#### ARTICLE

# Imagination and belief in dreams

Manhal Hamdo<sup>1,2</sup>

<sup>1</sup>Humboldt-Universität zu Berlin, Berlin, Germany and <sup>2</sup>Centre for Advanced Studies in the Humanities, Berlin, Germany

Email: manhalhamadu@gmail.com

(Received 13 January 2025; revised 22 July 2025; accepted 2 August 2025)

#### **Abstract**

Imagination plays various epistemic roles but can it help us address dream skepticism? This paper explores different conceptions of imagination – propositional, processual, and imagistic – and examines their relevance to the Cartesian dream argument. I distinguish between the phenomenology of dreaming and its epistemological threat, arguing that dream skepticism arises not from the content of dreams, but from the immersive, belief-like quality of dream experience. While some models treat dreaming as propositional or inferential, I argue that these fail to capture the distinctive imagistic nature of dream experience. This kind of imagination, vivid and involuntary, simulates the phenomenology of belief without involving actual belief formation. By interpreting dream skepticism through the lens of imagistic imagination, we gain a better understanding of why the dream scenario remains epistemically troubling – despite attempts to explain it away through propositional or inferential models.

Keywords: Dream skepticism; propositional; process; imagistic; phenomenological; seeming

# 1. Introduction

Descartes famously raised the concern that the similarity between dreams and waking experiences could undermine the certainty of our knowledge. This problem, known as dream skepticism, questions whether we can ever be completely sure that we are not dreaming right now.<sup>1</sup> Descartes' thought experiment highlights how the vividness of dreams can make them indistinguishable from waking life, thus challenging the foundations of our epistemic confidence.

<sup>&</sup>lt;sup>1</sup>As a historical matter, dream skepticism is not unique to Descartes; it has deep roots in both Eastern and Western traditions that predate him by centuries. In pre-Cartesian Western philosophy, the topic of dreams consistently appeared in various texts, as seen in works like Plato's *Theaetetus* and Augustine's *Confessions*. Plato presents the dream problem as a strict reductio ad absurdum of Protagoras' theory of knowledge (cf. Hanna 1992). Augustine viewed dreams as a cause for moral concern (cf. Matthews 1981). In Eastern philosophy, the ancient Chinese philosopher Zhuang Zhou, also known as Chuang Tzu, famously recounted a dream where he was a butterfly. This experience left him pondering whether he was a man dreaming of being a butterfly or a butterfly dreaming of being a man (cf. Möller 1999).

<sup>©</sup> The Author(s), 2025. Published by Cambridge University Press. This is an Open Access article, distributed under the terms of the Creative Commons Attribution licence (https://creativecommons.org/licenses/by/4.0/), which permits unrestricted re-use, distribution and reproduction, provided the original article is properly cited.

Philosophers like Kant and Moore have struggled to address the problem of dream skepticism.<sup>2</sup> Despite their efforts, the issue remains unresolved and has been described by some scholars as a persistent conundrum (cf. Hanna 1992). Recently, Sosa has offered two responses to dream skepticism. Sosa's first approach is grounded in his virtue epistemology (cf. Sosa 2007), where he distinguishes between two levels of knowledge: animal and reflective. The former arises from first-order intellectual competence – apt belief formed through reliable cognitive performance. A belief is apt when it is not merely true, but true because it was produced by a competence - a reliable ability to attain truth in appropriate conditions. That is, it is competently formed – produced by a cognitive faculty (such as perception, memory, or inference) operating properly in the right environment and free of epistemic luck. The latter, reflective knowledge, requires not only that the belief be apt, but that the agent possesses an appropriate metaperspective: the ability to assess, endorse, or understand the source and reliability of her belief. In other words, reflective knowledge includes a higher-order awareness of one's own epistemic competence, often structured by supporting background beliefs about the reliability of perception, memory, or inference. On this account, beliefs formed through perception – such as seeing a tree and believing there is a tree – are the result of reliable perceptual faculties, such as vision, which function as part of our broader cognitive system. In ordinary, non-deceptive circumstances, these perceptual beliefs are apt: they are true because they are competently formed. Thus, they qualify as animal knowledge. Sosa argues that we need not defeat the skeptical hypothesis in order to have knowledge. As long as our beliefs are produced by reliable competence and are apt in our actual context, they count as knowledge - even if we cannot be certain we are not dreaming. What matters, then, is not defeating dream skepticism outright, but showing that our beliefs are aptly formed in the actual world.

Sosa's second approach, his imagination model of dreaming, views dreams as imaginative episodes that simulate perceptual experiences without involving actual belief.<sup>3</sup> On this model, dreamers imagine themselves believing but do not actually form beliefs. The model thereby distinguishes dreams from hallucinations, where beliefs may form about what is (falsely) perceived. In contrast, the process view of imagination suggests that imagination should not be reduced to isolated mental images or static propositional attitudes. Instead, it is a structured sequence of mental transitions, governed by inferential norms, in which imaginative episodes unfold and give rise to conclusions akin to those formed through reasoning. On this view, dreams may not just consist of sensory imagery but may also simulate inferential processes similar to those involved in deliberate imaginative reasoning.

This paper argues that what sustains dream skepticism is not the formation of belief within dreams, but the phenomenology of belief – the experience of seeming to believe certain things while dreaming, even if no actual belief is formed. While I acknowledge Sosa's argument that dreams may not involve genuine beliefs and therefore cannot

<sup>&</sup>lt;sup>2</sup>Kant's (1957) attempt to address the problem of dream skepticism, as Conant (2012) explains, actually introduces a new form of skepticism. While Descartes focuses on how to distinguish between dreaming that one is experiencing something and actually experiencing it, Kant shifts the focus to what makes it possible to dream of experiencing something in the first place – that is, he examines the conditions of possibility that Descartes assumes. On the other hand, Moore (1968) addresses dream skepticism by pointing out the incoherence in the skeptic's argument. He argues that if a skeptic has ever dreamt, they must already understand what a dream is, and this understanding necessarily involves the ability to differentiate between dream experiences and waking experiences.

<sup>&</sup>lt;sup>3</sup>The idea that dreams involve imaginative experiences has been explored in various ways by numerous scholars. Notable examples include O'Shaughnessy (2002), McGinn (2004a) Sosa (2005b, 2007, 2009), Ichikawa (2009, 2016), Thompson and Batchelor (2014), Soteriou (2013, 2020), and Crowther (2018).

undermine knowledge, I claim that the immersive and involuntary nature of dreaming imagination generates experiences with a phenomenal force that closely resembles believing. This resemblance, I contend, is sufficient to sustain a form of skepticism that is not strictly epistemic in Sosa's technical sense, but phenomenological: one can be experientially deceived even if not doxastically mistaken.

The layout of the paper is as follows. In Section 2, I distinguish between various forms of imagination. Section 3 outlines Sosa's model, and Sections 4 argues that dreams cannot be explained by Sosa's propositional concept of imagination. Section 5 reviews other scholars' process-oriented view of imagination, arguing it is also inadequate for understanding dreams. Section 6 argues that Descartes' view of imagination is primarily imagistic, and Section 7 interprets his account of dreams as experiences with a distinct phenomenal character. Section 8 offers a phenomenological interpretation of his perspective on believing in a dream. Finally, Section 9 concludes that both propositional and processual views fail to address dream skepticism adequately because they misinterpret the kind of imagination Descartes had in mind. Consequently, dream skepticism remains unblocked.

# 2. Types of imagination

Epistemologists interested in imagination often debate its nature, recognizing that it is a heterogeneous concept referring to various types of mental states and processes (Kind 2013).<sup>4</sup> For the purposes of this paper, it is essential to distinguish between different forms of imagination early on. Doing so allows us to identify which type(s) of imagination are most relevant for exploring cases where imagination appears to transcend reality – such as in dreams or fantasy – as opposed to cases where imagination is used to reason about the actual world, as in planning, decision-making, or anticipating future events. This, in turn, clarifies how these types of imagination contribute to the debate on dream skepticism. The main types of imagination discussed in epistemological literature include the following:

- Propositional, belief-like, or imagining-that imagination: This type involves imagining that a certain proposition is true (cf. Walton 1990; Arcangeli 2018). For example, Karl imagines that the colloquium will take place at 3 p.m. It is a propositional attitude, where the content can be evaluated as either true or false, similar to conceptual thought. When we propositionally imagine, we conceive of a specific state of affairs, such as imagining that humans have discovered a hidden city beneath the ocean. In this form of imagination, the content is a proposition that shapes what is being imagined.
- Imagination as a process: This is not defined by a particular representational format, such as propositional or imagistic content. Instead, it refers to the way imaginative episodes unfold over time, involving transitions between mental states and the organization of those states into a coherent sequence. These states can be imagistic (e.g., visualizing a forest or a character) or propositional (e.g., imagining that someone chooses to act a certain way). What distinguishes the process view is the focus on how one state leads to another for example, moving from one visualized scene to another, or from one proposition or supposition to the next. This approach aligns with recent accounts that emphasize the inferential structure of imagination (cf. Myers 2021; Wiltsher 2023). For instance, while writing a novel, Sarah imagines a protagonist, Jane, discovering an ancient map in her attic. She then imagines Jane deciding to follow the map, leading her to a hidden treasure.

