

World rock art, by JEAN CLOTTES, translated from the French by Guy Bennett. 2002. Conservation and Cultural Heritage Series, The Getty Conservation Institute, Los Angeles; 144 pages, 150 colour and 5 monochrome plates. Paperback, US\$29.95, ISBN 0-89236-682-6.

'Wipe that line away and that distant human being is, in a very real sense, expunged as well' (p. 136). This eloquent warning is not restricted to the general audience this book potentially targets, but to everyone who comes into contact with anthropogenic traces and artefacts from the past. What Dr Jean Clottes has done is to raise the warning flag for a wider readership. The dissemination of information regarding the conservation of anthropic manifestations can only be rewarded with praise. As is expected from the publisher, this well-illustrated and informative review of world rock art is geared towards a wider readership and is primarily about the critical state of conservation of what is perhaps our most endangered (pre)historical inheritance. To paraphrase a statement made by the Getty Museum on their web-page, the preservation of the world's archaeological resources ultimately depends upon our efforts to integrate conservation into the practice of archaeology. As we all know, the conservation of sites is not restricted to archaeologists. but expands to local and national administrations and especially the general public. The formula is simple: the higher the awareness, the lower the cost of conservation.

Throughout the book, one can find interesting case studies, which sample the variety of landscapes and styles that constitute this unique inheritance on a global scale. Clottes covers sites in Africa, Australia, the Americas, Europe, the Middle East, China and Oceania. The author, as we shall see, subtly raises important issues without presenting them as a rhetorical tour-de-force for the experts, but keeping the flow of information at a simple and intelligible pace. To sensitise (and still entertain) the reader, Clottes has attractively compartmentalised his work into seven chapters. While the conservation aspects and the preventive measures are the running theme throughout the chapters, I personally found the chapter on 'interpretation' to be the most developed, engaging and engaged.

The first chapter opens the discussion with a series of reflections on the fragmented nature of our knowledge about rock art. What Clottes makes absolutely clear is the fact that this body of behavioural and cognitive evidences 'offers a unique window into the past, all the more tantalising for their own mysterious beauty' (p. 12). This attraction to the tangible traces of an exotic other from a forgotten past has to be carefully monitored. In the name of 'archaic revival' many abuses have been perpetuated by ruthless vandals, enthusiastic scholars and pseudo-archaeologists. This window into the past is a fragile structure whose windowpanes can be easily shattered and expunged. It is therefore our duty to inform and preserve. Clottes concludes this first chapter by marshalling the following advice: '... the general public must be informed of the value rock art holds for humankind and of the absolute need for its preservation' (p. 14).

In the second chapter, Clottes is primarily concerned with the role of context and environment in the production of rock art on a global scale. Indeed, his emphasis on situated-ness as a key component in the understanding of rock art elevates the discourse to a hermeneutic level where the interpretation of the iconographic phenomenon becomes a complex articulation of factors. The role of the environment becomes as crucial as the role of the image itself in the attempted interpretation. The chapter concludes with a brief discussion on two current methodologies applied in rock art research: the archaeological process and the ethnographic analogy. In other words, rock art research relies on two distinct processes:

- the empirical, analytical and quantitative;
- the analogical and speculative.

These two processes are inherent to an investigation whose body of evidence is both a signature of presence and absence. The techniques and traditions which, according to Clottes, lasted until 1964, are today 'sedimented' and fossilised practices. To jump ahead, Clottes makes an important contribution to a discussion that expands way beyond the targeted readership by questioning the role of the archaeologist in relation to rock art (p. 102).

- Is it to study empirically the process of manufacture and the quantitative recurrence of characteristic phenomena?
- Is it to try to situate the investigated rock art on a (pre)histori-cal time line?
- Is it to establish structural links based on analogous manifestations in unconnected places?
- Is it to interpret, that is, to exercise a hermeneutic license, which will be subjective and speculative?

The debate is open. As for analogies, I fully endorse the author's position, which is that without comparative analysis based on ethnographic evidence, 'rock art would all too often remain a beautiful but baffling testimony to the beliefs and worldviews of vanished cultures' (p. 35).

Chapter three opens with the thorny question of dating techniques. This is a problem Clottes knows well and has recently been confronted with (see the recent article by Paul Bahn and Pettitt [2003], where the authors argue that archaeologists must be more cautious with carbon-derived data, and more specifically, they put into question the dates for Chauvet on the basis that these dates were provided by a single laboratory). Obviously, radiocarbon dating has limitations and is not irreproachable. The point raised by Bahn and Pettitt is crucial not just in terms of chronology and stylistic progression, but also in terms of cognitive development. Clottes offers the expected alternative to radiocarbon dating with three indirect forms of dating. But, as is well known, even these processes present weaknesses and can only provide a relative indication of age. Clottes warns about the precariousness of stylistic characteristics, superimposition and chronologies. This leaves us with a reliance on carbon dating (the application of which in rock art research is still an embryonic process and cannot provide fully reliable empirical data about the age of an anthropic manifestation on a lithic support). This particular area of rock art investigation will need some technological and methodological improvements before it can satisfy the critics, and remove the patina of scepticism that has discredited the discipline in a variety of social science circles. The obsession to determine the oldest rock art is understandable, but at this stage of our investigation seems to be an unattainable lure. Perhaps our efforts should be concentrated in conservation and providing theoretical frameworks for the voluminous data that have already been gathered but unfortunately are scattered all over the place. To jump ahead once again, Clottes hints at a proposal for a centre for world rock art where specialists could 'develop standardized protocols in the collecting and managing of such documentation; it would disseminate information to be used for exhibits, preservation and research' as well as archiving the documents in 'the best possible conditions' (p. 136).

The notion of 'place' as an important factor in the production of rock art is revisited in Chapter 4. Clottes rightly specifies that 'it is meaningless to isolate paintings and engravings from their natural settings' (p. 59). This is a subtle blow to many monographs and articles where images or panels have been neutralised by artificial extractions and subjectively presented as an autonomous manifestation. This process has been harmful to our understanding of rock art. The image is not independent from its support, the support cannot be isolated from the environment and the environment is a collage of geologic biographies where the traces of anthropic passages have been 'sedimented' in the landscape. To frame one of these components as if it were independent sterilises the investigation and reifies the component's function to a constructed material existence (the so-called artefact). This is what museums do, and contrary to popular belief, rock art is not a 'musée des roches', but rather an open-air library with the most impressive collection of 'rare books'. The environment provides the architectonics for the strategic placement of these 'books', and the true conservation effort is to present the landscape as such. The chapter progresses with a typology of supports and comprehensive descriptions of the techniques employed in the manufacture of these engravings, paintings, drawings, 'sculptures' and even geoglyphs.

Chapter five presents the necessary classificatory process for the variety of parietal themes both in open air and in caves. The thematic classification is expectedly broad and is obviously written with a wide readership in mind. Of interest is the discussion about the absence of naturalistically rendered human form in caves (mostly faces and anatomical segments) in contrast to the abundance of fully developed and easily recognisable depictions of humans in the rock art iconography. In fact, what has been often classified as 'anthropomorphic' is therianthropes (subject presenting both animal and human attributes). Except for a few exceptions, there is an undeniable absence of human representation in Palaeolithic European cave iconography. This phenomenon was thoroughly discussed by Ucko and Rosenfeld (1972) in a seminal article titled Anthropomorphic representations in Palaeolithic art. The discussion was then recently taken a great deal further by Jean-Louis Schefer (1999) who wrote that 'La pierre angulaire du sysème figuratif reposent bien sur l'absence thématique d'une figuration humaine pleinemnet configurée' (p. 30). This discussion is about absence, but also about what Clottes has beautifully described as 'the permeability of boundaries between the human and animal worlds' (p. 83). And this to me is the true cornerstone. The omnipresent animistic feeling which seems to run throughout the 25 000 years of Pleistocene ideologies becomes tangible in the extant corpus of cave and open-air iconography.

As for the universality of themes, the key word is caution. To connect and link is a very rewarding exercise but also it can lead the discourse into a trivialisation of a corpus which, as far as we know, might have nothing in common and shares a completely different ideological framework. The problem of trivialisation is a syndrome that creeps in whenever similarities are found in distant clusters of images. This is unfortunately what regularly occurs with the discussions about the so-called 'signs'. Not only the word 'sign' is a misnomer, but also it implies a semiotic function which might or might not be there. The attempt at classifying semiotically a large body of iconographic manifestations into one 'taxonomic' category is as precarious as bypassing them altogether on the premise that they are undecipherable.

Chapter six is most engaging. Here Clottes feeds the reader with a substantial meal. On the menu: variations on some hermeneutic themes. A lot could be written in response to this particular chapter. To begin we could question the validity of a hermeneutic discourse in relation to inert anthropic manifestations. What sort of contribution does a discussion on 'interpretation' contribute to our investigation? Should we be satisfied with quantitative analysis and generic classifications? Hermeneutics is where the archaeologist dissolves into the philosopher and momentarily puts aside the empirical. Hermeneutics is intrinsically speculative (especially when discoursing on fossilised practices). The reliance on informers with the 'significant problem of the mutability of important oral traditions' (p. 103) as well as the biased subjectivity inherent to the process of transmission is a gentle blow to ethnography. But pessimism fragments when one shifts from the utopian quest for 'meaning' into a more pragmatic (and phenomenological) investigation about 'function'. The questions then become:

- What role does the image play in the transformation of a random space into a codified place?
- How are these clusters of images laid out on the social landscape?
- What is their role in disseminating knowledge?
- Is there an obvious exoteric and esoteric dimension embedded in the image?
- Can we detect the presence of 'routes' (socio-economic networks) for which rock art becomes landmarks?

These questions can be investigated thoroughly. Rock art may have different function as well as different meaning according to the 'reader'. In this plurality of function and meaning, the best one can do is to establish an exhaustive list that should never be presented as final and from which hypotheses can be posited. Only then can the process of interpretation be validated as empirical and regarded as a true contribution to our discipline.

To conclude this (admittedly abstract) discussion, I wish to present Clottes' *artificial divisions* of the current hermeneutic trends which, in my mind, are based in an unacknowledged phenomenological methodology (p. 107–112). It begins with 'the affirmation of presence' whereby the iconography represents:

- 1. the ontological signature of presence even in the face of absence;
- 2. a territorial claim; the existential 'scarifications' from liminal passages and transient stages.

Following this 'sedimented' claim for 'presence' is the concept of '*a testimony*' where the iconography is perceived as:

- 1. a message;
 - 2. mnemonics (for whom?);
 - 3. (pre)historical narratives (especially in the context of the colonial period);
 - 4. sorcery (although Clottes offers no evidence for this);
 - a recording of the social practices such as initiations and rites of passage;
 - 6. mythogenic structures out of which the myths were extracted and 'performed'.

The testimony, Clottes argues, will then be helpful in '*influencing the world*' (a terminology which might be perceived as

a little too Castanedian perhaps), thus helping the iconographic manifestations to become:

- 1. a preventive measure against the vagaries of life;
- a system of communication manufactured with the intention to preserve and enforce social practices, traditions and conventions;
- a body of information which requires to be maintained and/or re-activated;
- 4. the revival of a message embedded in the images.

These artificial divisions, I will suggest, offer a grid of interpretation that is phenomenological in its ontological determinism. Regarding the question of shamanistic evidence in the production and use of rock art, the issue is, as we all know, sensitive and I will only briefly discuss it. Suffice to note that when Clottes suggests the shamanistic interpretation, he admits that 'shamanism, of course cannot explain all of world rock art, which has a multiplicity of meanings' (p. 112). This phenomenological twist is welcomed and, in a way, re-situates the debate into a less tautological ground—leaving plenty of space for healthy discussions to come.

The seventh and last chapter is actually the chapter which discusses conservation per sé. Rock art is an endangered heritage and our efforts to preserve this rapidly vanishing inheritance are, in most cases, a futile battle to salvage the ephemeral. Against the factors contributing to the rapid destruction, we have only a limited number of preventive solutions. Among these factors, we find the exposure to harsh conditions (erosion) in open air and in the caves after discovery. The animal rubbing against the rock surface results in a premature crumbling of the surface. As for human 'contribution' to the deterioration of rock art on a global scale, intentional procedures such as chalking, wetting and a variety of vandalistic behaviours are attempts at robbing us of a priceless inheritance and are condemnable acts. But the worst is perpetuated in the name of human greed where concerns for the preservation (and respect) of rock art areas are of no concern in the face of economic growth (see the Dampier case in Australia).

To conclude, I want to reiterate the need for publications of this nature that are effective ways to heighten public awareness about rock art and the problems this invaluable cultural inheritance faces. Despite definitional and methodological differences, all the parties in the discipline of rock art research should join in with Jean Clottes' efforts to sensitise the public and salvage what is left of this ancestral way of communication (if anything else), and to enforce the notion that wiping 'that line away and that distant human being is, in a very real sense, expunged as well' (p. 136).

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REFERENCES

- BAHN, P. and P. PETTITT 2003. Current problems in dating Palaeolithic cave art: Candamo and Chauvet. *Antiquity* 77: 134–41.
- SCHEFER, J.-L. 1999. Questions d'art paléolithique. Edition P.O.L, Paris.
- UCKO, P. J. and A. ROSENFELD 1972. *Anthropomorphic representations in Palaeolithic art*. Simposio International de Arte Rupestre, Santander.

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Landscapes, rock-art and the Dreaming: an archaeology of preunderstanding, by BRUNO DAVID. 2002. Leicester University Press, London, 235 pages. Hardcover, ISBN 0-7185-0243-4.

Bruno David's book is the third title in the series, *New approaches to anthropological archaeology*, edited by Thomas E. Levy. Levy promises a text that 'differs from much theoretical discourse in archaeology today in that it is dedicated to publishing work firmly grounded in archaeological fact, *while also venturing to explore more speculative ideas about how cultures evolve and change* [emphasis mine]' (p. xi). It offers all the expected features of a scholarly work, including lists of figures and of tables, a preface, an extensive bibliography and an index. After the introduction, the text is divided into Part I, 'The present past', and Part II, 'Presenting the past'. The plentiful images are all in black and white, a minor detraction.

How refreshing it is to read a text by an author whose primary concern is to understand the *human beings* who created the rock art, not to just count, classify and describe the images. David writes in his Preface,

> ... I wanted ... to write an Aboriginal history with people, as sentient and sensual beings living in a meaningful, engaged and engaging world ... Nevertheless, the history that I write is written through a Western sociological lens, and in this sense represents in the first instance a commitment to Western authorship in dialogue with Aboriginal worldviews, rather than a commitment to the experience of Aboriginal being. This is very much an etic rather that an emic thesis (p. xi).

A more accurate name for the book would have been to reverse the phrases in the existing title, since David consistently ties all of his arguments back to the concept of preunderstanding, sometimes in a less-than-elegant manner.¹ Coined by Hans-Georg Gadamer, this term refers to 'the initial conceptual conditions through which people interpret their world ...' (p. 3). All in all, David draws upon hermeneutics, structuralism, semiotics, Gadamer (particularly the concept of preunderstanding), Derrida's notion of *différance* and archaeology to discuss Aboriginal rock art and culture. As David explains,

> Rock-art is used to explore these themes [archaeology of the Dreaming and preunderstanding] as it is one of the most abundant, and most visual, of all archaeological remains. What I wish to show in the following pages is that Australian rock-art and other aspects of the cultural landscape can be used to investigate patterns of change and continuity in the way people engaged in their worlds, particularly as it relates to the Dreaming as known from recent times (p. 8).

Notice how he hyphenates 'rock-art'. I will return to this point later.

David has two aims in this book: (1) confrontation of the antiquity of the ethnographically known Dreaming of Australia, and (2) reflections on Western constructions of the historicity of the ethnographically known Dreaming (pp. 3–4). Through chronological evidence of rock art and archaeology, he ends up proving that modern expressions of the Dreaming are relatively recent. I cannot speak to the accuracy of the archaeology in this text, but his arguments are well constructed and convincing. My only question with the archaeology is why he selects different regions to make

¹ The edition I was able to obtain of Gadamer's *Truth and Method* (Trans. By Joel Weinsheimer and Donald Marshall, New York: Crossroad, second revised edition) translated this term as 'fore-understanding'.

his case, sometimes explaining the limiting factors that affect this decision, but not always. He does not, nor does he ever promise to, survey the continent in order to support his thesis.

Part I, 'The present past', consisting of five chapters, begins with a history of Western scholarship that led to the popular formulation of the concept known as the Dreaming. Aborigines' conception of the Dreaming links them to the landscape. As David discusses, 'It is through the Dreaming that place is conceived and understood, and it is by reference to the Dreaming as law that what can and cannot happen at a place is determined ... It is a way of giving geographical space meaning, of mapping the experienced world' (p. 25). Chapter 3, 'Placing the Dreaming: the archaeology of a sacred mountain', is where David really focuses on place theory. Here he defines space and place, but only cites other authors to define centre. Many of his ideas parallel those of Yi-Fu Tuan, although this scholar's work is not listed in the bibliography (please see *Suggested Readings*). He also discusses Henri Lefebvre's notions of social place:

It is thus not just an outside world that we map in geographical space, but rather *territory*, as already owned, contextualized and continuously renegotiated space. History is positioned to address not so much the nature and dynamics of outside realities, but of people's relationships with their surroundings as fields of experience. History, like geography, is about tracing landscapes of engagement (p. 31).

To distinguish social place from other types, David puts the terms in quotes, i.e. 'natural' places, a practice he never really defines. He folds place theory and archaeology together when he summarises his approach:

> To get to an archaeology of the Dreaming of ethnographic times (as ontology that informed recent human behaviour) —to trace its antiquity—I focus on three of its material expressions: (1) regional behaviour as traced by virtue of a *place*'s Dreaming significance; (2) *ritual* behaviour as it relates to historically documented Dreaming beliefs; and (3) *symbolic* behaviour as it relates to the land as marked, through rock-art, by recent Dreaming beliefs (p. 27).

