The Journal of Aesthetics and Art Criticism, 2021, 79, 285–300 DOI: 10.1093/jaac/kpab022

Advance access publication 18 June 2021

Original Article



Relief and the Structure of Intentions in Late Palaeolithic Cave Art

Fiona Hughes

ABSTRACT

Artworks at Lascaux and other late Palaeolithic caves integrate geological features or "relief" of the cave wall in a way that suggests a symbiotic relation between nature and culture. I argue this qualifies as "receptivity to a situation," which is neither fully active nor merely passive and emerges as a necessary element of the intentions made apparent by such cave art. I argue against prominent interpretations of cave art, including the shamanist account and propose a structural interpretation attentive to particular cases. Seen in this way, cave art displays intentions that are analyzable as having a tripartite structure: mentally directed, embedded in actions and receptive to a situation. Moreover, the latter is the medium through which the other two elements are conjoined. Drawing on a range of archaeological and philosophical resources from both analytical philosophy and phenomenology, I argue that what I call cave art's "intentional story" is important for the philosophy of intentions more generally.

My aim in this article is to examine what can be established about intentions discoverable in late Palaeolithic cave art, especially in regard to the role played by relief.¹ By "relief" I mean the almost always uneven surface of the rock wall of decorated caves, as well as more pronounced protuberances and fissures. I argue that receptivity to the natural environment was not merely incidental and counts as a structural element of the intentions through which that art was created. Evidence supporting this claim is that some relation to the material environment of the cave is a feature of all cave art that has been discovered so far, while incorporation of features of the relief is pervasive. I propose this thesis as a hypothesis that can be tested against—as well as potentially illuminating—both existing and future evidence. If true, this reveals something important about how these hunter gatherers related to their environment, in particular what I call their "receptivity to a situation," a relation not reducible to either activity or passivity. I hope to show both that a philosophical approach is particularly well positioned to establish ways in which intentions can be addressed without falling into mere speculation and that archaeological research can contribute to philosophical understanding of intentions.

I propose a structure of intentions as a framework that is both sufficiently open to be able to encompass a wide range of individual cases and sufficiently precise to be able to release new insights. Consequently, my account does not impose a universal structure onto particular caves. Rather, I argue from the evidence provided by artworks to an implied structure of intentions informed by a wide range of empirical evidence as well as open to adjustment in the face of further evidence. Such evidence arises both from direct experience of a number of caves, as well as from the archaeological literature. Only a fraction of such evidence can be mentioned in the current discussion.

After an initial account of the role of relief in cave art, I assess two archaeological interpretations offering very contrastive accounts of the role played by relief. In both the shamanist interpretation (which has attracted significant popular interest), as well as in the French archaeologist Norbert Aujoulat's extensive analysis of empirical phenomena at Lascaux, the relative importance afforded to relief has implications for the understanding of intentions at work in cave art. The absence of a systematic account of intentions in these approaches is instructive, not least because it is not unusual. Processual archaeology, which arose in the late 1950s influenced by anthropology and the natural sciences, insisted on the primacy of behavioral and scientifically quantifiable environmental data.³ In contrast, post processual archaeology, emerging in the 1980s under the influence of sociology and continental philosophy, sought to reinstate perspectives such as meaning, agency and intention.⁴ Nonetheless, archaeological discussions of intentions remain principally focused on the determinability or otherwise of their content, rather than their structure.⁵

Drawing on a range of philosophical resources from both analytical philosophy and phenomenology, I present the position that the depictions are neither wholly given by the rock nor entirely dreamed up by the artists and, instead, emerge from a relation between artistic making and receptivity to the material situation of the cave. Within this perspective, cave art displays intentions that are analyzable as having a tripartite structure: mentally directed, embedded in actions *and* receptive to a situation. Such intentions operate at the threshold between "the given" and "the constructed," between the objective and the subjective, between nature and culture.⁶ All of these oppositions require reassessment in the light of "receptivity to a situation" and its implications for the relation between activity and passivity.

In conclusion, drawing on my reconstruction of the implications for the analysis of intentions of Maurice Merleau-Ponty's phenomenological approach, I suggest that the configuration uncovered with respect to cave art may be instructive for the philosophical analysis of intentions more generally, revealing the role of receptivity to a situation not only "for them" but also "for us."⁷

I. THE USE OF RELIEF IN CAVE ART

The depiction of animals and abstract shapes—usually referred to as "signs"—are the most pervasive themes in decorated caves from the late Palaeolithic period (44,00010,000 BP).8 In all of these categories of cave art features of relief (in the broad sense I have defined) are deployed, although this is most evident in depictions of animals.9

In interpretations of cave art, the role played by relief is often remarked on. Ernst H. Gombrich, for instance, claims that the earliest cave art was the result of both "accident and projection" (2002 (1960), 89–93). According to this view, artists sought out bulls and horses in the rock just as they hunted for them as prey, before "fixing" the natural forms and making them visible as art. Despite a huge diversity in interpretations of cave art there is almost universal agreement about the pervasiveness of the use of morphological features of the cave wall (e.g., Paillet 2006, 63; Bahn 2010, 140).

An array of recent technological and methodological developments in 3-D recording and modeling have reinforced the evidence for the incorporation of relief. Such techniques are important not only for understanding but also for conservation, for instance, through providing alternative access.

If cases where features of relief directly determine artistic forms are restricted, as the archaeologist Paul G. Bahn remarks, to a few rare cases (ibid.), must we conclude that the use of rock features was, despite being widespread, merely circumstantial? In what follows, within a structural analysis responsive to particular cases I propose a way of grasping incorporation of relief as a crucial element in cave art.¹¹

II. SHAMANISM AND RELIEF: INTENTION, INTOXICATION, AND MAGICAL BELIEF

One of the most popular theories in nonspecialist discussions of cave art proposes that it can be explained as the actions of powerful individuals within hierarchical social groups, namely shamans. Although this approach has been highly contested within the archaeological literature, it continues to be influential, for instance, in public exhibitions deploying academic research in reputable museums.¹²

Moreover, one of the most influential contemporary figures in Palaeolithic cave art worldwide, the archaeologist Jean Clottes, is a proponent of the shamanist theory (see Clottes and Lewis-Williams 1996; Clottes 2011).

Recent discussions in archaeological theory often draw on anthropological—and to a lesser extent philosophical—debates about ontology to account for ways in which reality is carved up, especially how a species or a people see the relation in which they stand to their world and the beings in it (see Descola 2013). In his review of ontological approaches to rock art, Andrew M. Jones argues that scholars of rock art (in the relevant context, encompassing both late Palaeolithic cave art and Neolithic landscape art) have mainly employed ontological approaches to *define* rock art-making societies. As a principal example of this, Jones cites shamanism, which has been deployed as an "all-encompassing category" understood as an "ideal type" (176–7; See also 169). He argues against this for an ontological approach that is both relational and critical, using ontological distinctions as heuristic (169). This is just one example of how, whatever its shortcomings, shamanism still figures in contemporary archaeological discussions. Conclude it is important to make a reasoned assessment of the shamanist interpretation with regard to the structure of intentions.

David Lewis-Williams, a specialist in the ethnographic study of the San people of southern Africa, is the principal exponent of the shamanist interpretation of late Palaeolithic cave art. Lewis-Williams in *The Mind in the Cave* makes much of how the cave wall operates as a "living membrane" between this world and the next (2002, 199, 214). According to his interpretation, the cave art of the late Palaeolithic shaman artist—like the rock art of the San people—was intended to make transitions across this border possible.

