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Title:

Understanding Subjective Experience in Psychedelic-Assisted Psychotherapy: The Need for Phenomenology

Abstract:

Psychedelic-Assisted Psychotherapy is being investigated as a treatment for a range of psychiatric illnesses. Current research suggests that the kinds of subjective experiences induced by psychedelic compounds play key roles in producing therapeutic outcomes. To date, most knowledge of therapeutic psychedelic experiences are derived from psychometric assessments with scales such as the Mystical Experience Questionnaire. While these approaches are insightful, more nuanced and detailed descriptions of psychedelic-induced changes to subjective experience are required. Drawing on recent advancements in qualitative methods arising from the interdisciplinary field of phenomenological psychopathology, we propose a systematic and comprehensive investigation into how Psychedelic-Assisted Psychotherapy alters subjective experience. This research program aims to characterise the nature of therapeutic psychedelic experiences by drawing on concepts from philosophical phenomenology. Such characterisations should, moreover, contribute to our understanding of the mechanisms of psychedelic therapy, the role of integration therapy, and related philosophical debates.

Keywords:

Psychedelic, Phenomenology, Psychopathology, Qualitative Research, Psychotherapy

UNDERSTANDING SUBJECTIVE EXPERIENCE IN PSYCHEDELIC-ASSISTED PSYCHOTHERAPY: THE NEED FOR PHENOMENOLOGY

Introduction

Recent literature suggests that the success of Psychedelic-Assisted Psychotherapy (PAP) cannot be attributed entirely to neurobiological mechanisms. Rather, patients' subjective experiences seem to play an important causal role—some even argue that the subjective effects of psychedelics account for the majority of their therapeutic benefit (Yaden and Griffiths, 2021). However, despite widespread acknowledgement that alterations in subjective experience are key to the effectiveness of PAP, remarkably little is known about these experiences. Most studies of the subjective effects of PAP use existing assessment scales, such as the Mystical Experience Questionnaire (MEQ). These are excellent tools for determining whether one has had a mystical experience and to assess the intensity or completeness of such an experience. However, these psychometric scales do not adequately distinguish among different kinds of psychedelic experiences. Without a more systematic and comprehensive account of experiential alterations that occur during the use of psychedelics, it will be difficult to fully understand the causal role that subjective experience plays in PAP. In this article, we argue that a qualitative research program that draws on both philosophical and empirical approaches to phenomenology can provide an account of these experiences. In what follows, we provide a brief overview of PAP, clarify how phenomenology can contribute to our understanding of this therapeutic intervention, and outline the shape that a phenomenological research program might take.

What is Psychedelic-Assisted Psychotherapy?

Psychedelic-Assisted Psychotherapy (PAP) is a treatment that involves combining psychedelic compounds with a psychotherapy program (Schenberg, 2018). Patients go through three distinct phases of therapy: preparation sessions, medicine sessions, and integration sessions (Reiff et al., 2020). During preparation sessions, therapists develop rapport and psychologically prepare patients for their medicine session. During medicine sessions, patients are administered a psychedelic compound and are guided through their altered state. During integration sessions, patients discuss their psychedelic experiences with therapists to interpret purported insights gained from the experience (Reiff et al., 2020).

The compounds used for PAP are varied. This variety of compounds subsumed under a common label reflects ongoing definitional debates surrounding the term *psychedelic*. Etymologically, psychedelic means 'mind-manifesting'. Other terms used to refer to compounds under this label include *entheogen* (the divine within), *psychotomimetic* (mimicker of psychotic states), and *hallucinogenic* (producer of hallucinations) (Nichols, 2016). One system of classification distinguishes between what are known as 'classic psychedelics' (e.g., LSD, psilocybin, mescaline, DMT) and other classes of psychoactive compounds referred to as 'entactogens' (e.g., MDMA), 'dissociative agents' (e.g., ketamine), and 'atypical psychedelics' (e.g., ibogaine) (Garcia-Romeu et al., 2016). Preliminary evidence on the effectiveness of PAP shows promise for a range of psychiatric illnesses, with evidence emerging especially for psilocybin in treating both major depressive disorder and addiction disorders, and MDMA in treating post-traumatic stress disorder (Perkins et al., 2021). However, it should be noted that PAP is still an experimental treatment and more work is required before this experimental treatment modality is suitable for use in clinical contexts.