By twining together these three lines of evidence, he creates what Taçon and Chippendale have called a 'cable' of reasoning. He is most diligent in pointing out alternative theories, some of which contradict his own.

For his analysis of regional behaviour, he discusses several archaeological sites in the Cape York region of Australia to illustrate his ideas (pp. 33-44). What he reveals in his analysis of the Ngarrabullgan area is that humans have lived on and near this mountain since the earliest periods of habitation in Australia, but that rockshelters on the mountain cease to be used after c. 1300 C.E. Occupation at all the other sites in the mountain's neighbour-hood continues until the period of European contact. He concludes: 'Why the change in people-land relations around the fourteenth century C.E. I do not know. One implication, however, is that it involved a change in systems of meaning relating to place. The archaeological changes suggest that Ngarrabullgan attained new cultural significance' (p. 46). He suggests the 'new cultural significance' may be linked to a change in cultural practices associated with the Dreaming. Following a similar process, David analyses modern ritual behaviour, focusing particularly on the Arrente Native Cat Dreaming.

David's discussion of the symbolic behaviour associated with Dreaming is where Gadamer's concept of preunderstanding and Derrida's notion of *différance* become particularly important. Symbolism, especially visual signs such as are found in rock art, is a physical fragment of human interpretation of the world around them. Gadamer's thinking about this process was limited, as David points out: 'When Hans-Georg Gadamer coined the term "preunderstanding", he had in mind a world rendered meaningful through *language*. It is, he argued, the interpretive act that enables the world to be understood, and the interpretation is linguistically mediated ...' (p. 67). But David goes on to write: 'What Gadamer does not adequately address is the power of non-linguistic *representations* in the creation of a community of culture, and the role of (non-linguistic) symbols in constructing and understanding the world ...' (p. 67). Material objects, symbols in their own right, attract humans and shape their behaviour as much as they are shaped by such. David offers the examples of the telephone or a living room chair to illustrate how objects shape human experience of their surroundings.

David spends considerable time discussing Derrida's notion of *différance*, coined to 'highlight the impossibility of fixing an understanding of what a person means when they say something in terms of a pre-existing structure of linguistic signs' (p. 68). David seems particularly interested in Derrida's concept of an 'open network of signs', in which he includes rock art, as he explains:

> Fixed in the landscape, rock-art is a highly visual, and relatively long-lasting social expression that marks the land ... In their relatively fixed emplacement, items of rock-art are spatial inscriptions, social signs in and of place. They divide the world in their symbolic marking, a marking whose meanings continuously unfold in relation to preunderstanding. Products of a socially structured, territorial world, both rock-art and place emerge as already political, as meaningfully engaged in a social world of decision-makers from the moment of their social production, a politic that is legitimated and confirmed in marking ... New rock-art practices, as forms of place marking, signal alterations of socio-geographical forces ... Because rock-art marks the land, it emblazons social relations onto the land. Rock-art materializes as inherently political, by practice if not by explicit intent. This, of course, opens various doorways into the archaeological record, in particular an opportunity to investigate territorial relations and relations of power in pre-History (p. 69).

To illustrate his ideas about symbolic behaviour—rock art—in relationship to landscape and modern Aboriginal beliefs, David draws on examples from the Wardaman area of Arnhem Land.² The examples chosen are erudite and nicely prove the point.

My only question is why he keeps shifting to different regions of Australia for his examples of different types of behaviour. For his regional discussion of place, he focused on Cape York; his analysis of ritual behaviour addresses Arrernte people of the central regions, while his discussion of archaeological trends focused along the eastern seaboard. I would have found it more illuminating if David had been able to create layers of analysis for the same regions. I am not an archaeologist, so I am not privy to what limitations David had to abide by, nor does he always adequately explain them.

In his analysis of Wardaman area rock art, David asks 'whether or not the paintings that today express the identity of the land and the Dreaming were all initially undertaken within a relatively well-bounded and identifiable time frame' (p. 74). If so, he suggests these temporal patterns would be clues to a modern system of preunderstanding, although he acknowledges that he may only be addressing the most recent expression of a much older system. He concludes: 'However, because the means of expressing a world-view is part of that very world-view, changes in expression

 $^{^2}$ He explains that the rock art of this region that has been more thoroughly investigated than many others, particularly by a team that included himself and Josephine Flood.

or manifestation imply changes in the system of preunder-standing itself' (p. 74). My question to Dr David would be, what about archaistic practices, when members of a culture deliberately copy or imitate something much older? Western examples of this would be the continuing practice of tenth-century style Byzantine painting in new Orthodox Christian churches or restorations of public buildings to eighteenth-century Neo-Classical forms. How does he account for this possibility?

Part II, 'Presenting the past', consists of four chapters. As an art historian, I found this portion sufficiently technical to surfeit me. David produces lots of charts, graphs, images of landscapes, discussion of sedimentation rates, stone artefacts, food processing strategies, and so on. David offers a well-balanced argument, often discussing contravening theories and evidence. Having argued that the Dreaming as it is known today emerged in the late Holocene, he then proceeds to discuss 'the historical conditions of its modern appearance' by examining archaeological trends, ethnographic use of seed foods and a regionalisation of rock art images (p. 113).

I found the discussion focusing on seed food processing to be particularly illuminating. This is important for several reasons, as David explains:

> A focus on Australian Aborigines as 'hunters and gatherers' reduces complex social strategies to narrow, economic categories, belittling in the process the complex relationships that exist between people and their meaningful, socially constructed worlds ... In this chapter I explore some of these implications via a consideration of changing food habits and changing domicultural practices during the mid to late Holocene. I focus on the archaeology of one major food item and its related processing technology, specialized seed grinding ... Ground-seed foods are gendered in their attainment, in their production and in their use, and in these capacities they are closely entwined with the sexual division of labour, gender roles in intra- and inter-group social relations, and territorial relationships with 'country' (pp. 155, 158).

Milling stones are the archaeologically observable evidence for his discussion of how such food resources were exploited seasonally and marked not only the social practice, but also a place. At least for those readers who do not live in Australia or are not familiar with the archaeology of this continent, such discussion is refreshing and serves to underscore David's argument.

In his final discussion of rock art, David focuses on the regionalisation of visual form. I have to make a conscious effort not to use the term 'style' since he works so hard to avoid it himself, a point to which I will return later. The essence of David's argument is that images imply metaphor. The use of metaphor can reveal much about the sensual, emotional and intellectual context in which it is employed. Rock art and metaphor are used to construct a world that overlays the physical world, as David explains:

Because landscapes are understood through symbolic representations including, by not limited to, language, and because representations are by definition metaphoric (in that they identify one thing in terms of another), understanding takes place through a process of metaphoric inter-referencing. Preunderstanding is the truth that is constructed in a total system of metaphoric relations' (p. 177).

It is this preunderstanding that David is trying to illuminate for the modern Western reader. He continues:

> Rock-art thus involves a marking of the land by people who do more than wander around a politically neutral, open landscape. As Conkey (1990, p. 15) notes in relation to art styles, what artistic practices 'can tell us about is not culture or groups per se, but the contexts in which

group or other social/ cultural phenomena are mobilized as process' (p. 179).

My only comments about David's discussion of rock art are really aimed at the larger community of scholars, rather than just picking on him. He chooses to hyphenate 'rock-art', following the suggestions of Paul Taçon and Christopher Chippendale, to distinguish his subject 'from the Western artistic programme, which is closely tied to a market economy' (p. 10, note 5). I find this small detail to be quite specious. As an art historian, I can say that much of the art created in Western history was outside of a 'market economy'. Art's relationship to a market is a modern phenomenon, post-Renaissance, and yes, definitely Western. To avoid the term 'art' in discussing all other creative endeavours in Western history before the Renaissance (some 30 000 years of it) and that created in the entire history of every non-Western culture is fallacious. But this is an argument I have with the discipline of archaeology, not with Dr David.

He explains early in the text why he hyphenates rock art but he never really addresses why he is so chary of style. Most of his terminology is about motifs, shapes and media. When he is forced to use the term 'style', he puts it in quotes. In my opinion, he makes the same mistakes as so many have done before him. He uses the time-worn practice of immediately dividing images into categories defined first by geography, then medium, and finally on a figurative/ non-figurative dichotomy. The geographic distinctions make sense in this special case because David and other scholars have discussed rock art sites with Wardaman elders, so have information about who was responsible for what regions.

But the distinctions based on medium and figurative/non-figurative cannot be so easily defended. He does report a similarity between pecked and painted images of dingoes at one site, but that is the sole exception. What I believe is missed by creating such arbitrary categories is one whole dimension of meaning and metaphor. This is like reading a text but ignoring all the words that are capitalized because they look a little different. It is my observation that this practice is derived from the archaeological method of separating stone tools from those made of wood, antler, iron or other materials. A visual representation of an idea, however, is not commonly restricted by technical means. An obsidian blade can be proven to be a sharper tool than one made of flint, but how can we argue that a painted image is more effective than one pecked into a stone surface? Myriad social factors affect the decision as to which medium to use in creating an image. But I have yet to see a convincing discussion from any part of the world-even in regions with rock art created and maintained by living populations such as we have in Australia-where one medium is more desirable or effective than another in fulfilling the intended function. As for figurative/ non-figurative, this is an arbitrary judgment based purely on our Western sensibilities and skills of recognition, a point with which I am sure Dr David would agree. This last problem can be mitigated somewhat by consultation with Aboriginal elders.

David's conclusion reiterates many of the points made in earlier chapters, neatly fulfilling the promises made in his introduction. He emphasised the etic power of the researcher as a writer creating culture, ideas that parallel those of James Clifford and George Marcus, co-editors of *Writing culture: the poetics and politics of ethnography*, a book I would highly recommend to those readers interested in investigating this notion more deeply. As David admits, '[M]y own writings about Aboriginal history can never testify to the meaning of Aboriginality, nor indeed can it ever be a testimony of *Aboriginal* history. It can only ever be a statement of *approach*, from my own contemporary Western viewpoint' (p. 206). His conclusions, too, are refreshingly devoid of the usual moaning about more research being needed or the problems with inadequate surveys, although I am sure there is still plenty of Rock Art Research 2003 - Volume 20, Number 2.

work to be done. All in all, I found David's text to be challenging, inspiring and technically sound. But hang onto your hair, folks, for this is heady stuff.

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SUGGESTED READINGS

- GADAMER, H.-G. 1989. *Truth and method*, transl. J. Weinsheimer and D. Marshall, 2nd revd edtn. Crossroad, New York.
- CLIFFORD, J. and G. MARCUS (eds) 1986. Writing culture: the poetics and politics of pthnography. University of California Press, School of American Research Advanced Seminar, Berkeley.
- TUAN, YI-FU 1974. Topophilia: a study of environmental perception, attitudes, and values. Prentice-Hall, Inc., Englewood Cliffs, NJ.
- TUAN, YI-FU 1977. Space and place: the perspective of experience. University of Minnesota Press, Minneapolis.
- TUAN, YI-FU 1979. Thought and landscape: the eye and the mind's eye. In D. W. Meinig (ed.), *The interpretation of ordinary land-scapes: geographical essays*. Oxford University Press, Oxford. RAR 20-664

Prehistoric imagery and landscapes. Rock art in Stjørdad. Trøndelag, Norway by KALLE SOGNNES. 2001. BAR International Series S998, Oxford, 206 pages. Softcover, £36.00, ISBN 1-84171-279-5.

I begin this book review with irony. Note the primary title of the work, above. It deals with *rock art*, and mentions two concepts in this field, *viz. landscape* and *imagery*. It can therefore be assumed, correctly, that this is a volume that deals with these two topics in the field of rock art study. Recently, a rock art glossary was published (Bednarik et al. 2003). There is no entry for 'landscape' or related concepts, nor the terms 'imagery' or 'image', though the more pretentious, but the no more precise, non-English derived terms 'iconic' and 'iconographic' are listed. The omission of 'landscape' is quite surprising in that this concept has become important in the field of archaeology worldwide and Sognnes' study contributes to this approach in rock art research.³ Let me make some general observations about the concept of landscape before proceeding.

Perceiving landscapes

A landscape can be viewed as a segment of the observer's surroundings—a sighting. This produces a delimited, but real, landscape that can be seen at a moment in time as a perceptual experience, a view of one's surroundings. One can also observe an unfolding view or panorama, usually of the horizon, from a specific viewing point. This produces a landscape that can be seen in one place, but in a few moments of time. Open valley floors and mountain peaks offer the best examples.

Interpreting landscapes

There are at least two important avenues of rock art interpretation based on use of landscape evidence. If there is an association of land features and rock art it might be assumed there is a functional relationship (see the reviewer's concept of 'contextual analysis', Swartz and Hurlbutt 1994). Sognnes uses a broader regional concept, which he terms the 'collective cognitive landscape' (see p. 31). This is an internally inconsistent phrase in that cognition is an individual process and cannot be collective. Perhaps 'culturally conceived landscape' might be a better choice of words. Evidence for this approach would be recurring patterns of distinctive contemporaneous rock art within similar landscape situations in a particular range of time. This approach is broader and deals with regional landscape settings having distinctive spatiotemporally restricted rock art imagery and arrangement.

The volume under review is organised into eight numbered but unnamed subdivisions I will term Sections: 1. Rock art and research, 2. Physical landscapes, 3. Imagery, 4. Social landscapes, 5. Ancestral and ritual landscapes, 6. Summary and conclusions, 7. Catalogue, and 8. References. The first portion of the Rock art and research section deals with the history and terminology of rock art research in Stjørdad and surrounding areas in Finno-Scandia. The last portion of the section deals with high global archaeology theory. I found the contents most interesting and it provides a view of the field of archaeology as seen from Norway. However, I see little relation of this presentation with the topic of the volume. The Physical landscape Section reveals Sognnes' geological background. It provides a detailed geological and geographic discussion of the landscape of northern Norway. In the Imagery section the design elements of the study are described and analysed in great detail. He proposes five traditions: 'boat' (the most diagnostic, possessing the more numerous and variable motifs), 'horse', 'anthropomorph', 'footprint' and 'cup-mark'.

The motif analysis of 'boats' is the most detailed and innovative study. Sognnes states that previous workers have used what he calls 'gestalt' types to order 'boat' images in Scandinavia, using hull attributes as the primary criterion. These types proved to be ineffective in explaining the development and distribution of boats in the area. Instead Sognnes sets up a matrix with an axis of prow and skid forms and another of hull shape and designs. This creates a table with 96 variables. From these variables he identifies seven examples that have been recognised by others as specific gestalt sub-types. This provides an analytical, rather than gestalt or subjective, base for type identification.

I entered the interpretive sections, *viz. Social landscapes* and *Ancestral and ritual landscapes*, with high expectations that were not realised. It would be here that various 'culturally conceived' landscapes, mentioned above, could be derived using locational analysis and associations with land features. In fairness to Sognnes I was probably expecting too much. The thrust of the interpretations seems largely backward, the use the direct historical approach from other times and cultural analogies from other regions, to explain the rock art at hand. It would have been useful to recover direct evidence to explain the shifts of associations between rock art and landform through time.

The study is thoughtful, well written, and provides extensive data, but an overall integrated summary of the findings is not offered. It is not possible to pick up this work, read the conclusions and get a basic synopsis of the study. There should have been a final compilation of descriptions containing all aspects of each 'culturally conceived' landscape dealt with in the study.

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³ This rock art glossary was compiled of terms submitted for inclusion over a four-year period of consultation of the discipline. The terms landscape, imagery and image were not tendered. Ed.

REFERENCES

- BEDNARIK, R. G., A MUZZOLINI, D. SEGLIE, Y. A. SHER and M. CONSENS 2003. *Rock art glossary. A multilingual dictionary.* Brepols, Turnhout, Belgium.
- Swartz, B. K., Jr and T. S. Hurlbutt 1994. Space, place and territory in rock art interpretation. *Rock Art Research* 11: 13–22.
 RAR 20-665

Before California: an archaeologist looks at our earliest inhabitants, by BRIAN FAGAN. 2003. AltaMira Press, Walnut Creek, CA, 400 pages. Cloth, US\$24.95, ISBN 0-7425-2794-8.

Most Americans know that the incredible geographic diversity of California is matched, or even exceeded, by the ethnic diversity of the state's modern inhabitants. However, few Americans appreciate the dramatic scope of the human story that began in ancient California some 13 000 years ago. In his most recent book, *Before California*, Brian Fagan offers an entertaining synopsis of California's archaeology that highlights creative human adaptation to an ever-changing environment.

Fagan, a professor of anthropology at the University of California in Santa Barbara, has published over two dozen textbooks and popular books on archaeology, making him well qualified to write the first book-length synopsis of California archaeology to be published in almost twenty years. Thus, *Before California* fills a lacuna in the literature, and Fagan's entertaining style will appeal to many. On the other hand, his approach occasionally may irritate readers with a scholarly interest in archaeology.

Fagan begins his book with a chapter disparaging California archaeology as 'unspectacular, very dry dust indeed'. The early inhabitants of California lacked pottery, agriculture and monumental architecture, and therefore left sites that compare unfavourably to those found in some other parts of the world. Fagan goes on to explain that poor preservation, looting, sloppy archaeologists, and rampant urban growth have damaged even that meagre archaeological record.

From this inauspicious beginning, Fagan weaves an intriguing tale of human tenacity in the face of climate changes and accompanying environmental transformation. A tapestry of offshore islands, coastal rainforests, grasslands, marshes, mountains and deserts provides a rich stage for Fagan's story, and 13 000 years of climate change animates the tale. Rather than simply recounting assemblages of artefacts and describing their changes over time, Fagan examines cultural changes in a well-developed context of palaeo-environmental change.

