkages to vague non-scientific concepts and other processes of drift.
- 39 Lastly, it can be argued that the COVID-19 crisis context forced Dutch BPP to align itself with what was at the time thought to be needed, feasible and legitimate. This might have facilitated processes of shift, transforming expertise in ways that seemed appropriate for the situation at hand. Given that Dutch BPP is still in the process of fragmented institutionalization and has not yet firmly grounded itself on fixed disciplinary standards and norms, such transformative processes may have been more viable. This line of thinking would tie in with previous observations of the rather fluid boundaries of BPP, with norm-setting frontstage role models but beyond that, with a heterogeneous landscape of practices (Feitsma & Schillemans 2019). It suggests that BPP experts continue to find ways to modify and tailor their approach, even during the challenging times associated with a pandemic.

Discussion: unpacking dynamics of expertise in context

Contributions to state-of-the-art debates on expertise in public policymaking

- 40 Our analysis of BPP during COVID-19 suggests a need to refine our thinking on the role of expertise in policymaking, and more particularly on the notion of expertise drift. To begin with, the UK case-study on behavioral fatigue has made clear that it is important to understand expertise drift as a *context dependent* phenomenon. Expertise drift can be the process of a chaotic dynamic in which multiple institutional processes interrelate with each other. How expertise comes to drift out of its epistemic range is not per se an intentional process, and the immediate cause does not necessarily lie within the scientific domain, i.e., with the statements and acts of individual academic experts. The UK case shows that even when the behavioral science community and many behavioral sciences directly advising government explicitly distanced themselves from the notion

of behavioral fatigue, the UK government's established ties with BPP thinking still generated a form of institutional seeding through which that notion could gain prominence. When considering the expertise drift that emerged here, it is hard to point fingers at specific institutions or players: it makes more sense to take into account the wider institutional picture that has enabled such processes to occur. In this context, it was not just that experts started to pronounce things on which they lacked expertise, but that institutional structures and norms enabled an intuitive concept to gain credence. Here, transgressive competence emerged when tentative forms of expert speculation were pulled into policymaking circuits that were primed to receive them.

- 41 Our focus on how pre-existing institutional context shapes expertise dynamics echoes relevant insights from the literature on policy learning (e.g. Dunlop, 2017). This literature is interested in how policy systems successfully come to, or instead fail to, update their beliefs about complex policy issues (Dunlop et al., 2020). Analogous to our notions of potentially risky processes of drift and shift, policy learning looks into whether the learning in policy systems is of a functional or dysfunctional nature (ibid.). Notably, the associated focus on the role of epistemic communities – and whether they are authorized to facilitate functional epistemic learning – are of relevance here, as we might view the BPP field as a still growing epistemic community seeking to influence policymakers' beliefs (ibid.). Interestingly, in their analysis of expertise use during COVID-19, based on case-studies in UK and Belgium which adopted a policy learning lens, Zaki and Wayenberg (2021) come to similar conclusions about the context dependency of expertise use. They describe how in the UK pivotal policy decisions about whether or not to go into lockdown were shaped by processes of “epistemic venue-shopping”, filtering for scientific advice that matched with established *policy legacies*, particularly a pre-crisis prioritization of economic growth. The authors find that the “economic predispositions of policymakers and the ensuing sensemaking frames have influenced the identification and selection of COVID-19 scientific advice”, and interestingly also explain the early-on authorization of behavioral fatigue in the UK in this way (ibid.: 21). This parallels our analysis of how institutional context determines expertise use, with the difference, however, that we have focused on a different aspect of context: not pre-existing policy agenda priorities but pre-existing epistemic beliefs – the *epistemic legacies* – that shape the role of expertise in policy. The hegemonic System I way-of-thinking about human behavior (Kahneman 2012) is an example of such an epistemic legacy that we identified in our UK case-study as a powerful shaping force in how BPP was taken up.
- 42 Besides more attention for the shaping role of institutional context, our article also calls for an enrichment of the vocabulary on expertise drift. So far, a wealth of existing studies on policy studies has described processes of expertise drift in different words, including the abovementioned “epistemic venue-shopping” (Zaki & Wayenberg, 2021) and the foundational work of Weiss (1977) on the diverse uses of research for policy, pointing out how policymakers sometimes look for “expert justification” to sell already made choices. Fully acknowledging the many links to existing theories on knowledge use, we believe that our vocabulary on expertise drift, thrift and shift nonetheless makes important refinements to our understanding of science-policy relations. To begin with, in studying these relations, we have moved beyond the traditional realm of policy studies, taking in notions from STS studies and furthering interdisciplinary inquiry between those scientific domains. Further, while traditional policy studies have

