

http://www.palethnologie.org ISSN 2108-6532

## VARIA 2009







Review published by the P@lethnologie association, created and supported by the TRACES laboratory, the Ethnologie Préhistorique laboratory, the University of Liège and the Ministry of Culture and Communication.

### Director

Vanessa LEA

### **Editorial committee**

François BON

Sandrine COSTAMAGNO

Karim GERNIGON

Vanessa LEA

Monique OLIVE

Marcel OTTE

Michel VAGINAY

Nicolas VALDEYRON

### Scientific committee

Michel BARBAZA, university of Toulouse, France

Laurent BRUXELLES, INRAP, France

Jacques CHABOT, university of Laval, Canada

Jesús GONZÁLEZ URQUIJO, university of Cantabria, Spain

Dominique HENRY-GAMBIER, CNRS, France

Jacques JAUBERT, university of Bordeaux, France

Béatrix MIDANT-REYNES, CNRS, France

Karim SADR, university of Witwatersrand, South Africa

Boris VALENTIN, university Paris I, France

Jean VAQUER, CNRS, France

Randall WHITE, university of New York, USA

### **Translation**

Magen O'FARRELL

### Layout

Yann BELIEZ

### Cover

Fabien TESSIER

### The contributions should be addressed to:

### **REVUE P@LETHNOLOGIE**

Vanessa LEA, Research associates

### TRACES - UMR 5608 of the CNRS

Maison de la recherche

5 allées Antonio Machado

31058 Toulouse cedex 9, FRANCE

Phone: +33 (0)5 61 50 36 98

Fax: +33 (0)5 61 50 49 59

Email: vanessa.lea@univ-tlse2.fr

### This numeric publication received support from

















# Palethnologie/2008.

# «HUNTERS» AND «HERDERS» IN THE CENTRAL SAHARA: THE «ARCHAIC HUNTERS» EXPELLED FROM THE PARADIGM

### Jean-Loïc LE QUELLEC

### **Abstract**

With regard to the chronology of the rock art of the whole Saharan sub-continent, a very common opinion is that, starting from the VII<sup>th</sup> millennium BP or even earlier, an older "Culture of the Hunters" had been replaced by groups of "Herders", and that this change appeared in rock art as a modification of styles, techniques and, above all, of the set of themes associated with the imaginative world of these two populations. A series of recent publications renews this proposal for the Fezzan province, by presenting "archaic Hunters" as existing before 8000 BP, or even as dating from the very Late Pleistocene. After analysing the methodology and the arguments adopted by its authors, this thesis will finally be confronted with, and largely contradicted by, new observations carried out on the two plateaux of the Libyan Messak, i.e. in one of the supposed 'homes' of the aforesaid "Hunters Culture".

Key-words: Sahara, Libya, Neolithic, rock art, chronology, hunters, herders

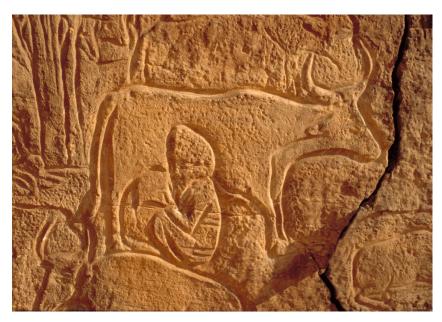


fig. 1 : Scene of milking cows in Bubalin style. Detail of an engraved ensemble of Wâdi Tiksatîn, Messak Settafet (Fezzân, Libya).

In 1933, to classify Matkhendûsh engravings, Leo Frobenius proposed to distinguish on the one hand a "wild animals group" whose authors were the "Hunters of the plateaux", and on the other hand a "domestic animals group", deemed to be the creation of a "civilization of the plain herders". Two years later, M. Revgasse confirmed this important dichotomy and postulated its validity not only for engravings from Djérât but for the whole northern part of the continent. He affirmed that it was possible here, "as in all of the Sahara, to divide these works of art into two large categories: a) the archaic engravings or rock engravings strictly speaking and b): more recent libyco-Berber engravings characterised by a great decline and by the appearance of the camel" In his opinion, category a), that of archaic engravings, itself counted "two very clear divisions: 1. art of primitive populations practising hunting and gathering; 2. more recent art of the first herders".

In 1932, in a book devoted to Libyan rock art, P. Graziosi proposed that the oldest engravings were made by a group known as "the Berjûj hunters" ('gruppo venatorio del Bergiúg'') whose engraved works were characterised by "beautiful representations of tropical fauna" marked by "strong naturalism,

great expressivity [...] advanced technique" and "very remarkable" dimensions. He saw the decline of this group as coinciding with the apogee of a "pastoral art" which had moved away from naturalism and was "tending towards more rigid and solidified forms". This he subdivided into two phases: the older "typified by beautiful representations of bovines of a markedly naturalistic character, and which may be contemporary with at least some of the engravings of the Berjuj hunters group", whereas the second, badly dated and given the name of "the Shâti hunters group", consisted of "expressions relating to hunting scenes" which have both a "naturalistic character" and a "decadent style" (GRAZIOSI 1942:259 - 261, 271).