<sup>&</sup>lt;sup>4</sup>See Myers (2024) for a survey of the epistemology of the imagination and Strohminger (forthcoming) for another survey.

- Sarah develops the plot step by step imagining Jane solving cryptic riddles, facing environmental challenges, and eventually confronting a rival treasure hunter. Each event follows logically from the last, forming a coherent narrative arc. This structured unfolding of content exemplifies how imagination can function as a rational process, generating and justifying transitions within an imagined storyline.
- Imagistic, sensory, experiential, or perception-like imagination: This type involves vividly imagining sensory experiences (cf. Balcerak Jackson (2016); Langland-Hassan (2016)). For example, Lauren imagines herself climbing a mountain in the Alps, complete with the sensations of cold air and rough rock beneath her hands. Sensory imagination uses mental imagery to represent perceptual properties in a format resembling actual sensory experiences, even in the absence of real sensory input.

While there may be other forms of imagination, we will focus on those mentioned earlier. Given the variety of types, it would be unreasonable to assume they all function the same way epistemically.<sup>5</sup> Therefore, when considering how imagination might be relevant to dream skepticism, it is crucial to specify the type in question. Doing so is particularly important when assessing whether a given form of imagination can construct dreams and thus effectively engage with the problem of dream skepticism. Let us address each kind in turn.

# 3. Sosa's propositional imagination model of dreaming

To begin, let us consider the first perspective on imagination and explore how it relates to the contents of dreams. On this view, propositional imaginings unfold in line with the norms that govern belief. This type of imagination, often referred to as "cognitive imagination" (Arcangeli 2018), involves simulating belief states. Sosa (2005a, 2005b, 2007, 2010) argues that dreaming consists not of actual beliefs, but of a specific type of propositional imagining – namely, imagistic imagination toward which the dreamer imagines holding beliefs. That is, while the content of dreams is primarily imagistic – involving vivid sensory-like experiences – the dreamer is imaginatively placed in a situation where they appear to hold beliefs about what is happening. On this view, the dream itself is not propositional in structure; rather, propositional imagining occurs alongside the imagistic content, in the form of imagining that one believes certain things are true within the dream. These simulated beliefs do not qualify as genuine beliefs, since they lack the appropriate causal and rational roles. As Sosa puts it, "to dream is to imagine, not to hallucinate" (2005b, p. 7). Thus, dreams involve not the formation of

<sup>&</sup>lt;sup>5</sup>For a discussion on the epistemological differences between imagining, supposing, and conceiving, see Balcerak Jackson (2016).

<sup>&</sup>lt;sup>6</sup>My point is not that Sosa excludes imagistic imagination, but that he frames dreaming primarily in terms of imagining propositional attitudes, or what he calls "propositional content" (Sosa 2010, p. 78). In Sosa (2005a), he states that imagining episodes – such as dreams – "can have truth-evaluable propositional content" (p. 29). In an endnote to Sosa (2005b), he writes that for assenting and judging within dreams, he uses the term "affirmation" for "conscious assent to a propositional content" (p. 16). He reiterates this in a footnote to Sosa (2007). The idea that two different kinds of imagination might be involved in dreaming – sensory imagination (which consists in mental imagery) and propositional imagination (which consists in imagining that a proposition is true) – is supported by Ichikawa (2009, 2016) and Gregory (2024a, 2024b). For example, if I dream of being chased through a dark alley, I not only imagine the sights and sounds of the scene, but may also imagine myself believing that I am in danger – that I am being pursued.

<sup>&</sup>lt;sup>7</sup>An alternative to hallucination and imagination accounts is the view that dreams do not involve either perceptual or imaginative experiences but are instead sui generis immersive spatio-temporal hallucinations (Windt 2010, 2015).

real beliefs, but the imagining of holding beliefs about imagistically presented content. In this way, propositional imagining happens within dreaming, but the dream itself remains fundamentally imagistic.

To lend more plausibility to this view, Sosa emphasizes that "the inference from <In my dream I believe (or intend) such and such> to <In actuality I so believe (or intend)>" is a mere flawed reasoning (Sosa 2005b, p. 8). He asserts that beliefs formed in dreams lack the causal connections that real beliefs have to actions and are not equivalent to beliefs held while awake. As García (2009, p. 9) puts it, a dream belief might "taste like a real belief, look like a real belief, smell like a real belief. But I cannot on these bases conclude that it is a real belief." Sosa uses an example of a tiger attack to illustrate the absence of belief in the case of dream, thereby distinguishing between what takes place "in my dream" and what really occurs "while I dream." He writes: "from the fact that in my dream I am chased by a lion it does not follow that while I dream I am chased" (Sosa 2007, p. 19). The assent in a dream is not a real belief but only something imagined to be one. In a dream, I do not actually believe that I am awake; rather, I imagine myself believing that I am awake.

This distinction between dream believing and real believing underpins his argument: if I am capable of believing something, I must be awake. This epistemic asymmetry between dreaming and wakefulness mitigates dream skepticism and strengthens the certainty of the cogito against it. Sosa argues that when it comes to a cogito proposition, such as I think or I am, reflection reveals that the best epistemic option is to believe the proposition. One recognizes that disbelieving it would be self-defeating and thus defective. Additionally, suspending judgment would prevent one from seizing a better epistemic option – namely, taking the right judgment to the proposition. In Sosa's words, the believing option is the only one about which I know ahead of time that my taking it will obviously imply that I am epistemically right in so doing (Sosa 2005b, p. 15).

Sosa extends this argument to the proposition "I am awake," asserting that believing it is "the only epistemically undefective option" (2005b, p. 15). He explains that for the proposition I am awake, both suspending judgment and disbelieving share a flaw: "I know ahead of time, as I ponder my question, that I am better off epistemically if I take a particular other option, namely, the belief option, since only about that option is it obvious to me now that if I take it I will be right" (2005b, p. 15). Sosa concludes that "I am awake" and the cogito proposition "I think" share the same epistemic status. He

 $<sup>^8</sup>$ In his 2005a work, Sosa goes further by asserting that there is a contradiction between the beliefs held in waking state and those in dreams. He argues that if a proposition P is true in a dream (denoted as Dp), then its negation (denoted as A¬p) is likely to be true in waking states.

<sup>&</sup>lt;sup>9</sup>The literature offers different interpretations of dream scenarios like this. Some say that scenarios like pursuing a lion or plummeting from a significant height trigger emotional responses within the dream state. These emotions show that we form beliefs in dreams. This explains the common experience of waking up with a mix of distress and relief, realizing that harrowing scenarios were just figments of our dreams (cf. McGinn 2004b, Bueno 2009). However, others defend Sosa's proposal. For example, Ichikawa (2009, 2016) explicitly holds that we imagine things without believing them during dreams and that emotions in dreams occur due to what appear to be beliefs but are not.

<sup>&</sup>lt;sup>10</sup>Sosa is not the first to suggest an epistemic asymmetry between dreaming and wakefulness in addressing dream skepticism. Bernard Williams, in appendix 3 to his *Descartes: The Project of Pure Enquiry*, critiques Descartes' purported claim that "the standpoint of rational enquiry is neutral between dreaming and not dreaming" (1978, p. 312). Williams argues that, contrary to this view, dreaming involves epistemic impediments akin to being drugged or drunk, where rational conclusions are impaired. These impediments, however, are typically absent in the sober, wakeful state, rejecting the idea of neutrality between the two states.

<sup>&</sup>lt;sup>11</sup>To explore this argument further, including its application to the proposition "I am awake," see Sosa (2007, pp. 16-20).

states, "we can just as well affirm <I think, therefore I am awake> as <I think, therefore I am>" (2005b, p. 15). Both propositions are epistemically equivalent: it is impossible to affirm either as false; they must be true if affirmed. They both have the special advantage of being clear and distinct.

Building on the supposed distinction between dreaming and wakefulness – specifically between belief in dreams and belief in reality – Sosa argues that his imagination model refutes dream skepticism and its implications for perceptual knowledge. This raises an important question: Is the type of imagination that bridges the similarity between dreaming and wakefulness different from the imagination used in Sosa's model?