The shamanist interpretation claims to explain not only *why*, but *how* cave art arose, namely, as the consequence of neuropsychological phenomena enhanced by heightened states of consciousness arising most probably outside the cave. According to Lewis-Williams, "entoptic" images internal to the process of vision and universal to all modern humans—including the cave artists of the late Palaeolithic—were, under conditions of trance, the first stage in a process culminating in hallucinations of socially significant motifs—principally animals—which were later "fixed" onto the contours of the rock of the cave (2002, 126–30, 193). This is Lewis-Williams's inventive account of the origin of 2-D representations.¹⁵

Lewis-Williams does not develop a systematic and explicit account of intentions at work in cave art. His interest in human action or agency is directed towards what he sees as the hierarchical and competitive social order characteristic of the late Palaeolithic (Lewis-Williams 2002, 268–286). His method operates as a "dialectic between social construction and neurological foundations" within which the latter is understood as implying the "full range of human consciousness" with an emphasis on "autistic" and visionary states, for instance, dreams (124).

What, then, is the intentional story Lewis-Williams's account implies? He states explicitly that cave art arose rationally, while arguing against a restricted range of rationality understood, in his view, according to the model of Western science (Lewis-Williams 2002, 111). The image makers' intention was to reach a transcendent spiritual world hidden behind the rock face, a mythological motivation intertwined with the aim of achieving social or political control (234–5). This complex intentional story determined the significance given to neuropsychological phenomena.

A frequently raised objection is that it is contestable to attribute to late Palaeolithic art a range of features derived from ethnographic studies of much more recent periods in quite different geographic regions. ¹⁶ Meanwhile, J.D. Lewis-Williams and T.A. Dowson's neuropsychological argument has also been put under scrutiny on the grounds that there is insufficient evidence for its "three stages of trance" theory of a progression from entoptic to figurative visions (1988, 208). ¹⁷

A series of further questions would need to be addressed for the shamanist interpretation's intentional story to be persuasive. Did the artist merely passively reproduce what had previously been experienced in *ecstasis*? Or did intoxicated mental states motivate but not entirely determine sober action? If so, what might have been the relations between belief, intoxication, deliberation, and action? In particular, what might have been the relations between "entoptic" states—current or remembered—and sober observation of features of the rock onto which those virtual images were transferred? What role was played by tools and techniques that were chosen and used, presumably in sobriety? In the absence of consideration of the interplay between activity and passivity these questions imply: the shamanist interpretation remains impressionistic. Moreover, it is not clear that the Shamanist interpretation can answer these questions and maintain the distinctiveness of its thesis, which emphasizes the magical over making.

The shamanist interpretation's failure to provide an adequate account of intentions operative in cave art also arises from its resistance to addressing how specifically artistic or aesthetic features contributed to the supposed transition from one world to the next. The shamanist interpretation may be able to explain why a depiction was positioned at a particular place—where the rock supplied a point of access between one world and the next—but it cannot explain why shaman-artists went to the trouble of making what are often very expressive and complex depictions. Why did they not, for instance, just make a simple mark: "Here is the spot"? The shamanist interpretation treats artworks functionally while the expressive force of cave art is left entirely unaccounted for. 19

Finally, although the shamanist interpretation presents the geological environment as a crucial factor in cave art, the relation between culture and nature is not coherent in Lewis-Williams's account. He claims that relief participates in cave art and that the images were "already there" (Lewis-Williams 2002, 193). Each cave contributes its own "peculiar topography" (229). But, as we have seen, he also argues that neuropsychological phenomena give rise to mental images that are "fixed to" the rock. And, while images are "extracted from suggestive features of the surface," he concludes that images arising prior to exploration of the cave were sought out in the course of "vision questing" (214). This conclusion would entail that the mind projects and fixes *its* images when it finds a suitable formation in the rock. Lewis-Williams's account is at best unresolved. It hovers between, on the one hand, a magical account of the potential of the rock that fails to account for artistic intervention and, on the other, treating the use of relief as instrumental and culture as dominant over nature.

III. A DEFLATIONARY ACCOUNT OF RELIEF: DIRECT PARTICIPATION OR PRECONCEIVED CONCEPT?

Norbert Aujoulat's (2005/2013) *The Splendour of Lascaux* remains one of the principal archaeological references for what is still perhaps *the* iconic cave within late Palaeolithic art. Aujoulat's importance for my argument is twofold. First, he provides a wealth of empirical archaeological evidence with which to test my account, which I draw on later. Second, his skepticism about the role of relief in cave art provides a counterargument allowing for the fine tuning of my thesis.

The problem I diagnose in Aujoulat's account is the lack of an adequately mediated transition from phenomena to theory. This has more general implications. Arguably, there is *no* pure description of archaeological phenomena that is not in some way informed by theoretical perspectives and *any* adequate archaeological theory must account for a range of phenomena. The phenomenological approach I later propose draws on Merleau-Ponty's commitment to working between (1) concrete cases, especially in the arts, which give rise to reflection (Merleau-Ponty 1964) *and* (2) a theoretical approach that begins (but does not end) with description (Merleau-Ponty 2002, ix). This makes his approach particularly apt for the development of a theory that is receptive to empirical evidence.

Aujoulat acknowledges that the use of natural relief to supply missing anatomical features of animal forms has long been remarked on (2005, 228). However, he insists that the incorporation of relief is rare at Lascaux. Moreover, he claims there are relatively few such cases throughout Palaeolithic cave art (228, 261). He concludes that the "direct participation of the wall in an outline is marginal" (228). He concedes there are a few marked exceptions particularly in other caves, but the overall conclusions he draws are deflationary in which he denies that features of the relief played a substantial role in cave art (Aujoulat 2005, 271, 2013 (2004), 270–1). I show that, nonetheless, his detailed analyses of Lascaux reveal a rather different story and that much hangs on what is understood by both "relief" and "direct participation."

For Aujoulat the most widespread and significant contribution of the "contours of the wall" is in supplying guidelines for the positioning of figures (2005, 228). Among the cases he cites are a yellow stag in the Hall of Bulls, as well as the falling cow and the upside down horse in the Axial Gallery, the orientation of all of which follows features of the rock. "Natural elements" also contribute to supplying the "third dimension" of depth, for instance the use of a concavity to depict a convexity (232, 260). In neither of these cases is the choice of figures determined by the rock, which, nonetheless, facilitates specific ways in which forms are elaborated.

A further "participation" by the "wall support" is in providing natural "frames" for cave art (Aujoulat 2005, 261, 232). Such framing devices are common and include the use of a natural kerbstone in the

Hall of the Bulls as the inferior limit above which all paintings are positioned, while the paintings in the adjacent Axial Gallery are laid out within a series of panels that are entirely natural (see also Clottes 2018). Although Aujoulat insists that such natural frames did not determine the choice of specific themes or the way they were ordered, he comments that such parameters played "a major role in influencing the general shape of compositions within the limits imposed by structure (the ridges, ledges or proportions of the walls, for instance)" (2005, 66, translation adjusted). Later he says that such structures had an important influence on—even played a decisive role in—"graphic ensembles," while denying they influenced themes or compositions (232). He goes on to say that such natural frames were used to position a composition insofar as they were able to "hold the eye and direct the spatial distribution of the figures" (261). This implies that rock features not only determined the limits of the space deployed, but also influenced the distribution and relations between figures within spaces. While this does not amount to "direct participation," which would entail determining which figures were chosen, the wall's configuration nonetheless influenced how they are arranged.

Turning to Aujoulat's comments on the role played by the cave in intentions operative in its art, we find some prevarication. Commenting not on "relief"—which he understands as restricted to prominent features—but on the general material conditions of the cave he remarks: "the natural setting did not, *perhaps*, influence motivation" (Aujoulat 2005, 261–2, emphasis added). However, he describes cave art as "structured and deliberate," immediately going on to say that this seems to "complement" the structure of the galleries (262).²¹ He thus implies a convergence between intention and the cave's morphology. On another occasion, he remarks: "The support thus appears to have been another major element affecting the choices made and the decisions taken by Palaeolithic man" (257). Thus, both the layout of the cave and relief (in my broader use of this term) play some role in the intentional story implied by his account.