The theme of human adaptation hangs loosely on a chronological framework. Clovis hunters (Fagan deftly handles the controversy surrounding the date of earliest humans in North America) arrived as the Ice Age was ending and California was cooler and wetter than today. Shortly thereafter, much of the megafauna went extinct, and the early hunter-gatherers increased their reliance on small game, plants and marine resources. In fact, during the Altithermal, a warm, dry period from 8500 to 4500 years ago, humans survived largely by grinding grass seeds on millstones. As the Altithermal ended, ancient Californians increased their exploitation of acorns and riverine salmon (although probably not because of environmental change), and population densities rose in response. Politics developed, powerful individuals assumed a disproportionate role in community decisions, and inter-tribal violence increased. A series of droughts beginning 2000 years ago stressed societies, further intensifying the violence.

Fagan believes that the trend towards increasing violence reversed itself about 900 years ago. 'Something happened', and co-operation based on economic interdependence replaced the violence. According to Fagan, the high diversity of ecological zones within small areas encouraged alliances, by which the people achieved economic diversification. For example, in northern California an alliance formed between cultural groups occupying the coast, inland riverbanks and mountains. If the resources in one zone failed, the people living there could rely on their allies in the other zones. Although his argument is not entirely convincing (he does not present a lot of evidence), his idea is intriguing.

Fagan's attempt to impose a chronological organisation on his book is often overwhelmed by the many dimensions of California's pre-History: cultural groups, geography, environment, types of resources. Happily, Fagan is at his best when he writes chapters on topics rather than time periods. For example, his descriptions of dolphin hunting, shell mounds, acorn processing and coastal life are all superb. The breakdown of the chronological organisation also means that the reader can feel free to jump around rather than reading the chapters in order. Readers of *Rock Art Research* may want to jump to Chapter nine.

'Art on the rocks' is an excellent overview of rock art for a popular audience. Fagan raises almost all of the critical issues: the dangers of viewing rock art with a Western perspective, the benefits and hazards of ethnographic analysis, the difficulty of dating rock art, and the likelihood that we will never fully explain the art. He begins by describing the shifting paradigms that have characterised Western studies of rock art, from art for art's sake to sympathetic hunting magic to shamanism, the current mania of many researchers. In this context, he correctly concludes that no single paradigm can possibly describe the multitude of thought processes that motivated the artists. (Indeed, with the failure of so many past paradigms, one wonders why scholars continue to generate monolithic explanations of rock art.)

Fagan does fall prey to one of the classic errors of thinking about rock art. He concludes that among the Coso petroglyphs, '[a]lmost all of the humans are male' when, in fact, the gender of most Coso anthropomorphs is indeterminate. However, his brief characterisations of Coso petroglyphs and Chumash paintings overall are excellent. I offer only two serious criticisms of this chapter. First, to my taste, it is too short. California rock art is too rich to merit a mere 22 pages. Second, Fagan never mentions conservation, which is especially important in a state with a large population and popular rock art sites.

Throughout the book, Fagan's greatest strength is also his downfall: he enjoys telling stories and he does it well. Scholars will object to two of his strategies. First, he seamlessly moves from fictional sketch to reasonable supposition to well-established conclusion. While this creates a human stage to appeal to readers, it complicates the critical evaluation of some of his conclusions. Second, he occasionally generalises his conclusions over millennia or across environmental boundaries. For example, Fagan admits that ritual is almost impossible to reconstruct from archaeological remains, but he then provides a single, detailed description of shamanic activity for all of ancient California. On the other hand, these criticisms are not entirely fair since Fagan explicitly notes that his 'book is for popular consumption', and he is less guilty of glossing over details than authors of many popular books.

Other problems are more difficult to excuse. There is a presumption in choosing to ignore the oral histories of traditional peoples ('This is an etic history ... told from an archaeologist's perspective') and then composing fictional or over-generalised accounts of their ancestors. More importantly, Fagan mentions the federal laws regulating the disposition of Native American skeletons, but he never discusses ethics when describing the excavations of ancient cemeteries. Finally, his writing, excellent in many places, is sloppy and difficult to follow in others. Errors, both factual and grammatical, detract.

In spite of its shortcomings, *Before California* binds together an interesting array of facts with narratives that emphasise 'the flexible ingenuity' by which ancient Californians adapted to 'harsh, never predictable environments'. To scholars, it offers an up-to-date synopsis of California's archaeology in a single package. Endnotes and recent references provide an *entrée* to the literature for those seeking further information. However, the book is most appropriate for modern Californians interested in a readable synopsis of their state's archaeology.

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Ithyphalliques, traditions orales, monuments lithiques et art rupestre au Sahara: hommages à Henri Lhote / préf. Pr Alain Jardin, edited by JEAN-LOÏC LE QUELLEC, avec la collab. d'Aldo Bocc. Saint-Lizier, AARS, 2002. 248 pages, numerous illustrations. Les Cahiers de l'AARS 7.

This eclectic compendium of articles edited by Dr Jean-Louis Le Quellec is a short publication in memory of Dr Henry Lhote (1903–1991). As the title indicates, this compendium discusses a variety of themes. Sixteen essays in French, English, German and Italian⁴ introduce a wide range of subjects directly or indirectly related to rock art in the Sahara. Rediscovered by the West in the 1930s, petroglyphs and paintings in the Sahara present one of the most fascinating corpuses of rock art (as well as a still unresolved chronology).

This 'festschrift' opens with a short think-piece by Le Quellec on the question of ithyphallic iconography in the extant corpus of rock art in the Sahara. This fascinating topic has been notoriously evaded by antiquarians and many twentieth century researchers. According to Le Quellec, in the context of rock art in the Sahara, 'ithyphallic' is used to describe any recognisably male depiction (human, animal, or even mythical) of which the erethism (abnormal excitability) is either obvious or probable (p. 7). Perceived as depraved and obscene, the depictions were conveniently *passées sous silence* (hushed). Even today, according to Le Quellec, published ithyphallic images are rare and the subject is seldom discussed. Why?

This is not the place to tackle this oddly puritanic vestige, but before I resume my assessment of this inspiring think-piece, I would like to expand briefly on the idea of the 'obscene'. Images of coital stages, fellatio and other sexual practices are at the frontier of representation. Perhaps the 'shocking' element in these ithyphallic images is the thematic recurrence of coital practices between humans and canines and other zoomorphic representations (rhinos, bovids, to name a few). These images are, arguably, complex markers in the abstract territory of fantasies. These 'obscene' (*Ob skene*: off stage) practices are often relegated to specific loci where '... walls, enclosures and façades serve to define both a *scene* (where something takes place) and an *obscene* area to which everything that cannot or may not happen on the scene is relegated: whatever is inadmissible, be it malefic or forbidden, thus has its own hidden space on the near or the far side of a frontier' (Lefebvre 1997: 36).

As Le Quellec noted, many of these images emphasise the relationship between the sexual practice and the gaze of the practitioner(s). The depiction of the eye is an interesting graphic phenomenon where the observer ultimately becomes the observed. The eye shifts into the 'I', and the observer finds himself/herself included in the dynamic of the scene. This inclusion in the frontier of the phantasmagoric is something which deserves more ink to be spilt.

The first article, written by Nagette Aïn-Séba, explores the notion of anatomical linkages and sexuality. She establishes two interesting sets of associations between genitals, hand and horns, and between horns, arched objects and lunar crescent characteristic of the bubalian and bovidian petroglyphs. She argues that the curved or arched horns of bovines are often in contact with the hands of an ithyphallic anthropomorph. Crescent-like depictions are also commonly associated with ithyphallic images and sexually explicit iconography. Noting the voluminous recurrence of ithyphallic anthropomorphs wearing horned masks, the author suggests that the representation of horns and horned forms played a symbolic role especially in the context of sexual instincts and reproduction. Aïn-Séba's essay seems to be validating the idea of a 'fertility cult' by presenting these structural associations as archetypes, which can be found throughout the Sahara. Her rather indefinite conclusion seems to indicate that a lot more investigation should be pursued in this particular area before one can determine the validity of her associations.

The next article, written by Ginette Aumassip and A. Kadri, is an encyclopaedic survey of the Algerian steppe horse addressing, among other things, the contentious issue of domestication of horses in the Sahara. Some, based on a simple line on some engraved equidae, were quick to see a saddlecloth and postulate 'empirically' that these engraved horses were domesticated. However, the compartmentalisation of the inner body seen on certain engraved horses were later found in bovines, antelopes, and even a lion. This particular hermeneutic fallacy seems to be a very pervasive bog in rock art research. The compartmentalisation of the depicted animals was not just simply a stylistic characteristic, but, as the authors rightly note, some of these anatomical details indicated the engraver's determination to specify systematically the taxonomic characteristics of the engraved animals. This would validate the author's thesis that among the engraved and painted equidae, two types of horses roamed the Sahara regions. It is interesting to note that some of the representations were misinterpreted as horses when in fact what was depicted were zebras!

According to Dida Badi, oral traditions in the Berber populations are reliable ethnographic resources. The attempt to link pre-Historic and proto-Historic populations with contemporary inhabitants in the Sahara (especially the Tuareg) was already the concern of Henri Lhote and Théodore Monod. For Badi, the study of oral traditions from actual populations living in a central region of the Sahara (the Adagh) show that this region was traversed by many populations from the Sahara's fringe and periphery and that these have appropriated territories and have resided there for an extensive amount of time. This is interesting, the author argues, because it presents the ethno-archaeologist with a pattern of migratory routes and corpus of archaeological vestiges which can be somewhat resituated based on information gathered through localised oral traditions. For the non-specialists, this essay might be a bit cumbersome at times due to its erudite nature. Indeed, for those who do not have a good genealogical background of the successive waves of populations and a firm handle on chronology, this essay will remain somewhat hermetic.

⁴ The author apologises in advance for omitting essays in Italian and German, two languages which he cannot read.

With his zoological article on the stag in Africa, Gabriel Camps introduces an interesting paradox. Indeed, based on archaeological evidence, the stag was an undeniable presence in the Neolithic landscape of the Sahara, and yet few (still undetermined) images have been reported. Worthy of mention is the fact that the author offers a clue about the paradox. In the oral tradition of *Kabylie* we still find some references to stags even though they have been absent for a while. This, I presume would be an interesting investigation for a philologist.

The next article was written fifteen years ago by Guy Chauvot de Beauchêne who died in 1987 in the Sahara. The article is essentially another encyclopaedic entry explaining the processes of formation and accumulation of salt in the Sahara. The author hops elegantly from place to place in this map-less article. Despite this lack of topographical resources, the article succeeds in pointing out the obvious reliance of salt in the Sahara. The author surveys well-known quarries and introduces the reader to the phases of manufacture. Today, the trucks have replaced the camels and the camel drivers, and with their gradual disappearance the Sahara looses one of its cultural trademarks. It is important to try all that we can to preserve this ancestral way of life otherwise, as the author puts it, '*le désert ne serait plus qu'un pays admirablement beau, mais vide de toute chaleur humaine*' (p. 91)

In 'Following the tracks of Henri Lhote: new paintings in the Tassili-n-Ajjer (South-Ageria)', Ulrich Hallier and Brigitte Hallier present some recent discoveries from the Middle Cattle period. They begin with a short acknowledgement of Lhote's contributions and achievements. In the footsteps of Colonel Brenan's discoveries in the Tassili, Henry Lhote pioneered intensive fieldwork campaigns. Along with a handful of co-workers, he traced a large amount of the extant corpus of rock art found in the Tassili. Later on, an exhibition displayed '1500 sqm of rock paintings taken by Lhote and his co-workers in a 1:1 scale directly from the originals' (p. 107). This impressive fit of determination has become overshadowed by the damaging effects the practice of swabbing and washing had on the paintings. In a way, we are lucky to have Lhote's massive body of tracing, but at what cost? This particular issue was notably missing from this essay and the same can be said about the whole book. Hidden behind this short biographical entry is the true message of this article: while Lhote discovered a great deal in the Tassili, more is there to be found. After discussing a few iconographic configurations where clothing, tools and body painting offer new insight on the middle-cattle period in the Tassili-n-Ajjer, the authors conclude with a plea to make Lhote's copies available. They also indicate that a true homage to Lhote would be a corpus in memoriam.

By far the most engaging article is Jean-Loïc Le Quellec discussion on Henri Lhote and the Peul's initiatory procedure called the *lootori*. The author retraces the hermeneutic process that led Lhote to establish a link between a particular panel in Ti-n-Tazarift and the annual Peul ceremony of lustring bovines while initiates proceed through a series of choreographed initiatory stages. The panel shows several bovines which seem to be kneeling, and a procession of (also kneeling) masked initiates proceeding towards the so-called '*motif digité*' which is supposed to represent a symbolic layout of the social organisation. The procession of masked anthropomorphs end in one of the 'digit' performing a snake-like dance. The copy of this panel was presented at a museum in 1957 in the context of an exhibition, and was seen by thousands.

Among the visitors was a Peul from Mali named Amadou Hampaté Bâ. He recognised an initiatory procedure which was still practised at the time in the region of Diafarabé. The bovines and initiates were not kneeling, but rather depicted as standing in the water. This argument convinced Lhote and the panel was re-titled 'Bovines in the water – Ritual ceremony called *lootori*'. The article proceeds with a fascinating investigation where oral tradition and dated artefacts seem at first to concord and validate Hampaté Bâ and Lhote's hermeneutic position, but subtly and almost forensically Le Quellec deconstructs the whole thing and shows that there are too many discrepancies in the linkages to accept this interpretation. The author argues that Hampaté Bâ's approach needs to be carefully reconsidered even if the price is that we lose direct access to a hermeneutic of the extant rock art in the Tassili. Le Quellec concludes with the following warning (which I endorse fully): '*ne pas soliciter excessivement les documents, et pratiquer un comparatisme méthodique*' (p. 155) ['try not to solicit excessively the documents, and practise comparative analysis methodically'].

Chantal Chevalier Lhote offers a touching biographical reminiscence about Lhote's first peregrination in the mesmerising world of the Sahara. The colonial existence is usually associated with exploitation and abuse, but colonialism also provided opportunities to have access to uncharted places. The consequences of this period of Western civilisation are well-known, and I would suggest that the reader brackets momentarily his or her criticism, and enjoy the ride on a camel in the company of a young taxidermist busy with collecting artefacts. In a series of lucky encounters and skilled in public relations, the young Lhote lived a life worthy of some Frison-Roche's protagonist. Lhote crossed the Sahara using all available means of transportation and spent the last years of his youth learning the meaning of existence (survival really!) from the 'agrande école de la vie'—the Sahara.

This 'learning the hard way' was also the running theme in René Oriard's article about Henri Lhote's tribulations while navigating the Niger river in a small kayak. The article is a short book review in itself. The author comments on Lhote's *Le Niger en Kayak* (undated). This book was dedicated by Lhote 'à tout ceux que tente l'aventure' [to all those tempted by adventures]. Lhote's temptation almost turned into catastrophe a few times in the white water of the Niger. But, as we know, he survived all the ordeals and went on to become a respectable investigator in north African rock art. Perhaps the most interesting part of this article is the photo of Henry Lhote proudly sporting a colonial helmet and looking seriously into an uncertain future on the eve of the dreadful year 1939. The colonial attitude which was, back then, part of the expected decorum, contrasting dramatically with the Lhote of *The search for the Tassili frescoes* (1959).

Alfred Muzzolini, François Pottier and Françoise Pottier contribute to a better understanding of the influence and expenditure of the Tazina school. This essay is primarily focused on the discovery of some petroglyphs attributed to the Tazina school in a rather unexpected location. This corpus of new petroglyphs extends the influence of that school and marks its north-eastern limit. The Tazina school is characterised by great visibility, small size, grooved and polished outline, and thematic ranging from giraffes to bovines to elephants and ostriches. But the authors are more concerned with anomalous representation of Oryx. The horns found on the Oryx in this new corpus are straight, thus taxonomically belonging to the Oryx leucoryx, which differentiate them for the 'cimitar' type found in the more common Oryx dammah from Algeria and Morocco. The authors solve the puzzle by concluding that perhaps these petroglyphs were bad copies of the Oryx dammah.

The Tazina school was revisited by Alain Rodrigue in his essay, 'Tazina, un style opportuniste'. Rodrigue offers a more detailed identification of the Tazina figures where we learn that the engravers' signatures were the emphasis given to the depicted animals' extremities such as horns, tusks and specific anatomical segments. But the crust of the article is not about

identification, but rather, it is about what the author has called 'opportunistic geology'. It refers to the engravers' privileging specific surfaces (horizontal) and specific anatomical segments involved in the manufacture of these particular petroglyphs (noticeable prolongation of extremities). The author introduces the notion of 'somatotropic movements' as fluid movements, easily repeatable, and conditioned by the position of the body in relation to the engraved surface. Somatotropic movement are a characteristic of the Tazina school. The predominance of Tazina petroglyphs on strategically situated tender azoic sandstone indicates that this was the stone of predilection. As a tentative conclusion, the author proposes a taxonomic framework where the listed characteristics for the Tazina school should always be present, and if absent, the petroglyphs under investigation should not be categorised as belonging to the school. If taxonomy was always that precise, many classificatory mistakes would have been avoided, and stylistic analysis would have a better reputation!

Nicolle Petit-Maire introduces the readers to the climatic fluctuations and mechanisms that have been the primary agents in shaping the Sahara. The author argues that hidden underneath the sea of sand are the fossil remains of a verdant ecosystem. This article would have been much more effective if it had been placed at the beginning of the book, but for some interesting editorial choices the articles were arranged by alphabetical order. In the Neolithic period (approximately from about 9000 to 2500 BP), much of the Sahara was habitable. The 21 000 to 16 000-year-old dunes used to be part of a larger system covering a wider area of 400 kilometres southward, a response to the global cooling (a climatic consequence of the glacial and interglacial phases of the Pleistocene).