# 4. Voluntary vs. involuntary imagination

Sections 4–6 examine various models of imagination – deliberate, propositional, and processual – to assess which forms are operative in dreaming. This analysis is essential to the overall argument: if dreams can simulate the phenomenology of belief without producing actual beliefs, then understanding the kind of imagination that supports this simulation is key to evaluating the skeptical threat Descartes identifies. The distinction between voluntary and involuntary imagination, in particular, helps clarify how imagination can sometimes feel epistemically forceful, even when it is not under conscious control.

When it comes to the question of whether propositional imagination is similar to the kind of imagination involved in daydreams and dreams, the answer will largely depend on distinguishing between deliberate and spontaneous imagination.<sup>13</sup> Dreams, like daydreams and episodes of mind-wandering, are best understood as cases of spontaneous imagination - mental episodes that arise without deliberate initiation or sustained control. My distinction is based on Walton's distinction (1990, pp. 13–16).<sup>14</sup> Deliberate imaginings are those that we actively initiate and guide. They are under voluntary control in the sense that we do direct their course. For instance, consider planning a vacation. You choose to imagine the trip, and you decide on the destination, activities, and details. This contrasts with spontaneous or passive imaginings, such as daydreams or mind-wandering, which may unfold without deliberate intention - even if, in some cases, we could intervene and steer them. Importantly, involuntary imaginings are not necessarily pathological or distressing; they include everyday mental imagery that arises unbidden and fades naturally. They unfold on their own, and we simply become immersed in them. For example, daydreaming about meeting a celebrity happens without us consciously choosing to start or shape the imagination. In this scenario, we experience daydreaming as if we are part of an unfolding story, rather than actively creating it. This lack of control makes spontaneous imaginings feel unexpected and emotionally engaging. This is why we often wake from dreams with a mix of relief and distress, realizing that intense experiences – such as being chased by a lion or falling from a height - were merely dreamt.

<sup>&</sup>lt;sup>12</sup>See Sosa (2008) for an in-depth discussion of how dream skepticism threatens perceptual knowledge by compromising the safety of our perceptually based beliefs about the world.

<sup>&</sup>lt;sup>13</sup>See also Langland-Hassan (2016) and Spaulding (2016) for a discussion on deliberate and spontaneous imagination, which addresses a skeptical challenge to gaining knowledge through imagination.

<sup>&</sup>lt;sup>14</sup>Beyond the clear-cut examples, things can become complicated. This complexity may indicate that the line between deliberate and spontaneous imagination is blurred at the edges. However, the distinction is clear in the most typical cases, and for simplicity, I will focus on these paradigmatic examples of deliberate and spontaneous imagination.

Voluntary imaginings are typically initiated and guided by the agent, and in many cases, they are world-sensitive - that is, they aim to track, model, or explore how things are or could be in the world. This is evident in uses of imagination for planning, predicting outcomes, or mentally simulating real scenarios. When a person voluntarily imagines, they do so with a purpose, concentrating on more likely scenarios in order to reach their goal. Thus, the content of their imaginings is shaped by their knowledge of what the world is like. 15 Consider Sam, a young professional who is contemplating a move to a new city for a job. Sam might engage in various forms of imagination to figure out if this move is the right choice, what type of apartment to rent, or which neighborhood to live in. In these scenarios, it is reasonable to think that imagining could give Sam valid reasons for his beliefs. If Sam wants these imaginings to be useful from an epistemic point of view, it makes sense that he would deliberately try to align them with his understanding of reality. These are not just idle daydreams or dreams, but controlled imaginings. For example, when Sam imagines his potential new apartment, his imagination is guided by the actual layout of the space, the proximity to public transport, the location of amenities like grocery stores and gyms, and so forth.

That said, not all voluntary imagination is world-sensitive or goal-directed. One might deliberately imagine fantastical landscapes or fictional worlds for enjoyment or creative play, without any practical relation to the real world. In such cases, the imagining remains voluntary, but it is not epistemically oriented. Still, many voluntary imaginings – especially those used in decision-making – are structured by the agent's background knowledge and directed toward understanding possible outcomes.

When you face a problem without an obvious solution, you can use your imagination to devise potential solutions and consider their consequences. For example, if you come across a deep river that you need to cross, you can voluntarily focus your imagination on the river's width, depth, current speed, and possible crossing points. By doing so, you evaluate strategies for crossing safely and aim for a satisfactory result. In essence, you shift your conception of imagining toward that of knowledge: even imagination involves dealing with facts and presenting relevant propositions to your consciousness for consideration.

It seems that deliberate imagination, which has the potential to support propositional thought, is the kind in which one forms beliefs: that the center apartment is the best option, or that one can cross the river. But does imagination play a role in justifying these beliefs? In other words, can imagining something provide a reason to believe it is true? To understand the connection between imagination and belief, we need to examine their relationship to truth and will (Arcangeli 2018).

When awake, Sam can willingly imagine that the center apartment is the best option. He believes this based on the evidence he has, such as practical considerations like space, transportation, and amenities. However, in a daydream or dream, Alice cannot deliberately imagine that Jasmine is in her office or determine whether this is true. This is because imagination in daydreams and dreams is often involuntary and typically lacks explicit guidance from reality-based considerations or the reliable evidence needed to form and assess beliefs.

That said, this does not mean that such imaginings are entirely detached from reality. Lucid dreams, for instance, frequently incorporate fragments of waking experience, and daydreams can be loosely shaped by concerns, memories, or desires related to real-world situations. In some lucid dreams, intentional control over the dream is even possible. Moreover, both voluntary and involuntary imaginative episodes – such as visualizing

<sup>&</sup>lt;sup>15</sup>The concept of knowledge used here refers to the common understanding of justified true belief. I do not assume any specific theory of epistemic justification.

athletic performance or rehearsing a conversation – can produce cognitive or behavioral benefits, even when they arise without conscious intent. Some imagination theorists argue that even spontaneous imagination can have epistemic effects. Athletes and musicians often report benefits from involuntary mental rehearsal (Currie and Ravenscroft 2002), and some studies suggest that imagining actions – whether deliberately or not – can aid in performance (Jeannerod 1994; Decety 1996). But such cases are not straightforwardly epistemic in the sense of justifying belief; rather, they involve embodied learning or priming. Even if involuntary imagination has causal efficacy, it lacks the deliberate epistemic aim that characterizes paradigmatic reasoning.

Voluntary imagination often serves epistemic goals – such as evaluating possible outcomes, testing hypotheses, or solving spatial problems. A clear example is mental rotation, where people imagine rotating a shape in space to determine whether it matches another. This ability, well studied in cognitive psychology, shows how imagination can aid in forming justified beliefs about the spatial structure of objects or environments (cf. Shepard and Metzler 1971). Similarly, when Sam imagines his future apartment layout, or when one imagines how to cross a river, these cases show imagination being used to simulate reality in a way that supports knowledge-related reasoning.

Spontaneous imaginative activities are quite common. For instance, we can imagine scenes similar to those portrayed in works of fiction without adhering to external standards of truth. Consider a case where you begin visualizing a cat approaching a tree, but then spontaneously picture the cat jumping down from a branch, without ever imagining it climbing. Similarly, consider imagining a friend discovering a treasure chest, only to later reinterpret it as a pile of rocks. In these cases, the imagined scenarios evolve internally, shifting from one depiction to another without requiring consistency or causal continuity.

Such examples show how imaginative episodes can spontaneously revise or reinterpret their content, rather than correcting falsehoods or establishing truths within an imagined world. Simply imagining a sequence does not make it "true" or "false" in any strong sense; rather, it reflects a flexible unfolding of possible scenes. Moreover, these cases illustrate that propositional imaginative projects often involve more than just free-flowing imaginings – they require a mental state that determines what counts as an imaginary truth in the evolving scenario.

We can then understand propositional imagination as a type of imagining that can occur deliberately – typically while awake – and whose content is evaluable as true or false with respect to belief. However, this is not to say that propositional imagination is always deliberate; spontaneous propositional imaginings can occur as well – for instance, when thoughts or scenarios pop into one's head unbidden, or when a narrative unfolds spontaneously during mind-wandering. The point, rather, is that dream imagination is typically spontaneous and predominantly non-propositional, often lacking the structured deliberation or evaluative stance that characterizes paradigmatic instances of propositional imagining. While propositional elements may appear within dreams – especially in lucid dreams or in those that simulate decision-making and reflection – this does not mean that dreams as a whole are propositional in nature. Rather, propositional thinking may occur during dreaming: for example, one might dream of walking along a beach and think, "this beach is nice," or wonder, "am I dreaming?" These propositional thoughts are embedded within a broader stream of imagistic, sensory-like experience and usually unfold without rational control or reflective awareness.