There is a tension, nonetheless, between these remarks and the implications for intentions he draws from his primary interpretative thesis, namely, that the disposition of animal figures in the cave was dictated by the seasonal mating patterns of these hunter gatherers' prey (Aujoulat 2005, 262). He speaks of a "rational design," which he says is demonstrated by "a rigorous spatial organization of the figures and a precise temporal logic" (2005, 262–4, 2013 (2004), 262). He also claims that the uniformity of groups of figures "shows that the art at Lascaux is not fortuitous but the result of precise layouts and preconceived concepts" and that the artists deployed "pre-existing virtual shape[s]" (2005, 242, 247).

While this emphasis on rational deliberation is distinct from Lewis-Williams's focus on altered consciousness, Aujoulat's account incorporates a role for mythological or religious motivations in that the "profane" was inseparable from what he calls "sacrilization" (2005, 264). Thus, rules operative in everyday life were already charged with what Aujoulat calls religious "universals" (ibid). Drawing together and extrapolating from these comments, it seems that the artists arrived in the cave with preconceived ideas based on their lives outside the cave. These ideas were the result of fully conscious practical rationality that was, nonetheless, mythologically charged. Features of the rock played a role, but they were not direct participants in the official intentional or motivational story and, rather, along with actions carried out within the cave, at best facilitated the implementation of pre-existing intentions or motivations.

The disparity between the Aujoulat's subtle and insightful descriptive analysis of morphological features and his shot from the hip denial of a substantive role for relief can be better understood through considering his possible motivations. With his talk of "preconceived concepts" and "rational design" I suspect he means to rule out that cave art was simply "given" by the rock, and thus that artists were merely passive and irrational recipients of something of which they had no understanding. However, on closer examination—helped by Aujoulat's own detailed descriptive analyses—it is a red herring to make the criterion for granting a role to relief the artificially high standard of "direct participation." If "relief" is understood as the often-implicit features of the rock within a more general material environment, there is no need to set up an opposition between granting a crucial role to relief and attributing agency to artists. Neither mere passivity nor absolute activity capture the intricate relations operative in cave art. As Aujoulat himself remarks on another occasion, "The interplay of the natural environment and human creation is continuous. It is a true symbiosis" (2005, 246).

IV. INTENTION AS MENTAL ACT AND AS INTENTIONAL ACTION

I now turn to a range of resources from analytical philosophy that I propose are helpful in understanding the structure of intentions operative in cave art.

The classical references on intention from analytical philosophy emphasize the relative priority of either intentional actions or intentions as mental acts. For Gertrude E.M. Anscombe, it is the action and not something "purely in the sphere of the mind" that comes first (1963, 9). Meanwhile, for Donald Davidson all intentional actions are carried out in respect of a primary reason, by which he means a belief in some combination with a "pro-attitude," that is, an evaluation inclining to do something, for instance, a desire (2001, 3–4). He went further to argue that prospective intentions reveal a mental event irreducible to action and the reasons motivating it—"pure intending"—presupposed in all intentions including intentional actions (88–9).

Nonetheless, for Davidson intention requires both a mental event and some relation to action, for even "pure intending" aims at intentional action (2001, 88). Meanwhile, Anscombe does not say that an intention is *not* a mental act, but rather that within intention intentional action comes first, that is, has priority (1963, 9). The decisive difference between them thus lies in the specific balance struck between idea and action. Crucially, Davidson's prospective intention is an intention to act whether or not it gives rise to an action (2001, 89). The explanatory advantage of this move is that it captures the intuition that I can have an intention and yet fail to bring it about. The disadvantage of his account of pure intending is that an internal link between intention and action appears to have been rendered problematic.

In a revision of Davidson that has potentially radical implications, Wayne Davis argues not only that "simple intentions need not be acted on" but that acting intentionally entails intending as a mental act while the reverse implication does not hold (1984, 43). This fails to address a way in which intending entails action, namely, a qualifying characteristic of an intention is that it must be directed towards an action even if the latter is not finally acted on. The direction of entailment is differentially reciprocal and not simply hierarchical as Davis claims.²²

We have seen that for both Lewis-Williams and Aujoulat the intentional story of cave art involves mental states, whether "autistic" or "rational." Both accounts also imply intentional actions, although neither develops that theme explicitly.²³ If it is persuasive that mental acts and intentional action are interrelated within an account of intentions operative in cave art, then Anscombe's insistence on the unity among different elements of intention is helpful (1963, 1). Moreover, the emphasis she puts on action facilitates an examination of the way in which a range of practices arising within the cave qualify as intentional.²⁴ At the same time the inclusion in her model of "intention for the future" makes it possible to account for forward planning only prospectively related to action, without falling into the problems of a pure intending standing in no necessary relation to action (1). Indeed, her integrated account of intention—including action, intention for the future and intentions with which—opens up the possibility of a range of hybrid options including intentional mental states that emerge within intentional actions. Nonetheless, not every work of cave art is a *chef d'oeuvre* and Davidson's notion of a pure intending irreducible to action can be helpful in the analysis of what may be considered as failed, abandoned or not fully executed intentional acts.

In more recent philosophical literature attempts have been made to resolve the nature of the relation between intentional action and intending by seeking to further determine the mental act characteristic of intention. The main alternative to variations on Davidson's "belief plus desire" model is that intending should be identified as planning (e.g., Bratman 1999 [1987]).

While it would be important to take into consideration philosophers' attempts to define intention, it may not be necessary for archaeologists to restrict their analyses of intentions to one conclusive model. As their goal is not to define intention and rather to illuminate archaeological phenomena through such definitions, it should be possible to operate heuristically, drawing on a range of different positions. Archaeologists need not wait until philosophers resolve their differences to profit from philosophical insights! A further advantage of this strategy would be that archaeological research may open up insights beneficial for philosophical analyses.

From this perspective, intentional features I have drawn out in my critical analyses of archaeological accounts of relief can be further explored in relation to each of these philosophical accounts.

Intentions at work in cave art surely involved desire. It seems unimaginable that cave artists did not at some level want to do what they did. However, it also seems unlikely that desire alone can wholly explain the motivation for creating artistic forms that are often extremely expressive and, arguably, give rise to a distinctively aesthetic pleasure. This suggests we would need to distinguish between desire and aesthetic purposiveness, that is, aiming to bring about something that produces pleasure not determined by a pre-existing end. While I cannot give an adequate account of the aesthetic status of cave art here, this too would be part of an adequate analysis of its structure of intentions. ²⁶

No doubt cave art involved individual beliefs. For instance, at least some of the relevant actions were likely based on holding something to be the case and, in this sense, true (see Schwitzgebel 2019). However, in the accounts of cave art discussed in previous sections, "belief systems"—which can be understood as holding together a set of beliefs within a systemic structure—have been more prominent than beliefs per se.²⁷ While individuals have belief systems, those most relevant to the current discussion belong to individuals insofar as they are members of social groups. Examples include not only the belief that the cave wall operated as a membrane to a world beyond but also the more general religious "universals" proposed by Aujoulat. Such belief systems, like individual beliefs, operate not only cognitively contributing to how experience makes sense but also as a background motivation for action.²⁸ The relevant sense of "cognition" need not be that of theoretical reason (Bratman 2009), nor need it entail conscious deliberation (Davidson 2001, 89). Nor must belief systems qualify as rational from an external perspective, for instance, from a position outside that shared by members of the belief-group. A belief system could be considered as a form of "faith." My claim is not that such belief systems are equivalent to intentions, but rather that they are part of the formative background conditions for ideas and actions operative within cave art's intentional story (compare Langton 2004).

Moreover, we can build on Aujoulat's analysis of Lascaux to establish that planning—as well as deliberation and decision making more generally—both outside and inside the cave must be part of the intentional story of cave art. However, such narrowly cognitive activities almost certainly arose alongside what Lewis-Williams calls the "autistic" end of the "spectrum of consciousness." Opting to characterize relevant intentions only as "higher-order" mental functions would be arbitrary and unrepresentative of the complexity of cave art's intentional story.