To conclude, it is fair to say that this book succeeds at sampling and confirming the fascination this corpus of rock art in the Sahara has on rock art researchers, as well as demonstrating the difficulties these researchers are faced with when trying to make sense of chronological sequencing, stylistic characteristics and ethnographic analogies.

Post-scriptum: I would like to notify the readers about an exhibition at the Musée de l'Homme titled 'Tassili d'Algérie, Mémoires de Pierre, avant le désert, l'art et la vie' and running until 5 January 2004. This exhibition was designed as a celebration of the Tassili in the context of 'l'année de l'Algérie'. An homage to Henri Lhote and his Tuareg life-long friend and guide Machar Jebrine ag Mohamed (1890?–1981) will take place by exhibiting a large collection of Lhote and his co-workers' tracings of rock art images from the Tassili.

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REFERENCE

LEFEBVRE, H. 1997. *The production of space*; transl. by D. Nicholson-Smith. Blackwell Publisher Inc, Oxford, U.K. and U.S.A.

RAR 20-667

RECENT ROCK ART JOURNALS

Purakala. Journal of the Rock Art Society of India (RASI). Edited by GIRIRAJ KUMAR. The most recent issue contains these research and review papers:

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SAPAR Bulletin. Journal of the Siberian Association of Prehistoric Art Researchers (SAPAR), bilingual in Russian and English. Edited by Y. A. SHER, prepared by E. A. MIKLASHEVICH.

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- FEDEROVA, N. and E. MIKLASHEVICH: Northern Archaeological Congress.

International Newsletter of Rock Art. Newsletter of the Association pour Rayonnement de l'Art Pariétal Européen (ARAPE). Edited by JEAN CLOTTES. Bilingual newsletter (French and English). Recent issues include these research articles:

Numbers 35 and 36 (2003):

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- VALDE-NOWAK, P.: Oblazowa Cave: new light on Gargas hands? LOUBSER, J. H. N., T. G. GREINER and T. HUDSON: Rock art
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- BRINK, J. W., I. A. CAMPBELL and A. E. PETERSON: Experiments in rock art preservation at Writing-On-Stone Provincial Park, Alberta, Canada.
- FARADZHEV, A.: Peter the Great's decree on rock art research in Russia.
- MAGAIL, J.: Certain rock engravings at Mount Bego were sundials.

Sahara. International journal of pre-History and History of the Sahara, with a strong emphasis on the region's rock art. Edited by P. L. CALZOLARI, D. CALATI, G. NEGRO and R. SIMONIS. The most recent issue includes these articles:

Volume 14 (2003):

- SOLEILHAVOUP, F.: Images sexuelles dans l'art rupestre du Sahara.
- VAN HOEK, M.: The Saharan 'girafe à lien' in rock art. Domesticated giraffe or rain animal?
- BROOKS, N., S. DI LERNIA, N. DRAKE, M. RAFFIN and T. SAVAGE: The geoarchaeology of western Sahara. Prelimina-ry results of the first Anglo-Italian expedition in the 'free zone'.
- PICHLER, W. and A. RODRIGUE: The 'Tazina style'.
- SCARPA FALCE, A. and S. SCARPA FALCE: Il riparo 'Uan Afaris' nell'uadi Sakallem (Tadrart Acacus).
- ZBORAY, A.: New rock art findings at Jebel Uweinat and the Gilf Kebir.
- PONTI, R.: La pittura rupestre nel riparo di Uan Telocat (Saharan libico).
- BERGER, U., F. BERGER, T. EL MAHDY and P. GABALLA: New rock art sites in SE Libya.
- GAUTHIER, Y. and C. GAUTHIER: Éléments remarquables de l'art pariétal de l'Immidir (Algérie).
- BEN NASR, J.: Nouvelles peintures rubestres inédites à l'abri d'Aïn Khanfous (Jebel Ousselat, Tunisie centrale).
- CHOPPY, J., B. CHOPPY, S. SCARPA FALCE and A. SCARPA FALCE: Le 'puzzle' d'Imrawen (Messak, Libye).
- ILIPRANDI, G.: Il riparo dei cavalli al galoppo (Ennedi, Ciad).
- HALLIER, U. W. and B. C. HALLIER: The rockshelters of Tisseboukand Irrekam Aharhar (central Tassili, Algeria).

RECENT BOOKS OF INTEREST

Prehistoric imagery and landscapes. Rock art in Stjørdad. Trøndelag, Norway by KALLE SOGNNES. 2001. BAR International Series S998, Oxford, 206 pages. Softcover, ISBN 1-84171-279-5.

Ancient ochres. The Aboriginal rock paintings of Mount Borradaile, by DAVID ANDREW ROBERTS and ADRIAN PARKER. 2003. J.B. Books Australia, Marleston, 104 pages, colour plates. Hardcover, ISBN 1-876622-42-3.

RECENT PAPERS OF INTEREST

An 8th millennium BC rock carving from Dhuweila (eastern Jordan) in the collections of the Royal Museums of Art and History (0.4704), by DIRK HUYGE. 2000. Bulletin des Musées Royaux d'Art et d'Histoire Bruxelles, Volume 71, pp. 5–13.

'Big pictures': insights into southern African rock paintings of ostriches, by FUMIKO OHINATA and MARYNA STEYN. 2001. *South African Archaeological Bulletin*, Volume 56, Numbers 173–174, pp. 57–61.

La Casa de Piedra de Ortega (PCIA, de Río Negro). I. La estratigrafía, by MABEL M. FERNÁNDEZ. 2001. *Relaciones de la Sociedad Argentina de Antropología*, Volume 26, pp. 261–284.

First dating of Pilbara petroglyphs, by ROBERT G. BED-NA-RIK. 2002. *Records of the Western Australian Museum*, Volume 20, pp. 414–429.

The development of Indian rock art studies since Independence, by ROBERT G. BEDNARIK. 2002. In *Indian archaeology in retrospect, Vol. 1, Prehistory: archaeology of south Asia*, edited by S. Settar and Ravi Korisettar, pp. 353–375. Manohar in association with Indian Council of Historical Research, New Delhi.

Lightning strikes twice: conflicts in perception of painted images, by KEN MULVANEY and JERRY JONES. 2002. *Australian Aboriginal Studies*, Volume 2002, Number 2, pp. 27–34.

[•]Alien abductions', Kimberley Aboriginal rock paintings, and the speculation about human origins: on some investments in cultural tourism in the northern Kimberley, by ANTHONY REDMOND. 2002. *Australian Aboriginal Studies*, Volume 2002, Number 2, pp. 54–64.

Torres Strait rock art: an enhanced perspective, by IAN J. McNIVEN, BRUNO DAVID and LIAM BRADY. 2002. *Australian Aboriginal Studies*, Volume 2002, Number 2, pp. 69–74.

From prehistoric art to writing, by LOUIS BARRAL and SUZANNE SIMONE. 2002. Bulletin du Musée d'Anthropologie Préhistorique de Monaco, Volume 42, pp. 41–47.

Ochre in the Middle Stone Age of southern Africa: ritualised display or hide preservative?, by IAN WATTS. 2002. *South African Archaeological Bulletin*, Volume 57, Number 175, pp. 1–14.

The rock art of the Bongani Mountain Lodge and its environs, Mpumalanga Province, South Africa, by J. HAMPSON, W. CHALLIS, G. BLUNDELL and C. DE ROSNER. 2002. *South African Archaeological Bulletin*, Volume 57, Number 175, pp. 15–30.

Therianthropes in San rock art, by PIETER JOLLY. 2002. *South African Archaeological Bulletin*, Volume 57, Number 176, pp. 85–103.

The earliest know palaeoart, by ROBERT G. BEDNARIK. 2002. In Vladimir Vasil'evich Bobrov (ed.), *Pervobytnaya arkheologiya: chelovek i iskusstvo*, pp. 23–31. Kemerovskii gosudarstvennyi universitet, Novosibirsk.



New rock art research association in Bolivia ROY QUEREJAZU LEWIS

During the last eight years Bolivia has gone through important economic and social changes that affect directly the physical integrity of rock art. The provincial municipalities have become autonomous in the administration of their economic resources and the management of their cultural heritage. As a result many provincial municipalities are starting to establish tourist circuits, which include rock art sites.

Through this process, rock art sites are beginning to be visited by larger numbers of tourists and new cases of vandalism have recently been carried out, with the ubiquitous engraved names on rock art panels. Although many municipalities have very good intentions, they sometimes lack the knowledge about rock art protection and conservation, and about tourist management.

On the other hand, local indigenous communities in rural areas (through the *Popular Participation Law*) have started to participate in local political, economic and cultural projects and decisions.

In order to co-ordinate future rock art conservation and tourist projects, the 'Asociación de Estudios del Arte Rupestre de Cochabamba', AEARC (Cochabamba Rock Art Research Association), was founded on 11 July 2003. Among its main objectives it has the planning, organisation, execution and control of sustainable rock art tourist projects aimed to protect and conserve rock art sites through active local indigenous participation, thus creating economic earnings for them, and strengthen their historical and cultural identity.

AEARC is formed on the basis of a Central Directory (in the city of Cochabamba) that will in the future co-ordinate sustainable rock art projects in different rock art areas of the Department of Cochabamba. In this sense, AEARC has started working in the Mizque area, where the local municipality has initiated excellent work with one of the local communities, in order to protect the abstract rock art paintings of Tunas Qaqa and carry out controlled and planned tourist visits.

One of AEARC's main policies is to work starting from the local indigenous communities upwards, which means that the indigenous communities will make their own decisions regarding various aspects of their heritage management. Consequently, a Local AEARC Directory has been formed in Mizque with the participation of local authorities and representatives of each rock art area in the Mizque region. AEARC maintains the work philosophy that any rock art project that aims to be sustainable must succeed in preparing the local communities towards working in an autonomous way, although co-ordinating their activities with local authorities (Mizque Municipality, for example) and with AEARC's Central Directory in Cochabamba.

In this sense, AEARC has already started working in the Mizque area, in consultation with its Local Directory, and organising future activities with the local communities, the local municipality and the Sub-Prefectura of Mizque (government representative). The Conservation and Tourist Project for the Mizque area includes the training of indigenous people as tourist guides, guardians and managers. An education program will be carried out in the local schools, and will also be directed to the general public of Mizque. For example, the education program will include a book that tells the story of the experiences of two schoolboys in rock art sites. The story indirectly reinforces the conservation and protection concepts of rock art. This book will be distributed freely among the students.

AEARC's activities also include rock art research. Since its foundation, thanks to the participation of indigenous members, the existence of new rock art sites has been reported, and more rocks with cupules have been investigated. One of them will certainly reinforce the considerable antiquity of some of the cupules in the Mizque region suggested previously by Robert G. Bednarik.

We consider that AEARC is the first experience of this kind in the Americas, with the active participation of indigenous communities in rock art areas based on the decisions taken in their own local AEARC Directory. We also consider that this initiative, with autonomous local indigenous participation and centralised co-ordination, is the only way to safeguard the rock art sites in our region.

Scholars interested in knowing more about AEARC's projects and in contributing with their own experiences can contact:

Professor Roy Querejazu Lewis, President, Central Directory, Cochabamba, at *aearc@hotmail.com*

Lic. Jorge Erick Teran, General Secretary, Central Directory, Cochabamba, at *aearc@hotmail.com*

Arq. Greby Caillavi, General Secretary, Local Directory, Mizque, at *grebycaillavil@yahoo.com* RAR 20-668

Rock art images copyrighted: Ruling of the Austrian High Court

The following is the translated actual judgment text in a legal test case in Austria, of whether rock art recordings are protected by copyright. It is likely to have legal implications in other countries and may serve as a precedent.

In the case tested, plaintiff and defendant are both active in the scientific research of Alpine rock art and have authored relevant publications on the subject. The defendant has used a drawing of a rock art image created by the plaintiff in his own, subsequently printed book, without soliciting the permission of the plaintiff. The plaintiff's drawing was used in the defendant's book without significant modifications and without naming the plaintiff.

Two lower courts had previously found that the plaintiff's drawing was not an original intellectual creation, which would be protected by copyright, because the plaintiff had not created a new work with it, he had merely copied the rock art motif.

However, the High Court rejected this finding and pronounced, that the existence of original intellectual creation is contingent upon individuality of execution, and not of statistical uniqueness. For the required individuality of a copyrighted work it suffices to establish that someone else might have treated the same object differently. The autonomous mental treatment of a found object or natural feature can in this sense constitute a copyrighted work. When a rock art image found in nature is graphically recorded, even when a faithful likeness is intended, adequate latitude for individual creative rendering does remain. It still requires with every line a mental judgment whether there is an authentic, artificial groove on the rock, occasioned at the time of the motif's creation, or a later intentionally added feature, or even a natural weathering feature of the rock. The result of this mental act is a specific depiction, which bears the stamp of the recorder's individuality and which, due to its individual signature in the selection of the available lines, has the potential of differing from the drawings of other scholars of the same rock art motif. The drawing of the plaintiff was therefore judged to be protected by copyright. The defendant was sentenced to abstaining from reproducing and disseminating, to removing the sketch from his book, and costs were awarded against him. (Translation by R. G. Bednarik.)

Southern African Association of Archaeologists 2004 Biennial Meeting Kimberley, 4–7 April 2004

Venue: The conference will take place at the McGregor Museum (P.O. Box 316, Kimberley 8300, South Africa; Fax No.: 053-842-1433).

Registration and icebreaker: Sunday, 4 April 2004.

Conference: Monday, 5 April to Wednesday, 7 April 2004. Organising committee: L. Jacobson (053-839-2703), jake@ museumsnc.co.za; D. Morris (053-839-2706), dmorris@ museumsnc.co.za; K. van Reyneveld: (053-839-2707), karen@museumsnc.co.za

Conference themes and sessions: At this stage we are considering sessions on the Early Stone Age (Acheulian), public archaeology, analogy in archaeology and the origins of modern human behaviour. Further details will be provided in the next circular. We welcome any further suggestions for, or offers to organise and chair sessions, themes or workshops. Please contact us as soon as possible. There will also be ample time for the presentation of individual research results in open sessions, either as oral presentations or posters. There will be one or more poster sessions in addition to oral sessions. You are therefore encouraged to consider offering posters as an alternative to oral presentations.

Excursions: There will be a visit to the Wildebeestkuil rock art site on the afternoon of Tuesday, 6 April. This site is administered by the San community and includes their vibrant arts and crafts centre. Post-conference: this is still in the planning stage. If you have any ideas or requests, please contact David Morris.

Accommodation: There is a wide range of accommodation available within a short distance of the Museum. Details can be obtained from the Tourism Information Centre at 053-832-7298 or *tourism@kbymun.org.za*. They will email an up-to-date comprehensive list on request. You are welcome to contact us for advice but please make your own bookings.

Please contact Leon Jacobson, Tel: 053-839-2703, Fax: 053-842-1433.

McGregor Museum P.O. Box 316 8300 Kimberley South Africa E-mail: *jake@museumsnc.co.za*

21st International Valcamonica Symposium 8–14 September 2004

The topic of the Symposium is *Prehistoric and tribal art: new discoveries, new interpretations and new methods of research.* Colleagues of several disciplines will take part in the Symposium to promote the co-operation of archaeology, pre-History and history of art with psychology, sociology, semiotics, cultural anthropology, biology and other disciplines. The pertinent international organisations will be invited to attend. During the Symposium, some associations will meet, among them the Board for Rock Art Archives (WARA) and the International Association for the Study of Prehistoric and Ethnologic Religions (IASPER). Regional committees on pre-Historic and tribal art will also meet. As usual, a visit to the archaeological parks and to recent rock art discoveries in Valcamonica is planned.

For further details, please contact Professor Emmanuel Anati, *ccspreist@tin.it*

ALFRED MUZZOLINI (1922–2003)

Without any doubt Alfred Muzzolini was an authority in the studies of Saharan rock art, to which he had dedicated forty years of his life. He knew the bibliography perfectly, and aside from Egypt, there was not a major Saharan site he did not personally visit. Born 5 January 1922 in Magnano, Italy, he had a double education, literary (he used to be a seminarist) and scientific (he studied at the Geology Institute in Nancy, France), and he also carved out a career as a diamond engineer in Africa. Having retired in Toulouse he founded the 'Éditions des Hespérides', which later became the 'Éditions Errance', specialising in archaeology books. Among the books he published in the collection Archéologie, horizons neufs figure prominent works known by all friends of the Sahara, such as the books of Henri-Jean Hugot, Le Sahara avant le désert (1974), Gabriel Camps' Les Berbères aux marges de l'histoire (1980) and Henri Lhote's Les chars du Sahara (1982).

Dr Muzzolini started rather early to prospect the rock art precincts, particularly those of the Figuig region (he also visited the Tamezzought and the col of Zénaga sites as early as 1960). Yet he only began to publish his own work in the 1970s and essentially on the chronology of Saharan rock art, the evolution of the climate in the Sahara and the origin of African domestic animals (cattle and sheep). His abundant scientific production is distinguished by an approach associating the archaeology, palaeoclimatic, archaeozoological and linguistic data, and a very sharp critical mind (some might even say over-critical), which allowed him to fully review the fairly inadequate approaches used by numbers of his predeces-sors-some of whom did not always support very well his pertinent remarks, always courteous but firm. Rightfully denouncing the abuse of the 'anti-stylistic' school preaching the neglecting of any recourse to the notion of 'style', supposed to be inaccurate and useless in pre-History, he showed, on the contrary, that this notion could be particularly productive with the condition of agreeing on the method and vocabulary used. Applying for this purpose what he called the 'core method', he was then able to review the old classifications of the paintings of the Tassili-n-Ajjer and of the Akâkûs, elaborated not so long ago by Henri Lhote and Fabrizio Mori. At first, it was quite easy for him to 'deconstruct' these classifications, however classic, because they showed many weaknesses and incoherences. Then, combining, yet without intermingling, the studies of well-defined (therefore verifiable) graphic styles and of precise cultural features ('clothing', 'armaments' etc.), he was able to elaborate a classification of varied cultural styles arranged in space and in time. He even managed to anchor this sequence in chronological brackets that indeed contained an uncertainty coefficient, but were, nevertheless, reliable when linking them to the latest general archaeological knowledge, from the Sahel to the whole of the Mediterranean.