In 1948, the term "Hunters Period", designating the time of the earliest Saharan engravings, appears again in a synthetic study by R. Perret of rock figurations from Djerat and from Fezzan in which he states "the oldest engravings were drawn by hunters" (Perret 1948:10). Subsequently,this reference to "hunters" will be systematically used by P. Huard, then by L. Allard-Huard, to indicate a "culture" recognized (but not defined) by the presence of 25 observable cultural features of engravings. This position was gradually developed in numerous studies until the publication

of two lengthy syntheses aiming to establishing definitively the existence of a unique "Culture of the Hunters" evidence of whose engravings could be traced from the Nile to the Atlantic (Huard, Leclant and Allard-Huard, 1980; Allard-Huard, 1993). The proposed pattern stipulates that two different artistic forms descended from this culture. "In the Sahara large, naturalistic incised wild animals; on the Nile, smaller subjects, subschematic and pecked on the entire surface". It was proposed that this dichotomy persisted "until the pastoral era" but, at this time, Saharan art would show a gradual "decline of techniques and styles", whereas that of the Nile would simultaneously gain in dimension, while evolving "to sub-naturalism or stylisation" (Allard-Huard, 1993: 41).

On the occasion of an exhibition, F. Mori (1960: 10) was led "to define the time of the hunters" by the complete absence of "representations of domestic fauna". From then on, many authors took up this thesis and, little by little, a pan-Saharan chronological framework was worked out, beginning with an archaic, or even pre-Neolithic, engraved art, produced by "hunters" who were completely unaware of domestication. Thus, in 1986, one could find in an illustrated book, which is moreover splendid, that "in all probability, the Berjûj hunters were immersed in a Palaeolithic culture, ultimate upholders of the Aterian culture", whereas, in the neighbouring zones of Wâdi-l-Ajâl and Tadrart-Akâkûs, "large herds were already being reared" (CASTIGLIONI & NEGRO 1986:214).

In 1987, while looking for a chronological framework suitable to the study of the engravings from Northern Shâti, I too considered that the simplest way to classify Fezzan engravings was to distinguish four groups, respectively gathering together the works of 1/the Hunters, 2/the Herders, 3/those showing horses (Equidian), and finally 4/those showing camels (Camelian). This position, inspired by P. Huard's thesis, I then held "pending any confirmation or really constraining later invalidation" (Quellec

1987:39), and I readily recognize that this model was then so powerful that I did not think, at that time, to call it into question.

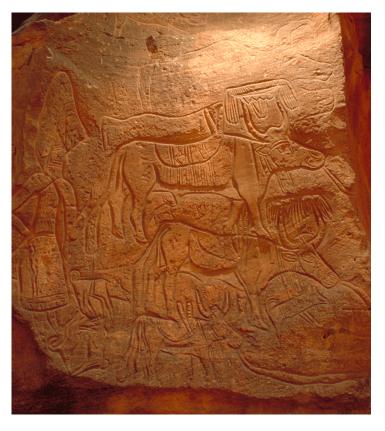
However, this way of thinking stems from an earlier stage of anthropological studies during which the idea prevailed that "Herders" or "Hunter-Herders" would everywhere succeed "Hunters". This position is illustrative of the simplistic idea according to which domestication would have eliminated hunting. Moreover it is marked by an evolutionary thesis which appeared long before Lamarck or Darwin, and was already perceptible in l'Esquisse d'un tableau historique des progrès de l'esprit humain in which, in 1795, Condorcet postulated that Man leaves the state of Nature by passing necessarily through the stages of herding and farming. This presupposition, which implies an immanent order of succession of economic and cultural phenomena, was later to be developed by Gustav Klemm. Publishing in 1843 Allgemeine Kultur-Geschichte der Menschheit, he explains that three stages succeed the wild state (Wildheit): hunting and fishing, then herding, and finally farming. The recognition of the biological principle of evolution and the development of the nascent prehistoric science led soon to a quasi-Darwinian vision of the history of cultures: they were supposed to develop from simple to complex states, under the pressure of the environment (hence the reason for the appearance of farming was then thought to be demographic growth). Better still, the ethnographers sought confirmation of their evolutionary thesis in the seriations suggested by the prehistorians, while they, in their turn, relied on the work of the ethnographers to support their own theories. Neither could see that a culture can never be reduced to one or other of its material elements, and together they built a splendid example of circularity. These evolutionary doctrines were popularised in 1877 by Lewis H. Morgan's book Ancient Society, which inspired Marx and Engels, and in which humanity was presented as passing through three progressive stages: the wild stage (preceding the invention of pottery), the barbarian stage, and finally civilization (starting with the invention of writing). Even

a convinced diffusionnist like Father Wilhelm Schmidt affirmed in 1926 in *Der Ursprung der Gottesidee* that it was advisable to distinguish *Urkultur* (culture of nomad hunters) and *Primärkultur* (culture of herders), the second necessarily succeeding the first.