My aim in the rest of this article is to explore a further philosophical consideration I believe is central to cave art's intentional story alongside intending and intentional action. Receptivity to a situation has not, as far as I am aware, been addressed in the analytical philosophy of intention.²⁹ Anscombe comes closest in introducing the idea of practical reasoning—to which the special "Why?" question characteristic of intentions *with which* belongs—as a "certain sort of general capacity in a particular field" (1963, 88), that is, a context within which intentions arise and to which they respond.³⁰ However, her account of field, while arguably a central presupposition for her account, is underdeveloped. Moreover, we can infer that for Anscombe "field" is defined by human linguistic conventions and should not be seen as natural (1963, 5,7).³¹ She does not include receptivity to features of the natural environment within her account of intentional actions. Indeed, examples she gives seem to exclude this.³²

V. SITUATION AS A THIRD ELEMENT IN THE STRUCTURE OF INTENTIONS

In this section I draw out the implications of the idea of situation in Merleau-Ponty's *Phenomenology of Perception* as a third element in the structure of intentions. Although this discussion principally prepares for the next section where I return to cave art, the reconstruction offered here already provides an account of the relevance of situation for the structure of intentions more generally.

The phenomenological idea of "horizon" as first systematically elaborated by Edmund Husserl clearly inspired Merleau-Ponty's idea of situation. For Husserl consciousness operates through a series of nested contextual levels or horizons. Internal horizons organize a perceptual object with regard to its intrinsic features such as its color and size. External horizons are the relations or contexts in which the object stands to other objects and events in greater or lesser proximity within a field (Husserl 1973, 33).³³ Let us take the example of a flag. Its internal horizons include its shape, its color, as well as the texture of the stuff from which it is made. The external horizons of the flag may include that it has

just fallen off the back of a truck, that it is picked up by Charlie (Chaplin) and that, coincidentally, a crowd of demonstrators come around the corner and happening upon a man holding an appropriately colored flag adopt him as their impromptu leader.³⁴

Merleau-Ponty's idea of a situation—as the field or background in relation to which anything stands—is *prima facie* comparable to an external horizon. However, strictly speaking, a situation should be interpreted neither as purely internal nor as purely external: to be situated refers to the subject's always already being implicated in a series of relations that are both self referring and directed to her world (Merleau-Ponty 2002, 475). Situations are, for Merleau-Ponty, always temporal (493) and spatial (311). They can be personal (418), social (523), political (517), historical (423), economic (200), or natural (523), for instance, as in this discussion, geological.³⁵

There is neither action nor thought without a situation. Consequently, the subject does not 'constitute' or fundamentally determine her objects either through thought or action, but rather "institutes" or initiates them within a situation in respect of which she is neither active (controlling) as opposed to passive (heterogeneously determined) nor vice versa, but both (497).³⁶

In *Phenomenology of Perception* Merleau-Ponty discusses embodied intentions in relation to motor intentionality, that is, our bodily orientation towards the world giving rise to meaning, for instance as habits (2002, 95).³⁷ His idea of situation is also clearly connected to motor intentionality: we are intentionally oriented towards a situation and ultimately a world, which is the theatre of our experience (450; 444). The link between situation and intentions is less clearly stated but can be established through the intermediary of intentionality in the following way:

- 1. All bodily intentions are characterized by motor intentionality, that is, they are kinesthetically directed towards something.³⁸
- 2. Motor intentionality is corporeal orientation towards a situation and ultimately a world.³⁹
- 3. Thus, bodily intentions operating through motor intentionality are situated in a world.

Merleau-Ponty comes close to making the link between intentions and situation overtly when he describes signaling a friend to join him, saying that his "intention is not a thought prepared within me and I do not perceive the signal in my body" (2002, 127). While there is no explicit mention of situation, it is clear that the intention must be understood as situated not only here but also "across the world ... over there" (127).

We can conclude that for Merleau-Ponty intentions necessarily arise in relation to some situation or other: there is no situation that does not make possible a range of intentions and there are no intentions that arise without a situation. We need not conclude, however, that intentions are simply determined by the situations within which they arise: to be in a situation is to find that we already stand in relation to an environment that affords certain possibilities that both shape our intentions and are shaped by our intentions.

Intentions thus understood are ways of intervening in possibilities offered by an environment. The environment may be cultural, thus expanding on Anscombe's account of field. But Merleau-Ponty additionally explores how the natural environment operates as a situation. The natural world *qua* situation comes to the fore—though not in isolation from social and cultural considerations—in cave art's intentional story.

VI. SITUATION AS MEDIUM FOR THE INTEGRATION OF INTENDING AND INTENTIONAL ACTION IN CAVE ART

If it is possible to show that the three elements identified so far—intending as mental state, intentional action and situation—are integrated within cave art, this would be a nontrivial result as it would establish a structure within which particular cave art phenomena can be examined. It would also show that in cave art, at least, situation is a necessary part of the structure of intentions.

The solution I propose in this section is that ideas and actions were developed and only took on their full intentional force in response to potentialities afforded by the cave, amongst which features of the relief played a central role. In a development of Merleau-Ponty's account of situation, "receptivity to a situation" (2002, 288, 232) captures a process through which thinking and acting respond to po-

tentialities of a situation within a complex relation reducible to neither activity nor passivity. The cave as situation was the medium in relation to which intentional ideas and intentional actions came to be united within a common structure.

Drawing on resources that have emerged so far, I now offer a hypothetical reconstruction of how intentional elements so far identified *may* have been integrated in the production of paintings or engravings. Of course, I do not know what was in the heads of the artists, the specific details and order of their actions or, indeed, when exactly they did what they did. What are, however, available for our inspection are the products of those ideas and actions—the artworks—along with the relations in which they stood and still stand to the relief of the cave wall. From this surviving material evidence, I believe it is possible to conclude that some version of the following hypothesis happened and, from it, to identify structural elements within the overall intentional story.

In the reconstruction that follows I refer to artists in the plural leaving open whether an individual or a group is implied. The activity of different hands, various forms of practical support requiring a wider group, along with shared beliefs are all evidenced, but so too is individual activity, for instance, in constrained spaces. While I cannot discuss this any further, cooperation must be assumed to be part of the intentional story of cave art.⁴⁰

VI.A. What Is Brought from Outside the Cave

- (1) Artists enter the cave already informed by some anatomical familiarity with one or more species of animal from the outside world. This is evidenced by the material record afforded by the artworks, many of which are anatomically precise, for instance, the representation of seasonal pelage.
- (2) A decision may already have been taken to deploy this familiarity in making a representation of a specific animal, for instance, a bovine rather than an equid. If so, artists already have an explicit idea of an intention to act. However, a concrete intention may not yet be formed. There may be an intention to paint *something*, but not yet a firm intention to paint anything in particular. The intention, in this case, would be a general idea of an action to be carried out. The material evidence establishes, nonetheless, that the potential outcomes were limited. Late Palaeolithic art, while not universal in content, has a restricted thematic range.
- (3) Artists arrive equipped with beliefs and, more generally, a belief system, including the significance of one or more animal species within a symbolic world order, even though it would be very difficult to establish the specific content of such beliefs. One reason for concluding there was such a system of beliefs is the relative uniformity in themes and style across broad geographic areas—for instance, from eastern Russia to western Spain—strongly suggesting a shared worldview, even though there is also evidence for both regional and local variation within what is a global phenomenon (see Abadia and Morales 2020). Second, we can conclude that there was some motivation for embarking on a difficult and potentially dangerous undertaking. It has been established that prehistoric peoples almost never lived in caves, so the significance of cave art was almost certainly symbolic. Belief systems would have provided a background for specific intentions for example, the motivation for depicting an animal bearing high symbolic value within a belief system.
- (4) Artists must be appropriately prepared and equipped before entering the cave, for instance, with tools or the materials for making tools, pigments most probably prepared outside the cave, perhaps scaffolding materials, most importantly lighting equipment including torches and lamps, as well as food and drink if the task is to take some time. A number of earlier sorties may have contributed to planning.
- (5) The initial selection of the cave as a site for symbolic expression may have been influenced by environmental features outside the cave. Many decorated caves are in a striking position, for instance, on a hill overlooking a river valley or within sight of a high mountain. 41 While their location may have had some practical significance—for instance, as a vantage point for identifying prey—it is likely position bore symbolic significance because they did not usually live in the immediate vicinity of the decorated caves. Whatever exactly the balance

between practical and symbolic considerations, it seems likely that a relationship to the environment outside the cave played a role in the formation of an intention to seek out and enter a cave in order to make art.⁴²

VI.B. Development of Intentions Inside the Cave

(6) Having ventured into the cave, sometimes crawling and often encountering physical obstacles while traversing a considerable distance—the first paintings at Niaux in the French Pyrenees are over 400 meters from the original entrance—an appropriate place for artistic activity is selected, perhaps returning to a place discovered during a planning trip.