Using a metaphor he particularly liked, the image

then acquired may be blurred, as if drawn using large pixels, but this does not alter its reality. The next step of his work, the one he was working on when death surprised him (such as an unwelcome visitor pestering one when at work) will be to reduce the size of the pixels, and also to try to incorporate into the general diagram all the figures excluded from this classification until they can be linked to a solid and coherent stylistic set. A vast program which certainly will meet its limits, but it does not matter since it has allowed some sets to be isolated ('Abaniora style', 'Iheren-Tahilahi style' etc.) and is already used by most authors. Concerning the chronology, Alfred Muzzolini was, along with R. Nehren, one of the first to have fought against the false idea of an archaic 'bubalin level'. This notion is unfortunately still conveyed, sometimes without any valid reason, by some researchers, when the said bubalin is only a style that, in central Sahara, cannot be dissociated from the Bovidian. Consequently he maintained the idea of a 'short' chronology that, indeed, is not unanimously accepted, but is resting on a very strong argument of which no element has received, up to now, any satisfying response from his contradictors. Of course, we could always reproach him for the fact that he neglected the meaning of the pictures, but this was only due to the assertions published in this field that prompted him to strengthen his position. Therefore, he thought it more advisable to leave this question between parenthesis while awaiting satisfying solutions to the more urgent problems of stylistic, chronological and cultural attributions.

Founding President of the AARS (Amis de l'Art Rupestre Saharien, or Friends of the Saharan Rock Art Association, a member of IFRAO) and first editor-in-chief, with Giancarlo Negro, of the international journal Sahara, his rigorous requirements, alertness and high point of view allowed him to exert a lasting influence on the development of a true palaeoart science. In addition to dozens of articles, he leaves three big books of which the last, Les images rupestres du Sahara (1995), will remain for a long time an absolutely necessary textbook to anyone interested in art history and the pre-History of Africa. He departed this world in Toulouse on 16 February 2003, after putting the finishing touches to an international Glossary of rock art research published by Brepols, but without being able to complete a synthesis in progress on the paintings of the Tassili n-Ajjer. Sometimes he could be a little difficult to approach, but for all those who have known his discreet thoughtfulness, generosity, kindness and the brilliant private conversations that he used to punctuate with recitals of beloved poems, Alfred Muzzolini remains 'immortel au foyer de l'instant' ('immortal at the heart of the moment') ---to quote the fulgurating words of Saint-John Perse placed as an introductory quotation in his last work.

Dr Jean-Loïc Le Quellec

RAR 20-669

Dr Alfred Muzzolini was a highly valued member of the Board of Editorial Advisers of *Rock Art Research* until his recent death, as well as a member of the Editorial Board of the IFRAO-Brepols imprint. His latest publication is the French section of the *Glossary of rock art research: a multilingual dictionary*, published shortly after his passing. Together with his significant other published work, it stands as a permanent monument to this prodigious researcher and scholar. *RAR* has lost one of its most distinguished supporters in him. [Ed.]

Alfred Muzzolini's main publications

- 1979a. Pluviaux sahariens et 'âge des eaux'. Bulletin de la Société méridionale de Spéléologie et de Préhistoire 19: 43–57.
- 1979b. L'extension géographique des 'Têtes Rondes' au Sahara. In E. Anati (dir.), Prehistoric art and religion, Valcamonica Symposium 1979. The intellectual expressions of prehistoric man: art and religion, pp. 365–384, 511–513.
- 1980a. L'âge des peintures et gravures du Djebel Ouenat et le problème du Bos brachyceros au Sahara. *Travaux de l'Institut d'Art Préhistorique* (Toulouse) 22: 347–71.
- 1980b. Les premiers bœufs domestiques au Sahara. Problèmes de vocabulaire. La 'période bubaline'. *Bulletin de la Société méditerranéenne de Spéléologie et de Préhistoire* 20.
- 1981a. Les datations du Néolithique Saharien et les problèmes du C14. Travaux de l'Institut d'Art Préhistorique 23: 169–97.
- 1981b. Le groupe europoïde d'Iheren-Tahilahi, étage 'Bovidien final' des peintures du Tassili. *Revue de l'Occident musulman et de la Méditerrannée* 32(2): 121–38.
- 1981c. Essai de classification des peintures bovidiennes du Tassili. Préhistoire ariégeoise 36: 93–113.
- 1981d. Les premiers bœufs domestiques au Sahara central: les documents des fouilles. *Bulletin de la Société méridionale de Spéléologie et de Préhistoire* 21: 19–34.
- 1981e. La datation des premiers bœufs domestiques sur les figurations rupestres au Sahara central. La 'période bubaline'. *Bulletin de l'Association Internationale d'Étude de la Préhistoire de l'Égypte* 3: 15–37.
- 1982a. Une 'relecture' de la littérature archéologique relative au Bos ibericus. Bulletin de la Société Méridionale de Spéléolo-gie et de Préhistoire 22: 11–29.
- 1982b. Sur un quadrige 'grec' de style Iheren-Tahilahi, au Tassili du N.-O. Ars Praehistorica I: 189–97.
- 1982c. La période des chars au Sahara. L'hypothèse de l'origine égyptienne du cheval et du char. In G. Camps and M. Gast (eds), *Les chars préhistoriques du Sahara*, Sénanque, Mars 1981, pp. 45–56.
- 1982d. Le vocabulaire zoologique relatif aux bœufs en Égypte, au Maghreb et au Sahara durant l'Holocène. Bulletin de l'Association Internationale d'Étude de la Préhistoire de l'Égypte 4: 21–39.
- 1982e. Les 'Martiens' dans les peintures des Têtes Rondes du Tassili. *Travaux de l'Institut d'Art Préhistorique* 24: 117–96.
- 1983a. Nouvelles peintures et gravures du Tassili du N.-O. Le quadrige 'grec' (découverte Kunz). *Nyame Akuma* 22: 18–22.
- 1983b. L'art rupestre du Sahara central: classification et chrono-logie. Le bœuf dans la Préhistoire africaine. Thèse de Troisième Cycle, Université de Provence, 2 vols, 602 p., 135 ill.
- 1983c. Incertitudes sur les datations C14 du Néolithique saharien: abords des sources et des lacs, sols, croûtes. *Congrès Préhistorique de France*, 21e Session, Montauban Cahors (sept. 1979), II: 207–18.

- 1984a. Reconsidération du problème du *Bos ibericus* au Maghreb. In W. H. Waldren, R. Chapman, J. Lewthwaite and R.-C. Kennard (eds), *The Deya Conference of Prehistory, early settlement in the western Mediterranean islands and the peripheral areas*, BAR International Series 229: 211–33. Oxford.
- 1984b. Les premiers ovicaprinés domestiques au Sahara. Nabta Playa, les figurations d'Ouenat et les 'Steinplätze'. Actes du 2e Colloque Euro-Africain 'Le passé du Sahara et des zones limitrophes de l'époque des Garamantes au Moyen Âge'. L'Universo LXIV(5): 150–47.
- 1985a. Review of F. Fedele and G. Turco 1982, Preistoria del Teneré (Sahara centrale). Storia et materiali della Collezione Turco, Museo Civico Craveri di Storia Naturale, Bra (Piemonte). Ars Praehistorica III–IV(1984–1985): 307–8.
- 1985b. Les climats au Sahara et sur ses bordures, du Pléistocène final à l'Aride actuel. *Empuries* 47: 8–27.
- 1986a. Les traits originaux d'une 'révolution néolithique' en zone aride ou semi-aride (Nord de l'Afrique). *Cahiers ligures de préhistoire et de protohistoire*, Nouvelle série 3: 5–27.
- 1986b. L'art rupestre préhistorique des massifs centraux sahari-ens. B.A.R. International Series 318, Oxford.
- 1986c. Article 'Akakus'. Encyclopédie Berbère III: 399-408.
- 1987a. Tassili-Sud, Aïr oriental, Ténéré, Djado. La frontière orientale des écoles rupestres du Sahara central. Ars Praehisto-rica V–VI (1986–1987): 103–30.
- 1987b. Deux nouveaux 'Ekade Ektab'. Ars Praehistorica V–VI (1986–1987): 265–71.
- 1987c. Les premiers moutons sahariens d'après les figurations rupestres. *Archeozoologia* I(2): 129–48.
- 1987d. Une ébauche de scénario pour le peuplement ovin ancien dans le Bassin méditerranéen. In J. J. Lauvergne (ed.), *Populations traditionnelles et premières races standardisées d'ovicaprinæ dans le Bassin Méditerranéen*, Colloques de l'INRA 47: 289–98.
- 1988a. Le 'Style de Tazina': définition, extension, signification de ses figurations les plus méridionales (Fezzân, Tassili, Djado, Aïr). *Préhistoire Ariégeoise* XLIII: 179–201.
- 1988b. L'évolution technologique du bige au quadrige en Médi-terranée orientale, au Maghreb et au Sahara: quand et pourquoi? IInd Deià Conference of Prehistory, September 23rd to September 30th 1988, Deià (Mallorca, Baleares, Spain): Deià Archaeological Museum & Research Centre, res. 30, 1–5.
- 1988c. Les chars des stèles du Sud-Ouest de la péninsule ibérique, les chars des gravures rupestres du Maroc et la datation des chars sahariens. *Actes Congreso Internacional 'El Estrecho de Gibraltar'*, Ceuta (Nov. 1987), I: 361–89.
- 1988d. The 'Chariot-Period' of the rock art chronology in the Sahara and the Maghreb: a critical reappraisal of the traditional views. In M. Lorblanchet (ed.), Rock art in the Old World. Papers presented in Symposium A of the AURA Congress, Darwin (Australia). IGNCA Rock Art Series-1: 9–31, New Delhi.
- 1988e. Review of F. Soleilhavoup, Éléments de préhistoire de l'Afrique du Nord et du Sahara. Préhistoire Ariégeoise XLIII: 239–41.
- 1988f. Figurations rupestres de chars avec attelage, de part et d'autre du Ténéré (Arkana et Oued Taguei, Niger). L'exten-sion des 'Libyco-berbères' au Djado. *Sahara* 1: 99–101.
- 1989a. New finds of late Round Head paintings in northern Tassili and the break of the 'Postneolithic Arid Phase'. *Nyame Akuma* 31: 2–8.
- 1989b. Les peintures rupestres de Ti-n-Moussa (tassili-n-Ajjer, Algérie). Têtes Rondes tardifs, groupe d'Iheren-Tahilahi, groupe d'Abaniora. *Sahara* 2: 31–48.
- 1989c. Les Nilo-Sahariens et l'archéologie. In D. Barreteau and C. von Graffenried (eds), Actes Séminaire 'Méga-Tchad', 'Datations et chronologie', pp. 77–101. Orstom, Paris.

- 1989d. Les débuts de la domestication des animaux en Afrique: faits et problèmes. *Ethnozootechnie* 42: 7–22.
- 1989e. L'état actuel des études sur l'art rupestre saharien: pesanteurs et perspectives. Ars Præhistorica VII–VIII (1988–1989): 265–77.
- 1989f. La 'néolithisation' du Nord de l'Afrique et ses causes. In O. Aurenche and J. Cauvin (eds), *Néolithisations*. BAR International Series 516, pp. 145–186. Oxford.
- 1989g. Essay review. A reappraisal of the 'Neolithic' of Tichitt (Mauritania). *Journal of Arid Environment* 16: 101–5.
- 1989h. Pour des approches rationnelles et différenciées dans l'étude des divers centres mondiaux d'art rupestre préhistori-que. *Espacio, Tiempo y Forma* 2: 15–47.
- 1990a. The sheep in Saharan rock art. Rock Art Research 7: 93-109.
- 1990b. La datation des chars 'au galop volant'. *Sahara* 3: 115–8. 1991a. Masques et théromorphes dans l'art rupestre du Sahara
- central. ArchéoNil 1: 16–42.
- 1991b. Les débuts de la domestication au Sahara et les gravures rupestres les plus anciennes ('école bubaline'). *Préhistoire Ariégeoise* 46: 211–33.
- 1991c. Proposals for updating the rock-drawings sequence of the Acacus (Libya). *Libyan Studies* 22: 7–30.
- 1991d. Que sont les 'Chasseurs' et les 'Chasseurs-Pasteurs' du Fezzan? *Espacio, Tiempo y Forma* 4: 269–82.
- 1991e. Article 'Bœuf (Préhistoire)'. *Encyclopédie Berbère* X: 1547-54.
- 1991f. The technological evolution from Biga to Quadriga in the eastern Mediterranean, the Maghreb and the Sahara: when and why? In W. H. Waldren, J. A. Ensenyat and R.-C. Kennard (eds), *IIInd Deya International Conference of Prehistory*, BAR International Series 574, vol. II: Archaeological Technology and Theory, pp. 307–320.
- 1992a. Dating the earliest central Saharan rock art: archaeological and linguistic data. In A. Friedman and B. Adams (eds), *The followers of Horus. Studies dedicated to Michael Allen Hoffman*, Egyptian Studies Association Publication No. 2, Oxbow Monographs 20, Oxbow Books, Oxford.
- 1992b. Henri Lhote. *La politique, les connaissances, la culture en 1991*. Encyclopaedia Universalis (Universalia 1992): 571–572, Paris.
- 1992c. Le profane et le sacré dans l'art rupestre saharien. *Bulletin de la Société Française d'Égyptologie* 124: 24–70.
- 1992d. Le 'Bovidien' dans l'art rupestre saharien: un ré-examen critique. *L'Anthropologie* 96(4): 737–58.
- 1992e. Zur Chronologie der Felsbild-Darstellungen in der Sahara. In G. Göttler (ed.), Die Sahara: Mensch und Natur in der größten Wüste der Erde, pp. 307–311. DuMont Buchver-lag, Köln.
- 1992f. Henri Lhote: l'homme et l'œuvre. Sahara 4: 103-7.
- 1993a. Les Nilo-Sahariens et l'archéologie. Dans: D. Barreteau and C. von Graffenried (eds), Datation et chronologie dans le Bassin du Lac Tchad, pp. 77–101. ORSTOM, Paris.
- 1993b. Les images rupestres des premiers pasteurs du Sahara. In C. Flon (dir.), *Le grand atlas de l'art*, pp. 22–23, Encyclopae-dia Universalis, Paris.
- 1993c. The emergence of a food-producing economy in the Sahara. In T. Shaw, P. Sinclair, B. Andah and A. Okpoko (eds), *The archaeology of Africa. Food, metals and towns*, pp. 227–239. Routledge, London.
- 1994a. Les béliers sacrés dans l'art rupestre saharien. In C. Berger, G. Clerc and N. Grimal (eds), *Hommages à Jean Leclant, Institut Français d'Archéologie Orientale, Bibliothèque d'Étude* 106(4): 247–71.
- 1994b. Sur la datation des figurations rupestres sahariennes. *Sahara* 6: 124–9.
- 1994c. Les chars au Sahara et en Égypte. Les chars des 'Peuples

de la Mer' et la 'vague orientalisante' en Afrique. *Revue d'Égyptologie* 54: 207–34.

- 1995a. Faunes holocènes du Maroc et variations des aires de distribution de certaines espèces sauvages dans le Nord de l'Afrique. L'expansion récente de l'Oryx dammah. In E. Ripoll Perello (ed.), Actes du 2e Congrès International de Ceuta 'El Estrecho de Gibraltar' (Nov. 1990), pp. 215–44.
- 1995b. Les images rupestres du Sahara. Self-published, Toulouse.
- 1995c. Les approches du monde symbolique dans l'art rupestre saharien: Préhistoire et science des religions. In R. Chernokian (dir.), L'Homme méditerranéen. Mélanges offerts à Gabriel Camps, Professeur émérite de l'Université de Provence, pp. 179–193. Publications de l'Université, Aixen-Provence.
- 1995d. Sur 'leopard-hunting scenes in dated rock paintings from the northern eastern desert of Egypt', par J. J. Hobbs and S. M. Goodman. *Sahara* 7: 125–6.
- 1995e. Arte rupestre del Sahara / Art rupestre du Sahara / Rock art of Sahara. CeSMAP / AARS, Pinerolo.
- 1996. Saharan rock art. In J. O. Vogel (ed.), Encyclopedia of precolonial Africa. Archaeology, history, languages, cultures, and environments, pp. 347–352. Altamira Press, Walnut Creek/ London/New Delhi.
- 1997. La notation des dates au C14. La Lettre de l'AARS 13: 19–22.
- 1998. La notation des dates au C14 (suite). *La Lettre de l'AARS* 14: 9–13.
- 1999a. La notation des dates au C14 (suite). *La Lettre de l'AARS* 16: 18–24.
- 1999b. Sur la méthode de datation par les films de silice. *Les Cahiers de l'AARS* 5: 11–14.
- 2000a. Livestock in Saharan rock art. In R. Blench and K. C. MacDonald (eds.), *The origins and development of African livestock: archaeology, genetics, linguistics and ethnography,* pp. 87–110.
- 2000b. Commentaires sur le 'Third AURA Congress'. La Lettre de l'AARS 18: 17–19.
- 2001a. Le droit de reproduction (copyright) des images (... rupestres ou non). *La Lettre de l'AARS* 19: 18–21.
- 2001b. Les relations entre l'Égypte et le Sahara aux temps néolithiques. In J. Cervello Autuori (ed.), Africa antiqua. El antiguo Egypto, una civilizacion africana, Aula AEgyptiaca studia 1: 205–218.
- 2001c. Au sujet de l'origine de l'écriture libyque. *La Lettre de l'AARS* 19: 23–26.
- 2001d. Code of ethics. La Lettre de l'AARS 20: 14-16.
- In press. Classifying a set of rock art: how to choose the criteria. In R. G. Bednarik (ed.), *Rock art and epistemology: courting sophistication*. Brepols, Turnhout.