An externalist might argue that this view is plausible only if mental content in dreams is generated entirely internally. But what if the content of our mental states during sleep is shaped by external factors – such as past experiences, language, and cultural context –

that continue to influence our imagination even in dreams? For instance, an externalist could point out that dreaming about being "chased by a lion" relies on concepts we have developed through exposure to the physical world and language. In this case, the content of the dream could still be formed by the environment, presenting us with propositions tied to real-world concepts.

One possible response to this objection is to argue that while waking experiences build a repertoire of familiar images, these images operate independently during dreams. Dreams reconfigure familiar elements in ways that do not rely on any active environmental input. <sup>16</sup> This self-contained process allows for novel and sometimes implausible recombinations that are not anchored in any external reality.

Consider a person who regularly encounters dogs in their waking life, making them a familiar presence in that person's mental landscape. In a dream, however, they might envision an animal that combines characteristics of a dog, a bird, and a mythical creature – creating a new image built on familiar elements but assembled in a unique, fantastical way. This reflects how dreams, though often drawing on familiar images from real-world experiences, repurpose these images through an autonomous, spontaneous process that operates independently of waking life certainties and external facts.

In sum, the spontaneous, often non-propositional character of dream imagination reinforces the skeptical challenge: since dream states can simulate belief-like experiences without rational control or truth-tracking, they cast doubt on whether similar waking experiences can always guarantee knowledge.

## 5. Imagination as a theoretical process

Let us turn now to construal (2), the process construal, which has been formulated and championed by Myers (2021) and Wiltsher (2023). Wiltsher does not offer a strict definition of imagination as a faculty, but rather describes what makes a process of thinking imaginative. According to him, it is not merely the use of particular imaginative states (such as visual images or sensory impressions) that constitutes imaginative thinking; rather, it is how those states are manipulated – how the thinker transitions, combines, and develops content in a way that reflects imaginative engagement. Thus, there is an important distinction between imagination as a general mental capacity and being imaginative, which refers to a specific kind of structured, norm-governed cognitive process. Similarly, Myers contends that the imaginative process involves norm-governed transitions from one state to another, systematically progressing toward a specific endpoint. Rather than viewing imagination as just a propositional attitude, we can see it as a process that not only helps form beliefs but also enables reasoning in a manner similar to how we reason with beliefs.

For instance, consider someone trying to figure out if a large table will fit through a narrow hallway. They might approach the problem through a process of reasoning, beginning with specific premises – such as the dimensions of the table, the width of the hallway, and the angles involved – and then arrive at a conclusion: the belief that the table will or won't fit. This example can be understood as a mental process, which

<sup>&</sup>lt;sup>16</sup>Dreams are not completely insulated from the external world. As Windt (2010) and Rosen (2019) argue, sensory integration or infiltration of waking stimuli into dreams is common, for example, hearing a real alarm morphing into the sound of sirens in a dream. This supports an interactive view of dream content, shaped both by endogenous imagination and exogenous stimuli. Still, such integration occurs outside the dreamer's control and does not imply epistemic access to reality during the dream. Rather, it reinforces the spontaneous, involuntary nature of much dream imagination and the dreamer's unawareness of its unreliability.

operates on certain states as input (the premises) and produces an output (the conclusion), with the output being derived but distinct from the input.<sup>17</sup> This kind of deliberate imagination underpins philosophical thought experiments, where imagination functions as a reasoning process involving a specific type of inference.<sup>18</sup>

Take Gettier's (1963) Ten Coins case, for example. In this thought experiment, Gettier used deliberate imagination to challenge the traditional justified true belief (JTB) analysis of knowledge. He structured a series of imaginative steps that led to the conclusion that JTB is insufficient for knowledge. The process begins with an initial belief – Smith's justified, true belief – and, through a series of imaginative transitions, arrives at a new conclusion: that JTB is not enough for knowledge. The gap between the input (Smith's belief) and the output (the inadequacy of JTB) is bridged by a structured imaginative process, regulated by norms that guide the transitions.

This process-based understanding of imagination is also relevant to how we interpret dream cognition. While dreams can represent unfolding events – such as walking down a street or solving a problem – they typically do so in an imagistic and loosely associative manner. Dream imagination does not necessarily exhibit the deliberate, norm-sensitive manipulation of content that characterizes imaginative reasoning as Wiltsher describes it. Instead, dreams tend to combine familiar elements spontaneously, sometimes creating a narrative flow but often doing so without rational guidance or epistemic aims – something further illustrated by Ellis's account of dream associations.

A key question then arises: Can processual imagination also apply to the imagination involved in dreams? Ellis (1910) suggests that dreams reveal the basic operations of the human mind, showing how reasoning and imagination are intertwined. This fusion creates dream narratives that follow patterns of resemblance and contiguity, forming what he refers to as "syllogisms" of dream reasoning. In his view, the dream mind connects thoughts, images, and events based on similarities, which can be visual, emotional, or conceptual. For example, in a dream, two people or objects might merge or replace one another because they share a common feature, like a similar appearance, sound, or emotional resonance. Moreover, continuity in dreams refers to the way dream sequences flow from one scenario or image to another. These transitions might be driven by emotional states, symbolic links, or mental associations. This reflects the mind's effort to create a cohesive narrative.

More recently, Wolman and Kozmová (2007) found evidence of rational thought in dream reports, challenging the idea that dreaming is comparable to psychosis. However, not all dreams are rational or coherent. While some dreams are relatively rational or mundane – a point emphasized by Wolman and Kozmová (2007) and supported by REM awakening studies (Sikka *et al.* 2018) – others exhibit disconnected or psychotic-like features, as Rosen (2022) has observed. Dreams often present sequences of events without causal or temporal continuity, such as finding oneself in a classroom after just having been on a boat. Unlike in inferential imagination, such transitions within dreams are not typically evaluated or corrected by the dreamer. There is no felt pressure toward coherence. Wolman and Kozmová analyze dream reports to identify different types of rational thinking that occur during dreaming, focusing on cognitive activities like logical reasoning. Their study shows that many dreams contain clear examples of structured thought.

<sup>&</sup>lt;sup>17</sup>I set aside the debate on whether the outcomes of practical reasoning are states, such as intentions to act, or actions themselves. For further discussion, see Paul (2013).

<sup>&</sup>lt;sup>18</sup>This suggestion draws on Hamdo (2023a, 2023b, 2025). Although he does not explicitly argue that reasoning is the fundamental mechanism behind thought experiments, his work can reasonably be interpreted as supporting this view.

Dreamers often evaluate situations and engage in various levels of reasoning, from simple cause-and-effect logic to more complex processes involving abstraction and inference.

However, I find both Ellis' and Wolman & Kozmová's accounts unsatisfactory for several reasons. Ellis's concept of resemblance shows that dreams are not governed by logical identity but by metaphor and analogy, leading to fluid connections between objects within dreams. His notion of continuity implies that dream transitions do not follow rational principles but instead operate through associations and emotions. This supports the view that dreams are bizarre and irrational, rather than cohesive narratives. That said, empirical studies confirm that dreams vary widely in their internal structure. Domhoff (2007) and Windt (2010) both argue that dream content spans a spectrum – from structured, coherent narratives to bizarre and illogical episodes. While dreams may sometimes simulate cognitive processes such as planning, decision-making, or reflection, they typically do so without the agent's deliberative engagement. The experience is one of being carried through an evolving scene, rather than actively reasoning through it. This lack of epistemic control further distinguishes dream cognition from the structured imaginative reasoning processes often explored in philosophical contexts.

Wolman & Kozmová's study also has limitations. It relies on dream reports, which are prone to memory distortions, selective reporting, and biases. Additionally, their study does not distinguish between different types of dreams, such as lucid and non-lucid dreams. Lucid dreams involve deliberate reasoning, while non-lucid dreams often unfold without the dreamer questioning the events, which is an important distinction.

However, interpreting the imagination in dreams as rational thinking involves applying an inferential reasoning model typically used in focused, deliberate waking thoughts. While deliberate imagination, such as that used in thought experiments, is guided by logic and coherence, the spontaneous imagination found in dreams often lacks such structure.

Consider a dream where the dreamer finds themselves in a mansion, conversing with a stranger. The dream then shifts through various scenarios: a dinner party, running through a forest, and flying over a city. In the dream, these events can appear connected through associations other than strict reasoning, giving the impression of a coherent story. Yet from a waking perspective, making sense of this sequence as rational thought would require imposing a logical structure where none exists.