The darkness of the cave, lit only partially by flickering light, limits what is perceived, especially at first. Some appreciation of the relief is likely to play a role in the initial selection of the place for the artwork, for instance, more easily observable features of the rock affording general framing conditions. Artists may also notice patches of color in the natural rock as having aesthetic potential. While such natural features may not have a direct effect on specific developments in the artist's intention—for instance, the selection of what animal to depict—they may contribute to emerging intentions.

- (7) It is possible that from the outset an artist notices the potential offered by a striking geological formation, for instance, the isolated standing rock that was minimally transformed into an upright bison at El Castillo in Cantabria. However, such instances of "direct participation" where a natural form almost wholly determines an artwork, aided by little more than artistic imagination, are very rare.
- (8) Relief is also likely to play a part in the development of composition, by which I mean that some groups of figures are arranged so as to be coherently distributed within a perceptual space framed by the rock. This does not entail a pictorial space in the art historical sense, namely, the illusion of a represented space. Moreover, "composition" here does not imply an interpretation of the meaning of spatial relations or of any supposed specific intentions lying behind what can be seen or touched, for instance, a narrative, evidence for which is extremely rare in early prehistoric art. Restricting analysis to the surviving material evidence, figures are often presented in spatial relations receptive to features of the relief.

Two examples of composition in this sense, both at Font de Gaume in the Dordogne, are the long sequence of bison in the gallery leading up to the Salon des Bisons, as well as an arrangement of bison in that small alcove itself. In both cases, the relations between the figures are significantly influenced by rock formations. In the gallery the bison follow a strong horizontal line in the rockface, while in the "Salon" bison radiate out within a roughly circular concavity.

A further remarkable example of the influence of natural framing is the rock shelter *Le Roc-aux-Sorciers* where both design and distribution of figures—female and animal—clearly respond to constraints afforded by a series of rock panels (Pincon and Geneste 2010).

If composition, in the restricted sense I have outlined, develops in relation to features of the relief, we can conclude that so too did the intentions motivating and enacting that composition.

- (9) Specific challenges and opportunities afforded by the rock are likely to come to light only on closer inspection through, for instance, playing with light sources and tactile examination of the rock. The dense engravings at Combarelles are a case in point. Particular features, even quite marked fissures with potential for contributing to depictions may only be discovered after the artist's activity has already begun, shaping the emerging intentional actions and intentional ideas, for instance in fine tuning exactly what is aimed at in portraying an animal bearing particular significance within the prevailing belief-system.
- (10) The potential afforded by finer—possibly near-invisible—fissures and bumps is likely to emerge only deep into the activity of art making.⁴⁴ At Niaux, a double series of twenty-six red dots with two claviform signs one at each end follows the line of a fine fissure high up in the Salon Noir (Clottes 2010, 156–7).

From the perspective of a philosophical analysis of intentions, some of these elements—(1) (3) (4)—qualify as background conditions, in that they are part of a broader intentional story without constituting the structure of intentions per se.⁴⁵ Others (5)—the relation to the environment outside—and (6)—selection of a site within the cave—while they could be seen as background conditions, may qualify as part of the material "situation" shaping intentions.

Intentions as ideas potentially arise at (2). They also arise, implicitly at least, at every stage from (6) through to (10) within which range the morphology of the cave plays a role. Moreover, from (7) onwards intentional ideas and intentional actions are integrated through the medium of receptivity to relief. Ideas emerge in their fullness through being enacted in response to potentialities afforded by the cave. This suggests it is highly unlikely artists entered the cave with a template that was imposed on the relief willy-nilly. The complexity of the environment is usually not such as to allow such a degree of forward planning.

We can conclude it is likely that much of the potential of the cave—facilitating and constraining—emerged only once activity was underway. If so, the relief contributed to the development of intentions—some of which were probably hatched outside the cave, as well as those arising within the cave before the work began—by affording emergent shapes and lines suggestive of something that *could* be depicted, usually without determining a particular figure that *must* be depicted. Thus, an intention arising outside the cave as in (2), even if it already aims at something quite specific, qualifies as an early version within a broader intentional story. The full structure of intentions emerges within a process of making in relation to a material situation.⁴⁶

It is even possible that the full intentional story required the perfect tense—what the intention *has been*—something that is clear only once the intention has been achieved. The dynamic relations between idea, action and situation mean that the intentional story is still in process up until the last mark is made. A fine fissure not yet observed is incorporated within the intentional action in the last stages. Although intentional actions operative in cave art qualify as a sort of "knowing one's way about," (Anscombe 1963, 89), it is also true that the full intentional import is only discovered in the course of intentional action. This is not to say that the intention is identical with its achievement: rather, the conclusion of bringing about an intention may be the only moment at which the agents realize what they have been about.⁴⁷ Seen in this way, the intention is not just something in the mind of an agent, nor is it merely a series of actions informed by and enacting an idea. It is even too simple to say that the intention requires both ideas and actions and is informed by conditions in the environment. Intentions have both transformed and been shaped through a relationship to an environment that has made possible integration of ideas and actions.

Taking up the hypothetical reconstruction I have been developing with regard to a specific example, the "Falling Cow" in the Axial Gallery at Lascaux exhibits a well-informed and convincingly accurate visualization (or idea) of the anatomy of a cow adapted—distended and distorted—into expressive form in the course of actions responding to possibilities and constraints afforded by the relief. A concavity that in the "right" lighting conditions appears convex offers the shape of the cow's belly. The angle of the concavity offers a way of presenting the cow's distinctive trajectory as "falling." This is not to say that the relief wholly determines the cow's falling position. Other falling figures—especially the nearby "upside-down horse"—suggest that this trope was significant within mythological beliefs informing the artist and that a suitable situation may have been sought in order to express a pre-existing idea. However, the material evidence shows that the realization of a mythical idea, if such there was, depended on potential afforded by the relief. The environment or situation was both natural and symbolic, that is, cultural.

The gestures of artists—for instance the falling cow, displaying skills such as drawing a line with fluency so as to create a figure full of expression and movement—not only were shaped by but also transformed a natural situation. An intention was developed through the interplay of ideas expressed in actions emerging in response to a situation that most probably was not experienced according to a binary distinction between nature and culture (Descola 2013). While neither relief nor morphology determined artistic production, within this intentional story the incorporation of rock features is not merely a background and is one of the structural conditions without which intentions exhibited in the material record of cave art could not have arisen.

VII. CONCLUDING REMARKS; THEM AND US?

Empirical archaeological research has established it is very rarely the case that relief gives most of a figure, also rare that it strongly influences the choice of a particular figure, often the case that a feature of the rock makes possible a range of different figures, while never (to my knowledge) the case that artistic production stands in no relation whatsoever to the prevailing environment of its cave. Thus, even if it is rare that relief directly determines content, such instances should be seen not as exceptions that prove the deflationary rule, but rather as exemplary of a much wider range of significant though often implicit relations between artwork and relief.