In collaboration:

- With Robert G. Bednarik, Mario Consens, Jakov Sher and Dario Seglie:
- 2003. *Glossary of rock art research: a multilingual dictionary.* Brepols, Turnhout.
- With Aldo Boccazzi:
- 1991. The rock-paintings of Tikadiouine (Tassili n'Ajjer, Algeria) and the Iheren-Tahilahi Group. *Proceedings of the Prehistoric Society* 57(2): 21–34.
- With Gérard Crevon, Louis-Noël Viallet and François Pottier:
- 1992. Essai de classification des peintures de l'Immidir (Algérie). Sahara 4: 135–40.
- With Jean-Claude Friquet and Danielle Lelièvre:
- 1995. Un char au 'galop volant' dans l'Oued Beridj (Tadrart algérienne). Sahara 7: 101.

With Achilles Gautier:

1991. The life and times of the giant buffalo alias Bubalus / Homoioceras / Pelorovis antiquus in North Africa, Archaeo-zoologia IV(1): 39–92.

With Hans Kolmer:

- 1982. Les peintures des 'Têtes Rondes' et les peintures de l'ère 'pastorale' dans l'Acacus (Libye). Chronologie relative et chronologie absolue. *Ars Praehistorica* I: 99–122.
- 1983. Les gravures et peintures rupestres de l'Acacus (Libye): une révision de la classification et de la chronologie relative traditionnelles. *Bulletin de la Société Préhistorique de l'Ariège* 38: 165–85.

With François and Françoise Pottier:

2002. El-Moor (Libye): la limite nord-est de l'école de Tazina. In J.-L. Le Quellec (dir.), *Ithyphalliques, traditions orales, monuments lithiques et art rupestre au Sahara. Préface du Pr. Alain Jardin. Les Cahiers de l'Association des Amis de l'Art Rupestre Saharien*, pp. 163–171.

Forthcoming events

Flowing through time. Calgary, Canada, 12 to 16 November 2003. The 37th Annual Chacmool Conference will explore archaeology through 'Humans and their aquatic environment' (see detailed announcement above). For details contact *chacmool@ucalgary.ca*

VI Simpoiso Internacional de Arte Rupestre. This event will be held from 29 November to 4 December 2003, in Jujuy, north-western Argentina. For details see *RAR* 19: 144. Please contact *grupoyav@imagine.com.ar*

Biennial Meeting of the Southern African Association of Archaeologists. Kimberley, South Africa, 4 to 7 April 2004.

For details see page 183. Please contact Leon Jacobson, McGregor Museum, Fax No.: 053-842-1433; e-mail: *jake@museumsnc.co.za*

Rock Carvings of North and West Europe. London, United Kingdom, 15 to 16 April 2004. A symposium organised by the British Academy in Association with the Royal Swedish Academy of Letters, History and Antiquities. For details, telephone 020 7969 5246 or visit *www.britac. ac.uk/events*

Le temps: 129e congrès national des sociétés historiques et scientifiques. Besançon, France, 19 to 24 April 2004. This major congress is held by the Comité des traveaux historiques et scientifiques, 1 rue Descartes, 75231 Paris cedex 05, France. Please contact Isabelle Tarier, congres. cths@recherche.gouv.fr

The next *IFRAO Congress* is to be held in India from 28 November to 2 December 2004 at Agra, India. It will be the only major rock art conference between now and 2006, and will be chaired by RASI (the Rock Art Society if India). For current details please see First Announcement, *IFRAO Report No. 31* on the next pages. Contact girirajrasi @ yahoo.com

The Editorial Board of RAR has secured a new outstanding member, R. G. ('ben') Gunn, who needs no introduction here. He has been one of Australia's most outstanding rock art specialists for many years and we consider ourselves fortunate to have him aboard.

Hamilton AURA Inter-Congress Symposium, October 2003: delegates form spontaneous discussion groups during a break in academic proceedings. The event was the most intimate and pleasant AURA conference ever held.

IFRAO Report No. 31



The Rock Art Society of India (RASI) in collaboration with The Archaeological Survey of India (ASI) will hold

The RASI-2004 International Rock Art Congress, Agra

nominated as

The Tenth Congress of The International Federation of Rock Art Organisations (IFRAO) 28 November to 2 December 2004

Rock Art Research: Changing Paradigms

Academic Committee

Robert G. Bednarik, Australia; S. P. Gupta, India; Joerg Hansen, France; V. N. Misra, India; R. S. Bisht, India; Jack Steinbring, U.S.A.; R. K. Sharma, India; Jean Clottes, France; R. C. Agrawal, India; Fidelis T. Masao, Tanzania; Pisit Charoenwongsa, Thailand; Rakesh Tewari, India; Majeed Khan, Saudi Arabia; Jean-Loïc Le Quellec, France; K. K. Chakravarty, India; Mario Consens, Uruguay; G. L. Badam, India; Yann-Pierre Montelle, U.S.A.; Paul S.

Bhimbetka, India

C. Taçon, Australia; Yashodhar Mathpal, India; Thomas Wyrwoll, Germany; Ashvini Kumar Sharma, India; Paul Faulstich, U.S.A.; Sadashib Pradhan, India; Alan Watchman, Australia; R. K. Chaudhury, India; Mila Simões de Abreu, Portugal; S. B. Ota, India; B. K. Swartz, Jr., U.S.A.; Graeme K. Ward, Australia; V. H. Sonawane, India; Matthias Strecker, Bolivia; Jane Kolber, U.S.A.; Dario Seglie, Italy; Alok Tripathi, India; Kevin Sharpe, United Kingdom; and Giriraj Kumar, India.

Organising Committee

S. P. Gupta, V. N. Misra, R. C. Agrawal, Giriraj Kumar, G. L. Badam, Ashvini Kumar Sharma, V. H. Sonawane, S. Chakraverty, R. K. Sharma, Amrendra Nath, K. P. Punacha, B. R. Mani, D. Dayalan, Ragni Roy, N. S. Bhatt, R. K. Agrawal, Munishwar Gupta, S. Pradhan, Dilip Padhi, S. B. Ota, K. K. Muhammed, Rakesh Tewari, Narayan Vyas, N. K. Samadhia, Brijesh Prajapati, Alok Tripathi, R. K. Pancholi, M. L. Sharma and P. K. Bhatt.

Congress Chairmen S. P. Gupta and Giriraj Kumar

All aspects of global rock art studies will be addressed, with emphasis on current concerns and developments, the future direction of the discipline and its global priorities. About 500 scholars will participate and around 300 papers are likely to be presented and discussed in about 20 Symposia and workshops. The Congress Web-site is located at *http://mc2.vicnet.net.au/home/ifrao/web/agra.html*.

Symposium/workshop themes

Please see p. 192 for rationales and calls for papers.

Other events

Besides these, the Congress comprises a number of special events including the Dr V. S. Wakankar Memorial Lecture and other scholarly and public lectures, the IFRAO Meeting 2004, the RASI General Meeting 2004, film and slide shows on Indian and global rock art, poster presentations and exhibitions by the delegates, and a substantial program of field trips and excursions after the Congress. Other special events will be announced progressively.

Special attraction

Post-congress RASI field trips to the following rock art and natural sites and adjoining archaeological monuments will be led by scholars working in the respective regions. Most of these sites are being exposed to the world community of the rock art scientists for the first time, hence the field trips present a rare opportunity to see the wonder that Indian rock art is.

- Bhimbetka and adjoining regions, led by S. B. Ota and Narayan Vyas;
- Chambal valley in Madhya Pradesh, led by Giriraj Kumar and R. K. Ganjoo;
- 3. Uttar Pradesh, led by Rakesh Tewari;
- 4. Chhattisgarh and Orissa, led by Sadashib Pradhan and Pradeep Padhi.

For details please refer to the field trips (below) and also to the web-sites *www.travelogindia.com* and *http://mc2.vicnet.net.au/home/ifrao/web/agra.html*.

General information

India is a country with exotic landscapes, varied geographical features, vibrant cultures and fascinating people with colourful lives well known for their affectionate hospitality. It is a land of long history of civilisation and culture, hence boasts of magnificent monuments representing the Indian marvels in art, architecture and science. Out of these, twenty-four have been inscribed as World Heritage sites by UNESCO. Bhimbetka Complex of the rockshelters in Madhya Pradesh, with its magnificent and towering natural rock architecture and rich rock art galleries set in the lush green Vindhya Hills, and sedimentary deposits bearing stone artefacts revealing the occupational history of the site beginning from the Middle Pleistocene period is a latest addition to this list.

Agra, the ancient capital of the Mughal emperors, is a must-see destination for the tourist visiting India. It is famous for its legendary monument Taj Mahal, the symbol of love and one of the world's most renowned architectural marvels. It has become the synonym of India. Besides, Agra Fort and the red sandstone monuments at Fatehpur Sikari are other attractions. One can also have an opportunity to visit rock art sites at Madanpura near Fatehpur Sikari (both world heritage sites). The climate at Agra in particular and in central India in general in November-December is pleasant, the temperature varies between 18°C and 28°C and this is the peak season for tourism. Agra, during the year 2004, will be a city of festivities as the year 2004 is being celebrated as the International Taj Year by the Government of Uttar Pradesh.

Agra is well connected by air, fast trains and four-lane highway to Delhi (220 km). By train and bus travel time to and from Delhi is three to four hours.

The Rock Art Society of India (RASI)

The Rock Art Society of India was founded in 1990 and has about 150 members. Right from its birth it was a member of International Federation of Rock Art Organisa-tions (IFRAO) and provides an international forum for the dissemination of research findings. The RASI journal Purakala, also established in 1990, is the only Indian journal completely devoted to the promotion of scientific research and popularisation of rock art heritage. With its 13 volumes it is one of the major journals of the IFRAO family. Discovery of the earliest rock art (cupules and other petroglyphs) of the world and the EIP Project to test their antiquity scientifically by the International Commission under the aegis of the IFRAO are its latest achievements. The RASI-2004 International Congress is the world's premier academic event in the discipline of purakala (palae-oart) studies and cognitive archaeology. Congress participation as well as membership with RASI is open to all.

Venue of the Congress

Hotel Jaypee Palace and Convention Centre is the venue of the Congress. It is a high-tech, 5-star deluxe hotel with the best facilities for holding international conventions at Agra. It is a magnificent structure in red sandstone and marble, spread in 25 acres of tastefully landscaped, lush greenery interspersed with huge water bodies and long walkways, and a magical creation that impeccably blends Mughal and contemporary architecture with modern amenities. It is located on Shamsabad Road, 2.5 km from the Taj Mahal and 9 km from Agra Cantt. Railway Station.

190 Registration fees

Prior to 10 Aug. 2004	After 10 Aug.
IFRAO-affiliated members US\$300.00	US\$400.00
Non-members	US\$500.00
US\$600.00	

Registration fees will entitle the delegates to participate in the Congress, affiliated programs and cultural events, to receive pre-Congress literature including Congress program and manual with abstracts of all papers, tea/coffee in the breaks and lunch during the Congress days, Microsoft PowerPoint facilities with LCD projectors for presentation of papers.

Besides, the delegates will also get the subsidised transport and reception from Indira Gandhi International Airport, New Delhi, to the respective hotels in Agra by air-conditioned coaches, from there to the venue and back on nominal payment, with complimentary guided tour to Taj Mahal and Agra Fort monuments (entry fees, if any, extra), guided subsidised field trip to the Madanpura rock art site and Fatehpur Sikari monument and trip to the shopping centre in Sadar market during the Congress days.

Accommodation to be booked by RASI

Because of the Taj Mahal, Agra is the most attractive tourist centre in India and 2004 is celebrated as the International Taj Year, the negotiated rates are the best possible conditions for the November/December, the months of the peak tourist season. They are the result of several months of hard work and negotiations.

A. The Hotel Jaypee Palace, Agra, a 5-star deluxe hotel, is well known for its friendly and affectionate services. It is also the venue of the Congress. The discounted rates for the Congress delegates given by the hotel are US\$72.00 MAPAI for single room, and US\$44.00 MAPAI per person in double-occupancy room. These rates are per night and include breakfast and dinner and are also inclusive of all applicable taxes at present rate (any increase in tax structure will be on the account of the guest delegates).

By booking your accommodation in the Hotel Jaypee Palace, Agra, you will remain in one building all day and save your valuable time, money and energy. You will also receive 25% discount on the hotel services.

B. Hotel Clarks Shiraz, 5-star hotel, 7.0 km from the Congress venue:

Single room US\$60.00 + taxes MAPAI;

Twin sharing US\$40.00 + taxes MAPAI per person.

C. Hotel Deedar – E – Taj, 3-star hotel, 2.0 km from the Congress venue (without swimming pool):

Single room US\$35.00 MAPAI inclusive of taxes;

Twin sharing US\$25.00 MAPAI per person inclusive of taxes.

D. Hotel Kant, 3-star hotel, 3.5 km from the Congress venue:

Single room US\$35.00 MAPAI inclusive of taxes; Twin sharing US\$25.00 MAPAI per person inclusive of taxes.

E. Hotel Amar, 3-star hotel, 4.0 km from Congress venue: Single room US\$35.00 MAPAI inclusive of taxes; Twin sharing US\$27.00 MAPAI per person inclusive of taxes.

Subsidised transport and travel

Reception of the delegates at Indira Gandhi International Airport, Delhi, and transport in air-conditioned coaches to their respective hotels at Agra, then to the Congress venue to and fro from 27 November to 2 December 2004: For delegates staying at Hotel Jaypee US\$18.00; For delegates staying at other hotels US\$40.00.

Travel management

Travelogue is the authorised Travel Agent of the RASI-2004 Congress. You can plan your visit to any tourist destination in India with them. You can contact Mr Arvind Srivastava, Director of Travelogue on his e-mail, *travelog@ datainfosys.net* and visit him on the web site *www.travelog india.com* or contact on mobile number 9412253727, 9837002674 (country code +91, city code 562). You can also visit the site of India Tourism: *www.tourismindia.com*.

All non-English communications should be directed to Robert G. Bednarik at *robertbednarik@hotmail.com*

POST-CONGRESS RASI FIELD TRIPS

To be led by the scholars and scientists working in the respective regions. Most of these sites are being exposed to the world community of rock art scientists for the first time, hence the field trips have to be managed by RASI with the help of RASI members, ASI authorities and travel agents. Therefore, RASI field trips have to be booked by sending the required amount along with the registration fees on or prior to the stipulated date, 10 August 2004.

A. Bhimbetka and the surrounding region

Led by S. B. Ota and Narayan Vyas

This is a three-nights and three-days tour which will start from Agra on the late evening of 3 December and will terminate at Bhopal on the evening of 5 December 2004. Bhimbetka, the largest complex of rockshelters, is famous for its magnificent and towering natural rock architecture and rich rock art galleries set in the lush green of the Vindhya Hills. Excavation of some of the rockshelters here has revealed a continuous sequence of human habitation from Lower Palaeolithic to Historic periods. It has been inscribed as the World Heritage Site in the Cultural Landscape category by the UNESCO in 2003. The region around Bhimbetka and Bhopal is equally rich in rock art and archaeology. A visit to these sites will be refreshing and a feast, both to the eyes and mind. It would be a unique experience to both tourists and scholars. All the tour programs of the Congress have been designed in such a way that the interested delegates can have a chance to visit at least Bhimbetka and Sanchi, both World Heritage sites, and the surrounding heritage sites of Bhopal. The organisers of the Congress strongly recommend the delegates to participate in this tour.

Sites expected to be visited are: Buddhist monuments at Sanchi, rock art sites at Raisen and Bhimbetka, Bhojpur temple with architectural drawings engraved on the rocks, Bharat Bhwan, archaeological museum and Museum of Man at Bhopal.

The **cost** will be advised shortly. Advance booking is necessary to make the requisite arrangements, which can be done by sending US\$100.00 along with the registration fees. Final payment can be made at the registration counter during the Congress days. The deadline for booking the tour is 10 August.

Please e-mail your inquiries concerning academic aspects to Dr S. B. Ota, Superintending Archaeologist, Archaeological Survey of India, Bhopal Circle, GTB Complex, T.T. Nagar, Bhopal - 462 003, India; Telefax: +91 755 2558250 E-mail: *asibpl@rediffmail.com*

For travel and accommodation contact Mr Arvind Srivastava, Director, Travelogue, e-mail: travelog@datainfosys.net

B. Chambal valley sites

To be led by Dr Giriraj Kumar and Dr R. K. Ganjoo

This is a two-nights and two-days tour. It will start from Bhopal on the evening of 5 December and will terminate at Bhawanimandi on the evening of 7 December, 2004.

The Bhanpura-Gandhi Sagar region in the Chambal valley is one of the richest zones of the Palaeolithic rock art and archaeological sites in the world. The famous Palaeolithic cupule cave Daraki-Chattan with more than 500 cupules executed on its vertical walls is located in the Indragarh Hill near Bhanpura. The back of the hill presents a palaeo-channel of a mighty river of pre-Quaternary age. The cave is facing the valley of the river Rewa which has been a cradle of Palaeolithic man. Lower Palaeolithic-rich factory sites have been exposed on its banks and talus of the hill. Daraki-Chattan is a major site being excavated and scientifically investigated by an International Commission under the multidisciplinary EIP Project, a RASI-AURA joint venture under the aegis of IFRAO, supported by the ASI, ICHR and other organisations and scientific laboratories in India and Australia.