The Role of Subjective Experience in Psychedelic-Assisted Psychotherapy

Recent research suggests that the therapeutic effects of psychedelics cannot be attributed entirely to neurobiological causes. Rather, patient's subjective experience during and after the psychedelic trip seems to play an important causal role in recovering from mental illness—with much psychedelic literature placing particular emphasis on the role of so-called 'mystical experiences' (Yaden and Griffiths, 2021). The presence and intensity of mystical experiences are associated with recovery from mental illness in psychiatric populations (Yaden and Griffiths, 2021) as well as increases in wellbeing in healthy populations (McCulloch et al., 2022). These experiences are quantified via the Mystical Experience Questionnaire (MEQ): a validated psychometric scale that contains 30 questions and 4 subscales derived from the larger States of Consciousness Questionnaire (Barrett et al., 2015). The subscales of the MEQ include Mysticality, Positive Mood, Transcendence of Time and Space, and Ineffability (Barrett et al., 2015). Notably, recent work suggests that, amongst healthy populations, only certain subscales of the MEQ (i.e., Mysticality and Positive Mood) are associated with increases in wellbeing (McCulloch et al., 2022). The association of only certain MEQ subscales with therapeutic outcomes highlights a potential limitation of current psychometric approaches. Research conducted with scales like the MEQ can investigate only a pre-defined range of possible experiential alterations, yet other alterations may also correlate with increases in wellbeing. Other psychometric scales such as the Altered States of Consciousness Rating Scale (Dittrich, 1998), Hallucinogenic Rating Scale (Strassman et al., 1994), Hood Mysticism Scale (Hood, 1975), Challenging Experience Questionnaire (Barrett et al., 2016), Psychological Insight Questionnaire (Davis et al., 2021), and Emotional Breakthrough Inventory (Roseman et al., 2019) have all been used to investigate psychedelic experiences (for a review of psychometric scales used to investigate psychedelic experiences, see Herrmann et al., (2022)). However, while these scales assess different aspects of the acute psychedelic experience, they are limited to investigating only a

pre-defined range of experiential alterations. To consider the full range of experiential alterations that occur when taking psychedelics and to investigate their role in the efficacy of PAP, we will need approaches that provide more nuance and accuracy in capturing the nature of these experiences.

It should also be noted that mystical experiences are not the only purported therapeutic aspect of the acute psychedelic experience. Insights drawn from the subjectively experienced contents of the psychedelic state also appear to be of great causal importance in producing therapeutic outcomes (Yaden and Griffiths, 2021). Furthermore, recent research conducted with the Metaphysical Beliefs Questionnaire provides evidence that changes in one's beliefs about the nature of reality following a psychedelic trip correlate with recovery from mental illness (Timmerman et al., 2021). This seems to be consistent with notions that subjective experiences play key roles in producing therapeutic outcomes as changes in one's beliefs may be linked to changes in one's subjective experience. Moreover, it seems that radical alterations in subjective experience during the psychedelic trip play an important role in bringing out the belief changes that, in turn, correlate with recovery effects.

Qualitative Approaches and the Promise of Phenomenology

There is a growing body of qualitative studies that examine patient experiences of PAP (for a review, see Breeksema et al. (2020)) To date, most qualitative literature on PAP involves thematic analyses of specific *contents* of the psychedelic experience (e.g., entity encounters (Davis et al., 2020)) rather than expositions of alterations in the *form* or *structure* of experience, such as spatial, temporal, or affective alterations. Among qualitative work that does analyse structural alterations in psychedelic experiences, there is no consistent typology or in-depth analysis of the variety of reported alterations. For example, while qualitative studies note that patients undergo altered experiences of time during PAP, there is often

limited exposition regarding the 'what-it-is-likeness' of this alteration beyond cursory statements reporting changes in the sensation of the passage of time (Breeksema et al., 2020). Furthermore, existing qualitative work on the acute psychedelic experience involves analyses that include a multiplicity of different psychedelic compounds, doses, treatment settings, and mental illnesses (Breeksema et al., 2020). The heterogeneity of factors subsumed under existing analyses, combined with the lack of a clearly articulated typology, highlight the need for a unified and comprehensive approach to analysing the experiences of PAP. While some studies have used phenomenological concepts to understand psychedelic experiences, most have relied on data collected without the use of phenomenologically guided qualitative methods and have not considered these experiences within clinical contexts (Horváth et al., 2018; Houot, 2021; Szabo et al., 2014; Szummer et al., 2017). In what follows, we outline a phenomenologically guided research program that aims to characterise in detail the phenomenology of clinically induced psychedelic experiences. We propose that recent advancements in qualitative methods developed by phenomenological psychopathologists provide the foundations for undertaking an in-depth and comprehensive investigation of how PAP alters structural features of subjective experience. Before clarifying what the proposed research program may look like, we provide a brief introduction to both philosophical phenomenology and the interdisciplinary field of phenomenological psychopathology.