A challenge to my account arises in respect of cave art on surfaces lacking any distinctive features. Although such cases are rare, it is striking that the surface of the "Great Ceiling" at Rouffignac is extremely flat. I would argue that this is an instance where the morphology of the cave rather than features of the relief plays a decisive role. The distance between roof and floor diminished substantially at this point. (Plassard 1999, 83). The original height of the ceiling measured between 0.8 and 1.2 metres. Consequently, artists (and, possibly, viewers) would have been unable to see extremely large animal figures in their entirety. (Personal communication Frédéric Plassard) Even with the current artificially lowered floor level, one strains to take in figures. This relation between size and visibility must have been intentional and clearly arose in relation to the spatial configuration of the cave. While the content of the operative intentions cannot be established, we may conclude that an aspect of those intentions was that figures would be difficult to "take in."

A second potential counter example to my thesis arises from instances where the wall was prepared for artworks, potentially suggesting control exercised over, rather than receptivity to, a situation. One of the most striking examples is at Chauvet, where in the Salle Hilaire brown surface clay was scraped clean so as to reveal underlying white limestone that features importantly in the depicted figures. Indeed, this scraping was only part of a complex process of making, which also involved mixing surface clay with charcoal (the instrument used for making the art), as well as further scraping and engraving of exposed surfaces in the final stages (See Fritz and Tosello 2015, see also 2005, 160). Although Chauvet offers a particularly heightened example of preparing the rock face, the process of "revealing" underlying rock is widespread in cave art. For instance, the engravings at Combarelles would initially have been startlingly bright—not grey on grey as they are now—as the underlying rock was revealed in the process of engraving. But this evidence for active manipulation of the rock surface does not undermine my thesis, which is not that cave art is passively determined by the rock face and, rather, that it is developed through receptivity to the potential of the rock. Revealing a lower stratum of the rock or, even more fascinatingly, mixing upper and lower levels, is an example of the reciprocity between nature and culture, between given and making and between activity and passivity I am trying to bring to light.

A further set of challenges are posed by Whitney Davis (1996) who argues (1) typically, archaeological thinking about intention invalidly implies an *original* intentional state (99), (2) structuralist archaeological thinking prioritizes structure over particular cases (125), and (3) it is often not possible to distinguish what is taken to be intentional in archaeology from the nonintentional (109). The interpretation of cave art offered here does not imply an original intention: my idea of an "intentional story" emphasizes how intentions typically have antecedents and descendants. Second, in this article structure is a means to approach concrete cases. Finally, my analysis of the role played by relief shows how the nonintentional is taken up in a complex intentional story within which natural and cultural elements are intertwined although distinguishable.

New developments in archaeology converge with the philosophical approach developed in this paper. Ontological approaches, inspired by Philippe Descola's anthropological analysis of animism, propose a nonbinary view of relations between nature and culture. Agency and thing theories, also drawing on animism as a contrastive model to the dominant western worldview, open the way to seeing rock features as persons in the sense that individual identities can be attributed to them.⁴⁸ All of these perspectives play a role within the "Material Turn," which treats the human perspective as arising within a broader ontology of beings. In my analysis of the structure of intentions exhibited in cave art, I have argued that human intentions requiring both mental activity and embodied actions are structured in relation to nonhuman environmental factors. My approach calls for a reassessment

of relations between activity and passivity, with implications for all of the aforementioned archaeological debates.

If the analysis of the structure of intentions of cave art I have offered is compelling, then I would suggest that philosophers can learn from this prehistoric intentional story: there is something in this picture that we can recognize not just "for them" but also "for us." Despite the distance, both temporal and cultural, between our perspective and what we can learn of the late Palaeolithic worldview from the material record, I think it would be worth exploring whether the role played by situation in regard to "their" intentions bring to light a feature of intentions more generally. On the basis of my reconstruction of Merleau-Ponty's phenomenological position, it is arguable that the structure of intentions requires a relation to a nested set of situations and ultimately an environment (cultural or natural and sometimes both). Receptivity to a situation supplies not only a background but also enabling or constraining conditions through which intending and intentional actions can be conjoined. I hope my elaboration of this case study may trigger recognition of some things we share—admittedly in a different register—with our Palaeolithic siblings.⁴⁹

FIONA HUGHES School of Philosophy and Art History, University of Essex, Wivenhoe Park, Colchester, UK. Email: fhughes@essex.ac.uk

REFERENCES

Abadia, Oscar Moro. 2015. "The Reception of Palaeolithic Art at the Turn Of the Twentieth Century: Between Archaeology and Art History." *Journal of Art Historiography* 12.

Abadia, Oscar Moro, and Manuel R. Gonzalez Morales. 2020. "Art in the Making: Recent Developments the Study of Pleistocene and Holocene Images." *Journal of Archaeological Method and Theory* 27: 439–53.

Anscombe, Gertrude E.M. 1963. Intention. Harvard University Press.

Aujoulat, Norbert. 2005. The Splendour of Lascaux: Rediscovering the Greatest Treasure Of Prehistoric Art. London: Thames and Hudson.

———. 2013 (2004). Lascaux Le Geste, L'Espace Et Le Temps. Paris: Seuil.

Bahn, Paul G. 2010. Prehistoric Rock Art: Polemics and Progress. Cambridge University Press.

Binford, Lewis R. 1962. "Archaeology as Anthropology." American Antiquity 28 (2): 217–25.

Bratman, Michael E. 1999 (1987). Intention, Plans and Practical Reason. Harvard University Press.

——. 2009. "Intention, Belief, and Instrumental Rationality." In *Reasons for Action*, edited by David Sobel and Steven Wall, 13–36. Cambridge University Press.

Carroll, Noël. 2009. "Interpretation and Intention: The Debate Between Hypothetical and Actual Intentionalism." Metaphilosophy 31 (1–2): 75–95.

Clarke, Andy. 2013. "Whatever Next? Predictive Brains, Situated Agents, And the Future of Cognitive Science." Behavioral and Brain Sciences 36(3):1–73.

Clottes, Jean. 2010. Les Cavernes de Niaux: préhistorique en Ariège-Pyrénées. Paris: Errance.

———. 2011. Pourquoi L'Art Préhistorique. Paris: Gallimard.

— 2018. "European Palaeolithic Rock Art and Spatial Structures." In *The Oxford Handbook of Archeology and Anthropology of Rock Art*, edited by Bruno David and Ian J. McNiven, 397–409. Oxford University Press.

Clottes, Jean, and David Lewis-Williams. 1996. Les Chamanes de la Préhistorique: Transe Et Magie Dans Les Grottes Ornées. Paris: Seuil.

Cooney, Gabriel. 2000. Landscapes of Neolithic Ireland. London: Routledge.

David, Bruno, and Ian J. McNiven, ed. 2018. *The Oxford Handbook of the Archaeology and Anthropology of Rock Art.*Oxford University Press. https://www.oxfordhandbooks.com/view/10.1093/oxfordhb/9780190607357.

Davidson, Donald. 2001. Essays on Actions and Events. Oxford University Press.

Davis, Wayne A. 1984. "A Causal Theory of Intending." American Philosophical Quarterly 21(1): 43-54.

Davis, Whitney. 1996. Replications: Archaeology, Art History, Psychoanalysis. Pennsylvania State University Press.

Descola, Philippe. 2013. Beyond Nature and Culture. Translated by Janet Lloyd. University of Chicago Press.

Fritz, Carole, and Tosello Gilles. 2005. "Les Dessins Noirs de la Grotte Chauvet-Pont-D'Arc." Bulletin de la Société Préhistorique Française 102(1): 159–71.