Nevertheless, exactly a century ago, Eduard Hahn, in a remarkable study of domestic animals, *Die Haustiere und ihre Beziehungen zur Wirtschaft des Menschen*, had already refuted the theory of the three economic stages (hunting, herding, farming) by pointing out that many pre-Colombian Indians practiced agriculture without having cattle. But long before this, authors like Alexandre de Humbolt had questioned the necessary succession of these three levels, a revision to which the Swiss historian I. Iselin had already proceeded in 1786. Now, accepting the evolutionary presupposition has important methodological consequences for research, more particularly insofar as "cultural singularities are

thus taken into account only in as much as they are considered to be symptomatic of historical gaps" (Taylor 1992:270). Thus, in rock art studies, this presupposition leads to an interest in bovine figures being confined to their indicating domestication or a mythical "incipient domestication", and to the consideration of hunting scenes or representations of "large fauna" only in as much as they indicate the presence of "hunters" (who are preferentially seen hunting elephants rather than hares). It is also at the root of the conceptual framework which has determined a chronology of Saharan rock art according to which Hunters precede Herders and writing groups follow them.

Nowadays, this evolutionist concept has generally been abandoned by anthropologists who no longer consider that societies necessarily go through historical phases defined by the alimentary, technical and intellectual resources that they employ to answer the pressures



**fig. 2**: Pastoral scene of Bubalin style including oxen with decorated pendants, keratic decorations, collars and saddles with decorated V-pommel. They are held by tethers with well-drawn strands and are accompanied by dogs. Engraved group in Wâdi Tidûwa, Messak Mellet (Fezzân, Libya).

of the environment. Only some anthropologists from communist countries still support this thesis for obvious ideological reasons. However, this obsolete concept still lives on in the work of specialists in Saharan rock art. They use it conjointly with other assumptions that have also been largely renounced by anthropologists, such as the systematic association between style and ethnic group. This persistent use of outmoded concepts seems to be related to shared assumptions on hunting and hunters, which are associated, consciously or not, with the equally obsolete idea of "archaic mentality" to the extent that, in the vocabulary of Saharan chronologies, an expression such as "period of the hunters" inevitably implies archaism - the hunter being, in our own culture, a metaphor of the primitive and the savage (Hell 1994). This is a nice example of ethnocentrism.

One of the assumptions associated with the idea of "hunters" is that this term would allows the gathering together of human groups defined only by their technical and economic characteristics, but which might differ in all other respects (Testard 1982, 1992). When the societies thus grouped are not those studied by ethnologists but those which interest prehistorians, it follows that the latter may easily credit their members with a "hunters' mentality" (concerning the "Bubalin", U. Sansoni (1994: 24-25) even speaks of a "practical and robust hunters' mentality"!), and they generally invoke a "hunters' culture", which however has never been observed in reality by ethnologists. Certain anthropologists preferred to use the unifying concept of "bands" (Steward) or of "hordes" (Radcliffe-Brown) to define a "level of organisation" which would be specific to hunter-gatherers" (in an analysis of the Saharan rock engravings, E. Anati speaks of "clans"). But the publication of very detailed ethnographic observations (in particular on the !Kung) has deprived these words of so much of their meaning that one can question, as did A. Testard (1992: 137) "the interest of preserving the economically-defined category of hunter-gatherers if some, at least, inherent features of social organisation cannot be attributed to it". Neither can the opposition of hunters to farmer-herders be reduced to the two

principal types of organisation: inegalitarian nomadic societies versus settled stratified societies, because many stratified societies which practice neither farming nor herding are known the world over. This implies that "it is no longer the economy of hunting and gathering which is relevant, but an economic structure defined in a more complex way, according to an economic cycle related to resources which may be just as much domesticated as wild". The relevant element becomes then, according to A. Testard (1992: 137), the storage of food products, either seasonally spontaneous or cultivated. As for the Sahara, it must be remembered that the traditional positions thus challenged had already been rejected by H.J. Hugot in its thesis defended in 1979: "With regard to the Neolithic of the southern areas of the Sahara, we increasingly believe that the traditional categories elaborated outside of Africa by Western researchers are strictly inapplicable". And yet, regretted that, in spite of serious studies of the ecological context in which live current populations, "we want to make of them, as does J.D. Clark, groups of "hunter-gatherers", "farmers", "herders", etc".