Chaturbhujnath nala near Gandhi Sagar has one of the longest and richest rock painting galleries in the world, more than 1 km long. The biggest composite animal and a dissected reptile figures form a special attraction at a big rockshelter at Gandhi Sagar. Besides, Buddhist caves and temples carved into the laterite hill at Dharmrajeshwar form other attractions. The Chambal valley tour will provide an opportunity to visit these sites. It has been designed especially for the scientists and scholars interested in Palaeoli-thic art, rock paintings, archaeology and palaeo-climatic studies. During the tour the maximum daytime temperature is likely to be around 25°C and nights will be cooler at 17°C. The tour is possible with a minimum of eight and a maximum of twelve participants on a first-come-first-served basis.

Tour cost is US\$170.00 per participant, which includes the journey by train in a/c coach from Bhopal to Bhawani-mandi, transport, twin-shared accommodation in guest house/hotel, breakfast, working lunch in the field, dinner, bottled drinking water (alcoholic bever-

ages and cold drinks are not covered), and all permits. It also includes the cost of the return journey ticket to either Hazarat Nizamuddin Railway station (New Delhi) or Jaipur Railway station by train on the choice of the participating delegates. For return journey to Mumbai by train please add US\$8.00.

Advance booking is necessary to make the requisite arrangements, which can be done by sending US\$85.00 along with the registration fees. Final payment can be made at the registration counter during the Congress days. The deadline for booking the tour is 10 August.

Please e-mail your inquiries concerning academic aspects to Dr Giriraj Kumar, President, Rock Art Society of India, c/o Faculty of Arts, Dayalbagh Educational Institute, Dayalbagh, Agra-282005, India.

E-mail: girirajrasi@yahoo.com

For travel and accommodation, contact Mr Arvind Srivastava, e-mail: *travelog@datainfosys.net*

C. Rock art and heritage sites of Chhatisgarh and Orissa

To be led by Sadasiba Pradhan and Dilip Kumar Padhi, 5 December to 12 December 2004 (8 days)

The journey takes the participants to some of the prime rock art sites in eastern India (more than 15 rock art sites with over 2000 rock pictures, both paintings and petro-glyphs) along with a host of other tourist attractions like (a) a rare assemblage of Historic monuments ranging from the 3rd century B.C. to the 13th century A.D.; (b) wild life sanctuary and wild life park, (c) Hirakud Dam across Mahanadi, the longest dam in Asia and (d) the Golden Beach on the sea. The tour is a combination of a/c coaches in train and air-conditioned luxury cars. During the tour the maximum daytime temperature is likely to be around 20°C and nights will be cooler at 10°C.

The tour is possible with a minimum of 16 participants and a maximum of 40 (on a first-come-first-served basis). **Tour cost** is US\$500.00 per participant. The price quoted includes transport, twin-share accommodation in hotels, breakfast, lunch in field, bottled drinking water (alcoholic beverages and cold drinks are not covered), and all permits and entry fees. Evening meals at hotels shall be at participants' own expense.

Advance booking is necessary to make the requisite arrangements which can be done by sending US\$200.00 along with the registration fees. Final payment can be made at the registration counter during the Congress days. The deadline for booking the tour is 10 August 2004. The proposed itinerary is as follows:

- Day 1 Sunday, 5 December 2004, departure from Bhopal by train at 5 p.m.
- Day 2 Monday, 6 December 2004, visit to Ramjharan and rock art at Singhanpur. Stay at Raigarh in hotel accommodation.
- Day 3 Tuesday, 7 December 2004, visit two important rock art sites, paintings at Kabrapahad and Karmagarh Ushakuthi. Night at Jharsuguda in hotel accommodation.
- Day 4 Wednesday, 8 December 2004, visit petroglyphs at Ulap, Vikramkhol, Lekhamoda, and paintings at Gangakhol, Sargikhol, and Phuldungri. Night at Sam-balpur

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in hotel accommodation.

- Day 5 Thursday, 9 December 2004, visit to Hirakud Dam, Leaning Temple at Huma and wild life sanctuary of Debrigarh. Night at Sambalpur in hotel accommodation.
- Day 6 Friday, 10 December 2004, visit petroglyphs at Bhimmandali and Ambajhol Khol. Night at Bhubanes-war in hotel accommodation.
- Day 7 Saturday, 11 December 2004, visit World Heritage Monument at Konark, Jagannath temple at Puri and Golden Beach on the sea. Night at Bhubaneswar in hotel accommodation.
- Day 8 Sunday, 12 December 2004, visit Wild Life Park at Nandankanan, rock edicts of 3rd century B.C at Dhauli., rock-cut caves of 1st century B.C at Khandagiri and Udaigiri and Kalingan. Temple art and architecture from 6th – 13th centuries A.D., and the State Museum. Night at Bhubaneswar in hotel accommodation

The tour terminates at Bhubaneswar on Sunday the 8th December 2004. Participants have the option to fly back home either from Delhi or from Calcutta or any other International Airport (Bombay and Madras) on the next day (Monday the 13th December 2004) or the day after.

On Tuesday the 14th December 2004 one has the option of travelling either by train or by air from Bhubaneswar.

Tickets can be booked for this return journey on payment, which is not covered in the tour cost of US\$500.00.

Please e-mail your inquiries concerning academic aspects to Sadasiba Pradhan, STQ-5, Sambalpur University Campus, Jyoti Vihar 768 019, India; Tel. No.: +91663 2430175, mobile: +91943 7052175.

E-mail: *spradhan55@yahoo.co.in*

For travel and accommodation, contact Dilip Kumar Padhi, Hotel Sujata, Sambalpur 768 001, India; Telephone Nos. +916632401302, Mobile: +919437055266, +91986 025266.

E-mail: vu2dpi@vsnl.com

D. Khajuraho, Prayag, Varanasi and Mirzapur

To be led by Rakesh Tewari

Details to be provided in the beginning of 2004 (see Congress Web-site *http://mc2.vicnet.net.au/home/ifrao/web/agra.html*).

Please e-mail your inquiries to Dr Rakesh Tewari, Director, Archaeological Organisations and Museums, Govt. of Uttar Pradesh, 27/1, Kaisarbagh (Near Rai Uma Nath Bali Auditorium), Lucknow – 226 001, India. E-mail: *rakeshlko@rediffmail.com*

SYMPOSIUM / WORKSHOP RATIONALES

Symposium A

GLOBAL PERSPECTIVES OF ROCK ART

Chaired by Robert G. Bednarik (Australia) Co-chaired by *Africa*: Jean-Loïc Le Quellec (France) *Asia*: Majeed Khan (Saudi Arabia) *Europe*: Jean Clottes (France) *North America*: Jack Steinbring (U.S.A.) *South America*: Mario Consens (Uruguay)

Recent developments in the study of rock art, especially since 1988, have been marked by a trend away from isolated research efforts towards internationalisation and global collaboration. Previously, rock art studies were conducted largely on a regional basis, dealing mostly with local issues and phenomena, and individual researchers had relatively little contact with colleagues in other regions or continents. Attempts of treating rock art holistically were then often limited to the creation of diffusionist models. The emergence of a dynamic, burgeoning discipline over recent years is to a large degree attributable to the replacement of the previous system by one guided by global perspectives. This involved various forms of standardisation, a gradual diminishment of the differences between previously isolated research schools and researchers, and the establishment of formal structures to underpin this approach.

The results of these developments are already becoming evident. It has been found that the most productive and consequential work is that conducted with a global perspective in mind, or one that addresses universal issues. This has led to a notable increase in such fields as conservation studies, site management studies, site recording work, technological analyses of rock art, development of methodology, dating and other analytical work with rock art—indeed, any aspect that lends itself to universal application. The symposium 'Global perspectives of rock art' invites contributions that review these developments, but it also seeks to include studies illustrating the effects of holistic approaches in interpretative endeavours, how they serve to illuminate the deficiencies of isolated studies, and how they have informed the manner in which regional studies are conducted nowadays.

The submission of presentation titles together with abstracts of up to 150 words is cordially invited for this symposium. Submissions will be warmly welcomed by any of the six chairmen:

Jean-Loïc Le Quellec: *JLLQ@aol.com* Majeed Khan: *majeedkhan42@hotmail.com* Jean Clottes: *j.clottes@wanadoo.fr* Jack Steinbring: *SteinbringJ@ripon.edu* Mario Consens: *consens@adinet.com.uy* or to Robert G. Bednarik, AURA, P.O. Box 216, Caulfield South, VIC 3162, Australia. E-mail: *robertbednarik@hotmail.com*

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Symposium B

EARLY INDIAN PETROGLYPHS AND PRE-UP-PER PALAEOLITHIC ART OF THE WORLD

Chaired by Giriraj Kumar (India) and Robert G. Bednarik (Australia)

Pre-Upper Palaeolithic rock art and portable palaeoart finds are gradually emerging from many parts of the world, including Asia, Africa and Australia. Of particular importance are non-iconic petroglyphs, especially cupules and apparent patterns created out of them. The evidence in the form of early petroglyphs from India is crucial to the exploration of hominid cognition. It presents a gradual evolution of cupule patterns and other forms of petroglyphs, leading to the development of motifs and designs in rock art. It provides a solid basis for understanding the beginning of human visual creations before the well-known forms of animals in western European Upper Palaeolithic art. It is being scientifically studied by the multidisciplinary Early Indian Petroglyphs (EIP) Project under the supervision of an international commission. The EIP Project is a joint venture by RASI and AURA under the aegis of the IFRAO. It is supported by the Archaeological Survey of India, the Indian Council of Historical Research and the Australia-India Council in Canberra. The primary objective of the EIP Project is to investigate and test the extraordinary claims from India that imply that the earliest known rock art tradition in the world may have been found in that country. If correct, certain archaic art traditions in India could be several times as old as the oldest previously dated rock art, that of the Upper Palaeolithic of France (dated to about 32 ka in Chauvet Cave). The proposition of an extremely early cultural sophistication in southern Asian rock art is of the utmost importance to world archaeology, to hominid evolution and to profound questions of the origins of culture, cognition and art-producing human behaviour. The international commission of the EIP Project uses methods such as carbon isotope AMS analysis, optically stimulated luminescence (OSL) dating, microerosion analysis, archaeological excavation etc.

Contributions for this symposium are invited for a comprehensive view of previous and new discoveries of pre-Upper Palaeolithic palaeoart made throughout the world, about their scientific study and dating. The results of the scientific investigations and dating of the early Indian petroglyphs carried out under the EIP Project and their impact on the discipline of rock art research will also form issues of discussion. Papers can be proposed to either:

Giriraj Kumar E-mail: girirajrasi@yahoo.com or Robert G. Bednarik E-mail: robertbednarik@hotmail.com

Symposium C

CHANGING TRENDS IN ROCK ART RESEARCH

Chaired by Mario Consens (Uruguay) and Yann-Pierre Montelle (New Zealand)

Rock art research is a young discipline in need for consensus. In the footsteps of Alice Spring's new beginning, this symposium will assess the efforts made by the contributors in the past four years. Assessments, theoretical papers and case studies will provide the ground for constructive debates. In light of the 'changing' and therefore transient nature of 'developing methodologies', we must prioritise discussions about innovative approaches and their assessments. Among other things, this symposium will provide a forum where we will question the role of theory in the analysis of rock art, as well as critically discussing the contributions technology has made and will obviously make in the coming years. We welcome contributions covering all areas of rock art research.

We invite contributions to this symposium, please provide paper title and an abstract of no more than 150 words to: Mario Consens, C.C. 18.007, Montevideo, Uruguay E-mail: *consens@adinet.com.uy*

or Yann-Pierre Montelle, (until May 2004) Box 6710, Brown University, Providence, RI 02912, U.S.A.; (after May 2004) 43 Webb Street, Christchurch, New Zealand E-mail: *Yann Montelle@Brown.edu*

Symposium D ROCK ART: NEW DISCOVERIES

Chaired by Rakesh Tewari (India) and Fidelis T. Masao (Tanzania)

It is an old saying that the best is yet to come, which aptly applies to the research work in different subjects including rock art. A lot of research on rock is being carried out in almost all the continents. Many new aspects of rock art are being brought to light with the pace of these works. Hitherto unknown rock art sites are being discovered day-by-day and more and more new areas are emerging as centres of rock art all over the globe. New approaches are being applied to study and interpret these most valuable and ancient human visual creations. Archaeological excavations, in progress at many sites, are revealing primary source material to understand the interrelation between the settlers of such sites and the rock art.

New methods are being applied to analyse this material and to provide an objective chronology to it. The proposed symposium would provide the much-needed opportunity to disseminate the outcome of these works and discuss their advantages and limitations which would further the progress of research and formulation of new measures. Anything new related to any aspect of rock art study would come under the ambit of new discoveries and may be discussed under this theme. Therefore, the papers for this symposium are invited from those who have something new to share with others.

The paper titles and their brief abstracts of not more than 150 words are to be sent to:

Rakesh Tewari, Govt. of Uttar Pradesh, 27/1, Kaisarbagh (near Rai Uma Nath Bali Auditorium), Lucknow – 226 001, India.

E-mail: rakeshlko@rediffmail.com

Symposium E ROCK ART DISCIPLINE: VISION-2025 (WORKSHOP)

Chaired by K. K. Chakravarty (India)

The rock art discipline has matured from its incipient thrall to archaeology and anthropology to an autonomous discipline, free from the trammels of other orthodox disciplines, with the development of its own investigative tools and techniques, derived from the natural and social sciences. It is the proper time to visualise the discipline in 2025. We have to identify the issues in the regional, continental and global perspectives, fix the targets up to the year 2025, and formulate a plan and strategy to achieve the goals in a phased manner.

The workshop will investigate the unfolding possibilities of emerging scientific technologies, or of the taphono-mic and metamorphological approaches, their application to rock art studies, for mapping human cognition systems and cultural landscapes, and their neural and material traces; for working out the rhythm of physical decay processes for dating purposes; and for tracing the intellectual, biological and environmental history of the rock art landscapes and establishing rock art as a great treasure of human knowledge. The problems and prospects of intra- and intercontinental collaboration in searching, researching, preserving and recycling rock art landscapes, as local and global heritage, will form subjects of enquiry.

It is hoped that this workshop will contribute to a better understanding of the pertinence and importance of rock art research for the future of humankind in the age of globali-sation, homogenisation and 'technification' of the earth planet. Written contributions are invited from the visionaries. They will be discussed and debated in the workshop to obtain a synthesis of them. Please submit proposals to:

K. K. Chakravarty, Govt. of Chhattisgarh, Room 140, Mantralaya, India

E-mail: kkchakraborty@cg.nic.in

Symposium F

BHIMBETKA: VISION-2025 (WORKSHOP)

Chaired by V. N. Misra (India) and S. B. Ota (India) Bhimbetka, the complex of rockshelters, is the only

pre-Historic site in India recognised as World Heritage by UNESCO under the Cultural Landscape category in 2003. Here the natural heritage is interwoven with cultural heritage. Developing the Bhimbetka Master Plan towards an inspiring future is our prime responsibility. Though a plan has been given in the document submitted to UNESCO, new and innovative ideas are always welcome so that we can make Bhimbetka an ideal site with a vision-2025.

The workshop will address these key issues:

- 1. The national and international thrust towards the development of Bhimbetka: the World Heritage site to assist in the development of archaeological and rock art heritage and biodiversity;
- 2. Key role to be played by Bhimbetka in developing tourism industry, education and heritage awareness;
- 3. Significant involvement of the tribal people and other local public;

The primary goal of the workshop will be to further develop Bhimbetka to the highest standards with respect to:

- 1. Protection in perpetuity of representative natural areas and landscapes;
- 2. Protection of rare and endangered species of flora and fauna;
- 3. Protection of archaeological and rock art sites;
- 4. Provision of high-quality tourism experiences based on Bhimbetka's outstanding array of scenic landscapes, fascinating variety of wildlife, archaeological and rock art sites including the excavated rockshelters, tribal culture past and present;
- 5. Involvement of tribal people;
- Enrichment of life and inspiration through the encouragement of public understanding, appreciation and enjoyment of Bhimbetka's natural and cultural heritage so as to leave it unimpaired for future generations;
- Developing the world-class research and development centre for multidisciplinary studies to cater the above objectives.

Your valuable and innovative ideas and contributions in written form are invited on the above-mentioned issues and challenges for developing Bhimbetka as an ideal site for an inspiring future. They will be discussed and debated in the workshop to obtain a synthesis of them. They should be directed to:

S. B. Ota, Archaeological Survey of India, Bhopal Circle, GTB Complex, New Market, T.T. Nagar, Bhopal-462 003, India; Telephax: +91 755 2558270. E-mail: *asibpl@rediffmail.com*

Symposium G

ANIMALS AND ANIMAL-LIKE BEINGS IN ROCK ART

Chaired by Paul S. C. Taçon (Australia), Thomas Wyrwoll (Germany), G. L. Badam (India) and Paul Faulstich (U.S.A.)

In almost every body of rock art, animals and animal-like creatures are depicted. This is true of rock art made by hunter-gatherers of all time periods as well as by pastoralists and agriculturalists, although purely geometric art has also arisen at times among these groups. In many areas animals predominate, with a particular focus on a handful of species. In parts of India, for instance, wild and domestic cattle dominate some rock art traditions while in Australia macro-pods, fish or reptiles are the most frequent subjects of regional art bodies. There are fascinating structural relationships between the placement of depictions of bison and horses in the ancient caves of Europe while in certain parts of western North America bighorn sheep are argued to be potent symbols of religious belief. In southern Africa the eland is said to reign supreme as something both good to think about and good to eat, as well as to paint, carve and draw. In most art bodies there are also depictions of composite creatures, usually part human and part animal, but sometimes consisting of body parts from several different animals. However, these

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usually account for only between one to four per cent of rock art bodies. They are unusual but rare, powerful but carefully executed.