By contrast, deliberate imagination – like that involved in constructing a thought experiment – requires focused reasoning and a clear logical sequence of events. When imagining Gettier-style scenarios, for instance, the process is tightly controlled, with specific premises leading to specific conclusions. While spontaneous imagination – such as that involved in dreaming – can often jump unpredictably between disjointed scenes or events, this is not universally the case. Studies based on REM awakenings suggest that a substantial proportion of dream reports are coherent, emotionally rich, and even mundane (Sikka *et al.* 2018). Nonetheless, even when dreams are structured or simulate goal-directed activity, they typically unfold without the dreamer's deliberative engagement or reflective oversight. The dreamer is not reasoning *through* imagined content, but being carried along by it. This lack of epistemic agency – rather than sheer incoherence – is what differentiates most dream cognition from inferential imagination.

Dream thoughts often appear illogical because they lack any consistent connection between events. For example, someone might dream of running a marathon without questioning why, even if they have never trained for one. The dreamer may seem to think rationally – in terms of processing a sequence of events – within the dream but remains unaware of the underlying irrationality of the events themselves.

Moreover, dreamers do not usually assess the truth, probability, or coherence of the events they experience. Rationality, which is crucial in deliberate waking thoughts, is

often absent in dreams. To evaluate the validity of an inference drawn in a dream, one must wake up and apply reason. Imagination's role does not end with generating a sequence of events; it extends to evaluating whether those events are true, false, probable, or improbable based on evidence.

Now consider the Sarah–Jane scenario as it might occur in a dream. Here, the narrative may appear similar on the surface – Jane finds a map, sets off on an adventure, and reaches the treasure – but Sarah is not deliberately constructing or rationally evaluating these events. The imaginative flow is spontaneous and uncritical: implausible plot points may arise without notice, coincidences may go unquestioned, and emotional salience may override logical coherence. Unlike the inferential structure of deliberate imagination, the dream unfolds passively. Sarah does not assess whether the challenges make sense or whether Jane's success is earned. The dream allows for immersive engagement without reflective oversight. In this sense, imagination's role is incomplete without the evaluative transitions that mark deliberate reasoning. Dreaming lacks such transitions, offering instead a simulation of belief and narrative coherence without actual rational scrutiny.

This distinction between unconscious, free-flowing imagination in dreams and the rationality of conscious imagination in waking life highlights the different roles imagination plays in each state.

So far, I have focused on deliberative imagination – whether propositional or processual – in its role in generating beliefs. However, important questions remain unanswered: What kind of imagination did Descartes have in mind when formulating dream skepticism? To answer this, we must distinguish between two uses. First, there is the imagination involved in dreams themselves – the spontaneous, imagistic mental activity that Descartes treats as epistemically deceptive. Second, there is the imagination Descartes uses deliberately, while awake, to construct his skeptical scenario. While both are relevant, my focus in the following sections will be on the first – on how Descartes characterizes the imagination at work in dreams, and what this reveals about their epistemic and phenomenological status.

# 6. The Cartesian treatment of imagination

Descartes frequently mentions imagination throughout his works, but the beginning of the Sixth Meditation provides a particularly valuable summary of his account of imagination and how he distinguishes it from understanding. This distinction builds on a recurring reference he makes in the second Meditation to three human cognitive faculties: sense, imagination, and understanding (or intellect). Sense provides sensory experiences, imagination allows us to form images of things not currently perceived, and understanding enables abstract thought. While his argument unfolds through examples, these examples are elaborated and discussed in greater detail. Here is a key passage where Descartes illustrates this distinction:

When I imagine a triangle, for example, I do not merely understand that it is a figure bounded by three lines, but at the same time I also see the three lines with my mind's eye as if they were present before me; and this is what I call imagining. But if I want to think of a chiliagon, although I understand that it is a figure consisting of a thousand sides just as well as I understand the triangle to be a three-sided figure, I do not in the same way imagine the thousand sides or see them as if they were present before me. It is true that since I am in the habit of imagining something whenever I think of a corporeal thing, I may construct in my mind a confused representation of some figure; but it is clear that this is not a chiliagon. For it differs

in no way from the representation I should form if I were thinking of a myriagon, or any figure with very many sides. Moreover, such a representation is useless for recognizing the properties which distinguish a chiliagon from other polygons. But suppose I am dealing with a pentagon: I can of course understand the figure of a pentagon, just as I can the figure of a chiliagon, without the help of the imagination; but I can also imagine a pentagon, by applying my mind's eye to its five sides and the area contained within them. And in doing this I notice quite clearly that imagination requires a peculiar effort of mind which is not required for understanding; this additional effort of mind clearly shows the difference between imagination and pure understanding. (Descartes 1996, p. 50–1)

Descartes appears to be highlighting the "peculiar effort of mind" as the act of producing mental imagery – to imagine something, one must create an image of it. This reflects an imagistic conception of imagination, where Descartes seems to impose a strict standard for what constitutes successful imagining. For instance, when considering a chiliagon, although we might generate some sort of image, it would only be a "confused representation" of a many-sided figure: "it is clear that this is not a chiliagon. For it differs in no way from the representation I should form if I were thinking of a myriagon, or any figure with very many sides."

In the broader context of the *Meditations*, which aims to achieve "certain and evident knowledge of the truth," as he notes in the Synopsis, Descartes presents a rather pessimistic view of imagination (Descartes 1996, p. 8). He dismisses imagination as an inadequate faculty for producing the secure knowledge he seeks. Instead, he prioritizes clear and distinct perception as the principal source of knowledge. In his view, clear and distinct perception is entirely separate from imagination, which he considers incapable of providing the kind of certain knowledge necessary for his pursuit of absolute certainty.

This pessimistic treatment of imagination is also evident in his discussion of the wax example in the Second Meditation. He observes that while we can imagine the wax being manipulated in various ways, these imaginings are limited to specific images of particular changes. Such images capture only a small portion of the countless transformations the wax can undergo. As a result, Descartes argues that these mental images cannot sufficiently support our belief in the wax's flexibility – that it can be shaped into many different forms. He states: "I would not be making a correct judgment about the nature of wax unless I believed it capable of being extended in many more different ways than I will ever encompass in my imagination" (Descartes 1996, p. 21). Moreover, although we recognize that the wax remains the same substance before and after melting, this continuity is not reflected in our sensory perceptions or imaginings. Therefore, Descartes concludes that our understanding of the wax's true nature must come from the intellect, rather than from sense perception or imagination.

A similar point arises in Descartes's exploration of the "I" in the Second Meditation. At first, he tries to understand the self through imagination, but soon realizes the limitations of this method. Imagination, he notes, often involves "fictitious invention" (p. 19). Because it relies on mental images, which are not direct representations of the world and may lack consistency, it cannot reliably reveal the true nature of things. Thus, Descartes concludes that imagination, prone to invention, is not a trustworthy tool for grasping the self or understanding reality more broadly. As he puts it:

to say 'I will use my imagination to get to know more distinctly what I am' would seem to be as silly as saying 'I am now awake, and see some truth; but since my vision is not yet clear enough, I will deliberately fall asleep so that my dreams may

provide a truer and clearer representation.' I thus realize that none of the things that the imagination enables me to grasp is at all relevant to this knowledge of myself which I possess, and that the mind must therefore be most carefully diverted from such things if it is to perceive its own nature as distinctly as possible. (Descartes 1996, p. 19)

As this quotation suggests, for Descartes, if a dream – formed by imagistic imagination – reveals the truth of the subject, then that truth would be grounded in a representational falsity. And a truth grounded in such misrepresentation lacks the certainty, clarity, and distinctness required to be believed. In fact, it cannot be considered truth at all. This is because such kind of imagination is completely independent of one's knowledge of what the world is like. This is why Descartes begins the First Meditation with the example of dreaming, illustrating how such deceptive experiences can lead to more profound and comprehensive doubts than just questioning the reliability of sensory-based beliefs. If even the seemingly real experience of sitting by the fire could be a dream, then one can never be certain that they are not dreaming at this very moment, mistakenly believing they are awake (Descartes 1996, p. 13). Dreams are deceptive because they make you think they possess the same clear and distinct experiential quality as waking experiences.

In sum, Descartes' treatment of imagination supports the idea that the skeptical power of dreams lies precisely in their imagistic nature. The imagination involved in dreams does not rely on propositional reasoning or inferential structure, but on the spontaneous production of vivid mental images that resemble perception. Because these images can feel subjectively indistinguishable from actual sensory experiences, they can simulate belief-like states without being grounded in truth. This reinforces the skeptical challenge: if imagistic experiences in dreams can feel just as real as waking perceptions, then even our clearest experiences may be deceptively constructed. To fully appreciate this challenge, we must now turn to the phenomenal character of dreams themselves – to how these experiences seem from the inside, and how they might generate the illusion of belief or perceptual contact with a world.