mostly focused on how and why policymakers use knowledge, our analysis has taken a more systemic viewpoint. We have followed processes of expertise use, which have opened up our analytical scope to not just look at the motives of policymakers but to also consider the broader interactions between scientific experts, policymakers, government departments, public media organizations, and other actors alike. Lastly and importantly, the concepts of expertise drift, thrift and shift help to gain a more precise and differentiated understanding of expertise use and the extent to which certain epistemic bounds are transgressed.¹⁴ Table 1 gives an overview of these diverging dynamics of BPP expertise that we observed in our case-studies.

Table 1. Dynamics of BPP expertise

<i>Dynamic of expertise</i>	<i>Description</i>	<i>Opportunities</i>	<i>Risks</i>
Drift	BPP expertise is applied just beyond the field's epistemic bounds (<i>transgression of expertise</i>)	Deep institutionalization of BPP expertise	Mis- and overapplication
Thrift	BPP expertise is applied non-exhaustively, well within the field's epistemic bounds (<i>curtailment of expertise</i>)	Room for other valuable forms of expertise	Underapplication
Shift	BPP expertise is drastically re-interpreted, detached from the field's original epistemic bounds (<i>transformation of expertise</i>)	Space for experimentation and new adaptations	Misapplication and alienation

Source: The Author

Recommendations for policy practice and future research

- 43 We believe that there is no straightforward answer to the question concerning the most constructive types of expertise dynamics for public decision-making. All three types would seem to have their own opportunities and risks – as shown in Table 1 above. While drift might indeed lead to bad, if not catastrophic (certainly in the context of COVID-19), policy decisions, it can also help mainstream valuable knowledge and, to some extent, stimulate interdisciplinary inquiry as knowledge is moved from one disciplinary domain to another. While thrift might prevent experts from overpromising and overreaching, it can also overly constrain the flow of knowledge, ultimately leading to poor decisions. Lastly, while shift may challenge a disciplinary field's legitimacy, it may also create needed space for experimentation and adaptation.
- 44 In light of the contingency of how expertise is ultimately employed in policy, we argue that policy expertise scholars need to keep tracing and unpacking actual dynamics of expertise, and “write up” when they stand in the way of functional, evidence-savvy policymaking. In this article, we have sought to unpack the particular dynamics of BPP expertise during the COVID-19 pandemic, while highlighting the role of institutional

context. Advancing this type of research agenda – in relation to other important fields of expertise and other salient policy issues – will result in a deeper understanding of expertise in public policymaking and more importantly, how this is contextually shaped.

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NOTES

1. The Netherlands and the UK were chosen as the underlying case studies for our analysis for four reasons. First, they offered contexts within which the principles of BBP had been well-established in public policy for several years before the onset of COVID-19. Second, both nations gave prominent roles to behavioral science experts in their institutional responses to the pandemic. Third, the Netherlands and UK offered interesting contrasts in the ways in they engaged BBP in response to COVID-19. Fourth, they offered case studies that the authors have accumulated over a decade's worth of BBP research collectively.
2. Shift is thus distinctly different from drift: while in cases of drift there is still a close association with the original field, shift takes place when expertise is reinterpreted in a more fundamental sense – loosening the connection to original ideas and institutions.
3. For example, it appears that the UK Prime Minister's libertarian instincts meant that he was ideologically opposed to the restrictions of citizen's freedoms associated with a lockdown. It is also likely that in the wake of Brexit, the UK was keen to demonstrate a distinctive policy response from its EU counterparts, many of whom had gone into lockdown earlier.
4. SPI-B's membership itself draws an important line of distinction between behavioral science (as a specific disciplinary space of inquiry), and the broader fields associated with the sciences which study human behavior (see suppressed reference).
5. SPI-B previously advised the UK government on the behavioral implications of the Ebola outbreak in west Africa. SPI-B has its origins in 2009, when SAGE formed a Scientific Pandemic Influenza group on Behavior and Communications (SPI-B&C) to support the UK government's response to Swine Flu.
6. The BIT was initially established within the UK Government's Cabinet Office (which supports the Prime Minister and, alongside the Treasury, is the corporate headquarters of the UK government), but is now a social purpose company that is jointly owned by the Cabinet Office, the innovation charity NESTA, and its own employees
7. Quarantine is associated with certain psychological/behavioral issues that we might expect during a lockdown (anger, infection fears, boredom, inadequate supplies, financial loss, and frustrations (see Brooks, 2020). But quarantine periods are also related to other effects that