The philosophical tradition of phenomenology is typically characterised as a self-reflective method for articulating the fundamental structures of experience or consciousness, including affectivity, embodiment, empathy, temporality, spatiality, and selfhood. Phenomenologists may, for example, distinguish different levels of selfhood, such as minimal selfhood and narrative selfhood, or different kinds of temporal experience, such as implicit and explicit time. When phenomenologists argue, for instance, that all experience includes a minimal sense of self, they mean that experience always includes a sense of mineness or for-

me-ness—the feeling that I am the one undergoing the experience (Zahavi, 2005; Zahavi, 2018). Such a claim may seem trivial, of interest only to philosophers who argue about the "essence" of consciousness. However, this philosophical clarification of basic experiential concepts provides the foundation for an interdisciplinary field called phenomenological psychopathology. This field, dating back to the work of Karl Jaspers, now has a century-long history and has contributed immensely to our understanding of mental illness (Stanghellini et al., 2019). The concept of minimal selfhood, for instance, has proved key to understanding the experiential alterations characteristic of schizophrenia spectrum disorders (Sass and Parnas, 2003). Phenomenological psychiatrists and psychologists argue that schizophrenia involves a disturbance or alteration in the typical sense that the experience I'm undergoing is mine: the boundaries between self and world, or self and other, begin to dissolve, and one may therefore have a variety of anomalous experiences, such as delusions of thought insertion or alien control (Henriksen et al., 2019).

In addition to phenomenology's application in psychiatry, it's also been adapted for use in qualitative research. These approaches are varied and have differing degrees of continuity with the original philosophical tradition. However, phenomenological psychiatrists and psychologists have recently begun integrating philosophical phenomenology with these existing approaches, using, for instance, Amedeo Giorgi's Phenomenological Psychology or Jonathan Smith's Interpretative Phenomenological Analysis in conjunction with approaches originally developed in phenomenological psychopathology (Henriksen et al., 2019; Feyaerts et al., 2021; Pienkos et al., 2017; Stanghellini et al., 2020; Stanghellini et al., 2021). Philosophical phenomenologists have also become more interested in conducting empirical qualitative research and have begun developing approaches that more tightly integrate philosophical phenomenology and qualitative research (Høffding and Martiny, 2016; Klinke and Fernandez, 2022; Køster and Fernandez, 2021; Petitmengin, 2006; Petitmengin,

Remillieux A, and Valenzuela-Moguillansky, 2019). The phenomenological research program we propose implements the aforementioned qualitative methods, integrating philosophical phenomenology with empirical approaches. We argue that a research program that draws on phenomenology's conceptual distinctions can provide the foundation for a unified, systematic, and comprehensive study of psychedelic experiences.

Outline of a Phenomenological Research Program

What should such a phenomenological research program look like? We propose one principal domain of investigation with three distinct yet interrelated sub-domains. The principal area of research should comprehensively and systematically characterise how the different structures of consciousness—such as affectivity, embodiment, empathy, temporality, spatiality, and selfhood—alter during PAP. That is to say, it should first investigate how the structural features of subjective experience outlined by philosophical phenomenologists alter in the therapeutic use of psychedelic compounds.

Philosophers have already begun drawing on the phenomenological concept of minimal selfhood to understand psychedelic experiences of 'Drug-Induced-Ego-Dissolution' (Day, 2021; Letheby and Gerrans, 2017; Millière, 2017). And some neuroscientists have drawn on neurophenomenological approaches, incorporating micro-phenomenological interviews into EEG studies to correlate neural and subjective effects of DMT (Timmerman et al., 2019). Other structural features of subjective experience, while not yet investigated within the conceptual frameworks of philosophical phenomenology, have attracted the attention of psychologists. Growing literature suggest that psychedelics have profound effects on how we experience our own affectivity, temporality, spatiality, embodiment, and empathy (for a review, see Preller and Vollenweider (2016)). Empirical qualitative work grounded in philosophical phenomenology and conducted by interviewers trained to elicit descriptions of

these aspects of experience would add an invaluable level of analysis to these growing areas of research.

As discussed above, PAP involves the use of many phenomenologically diverse psychoactive compounds. Accordingly, the proposed research program should lead to the creation of 'phenomenological profiles' (i.e., a profile of how the different structures of consciousness are altered) for each of the different compounds used in PAP. Furthermore, this investigation should describe how the different structures of consciousness are altered at various doses of each psychedelic compound, as well as how concomitant ingestion of other psychiatric medications and other non-pharmacological variables (e.g., music selection, use of eyeshades) alter the phenomenological profile of each psychedelic compound.