## 7. The phenomenal character of dreams

When we talk about the phenomenal character of dreams, we refer to the subjective experience of what it is like to be immersed in them. And what it is like is often strikingly similar to our waking experiences. Dreams involve imagistic imagination – mental imagery that is internally generated, not driven by sensory input. Yet, this imagination often presents content with a vividness and immediacy that makes it *feel* as though it were perceptual. That is, dreams simulate perception phenomenologically, even though they are not genuinely perceptual nor hallucinated. Consider any dream you have had, no matter the type. For instance, consider a dream in which you are walking through a forest, hearing birds chirp, or feeling a breeze on your skin. Because you are familiar with these sensations from waking life, your dream reflects what it is like to walk through a forest, hear birds, and feel the wind. In this way, dream experiences can have a phenomenal character that closely mimics that of ordinary life experiences, even though we are not in perceptual contact with the world.

The sensory or imagistic imagination involved in dreams, as discussed in Descartes' Meditations, consist of mental images that resemble percepts in waking life. These images also have referential content – they represent specific objects, even if those objects are not real. As a result, dreams appear to share the same phenomenal character as waking perception because they seem to put us in contact with mind-independent

objects, even though no such objects are actually perceived. Therefore, dreams are not genuinely perceptual experiences, but imagistic experiences that can simulate perception so vividly that they appear to be perceptual. From the first-person perspective, they present themselves as if they were genuine perceptions, even though no actual perceptual contact with the world occurs. For instance, in a dream, I might see things – like a fire, a winter dressing-gown, a piece of paper, or my hands – just as vividly as I would if I were awake. But with my eyes closed during sleep, I am not literally *seeing* anything, despite the vividness of the experience.

Take the example of imagining going to check your mailbox. When done deliberately, this act of imagination is marked by a kind of epistemic distance and intentional control - you are aware that the scenario is not real, and you can guide or suspend the imaginative episode at will. In contrast, in a dream, the same scenario might unfold with immersive vividness, but without that meta-awareness or voluntary structure. You feel the ground, hear the mailbox open, and see the envelopes. Phenomenologically, there is no indication that the experience is imaginary - you are not aware that you are imagining. In this way, dreams involve imagistic imagination that can vividly resemble perceptual experiences, even though it remains internally generated and detached from actual sensory input. While dreams are not hallucinations in the technical sense typically defined as perceptual experiences occurring without an external stimulus but which are subjectively indistinguishable from veridical perception - they do share certain phenomenological features, such as vividness and immersion. However, unlike hallucinations, dreams do not arise from malfunctioning perceptual systems in real-time wakefulness, but from internally generated, imagistic processes during sleep, disconnected from the sensory environment. What this suggests is that imagination, in dreams, can attain a degree of first-person realism – it seems like perception from the inside – even though it does not function like perception or hallucination epistemically.

The assumption is that dream experiences have no connection to external reality. As a result, even if a dream experience feels identical to a waking experience, we cannot assume it reflects any external reality – posing a significant problem. Descartes clearly articulates this issue when he notes that his dreams often replicate daily life phenomenally. He states, "How often, asleep at night, am I convinced of just such familiar events—that I am here in my dressing-gown, sitting by the fire—when in fact I am lying undressed in bed!" His point was that dreams replicate the phenomenal quality of waking life, making it difficult to distinguish between being awake and being asleep. He remarked, "there are never any sure signs by means of which being awake can be distinguished from being asleep." Descartes also observed that "visions which come in sleep are like paintings, which must have been fashioned in the likeness of things that are real" (Descartes 1996, p. 13), emphasizing the indistinguishability between dreams and ordinary experiences.

Descartes' argument goes further. He contends that dreams are spontaneous experiences – phenomenal states that occur involuntarily. As a dreamer, one "is unwilling to be deceived, imagines many things even involuntarily." This implies that while dreaming, we remain unconscious of our volitional control. He illustrates this by saying, "For example, I am now seeing light, hearing noise, feeling heat. But I am asleep, so all this is false. Yet I certainly *seem* to see, to hear, and to be warmed" (Descartes 1996, p. 19). This suggests that while dreaming, things seem a certain way, even though we do not have veridical perceptual experience. The word "seem" here refers to the phenomenological character of the dream – how things are presented to us experientially – but it does not imply that the experience is grounded in reality. Rather, it cautions us against taking the apparent realism of the dream as evidence of its authenticity.

Dreaming, then, is akin to the Müller-Lyer illusion: the bottom line appears longer than the top, even when we know the two lines are exactly the same length. The illusion persists despite our awareness of its falsity – we cannot make the appearance go away through rational insight alone. Similarly, in dreams, spontaneous thoughts and imagery arise independently of our volition. We do not choose what to imagine or how to interpret what we see; rather, we are immersed in a stream of content that feels real, even if it lacks epistemic grounding. In both cases, experience resists correction by belief. Descartes explains this, noting that "these ideas do not depend on my will" and occur "without any assistance from external things" (Descartes 1996, p. 26–7). The phenomenal world of dreams is simply "a vision created in my brain," resulting from "the weakness of our nature" (p. 62).

Consider hearing a voice without any discernible source, as often happens in dreams. If you could not identify where the voice came from, you would likely conclude it was a figment of your imagination or a hallucination, rather than someone actually speaking. From a phenomenological perspective, dreaming is not an action we perform or something caused by external stimuli. Dreaming, instead, can be understood as an involuntary mental activity characterized by imagery and a phenomenal quality that resembles ordinary experience.

This raises an important question: how can a phenomenological approach help us understand the experience of belief during dreaming – whether or not genuine beliefs are actually formed? Scholars like Sosa, as well as those who view imagination as a process, would likely agree with this line of inquiry. Sosa allows that dreams may seem to involve beliefs, but he questions whether these count as genuine beliefs in the epistemic sense. <sup>19</sup> What he disputes is not the presence of belief-like experiences in dreams, but whether these experiences meet the criteria for doxastic commitment required for knowledge. Similarly, proponents of the process view suggest that dreams not only generate beliefs but also facilitate reasoning, much like how we reason with our waking beliefs.

## 8. The phenomenology of believing

Descartes would not be troubled by rejecting the idea that beliefs formed during dreams are genuine in the epistemic sense, nor by acknowledging that the dreamer might handle them in an inferential manner. His central concern lies elsewhere: not in whether we hold or reason with beliefs while dreaming, but in whether we experience ourselves as having such beliefs – that is, whether dreams involve the phenomenology of believing. This refers to the subjective, first-person sense of what it is like to believe something – the felt quality of belief as it presents itself in experience. For example, the dressing-gown dream provides a distinct phenomenal experience as of being awake. As Descartes notes in the First Meditation, even vivid experiences of sitting by the fire or wearing a dressing-gown in a dream may feel indistinguishable from waking life:

Yet at the moment my eyes are certainly wide awake when I look at this piece of paper; I shake my head and it is not asleep; as I stretch out and feel my hand I do so deliberately, and I know what I am doing. All this would not happen with such distinctness to someone asleep.

<sup>&</sup>lt;sup>19</sup>Whether beliefs formed in dreams can truly be considered "beliefs" depends on how belief is defined within various philosophical frameworks. The concept of belief is complex and has been the subject of considerable debate (for an introduction, see Schwitzgebel 2011). Different theories interpret what it means to hold a belief in distinct ways, which can influence how dream beliefs are understood.

Here, by deliberately looking at the paper, shaking his head, and feeling his hand, Descartes enters a mental state where it seems certain to him that he is awake. However, this certainty fades when he recalls dreaming similar things in the past. He concludes: "there are never any sure signs by means of which being awake can be distinguished from being asleep" (Descartes 1996, p. 13). This realization leads him to persistently doubt the reliability of all his beliefs about himself and the world. Importantly, this does not mean that dreams are perceptual or hallucinatory in nature. Rather, Descartes' point can be read as emphasizing that imagistic imagination, when immersive and involuntary, can simulate the phenomenology of waking perception, thereby making dreams experientially indistinguishable from wakefulness.

Descartes' focus on the phenomenology of belief continues in the Second Meditation, where belief is portrayed as an occurrent mental state - one that is active and causally effective within the mind.<sup>20</sup> He writes, for example: "I am now seeing light, hearing noise, feeling heat. But I am asleep, so all this is false. Yet I certainly seem to see, to hear, and to be warmed." In this passage, Descartes reflects on how, despite dreaming, it still appears to him as though he is perceiving light, sound, and warmth. In this passage, Descartes reflects on how, despite dreaming, it still appears to him as though he is perceiving light, sound, and warmth. What it is for you, as a dreamer, to experience seeing light, hearing noise, or feeling heat is not that you actually perceive or believe these things, but that it seems to you as though you do. The phenomenology of dreaming involves a compelling presentation of sensory-like content, generated in the absence of external stimuli. This may give rise to what we might call the phenomenology of believing - an experiential state in which one feels as though one believes certain things are true (e.g., that one is sitting by the fire), even though no actual belief-forming process is occurring. Rather than forming beliefs within the dream in a full cognitive sense, the dreamer is immersed in mental content that simulates the feel of belief.