would be less common in a general social lockdown (for example, post-traumatic stress, social stigma, confusion (ibid)).

8. Evidence of System 2 responses appears to have informed Irish public policy much more than in the UK, resulting in an earlier lockdown in the Republic of Ireland (see BBC, 2020).

9. This situation was, of course, not unique to the behavioral sciences. The epidemiologist, John Ioannidis, has argued that the Corona Virus crisis might be ‘once-in-a-century evidence fiasco’ (Ioannidis, 2020).

10. Professor Stephen Reicher also advises the Scottish Government and sits on the Independent Sage Group in the UK.

11. This is why on March 16, 2020 a group of nearly 600 behavioral scientists wrote an open letter to the UK government raising concerns about the notion of behavioral fatigue (Hahn et al 2020).

12. Thrift refers to a situation in which a field’s epistemic bounds are far from being transgressed, and in which the use of expertise is curtailed. Shift refers to a situation in which expertise is transformed and detached from the field’s original epistemic bounds (also see Table 1 in the Discussion). These dynamics respectively represent a logic of curtailment of expertise and one of transformation rather than a logic of transgression as identified by Nowotny in his concept of expertise drift (2000).

13. Admittedly, there is a striking similarity between the Dutch and UK case when it comes to the contested notion of “herd immunity” – a specific notion that arose in the Dutch crisis discourse. On March 16, Prime Minister Mark Rutte gave a television address in which he introduced this notion, stating the following:

“The reality is also that in the coming period, a large proportion of the Dutch population will become infected with this virus. That’s what the experts are telling us now. They are also telling us that – as we wait for a vaccine or treatment to be developed – we can delay the spread of the virus and at the same time build up population immunity in a controlled manner.” (Rijksoverheid, 2020) That same evening, Jaap van Dissel, chair of the OMT, spoke along similar lines. This soon produced public confusion, with some interpreting the Dutch crisis response as actively aiming for long term herd immunity instead of immediately curtailing the virus. On March 18, both Mark Rutte and Jaap van Dissel reframed their position, this time stating explicitly that herd immunity was not an active goal. This case parallels BIT UK CEO David Halpern’s plea for building herd immunity in the UK, for which he was widely blamed as soon as it became clear that such a strategy would come with disastrous health consequences. The notable difference, however, is that in the Netherlands, it was not *behavioral* experts representing *behavioral* science, introducing it and taking the heat for it, but others. BPP had no role in this public contestation.

14. More precisely, the concept of drift reveals when epistemic bounds are transgressed, while thrift helps reveal how epistemic bounds are respected – which is not a self-evident phenomenon per se. The notion of shift reveals how the use of knowledge can raise questions about the original body of knowledge itself and how far its boundaries can be legitimately stretched. What these notions contribute to the study of science-policy interaction is a closer attention to the nature of particular bodies of knowledge and the extent to which their explanatory and applicatory limits are respected.

ABSTRACTS

Many government responses to the coronavirus-pandemic have been marked by attempts at expertization and scientization. Particularly, politico-epistemological authority is being given to the behavioural science community consulting government. This article critically scrutinizes this most recent wave of behavioural expertization. Taking developments in the UK and the Netherlands as our case-studies, we shed light on the disparate ways in which behavioural expertise is being (re)shaped during COVID-19. Some of these ways point at processes of behavioural expertise 'drift', in which the applicability and robustness of this knowledge source gets overstated. Other ways instead point at processes of behavioural expertise 'thrift' or 'shift', where the knowledge is used only minimally or taken in wholly new and norm-breaking directions. Doing so, we seek to demonstrate the importance of institutional context in understanding how behavioural expertise is currently shaping public policy: underpinning institutional configurations determine whether the expertise is gauged and applied effectively.

INDEX

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