As also discussed above, PAP is radically different from current psychotropic medication because patients are expected to gain lasting therapeutic benefits from a temporary altered state. Accordingly, the proposed research program should investigate how the structures of consciousness are altered at different time points during PAP. This should include alterations that occur at different phases of the acute psychedelic experience (e.g., come-up, peak, come-down, afterglow) as well as after the experience. We acknowledge that the proposed research program constitutes a massive undertaking, requiring that we disentangle how these diverse factors influence the phenomenological profiles of specific psychedelic compounds. For the sake of feasibility, we suggest that researchers begin with comprehensive qualitative studies of psychedelic compounds that have the most substantial evidence base in the treatment of mental illness (e.g., psilocybin and MDMA)—analysing how basic structures of consciousness are altered during the peak of the acute psychedelic experience at therapeutic dose ranges. Once this core knowledge base has been established, further studies can vary different influencing factors such as dose, setting, phase of the acute experience, and concomitant ingestions of other psychotropic compounds.

This program will also provide the foundations for research in three sub-domains. First, it opens the possibility of systematically investigating the relationship between how structures of consciousness are altered during the acute psychedelic experience and how they are already altered in various psychopathological states. This will allow for speculation regarding the causal role of different altered experiences in treating different kinds of illness, as well as elucidate how various pre-psychedelic states might influence the experiences that psychedelics induce (these topics have recently received preliminary attention; see Miceli McMillan and Jordens, 2022). For example, people diagnosed with major depressive disorder often report distinct changes in the experienced flow of time—not just the slowing of time, but also an experienced absence of future possibilities and feelings of an impending end (Fuchs, 2019; Ratcliffe, 2012). Phenomenologists argue that these kinds of temporal alterations are a core feature of depressed experience. If this is the case, then the therapeutic effect of PAP may, at least in part, be attributed to opposing shifts in temporal experience during and after a psychedelic trip—for instance, the sense of an open horizon of future possibilities. Similarly, it could also be the case that people with depression, due to alterations in their structures of consciousness, have psychedelic experiences that differ from people who have no mental illness and take psychedelics for recreational or religious purposes. These topics represent important areas of investigation that would increase knowledge of why (and how) certain kinds of psychedelic experiences are therapeutic for people with different kinds of mental illness. It may, of course, turn out that the effects of PAP are largely non-specific, benefiting people with different psychiatric diagnoses in similar ways. However, it's only by establishing the kind profiles that we've proposed, and attempting to identify differences in psychedelic experiences and therapeutic effects across diagnostic categories, that we can establish the relative specificity or non-specificity of PAP's effects.

Second, the research program also opens the possibility of investigating how integration therapy (i.e., post-trip psychotherapy that aims to help patients make sense of their experience) relates to alterations in the structures of consciousness *after* psychedelic experiences. It is commonly claimed that integration is key to maintaining the effects of psychedelic healing and limiting the harms that come from distressing psychedelic experiences (Gashi et al., 2021). However, to date there is limited work on integration and how this practice relates to therapeutic outcomes (Earleywine et al., 2022). For example, while some subjective experiences are seemingly important to therapeutic outcomes (e.g., mystical experience), it is unclear how much of this is driven by the acute experience itself vs. how the patient interprets the experience. To tackle this additional challenge, researchers could draw on hermeneutic and narrative approaches in qualitative research—many of which are compatible with or complementary to phenomenological approaches.

Third, the research program can contribute to philosophical debates. Phenomenologists often look to altered experiences to help articulate the basic structures of subjectivity. Much like a lesion-based model of research, investigating how different structures of consciousness change during psychedelic states can elucidate novel features regarding the nature of these structures themselves. For example, alterations induced by psychedelics might unveil novel features of temporal experience or challenge existing models of selfhood. For example, both Millière (2017) and Letheby and Gerrans (2017) argue that experiences of Drug-Induced-Ego-Dissolution represent experiences that lack self-consciousness. However, this appears to be at odds with work on minimal-selfhood by Dan Zahavi (Day, 2021; Zahavi, 2005; Zahavi, 2018) who claims there can be no conscious experience without some form of minimal-selfhood. This debate makes it evident that more phenomenologically guided qualitative data is needed to clarify the nature of alterations in

selfhood experienced during PAP, and how these alterations of selfhood may be reconciled with or challenge existing phenomenological concepts.

Conclusion

PAP shows promise as a therapeutic intervention. However, its success will depend on our ability to understand the role subjective experience plays in the therapeutic process. We have proposed a novel phenomenological research program that aims to systematically characterise the alterations in subjective experience induced by PAP. The proposed research program would comprehensively and systematically characterise how the different structures of consciousness—such as affectivity, embodiment, empathy, temporality, spatiality, and selfhood—alter during PAP. This will allow the field of psychedelic science to progress beyond the limitations of current psychometric approaches used to quantify the psychedelic experience—a development that may provide insight into the causal role of the acute psychedelic. Furthermore, the research program would provide empirical data that can advance philosophical debates over how to properly articulate the fundamental structures of consciousness.

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