In this symposium it is intended that depictions of animals, composite creatures and their local ecological settings be explored. Both common and rare subjects should be highlighted as low frequency or even absence may be of significance. However, no unifying explanatory theory is advocated. Indeed, it is expected that motivations for such image production will vary widely and that interpretations should be guarded, being based on local environment, ethnography, ecology and eclectic conditions. However, it is envisioned that participants in the symposium will endeavour to also situate their findings in wider contexts and that the results and implications of their research will have global relevance.

In order to structure the flow of papers, the symposium has been divided into four sections, with four of us co-ordinating these topics:

- (a) Wild animals in rock art, chaired by Thomas Wyrwoll, e-mail: Thomas. Wyrwoll@gmx.de
- (b) Rock art depictions of composite creatures and mythical beings, chaired by Paul S. C. Taçon, e-mail: pault@austmus.gov.au
- (c) Rock art and animal domestication, chaired by G. L. Badam, e-mail: glbadam@yahoo.com
- (d) Rock art, ecology and cultural adaptations to environments, chaired by Paul Faulstich, e-mail: paul faulstich@pitzer.edu

Please also indicate which section you wish your paper to be included in and copy your details to the relevant section organiser. Please send initial inquiries, paper titles and abstracts of not more than 150 words, preferably by e-mail, to: Paul S. C. Taçon, Anthropology, Australian Museum, 6 College Street, Sydney, NSW 2010, Australia. E-mail: *pault@austmus.gov.au*

Symposium H

PALEOLITHIC CAVE ART: REPORTS, ISSUES, AND DIRECTIONS AND METHODOLOGIES FOR RESEARCH (WORKSHOP)

Chaired by Kevin Sharpe (United Kingdom)

Recent French discoveries of caves containing Paleolithic art and finger flutings have sparked the public and scholarly imagination. Yet few researchers currently work in this field. This workshop aims to foster the study by offering a venue for reporting finds, related issues, and directions and methodologies for research, including methods for dating and recording, geomorphological studies, analytical and experimental techniques, and comparative analyses between sites, but not focusing on speculation as to the meaning.

Please send relevant proposals with abstracts not exceeding 150 words to:

Kevin J. Sharpe, 10 Shirelake Close, Oxford OX1 1SN, United Kingdom.

E-mail: ksharpe@ksharpe.com

Symposium I BOATS AND SHIPS IN ROCK ART (WORK-SHOP)

Chaired by Pisit Charoenwongsa (Thailand) and Alok Tripathi (India)

The history of shipbuilding is earlier than any written record pertaining to it. The beginning and evolution of shipbuilding can only be traced with the help of excavated material evidence and representation in art, particularly rock art. Since the boats and ships were made of organic materials, only little material evidence has survived. Representations of boats and ships in rock art thus constitute a major source to reconstruct the early history of shipping, shipbuilding and nautical activities of the pre-Historic and pre-industrial societies. They were navigating both in rivers and the sea. Early migrations between continents, which are separated by a vast stretch of sea, would have not been possible without construction and use of seaworthy rafts, boats and ships.

In the absence of sufficient archaeological evidence it is very difficult to reconstruct an accurate picture of ancient ships. Rock art presents some of the earliest representations of boats and ships. They are a source to learn about the most ancient boats and ships. There is a need for a scientific study of these representations to reconstruct maritime history. Their relative size can be determined by the number of persons they are carrying, the navigational aid, other objects kept in the boat or associated paintings. The uses of different gears indicate their use in different conditions and depths, both in rivers and the sea. The changes in shapes and sizes indicate the improvement in the building technology as a result of long nautical experience. These representations are often nearer to reality, therefore, study of them is more useful and reliable than many other evidences. Visual art helps in studying a ship in detail, its hull, superstructure, steering gear, type, building technique, capacity and so on. The chronology of these representations can be determined scientifically. Thus a systematic study of the boats and ships in rock art from nautical perspectives may generate considerable information about the ancient boats, ships and navigation. Abstracts of not more than 150 words and papers are invited on the above and related issues and should be directed to:

Alok Tripathi, Underwater Archaeology Wing, Archaeological Survey of India, Janpath, New Delhi - 110 011, India; Tel. No. +9–1–2301 7197 (work), +9–1–2336 0047 (residence). E-mail: *alok_asi@indiatimes.com*, *alok_asi@hotmail.com*

Symposium J

ARTISTIC APPRECIATION OF ROCK ART

Chaired by Yashodhar Mathpal (India) and Ashvini Kumar Sharma (India)

Rock art is the richest treasure of human visual creations discovered throughout the world. Its time span is vast, starting from the Middle Pleistocene period and continuing up to a few centuries back. In some countries like Australia it is still a living tradition. Rock art presents an evolution from non-iconic to iconic forms. Once the revolution to create iconic forms was achieved by the humans, a vast panorama of designs, motifs and symbols, both animate and inanimate, was created in a variety of forms and styles. They occur in the form of pictograms and petro-glyphs. In the wise selection of sites and skilful use of space in rockshelters, caves and on open rocks a whole wonderful world—real, imaginary and dreamy—has been created by the artists. This creative world is mostly dynamic, vibrant and full of life and spirit.

Artistic appreciation of this treasure of rock art has been long awaited. The present symposium has been designed to initiate meeting this challenge. Papers are invited about the critical assessment of rock art, which can involve the following parameters:

- Selection of the site;
- Spatial distribution;
- Designs, symbols, motifs, forms and styles;
- Lines and colours;
- Spontaneity and/or planning;
- Composition;
- Techniques and processes of art creation;
- Visual effect;
- Impact on modern art etc.

Please send initial inquiries, paper titles and abstracts of not more than 150 words to:

Yashodhar Mathpal, Folk Culture Museum, Bhimtal, District Nainital, Uttaranchal, India; Phone: +91 5942 247100, +91 5942 247499;

and e-mail a copy to Giriraj Kumar at e-mail: girirajrasi@yahoo.com

Symposium K

ROCK ART AND ITS RELATION WITH TRIBAL ART AND FOLK ART

Chaired by Sadasiba Pradhan (India) and Majeed Khan (Saudi Arabia)

Rock art is one of the most intriguing, enduring and informative of all sources of human history. It presents a pictorial story of the pre-Historic and pre-industrial communities. In the history of mankind no other work of fine art has such a wide distribution and lasted for such a long time.

Contemporary tribal art, folk art and other indigenous art traditions exhibit continuity of cultural traditions being transmitted by preliterate and pre-industrial societies where their creative manifestations are used as a sort of visual shorthand, which does not come within our definition of a written language. Continuing practices, oral and mytho-poetic traditions have lent credence to the idea about a vital relationship between rock art, tribal art and folk art and their common cognitive, aesthetic and socio-economic roots. The symposium proposes to examine the commonali-ty, continuity, similarity or otherwise of the habitat, sites, themes, motifs, techniques, materials, distribution, arrangement, execution, cognition and belief systems of rock art, tribal art and folk art. It will also try to assess the ethnocentric bias of rock art research on interpreting rock art with ethnographic data only. Abstracts of not more than 150 words and paper titles may be directed to:

Sadasiba Pradhan, STQ-5, Sambalpur University Campus,

Jyoti Vihar, 768 019 India; Tel. No.: +916632430175, Mobile: +919437052175.

E-mail: *spradhan55@yahoo.co.in*

Symposium L

CAN WE INTERPRET ROCK ART?

Chaired by Jean Clottes (France)

As soon as rock art images were discovered, people started wondering about their meaning(s) and proposed interpretations about them, thus trying to answer the question 'Why?'. Sometimes those attempts went too far, and some researchers then felt (and a few still feel) that it was downright impossible to pin down the meaning(s) and that it was far more productive to work on the other big questions (What? Where? When? How?). Between the extremes of refusing to tackle the thorny problems of interpretation and telling unsubstantiated tall stories, could there be a middle way (or rather several or many middle ways)? This is the main purpose of this symposium.

No doubt interpretation is fraught with difficulties. One must distinguish between art for which there exist direct testimonies, either from the people who made it or from the traditional people that are still using it (this big difference is a major problem in itself), and between fossil art, i.e. art for which all local traditions are long gone. Even in the first case (emic), we can never be certain of getting 'the truth', as its aspects may be numerous, various, ambiguous, sometimes misleading, depending on the inform-er(s) and on the researchers, on their respective gender and status.

Interpretation can be done at various levels: first, a recognition of the subject portrayed, which in itself—despite appearances—is a major and often far from easy endeavour; second, a research on the structures and syntax, i.e. on the elements of a scene, on the associations (or not) of motifs or of the techniques used, and also on the places chosen for the art; third, on the meanings themselves: here, too, we have different levels, as it will sometimes be possible to get direct information from some people who know the meaning(s) of the art (but see above), and sometimes one will have to rely on ethnographic accounts or testimonies of past centuries. In the second case, that of fossil art (etic), the problems are compounded.

The three levels or stages outlined can be followed, but the third stage will obviously be far more difficult to reach. Three main tools can be used: the subjects represented, their syntax and techniques; their location; and ethnographic analogy. Analogy with more recent and better known bodies of art will indeed play a major part if it is used with due care and restraint, i.e. at the level of universals. The details of the sacred (or other) stories that inspired pre-Historic art will always be beyond our reach, but convergences in manners of conceiving the world may provide interpretive frameworks, which is quite different from 'explanations'. This brief perspective on rock art interpretation in its various guises may be challenged, either by those who think it goes too far or by those who think it does not go far enough. In this symposium we shall welcome papers on theoretical issues concerning the interpretation of rock art, its dangers and possibilities, whether it be Palaeolithic or very recent art, in all parts of the world. We shall also welcome case

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studies that may illustrate (or contradict) some of the problems mentioned or raise some others.

Jean Clottes, 11, rue du Fourcat, 09000 Foix, France. E-mail: *j.clottes@wanadoo.fr*

Symposium M DATING OF ROCK ART

Chaired by Alan Watchman (Australia) and R. K. Chaudhury (India)

Scientific methods for dating rock art will be presented and discussed. The aims of this symposium are to consider the reliability of the results from recently analysed rock art and to facilitate discussion about new approaches to the dating process. Abstracts should be less than 150 words and contain the essential points of the paper that will be presented. Send abstracts to:

Alan Watchman, Department of Archaeology and Natural History, Research School of Pacific and Asian Studies, The Australian National University, Canberra, ACT 0200, Australia.

E-mail: Alan. Watchman@anu.edu.au

Symposium N

RECORDING, STORING AND COMMUNICATING ROCK ART

Chaired by Mila Simões de Abreu (Portugal) Rationale has not been received.

Symposium O

PALAEOART, TECHNOLOGY AND COGNITION Chaired by Robert G. Bednarik (Australia)

Palaeoart, that is rock art and portable, very early art-like finds, can throw considerable light on the technological development and cognitive evolution of humans. Early man's perception of the physical and biological environment and interaction with it, use of sites for the creation of rock art, skill and technology applied in palaeoart production (including plaques, figurines, beads, pendants), efforts made to meet challenges, his technological achievements made during that process and so many other aspects revealed through palaeoart can be analysed for understanding the technological evolution of humans. These evidences can be correlated with other indications of the evolution of human cognition and culture.

Titles of papers dealing with such issues and abstracts of not more than 150 words are invited for presentation in this symposium. Please send these to:

Robert G. Bednarik, AURA, P.O. Box 216, Caulfield South, VIC 3162, Australia.

E-mail: robertbednarik@hotmail.com

Symposium P

ROCK ART CONSERVATION AND MANAGEMENT Chaired by B. K. Swartz, Jr. (U.S.A.) and Graeme K. Ward (Australia)

Rock art is a vulnerable and non-renewable resource informing us of our past. It is crucial that as much as possible be preserved for future generations. It is exposed to vandalism, weather, erosion and other factors. The only effective way to preserve rock art is by intensive and systematic recording and inventorying. The purpose of this symposium is to examine and evaluate strategies to accomplish this end.

Abstracts, limited to 150 words, should be e-mailed to: 01bkswartz@bsu.edu

or faxed to (765) 285-2163, or snail-mailed to:

B. K. Swartz, Jr., Department of Anthropology, Ball State University, Muncie, IN 47306-0435, U.S.A.

Symposium Q

ROCK ART MANAGEMENT AND EDUCATION PROGRAMS FOR SITE VISITORS

Chaired by Matthias Strecker (Bolivia) and Jane Kolber (U.S.A.)

The rock art of many countries in the world is finally being recognised as an important part of national and international heritage. With this acknowledgment comes the governmental land managers', as well as the private land owners', understanding that these precious sites must be administered and protected. Various countries, groups and individuals have developed management plans and educational programs to promote the appreciation, conservation, protection and preservation of rock art sites. Information about the strategies and methodologies utilised will assist and hopefully inspire others in developing and expanding their own plans. The participation of the local population in management plans and educational campaigns is vital for success of these projects. Identification of the rightful heirs of these sites must be acknowledged and included in all plans and instructional efforts. They include the present inhabitants of the region as well as the indigenous peoples who trace their ancestry to the sites. The people should be provided with information that will assist in their absorption of personal pride for and appreciation of these sites. All these interrelated stakeholders should be involved in all projects as participants, leaders, site stewards, advisers and decision makers.

Comparisons with and support from worldwide projects can strengthen new and ongoing efforts in rock art conservation and education. Lessons from successes and failures will provide further insights. This session will encourage managerial and educational projects throughout the world, which will consequently provide protection and appreciation for rock art sites.

Matthias Strecker, SIARB, Casilla 3091, La Paz, Bolivia; Tel./Fax +591-2-2711809.

E-mail: strecker@acelerate.com

Symposium R

ROCK ART SITES AND TOURISM

Chaired by S. P. Gupta (India) and Joerg Hansen (France)

Rock art sites set in the bountiful natural environment or deep in the mysterious caves are great centres of universal attractions. Some of them, like Lascaux in France, Altamira in Spain, Valcamonica in Italy, Kakadu National Park in Australia, Bhimbetka in India etc., have been inscribed as World Heritage Sites by UNESCO. Their global publicity is ensured at least amongst the intelligentsia. These are

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indeed as great a pride of their countries as many Historic structures embellished with great works of art of painting and sculpture like Ajanta Caves in India, Stonehenge in England etc. Students visit them to gain knowledge, and the public satisfies its curiosity and love for the past. Foreigners visit them for both reasons.

Rock art sites, if developed properly with first-rate tourist facilities of transport, hotel and food available at reasonable cost, located at not too far distance, with centres of interpretation supported by colourful publications of various kinds, including transparencies, photographs, disks etc., on the same footing as other monuments, the world will be able to open a larger vista for naturo-cultural tourism. We have only to find out ways and means to:

- Develop tourism-friendly management plans and infrastructure;
- Carry out thorough research and study on the sites;
- Integrate rock art sites with some existing tourist circuits;
- Create some new circuits if so desired;
- Start a vigorous publicity campaign.

Let us find out the ways and means to create tourist demand for rock art sites. Abstracts of not more than 150 words and paper titles are invited on the above and related issues and should be directed to:

S. P. Gupta, The Indian Archaeological Society, B-17, Qutab Institutional Area, New Delhi - 110 0116, India; Telephax +91 11 26960654.

E-mail: *iasnewdelhi@rediffmail.com* and a copy to *girirajrasi@yahoo.com*

Symposium S CHALLENGE TO PREVENT ROCK ART VANDALISM (WORKSHOP) Chaired by R. C. Agrawal (India)

Rock art is facing natural deterioration and human vandalism in its survival. The former is of low intensity, except in exceptional cases of natural upheavals and tectonic disturbances. Rock art has survived the natural vagaries but human vandalism, both direct and indirect, has become a serious concern for its very existence. Human interference with the environment of rock art disturbs the natural equilibrium, resulting in enhancement of exfoliation of rock surface and rock falls in rockshelters. Destroying the rocks and rockshelters bearing rock art in the name of development has become a common tradition throughout the world. Mutilation of rock art, knowingly or unknowingly, is one of the major dangers increasing steadily. Sometimes ruthless damage to it by researchers is an unforgivable sin. Thus, rock art vandalism has posed a great challenge to be taken care of immediately. The workshop intends to identify the problems, analyse the factors and evaluate the results of the work done in this direction. Then a plan and strategy have to be chalked out to meet the challenge. Written contributions are invited for presentation and debate in the Congress, which should be sent to:

R. C. Agrawal, Department of Museology, National Museum Institute (deemed to be University), Janpath, New Delhi -110 011, India.

E-mail: *rcagrawal_asi_india@hotmail.com*

Symposium T

ROCK ART AND MUSEUMS

Chaired by Dario Seglie (Italy)

The name rock art is traditionally attributed to all non-utilitarian anthropic markings on rock surfaces. Rock art is today only the 'residue' of ancient cultural complexes, conserved over time, while songs, prayers, dances, gestures, votive offerings etc. are unrecoverable, but it displays the spiritual abundance of our oldest ancestors. The keen interest in rock art derives from its relative rarity, as sites that testify the cognitive dimension of man; the main problem facing us now is conservation, protection and communication.

To identify the best procedures for a valid protection it is necessary to plan monitoring with instruments recording the variability in the environmental parameters and the impact on the rock monuments, in view of the primary conservational necessity. Rock art museums, projects or institutions, in open air or indoors, as cultural interpretation of reality, are a form of cultural heritage conservation technique. Museology and museography of rock art should be sciences devoted to the survival of this spiritual legacy of humanity. Abstracts of not more than 150 words and paper titles are invited on the above and related issues and should be directed to:

Dario Seglie, CeSMAP - Centro Studi e Museo d'Arte Preistorica, Viale Giolitti, 1, 10064 Pinerolo (TO), Italy. E-mail: *cesmap@cesmap.it*

Symposium U OPEN SESSION

Chaired by R. S. Bisht (India)

Please send any submissions for this symposium to: R. S. Bisht, Archaeological Survey of India, Janpath, New Delhi-110 011, India; Residence: A-15, Andrewsganj Extn., New Delhi - 110 049, India; Tel. No.: +91 11 2655579, Fax No. +91 11 23014821.

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