— 2015. "From Gesture to Myth: Artists' Techniques on the Walls of Chauvet Cave." Palethnologie 7: 208–314. Fuentes, Oscar. 2013. La forme humaine dans l'art magdalénien et ses enjeux. Approche des structures élémentaires de notre image et son incidence dans l'univers symbolique et social des groupes paléolithiques. Doctoral Thesis, Université Paris 1: Panthéon Sorbonne.

Gombrich, Ernst H. 2002 (1960). Art and Illusion: A study In the Psychology of Pictorial Representation. London: Phaidon.

Hamilton, Andy. 2008. "Intention and the Authority of Avowals." Philosophical Explorations 11: 23-37.

Helvenston, Patricia, and Paul Bahn. 2006. "Science ou pure spéculation? Réfutation des thèses concernant les hallucinogènes et l'art pariétal paléolithique." In Chamanismes et Arts Préhistoriques: Vision Critique, edited by

Michel Lorblanchet, Jean-Loïc Le Quellec, Paul G. Bahn, Henri-Paul Francfort, Brigitte Delluc Brigitte, and Gilles Delluc, 52–67. Paris: Errance.

Hodder, Ian. 2012. Entangled: An Archaeology of the Relationships between Humans and Things. Oxford: Wiley-Blackwell.

Hughes, Fiona. 2007. Kant's Aesthetic Epistemology: Form and World. Edinburgh University Press.

— 2013. "A Passivity Prior to Passive and Active: Merleau-Ponty's Re-reading of the Freudian Unconscious and Looking at Lascaux." Mind 122: 419–50.

———. 2017. "Reversibility and Chiasm: False Equivalents? An Alternative Approach to Understanding Difference in Merleau-Ponty's Late Philosophy." *British Journal for the History of Philosophy* 24(2): 1–24.

Husserl, Edmund. 1970 (1954). The Crisis of the European Sciences. Translated by David Carr. Northwestern University Press.

——. 1973 (1939). Experience and Judgment. Translated by James S. Churchill and Karl Ameriks. London: Routledge and Kegan Paul.

———. 1990 (1907). *The Idea of Phenomenology*. Translated by W. P. Alston and G. Nakhnikian. London: Kluwer. Ingold, Tim. 2011. *Being Alive: Essays on Movement, Knowledge and Description*. London: Routledge

Jaillet, Stéphane, Jean-Jacques Delannoy, Julien Monney, and Benjamin Sadier. 2018. "3-D Modelling in Rock Art Research: Terrestrial Laser Scanning, Photogrammetry, and the Time Factor." In The Oxford Handbook of the Archaeology and Anthropology of Rock Art, edited by Bruno David and Ian J. McNiven, 811–32. Oxford University Press. doi:10.1093/oxfordhb/9780190607357.013.45

Jones, Andrew M. 2017. "Rock Art and Ontology." *Annual Review of Anthropology* 46:167–81.

Jones, Andrew M., and Marta Díaz-Guardamino. 2018. "Enigmatic Images from Remote Prehistory: Rock Art and Ontology from a European Perspective." In *The Oxford Handbook of the Archaeology and Anthropology of Rock Art*, edited by Bruno David and Ian J. McNiven, 481–502. Oxford University Press. doi:10.1093/oxfordhb/9780190607357.013.52

Kant, Immanuel. 1987. Critique of Judgment. Translated by W.S. Pluhar. Indianapolis: Hackett.

Kiverstein, Julian, Ludger van Dijk, and Erik Rietveld. 2021. "The Field and Landscape of Affordances: Koffka's Two Environments Revisited." *Synthese* 198:2279–96. doi:10.1007/s11229-019-02123-x

Langton, Rae. 2004. "Intention as Faith." In Agency and Action: Royal Institute of Philosophy Supplement 55, edited by John Hyman and Helen Steward, 243–58. Cambridge University Press.

Latour, Bruno. 1993. We Have Never Been Modern. Harvard University Press.

Leroi-Gourhan, André. 2018. Gesture and Speech. Translated by Anna B. Berger. MIT Press.

Lewis-Williams, David. 2002. The Mind in the Cave: Consciousness and the Origins of Art. London: Thames & Hudson. Lewis-Williams, J. D., and T. A. Dowson. 1988. "The Signs of All Times: Entoptic Phenomena in Upper Palaeolithic Art." Current Anthropology 29: 201–45.

Lorblanchet, Michel, Jean-Loïc Le Quellec, Paul G. Bahn, Henri-Paul Francfort, Brigitte Delluc Brigitte, and Gilles Delluc (eds). 2006. Chamanismes et Arts Préhistoriques: Vision Critique. Paris: Errance.

McIntyre Ronald, and David Woodruff Smith. 1989. "Theory of Intentionality." In *Husserl's Phenomenology:* A Textbook, edited by J.N. Mohanty and William R. McKenna, 147–79. Washington, DC: Center for Advanced Research in Phenomenology and University Press of America.

Merleau-Ponty, Maurice. 1964. "Eye and Mind." In *The Primacy of Perception*, edited by James M. Eddie, 159–90. Translated by Carleton Dallery. Northwestern University Press.

———. 2002. Phenomenology of Perception. Translated by Colin Smith. London: Routledge.

——. 2003. Nature: Course Notes from the Collège de France. Translated by Robert Vallier. Northwestern University Press.

— 2010. Institution and Passivity: Course notes from the College de France (1954–5). Translated by Leonard Lawlor and Heath Massey. Northwestern University Press.

Olsen, Bjørnar. 2010. *In Defense of Things Archaeology and the Ontology of Objects*. Lanham: Rowman & Littlefield. Paillet, Patrick. 2006. *Les Arts Préhistoriques*. Rennes: Éditions Ouest-France.

Pinçon, Geneviève, and Jean-Michel Geneste. 2010. Art Rupestre: La 3D Un Outil de Médiation du Réel Invisible. In Sutu 13; https://journals.openedition.org/insitu/6411

Porr, Martin, and Hannah Rachel Bell. 2012. "'Rock-art', 'Animism' and Two-way Thinking: Towards a Complementary Epistemology in the Understanding of Material Culture and 'Rock-art' of Hunting and Gathering People." *Journal of Archaeological Method and Theory* 19: 161–205.

Plassard, Jean. 1999. Rouffignac Le Sanctuaire des Mammouths. Paris: Seuil.

Reader, Soran. 2013. "Agency Patiency and Personhood." In A Companion to the Philosophy of Action, edited by Timothy O'Connor and Constantine Sandis, 200–8. Oxford: Wiley-Blackwell.

Schwitzgebel, Eric. 2019. "Belief." Stanford Encyclopaedia of Philosophy, edited by Edward N. Zalta. https://plato.stanford.edu/entries/belief/.

Tilley, Christopher. 1994. A Phenomenology of Landscape: Places, Paths and Monuments. Oxford/Providence: Berg. Usó-Doménech, J. L., and J. Nescolarde-Selva. 2016. "What are Belief Systems?" Foundations of Science 21: 147–52. Vialou, Denis. 1996. Au Coeur de la Préhistoire: Chasseurs Et. Paris: Gallimard.

Wittgenstein, Ludwig. 1963. Philosophical Investigations. Translated by G. E. M. Anscombe. Oxford: Basil Blackwell.