Interpretations of Descartes' treatment of dreams vary. One view, which Ichikawa (2009) has called the "orthodox" theory (see also Windt 2015), takes Descartes to be describing dreams as hallucinations – perceptual-like experiences occurring in the absence of external stimuli. Another view (cf. Kind and Kung 2016) treats Descartes as describing dreams as imagistic simulations. I adopt this latter reading, interpreting Descartes as treating dreams as internally generated, imagistic states that simulate perception without involving actual perceptual faculties. On this view, dreaming involves imagination that is immersive, spontaneous, and phenomenally rich, but not genuinely perceptual. Crucially, dreams generate experiences that feel like perception and may simulate the phenomenology of belief, despite the absence of real-world input or belief-forming mechanisms.

In other words, it should feel as though you are phenomenally seeing the light, hearing the noise, and feeling the heat. The idea is not just that the experience represents properties like visibility, sound, and warmth, but that it also instantiates their phenomenal character – the qualitative feel of seeing, hearing, or being warmed, even in the absence of real-world causes.

This phenomenological interpretation is crucial to the *cogito*, the truth of which Descartes cannot doubt, even if he is dreaming. For him, experiencing the phenomenology

<sup>&</sup>lt;sup>20</sup>On Sosa's view, while dreaming, our beliefs and intentions remain intact but latent – that is, they persist dispositionally even if they are not occurrent (2007 p. 4-8). In contrast, Descartes highlights the phenomenological character of dreams, particularly the experience of undergoing mental states like believing or intending. The contrast here lies not in whether beliefs exist during dreaming, but in the explanatory focus: Sosa emphasizes the preservation of rational structures across sleep and wakefulness, while Descartes is concerned with the felt experience of such states during dreams.

of belief is linked to the acts of thinking. It includes an agentive component – being a thinking thing not only in the narrow sense of rational thought or intellection but also in the broader sense of "a thing that doubts, understands, affirms, denies, is willing, is unwilling, and also imagines and has sensory perceptions" (Descartes 1996, p. 19). To experience belief phenomenally in a dream is to encounter things as seeming to be a certain way. There is a sense of presence in the mind of those things, which in turn generates doubt as a form of thinking. This doubt, along with the other forms of thinking just mentioned, confirms Descartes' certainty of his own existence as a thinker. As Descartes states in the Third Meditation: "from the fact that I am doubting it follows that I exist" (Descartes 1996, p. 27). At stake here is the idea that rejecting the phenomenology of belief in dreams amounts to denying the experience of oneself as a thinking being.

The relationship between the beliefs we hold or reason with and those Descartes is concerned with can be understood as follows: the former depend on the existence of mind-independent objects, while the latter rely solely on their phenomenal character. The first is factual or world-setting dependent and, thereby, can be taken at face value. Contrary to that, while I may be mistaken about the phenomenal character of an experience, I would still experience it. I may wrongly believe that the bottom line of the Müller-Lyer illusion is longer than the top, yet I would still believe it. In this sense, I may dream of something similar to my experience of Müller-Lyer because, as Descartes notes, "the spontaneity . . . of my belief was all the greater in proportion" (Descartes 1996, p. 41). In such cases, I am engaged in seeming rather than propositional imagining, since I "cannot fix my mental vision continually" (p. 48) and cannot "make such a meticulous check" (p. 62) of the relevant vision to catch even the smallest error. Moreover, when I am engaged in seeming rather than propositional imagining, I cannot reason based on the belief formed from what I am imagining.

The key point is that the implications of the seeming hypothesis are crucial to Cartesian dream skepticism. Dreams can sometimes carry a phenomenal force that makes the imagined world feel strikingly familiar – as if one had been there before or were returning to a known place. This sense of familiarity is not necessarily grounded in memory or belief but arises from the immersive character of the dream's phenomenal content. It may simulate the feeling of believing one is in a familiar place, even in the absence of actual memory or cognitive endorsement. While not all dreams evoke this feeling, those that do highlight how phenomenology alone can generate a powerful sense of experiential continuity. Consider dreaming that you are sitting at your desk, with your phone lying next to your laptop. You notice its color, shape, and even a small scratch on the screen, all of which compel you to believe in the reality of these dream details.

The seeming inescapability of dreams makes them feel overwhelmingly pushy, compelling the dreamer to accept their apparent reality. This pushiness might initially suggest a hallucination model, since hallucinations are typically involuntary, perceptual-like experiences that impose themselves on the subject. However, on the imagination model I adopt, dreams are understood as immersive acts of spontaneous, imagistic imagination – internally generated simulations that, while not genuinely perceptual, nonetheless produce phenomenal content so vivid and coherent that they feel real and difficult to resist.

This reveals a key feature of dreaming imagination: it can lose its ordinary markers of deliberation and control, thereby simulating the epistemic force of perception. Consider, for example, the vivid sensations of sitting in a crowded café – the clatter of dishes, the aroma of coffee – or the warmth of the sun on your skin during a walk along the beach. Such richly detailed scenes are often experienced in dreams with the same immediacy as waking life. They are not just perceptions as if real; they feel like states one believes oneself to be in.

What matters, then, is not whether the dreamer forms beliefs in the technical or dispositional sense, but whether dreams involve the phenomenology of believing – the subjective feel of taking a scene to be real, of endorsing its content. The seeming inescapability of dreams – their immersive and involuntary quality – simulates this phenomenology of belief: it feels as though we are cognitively endorsing what we see, hear, or feel, even if no actual doxastic commitment occurs.

On this view, Cartesian dream skepticism is not merely a challenge to knowledge, as Sosa frames it, but a deeper worry about the experiential trustworthiness of our first-person perspective. Even if Sosa is right that belief – and thus knowledge – is absent in dreams, the phenomenology remains. And it is this phenomenology, which dreams convincingly reproduce, that continues to sustain an existential or experiential form of skepticism: if dreams can simulate the experience of belief so well, how can we be confident that our current experience is not similarly deceiving?

#### 9. Conclusion

Why do the arguments above matter? There are at least three key reasons.

First, if we interpret Descartes' dream skepticism through the lens of an imagination-based model – as some recent accounts suggest (cf. Kind and Kung 2016) – then the relevant kind of imagination must be imagistic. That is, the dreams Descartes describes involve immersive, sensory-like mental imagery that simulates perception, rather than abstract or propositional thought. Recognizing this places a significant constraint on any theory aimed at addressing Cartesian dream skepticism: such a theory must account for the phenomenological force of imagistic imagination. Approaches that neglect this – such as propositional (e.g., Sosa 2005a, 2005b, 2007, 2010) or process-oriented models (e.g., Ellis 1910; Wolman and Kozmová 2007) of dreaming – risk missing the point at best.

Second, and perhaps more importantly, understanding how to tackle Cartesian dream skepticism also reveals the importance of asking the right questions. Instead of focusing on whether dream states technically count as beliefs, the more relevant inquiry is whether dreaming involves the kind of phenomenology that makes it seem as though one is holding an occurrent belief – what we might call the phenomenology of believing.

Finally, since, as I have argued, dreams involve the phenomenology of belief – whether or not they involve beliefs in the technical sense – the issue of dream skepticism remains an open question.

**Acknowledgments.** I gratefully acknowledge funding from the Deutsche Forschungsgemeinschaft (DFG) as part of the Centre for Advanced Studies in the Humanities *Human Abilities* (grant number 409272951).

# References

Arcangeli M. (2018). Supposition and the Imaginative Realm: A Philosophical Inquiry. London & New York: Routledge.

Balcerak Jackson M. (2016). 'On the Epistemic Value Of Imagining, Supposing, and Conceiving.' In A. Kind and P. Kung (eds.), Knowledge Through Imagination, pp. 207–226. Oxford: Oxford University Press.

Bueno O. (2009). 'Sosa on Skepticism.' Metaphilosophy 40(2), 195-202.

Conant J. (2012). Two Varieties of Skepticism.' In G. Abel and J. Conant (eds.), Rethinking Epistemology, Vol. 2, pp. 1–74. Berlin: De Gruyter.