END NOTES

- 1 Discussion of "cave art" in this article refers to the late Palaeolithic period unless otherwise signaled. Nonetheless, there is clearly some continuity with later prehistoric rock art, which I sometimes mention.
- 2 Consequently, I do not enter into the debate in aesthetics between actual and hypothetical intentionalists, which operates in the reverse direction: from intentions to the *meaning* of artworks; see Carroll (2009).
- 3 Binford (1962) is seminal for this approach.
- 4 See, for instance, Hodder (2012).
- See Ingold (2011 213–4) for an insightful, though brief, exception.
- 6 Critical assessment of these binary distinctions features prominently in contemporary archaeological debates on the "Material Turn" (Ingold 2011), the "Ontological Turn" (Jones 2017), agency (Latour 1993) and Thing Theory (Olsen 2010).
- Insufficient attention has been paid in the archaeological literature to the contrast between the phenomenological approaches of Heidegger and Merleau-Ponty. Merleau-Ponty's approach with its explicit focus on situation as not only cultural but also natural, alongside the attention he pays to the reciprocal constitution of subjectivity and objectivity is particularly helpful for prehistoric archaeology where material culture is embedded in the natural world.
- 8 "Before Present" (BP) is the convention used by archaeologists to date prehistoric time from a benchmark of 1950. "Cave art" in the late Palaeolithic comprises paintings and engravings, but also finger fluting, bas reliefs, and, more rarely, sculptures. Art discovered on rock outside caves, for instance, in rock shelters, as well as portable art and personal ornaments found on many of the same sites belong to the same tradition (Abadia 2015).
- 9 Contrary to what used to be received opinion, human figures are part of the repertoire of cave art. However, they are comparatively rare, frequently discretely positioned and often schematic. See Fuentes 2013.
- 10 Techniques allowing examination of the 3D character of cave art include photogrammetry and laser scanning. See Jaillet et al. (2018). On Reflectance Transformation Imaging (RTI), see Jones and Díaz-Guardamino (2018).
- 11 The use of relief in cave art is difficult to see in two dimensions. For an experience in 3D of Chauvet Cave see Werner Herzog's film *Cave of Forgotten Dreams* (2010, Doc Club Studio).
- 12 See, for instance, the "Ice Age Art" exhibition in the British Museum in 2013.
- 13 See also Porr and Bell on the "fetishization" of an essentialist view of animism, arguing this excludes contemporary holders of animist worldviews from academic discourse, instead of addressing the need to reassess that discourse (2012, 163–4).
- 14 See also numerous (critical) discussions of Shamanism in David and McNiven (2018).
- 15 Cave art is only comparatively speaking 2-D. The use of relief renders it 3-D.
- 16 See Lorblanchet et al. (2006); Vialou (1996).
- 17 See also Helvenston and Bahn (2006).
- 18 Lewis-Williams wrongly treats all aesthetic assessment of cave art as reducible to the "art for art's sake" theory that he, rightly, dismisses (2002, 42–5).
- 19 The term art' can be used to define a restricted and privileged range of production. However, it can also be used, as it is here, to point to a creative activity that can take a wide variety of forms. While we certainly should avoid projecting our values onto those of others and other times, to speak of 'art' and the 'aesthetic' does not entail restriction to European or any other culture. Especially important in relevant discussions around "art" is a recent emphasis on making, that is, on the process rather than just on the final product of art. For a history of this and other aspects of the fate of the category of "art" within the archaeological context, see Abadia and Morales (2020).
- 20 Page numbers to the English (2005) and French (2013) edition are almost always identical. I will only signal when there is a discrepancy.
- 21 One example provided is Lascaux's Hall of the Bulls, the horses from which feature prominently in Aujoulat's "seasonal order" thesis. See below
- 22 Compare Hamilton on "the mistaken assumption that what I intend and what in fact I will do are separate matters" (2008, 26).
- 23 See Leroi-Gourhan (2018) for a classical archaeological analysis of gesture and action
- 24 Anscombe (1963, 8) argues that most things we do are intentional, while intentional actions require no observation and, possibly, no reflection.
- 25 For the idea of purposiveness, see Kant on the distinction between aesthetic pleasure and the pleasures associated with both sensory desire and desire for the good (1987, AA 221; see also AA 205–9). See Hughes (2007, 197).
- 26 The aesthetic status of cave art is omitted by Aujoulat and rejected by Lewis-Williams.
- 27 For an interesting discussion of belief systems, see Usó-Doménech and Nescolarde-Selva (2016).
- 28 See Usó-Doménech and Nescolarde-Selva (2016).
- 29 For a potentially related issue, see Bratman (1987, 20) on partial plans.
- 30 See Anscombe on the "special" status of the "Why?" question (1963, 28).

- 31 See also Anscombe's comment that Wittgenstein has "gone wrong" in speaking of the "natural expression of an intention" in *Philosophical Investigations* §647 (1963, 5).
- 32 See, in particular, the implication that neither casting a shadow in a rockery (Anscombe 1963, 37–8) nor causing a window to focus a light patch on a wall (51) would qualify as intentional. I do not disagree with Anscombe's conclusions about these examples, but I contest that such examples do sufficient justice to the complex relations between human actions and natural phenomena.
- 33 See McIntyre and Smith (1989, 174).
- 34 Chaplin Modern Times (1936). In this black and white film the color of the flag is implied, not shown.
- 35 See also Merleau-Ponty (2003).
- 36 See also Merleau-Ponty (2010) and Hughes (2013). For a comparable approach in the philosophy of action, see Reader (2013).
- 37 For recent work in "radical embodied cognitive science" drawing on Merleau-Ponty, see Kiverstein, van Dijk, and Rietveld (2021) especially on the roles played by environment, landscape and field. Enactivism and Predictive Coding makes copious use of ideas of environment, context and field. For a useful survey see Clarke (2013). However, the focus on causality in these approaches is distinct from Merleau-Ponty's emphasis on "motivation" and meaning (sens) rather than cause.
- 38 The relation between intentions and intentionality is usually implicit in Merleau-Ponty's account. The closest he comes to a definition of intentions in relation to intentionality, as far as I can see, is when he says that an intention supposes an aim [visée], that is an orientation towards something (2002, 499).
- 39 For the classic account of the intentionality of consciousness, see Husserl (1990).
- 40 Cultural transmission will also have played a role in the situation in relation to which cave art arose. I am grateful to Camille Walker for highlighting this point.
- 41 Niaux is an example of the first, while Altamira is within sight of an imposing mountain.
- 42 See Cooney (2000), and Tilley (1994) for parallel discussions in relation to the Neolithic.
- 43 The usual exception mentioned is the "scene" from the Pit at Lascaux. See also a deer licking the nose of another at Font-de-Gaume. Fritz and Toselli (2015) make a convincing case for the pervasiveness of representations of hunting by predatory animals at Chauvet.
- 44 A crevice or fissure can be seen as a threshold or turning point. See Hughes (2017).
- 45 Such background conditions are distinct from what Anscombe calls the "preintentional," for instance, the contraction of a muscle necessary for an action. Thus defined, the preintentional does not show up within the intentional story even though, (as she says, it) contributes to the guarantee "that *an* intention is performed" (1963, 28).
- 46 Drawing on Ingold (2011), Porr and Bell remark on the "dynamic dialogue with the material," in which both skilled practitioner and the material worked on "shape each other". Seen in this way, intentions and ideas "are not imposed onto the materials, but rather they are constantly adjusted during the process of making" (2012, 186–7).
- 47 Nor that the final description "swallows up" previous descriptions of an intentional action as Anscombe (1963, 46–7) argues. The structural analysis I am proposing is not only diachronic but also synchronic in that ideas, actions and relief interact and are not merely serial.
- 48 According to Thing Theory, which is indebted to Heidegger's distinction between things and objects, attributing agency—understood as synonymous with action—alongside intentions to things is permissible. See Olsen (2003, 100). The standard philosophical account of agency (following Davidson and Anscombe) is as a person's capacity to act intentionally.
- 49 I would like the thank all of the following for their very helpful input: Kathinka Evers, Marie Guillot, Guido Kreis, Marie McGinn, Monique Veyret, the editors and two anonymous readers for the journal. I am also grateful to many individuals who have generously supported my broader project during visits to the following institutions: l'Institut d'archéologie, l'Institut d'histoire de l'art et de muséologie, Fondation Borel (University of Neuchåtel, Switzerland); Centre National de Préhistoire, Périgueux; Musée Nationale de Préhistoire and Pôle internationale de la Préhistoire, Les Eyzies-de-Tayac, France.