Cornford F.M. (1935). Plato's Theory of Knowledge: The Theaetetus and the Sophist of Plato translated with a commentary. London: Routledge & Kegan Paul.

Crowther T. (2018). 'Experience, Dreaming, and the Phenomenology of Wakeful Consciousness.' In F. Dorsch, F. MacPherson and M. Nida-Rümelin (eds.), *Phenomenal Presence* (pp. 252–282). Oxford: Oxford University Press.

Currie G and Ravenscroft I. (2002). Recreative Minds: Imagination in Philosophy and Psychology. Oxford: Oxford University Press.

Decety J. (1996). 'The Neurophysiological Basis of Motor Imagery.' *Behavioural Brain Research* 77(1-2), 45-52.

**Descartes R.** (1996). Meditations on First Philosophy: With Selections from the Objections And Replies (J. Cottingham, Trans. and Ed.; Rev. ed.). Cambridge: Cambridge University Press.

Domhoff, G. W. (2007). Realistic Simulation and Bizarreness in Dream Content: Past Findings and Suggestions for Future Research. In D. Barrett & P. McNamara (eds.), *The New Science of Dreaming: Content, Recall, and Personality Correlates* (Vol. 2, pp. 1–27). Westport, CT: Praeger.

Ellis H. (1910). 'The Logic of Dreams.' The North American Review 192(658), 379-386.

García C.L. (2009). 'Sosa's Responses to Dreaming Skepticism.' Critica: Revista Hispanoamericana de Filosofia 40(123), 3–25.

Gettier E.I. (1963). 'Is Justified True Belief Knowledge?.' Analysis 23, 121-123.

Gregory D. (2024a). 'Imagining a Way Out of Dream Skepticism.' Erkenn 89, 2967-2984.

Gregory D. (2024b). 'Content Determination in Dreams Supports the Imagination Theory.' Philos Stud 181, 3037–3057.

Hamdo M. (2023a). 'On Galen Strawson's Central Approach to the Self.' Theoria 89(1), 42-56.

Hamdo M. (2023b). Epistemic Thought Experiments and Intuitions. Cham: Springer.

Hamdo M. (2025). 'Intuitions in Epistemic Thought Experiments East and West: What Went Wrong?.' Asian Philosophy, 1–21. https://doi.org/10.1080/09552367.2025.2506920

Hanna R. (1992). 'Descartes and Dream Skepticism Revisited.' *Journal of the History of Philosophy* 30(3), 377–398.

Ichikawa J. (2009). 'Dreaming and imagination.' Mind and Language 24(1), 103-121.

Ichikawa J. (2016). 'Imagination, Dreaming, and Hallucination.' In A. Kind (ed.), Routledge Handbook of the Philosophy of Imagination, pp. 149–162. London: Routledge.

Jeannerod M. (1994). 'The representing Brain: Neural Correlates of Motor Intention and Imagery.' Behavioral and Brain Sciences 17(2), 187-245.

Kant I. (1957). Critique of Pure Reason (N. K. Smith, Trans.). New York: St. Martin's Press.

Kind A. (2013). 'The Heterogeneity of the Imagination.' Erkenntnis 78(1), 141-159.

Kind A. and Kung P. (2016). 'Introduction: The Puzzle of Imaginative Use,' In A. Kind and P. Kung (eds.), Knowledge Through Imagination, pp. 1–37. Oxford: Oxford University Press.

Langland-Hassan P. (2016). 'On choosing what to imagine.' In A. Kind and P. Kung (eds.), Knowledge through imagination, pp. 61–84. Oxford: Oxford University Press.

Matthews G.B. (1981). 'On Being Immoral in a Dream.' Philosophy 56(January), 47-64.

McGinn C. (2004a). Consciousness and its Objects. Oxford: Oxford University Press.

McGinn C. (2004b). Mindsight: Image Dream Meaning. Cambridge, MA: Harvard University Press.

Möller H. (1999). 'Zhuangzi's "Dream of the Butterfly": A Daoist Interpretation.' *Philosophy East and West* **49**(4), 439–450.

Moore G.E. (1968). 'Certainty.' In W. Doney (ed.), *Descartes: A Collection of Critical Essays*, pp. 27–53. London: McMillan.

Myers J. (2021). 'Reasoning with Imagination.' In A. Kind and C. Badura (eds.), *Epistemic Uses of Imagination*, pp. 103–121. New York, NY: Routledge.

Myers J. (2024). 'Imagination as a Source of Empirical Justification.' Philosophy Compass. 19, 1–12. doi: 10. 1111/phc3.12969

O'Shaughnessy B. (2002). 'Dreaming.' *Inquiry: An Interdisciplinary Journal of Philosophy* **45**(4), 399–432. **Paul S.K.** (2013). 'The Conclusion of Practical Reasoning: The Shadow Between Idea and Act.' *Canadian Journal of Philosophy* **43**, 287–302.

Rosen M. (2022). 'Dreaming as a Virtual Reality Delusion Simulator: Gaining Empathy Whilst We Sleep.' International Journal of Dream Research 15(1), 73–85.

Rosen M.G. (2019). 'Dreaming of a Stable World: Vision and Action in Sleep.' Synthese 198(17), 4107–4142. Schwitzgebel E. (2011). 'Belief.' In E. N. Zalta (ed.), The Stanford Encyclopedia of Philosophy, Winter 2011 ed. http://plato.stanford.edu/archives/win2011/entries/belief.

Shepard R.N. and Metzler J. (1971). 'Mental Rotation of Three-Dimensional Objects.' Science 171(3972), 701–703.

Sikka P., Revonsuo A., Sandman N., Tuominen J. and Valli K. (2018). 'Dream Emotions: A Comparison of Home Dream Reports with Laboratory Early and Late Rem Dream Reports.' *Journal of Sleep Research* 27, 206–214.

Sosa E. (2005a). 'Dreams and Skeptics.' Philosophic Exchange 35(1), 19-32.

Sosa E. (2005b). 'Dreams and philosophy.' Proceedings and Addresses of the American Philosophical Association 79(2), 7–18.

Sosa E. (2007). A virtue epistemology: Apt belief and reflective knowledge (Vol. I). Oxford: Clarendon Press.

Sosa E. (2008). 'Skepticism and Perceptual Knowledge.' In Q. Smith (ed.), Epistemology: New Essays, pp. 121–135. Oxford: Oxford University Press.

Sosa E. (2009). Reflective knowledge. Oxford: Oxford University Press.

Sosa E. (2010). 'Replies to My Critics.' Crítica: Revista Hispanoamericana de Filosofía 42(125), 77-93.

**Soteriou M.** (2013). The mind's construction: The ontology of mind and mental action. Oxford: Oxford University Press.

Soteriou M. (2020). 'Dreams, Agency, and Judgement.' Synthese.197, 5319–5334. https://doi.org/10.1007/ s11229-017-1496-7.

Spaulding S. (2016). 'Imagination Through Knowledge.' In A. Kind and P. Kung (eds.), Knowledge through imagination, pp. 207–226. Oxford: Oxford University Press.

Strohminger M. (forthcoming). 'The Epistemic Role of the Imagination.' In E. Sosa, K. Sylvan, J. Dancy and M. Steup (eds.), The Blackwell Companion to Epistemology (3rd ed.). Chichester, UK: Wiley Blackwell.

**Thompson E. and Batchelor S.** (2014). Waking Dreaming Being: Self and Consciousness In Neuroscience, Meditation and Philosophy. Cambridge: Cambridge University Press.

Walton K.L. (1990). Mimesis as make-believe: On the foundations of the representational arts. Cambridge, MA: Harvard University Press.

Williams B. (1978). Descartes: The project of pure inquiry. London: Penguin Books.

Wiltsher N. (2023). 'Imagination as a Process.' Philosophy and Phenomenological Research 107(2), 255-275.

Windt J.M. (2010). 'The Immersive Spatiotemporal Hallucination Model of Dreaming.' *Phenomenology and the Cognitive Sciences* **9**(2), 295–316.

Windt J.M. (2015). Dreaming: A conceptual framework for philosophy of mind and empirical research. Cambridge, MA: MIT Press.

Wolman R.N. and Kozmová M. (2007). 'Last Night I had the Strangest Dream: Varieties of Rational Thought Processes in Dream Reports.' Consciousness and Cognition 16(4), 838–849.

**Manhal Hamdo** is a postdoctoral fellow currently working in Berlin. He completed his PhD in Philosophy at the University of Delhi in 2021, where he focused on the nature and epistemic role of intuition in analytic philosophy. His current research explores the epistemology of imagination and thought experiments.

Cite this article: Hamdo M. (2025). "Imagination and belief in dreams." *Episteme* 1–21. https://doi.org/10.1017/epi.2025.10076