In the history of science, we frequently note that, when a theory has been contradicted, its advocates try to "save" it by creating increasingly complex *ad hoc* elaborations, until a new theory makes the whole of it obsolete. Thus, in the example that concerns us, it was at first affirmed that representations of domestic animals were completely missing from the stage known as "Bubalin" or "hunters". This absence was even made the main and essential criterion for identifying this stage. When it was proven that this was false (and thus that the alleged "hunters" had indeed represented domestic animals) an attempt was made to 'save' the theoretical framework in use. An *ad hoc* thesis was worked out, according to which these were not really domestic animals, but testimony of a "proto-domestication" or an "incipient domestication".

The existence of a "Bubalin stage" defined by the absence of domestic animals has been refuted many times for more than fifty years, in particular in the writings of former advocates of the existence of a

www.palethnologie.org

"Bubaline" or "Hunters" phase in Saharan rock art (Graziosi 1952:108, 1970:334 - 336, 1981:19 - 22; Lhote 1960:204, 1965:203, 1984:256). But these important texts are blithely ignored and remain unanswered by those who, curiously, still support this position. Indeed, there are still authors currently postulating, explicitly or not, that this putative period may be defined by the total absence of representations of domestic animals. That gives free rein to possible manipulation: if, for some reason, the domestic animals in a group of engravings were not taken into account, this group would ipso facto be transformed into a representative example of the art of "Hunters". Presented in this way, such a misunderstanding seems trivial and quite easily avoided, but is it not, however, exactly the sleight of hand to which researchers resort when they use the following approach?

- 1. First define "hunters" (or "Bubalin") art as presenting essentially wild animals, and that of "herders" by the dominance of domestic animals and human beings.
- 2. On the sites, treat separately wild fauna and animals of domestic appearance, thus constituting *a priori* two thematic groups.

3. Conclude that these two groups do, in fact, belong to different and successive cultural entities.

As long as such an approach is applied, its advocates will only to enrich (in number) the inventory of works attributed to each of these hypothetical entities, without ever demonstrating any real proof of their existence. Indeed, "Hunters" or "Herders" are automatically and regularly given credit for every new discovery; nonetheless, these two categories still remain *a priori* assumptions. Using them for rock art studies responds to criteria whose definition is still awaited. (It is also extremely regrettable to note that this specious reasoning is regularly applied around the world; for example by E. Anati with regard to the Helan Shan rock art in China).

Such syllogisms are frequent in the work of authors who are convinced of the existence of a "hunters" (latterly: E. Anati, G. Aumassip, R. & G. Lutz, F. Mori, U. Sansoni), as is illustrated by the discussion of bovine collars, pendants and reins (or tethers). It is admitted that they constitute very important markers for the establishment of a chronology, but the advocates of a



fig. 3: Detail of the preceding scene.

"Bubalin" <u>age</u> for part of the engravings are extremely hesitant to recognize their presence on bovine of "Bubalin" <u>style</u> since, according to them, they could not have been domesticated at that time. However, as the presence of these markers is perfectly visible to whoever has the slightest knowledge of the available documentation, there remain only three possibilities to defend the hypothesis of a bubalin "stage" (and not of a "style"):

- 1. to deny the existence of these details (by proposing another reading when their drawing is rough or vague);
- 2. if the representations, because of their precision and their descriptive character, cannot possibly be denied, to explain them by proposing a hypothetical "early state of domestication" (of which archaeozoologists are totally unaware);
- 3. *in extremis* to suggest that if domestic animals can indeed be found in the "*Bubalin*", this could only be "*among the latest elements of this stage*" (Lhote 1976:790).

This type of circular reasoning, frequent in the literature, can only be broken by the discovery of incontestably "Bubalin" engravings which nevertheless show bovines incontestably provided with collars. Yet, this is precisely the case in the documentation collected during the last years in Messak (Libya) by A. and A. -M. Van Albada, Y. Gauthier, J.-L. Le Quellec and R. and G. Lutz. In fact, the bovines which were noted there are harnessed, saddled, decorated, mounted, milked, carry decorated pendants, are held by reins whose strands are represented, etc. As nothing in the style, the technique or the patina of these works differentiates them from all of those which are usually arranged in the "Bubalin", the only argument permitting them to be classified in the "Bovidian", supposedly more recent, is that they are obviously pastoral scenes. But once again the circularity is manifest: if all the scenes with pastoral connotations are automatically arranged in the "Bovidian", then no domestic animals will ever

be found in the "Bubalin". This type of classification is perhaps legitimate, but its chrono-cultural value, if it exists, still remains to be demonstrated. It follows that, when groups of rock engravings comprise bovines with the obvious trappings of domestication, to consider them as its "very beginnings" is even less advised in that it would be perfectly miraculous if the authors of these attempts should decide to commemorate them on the surrounding rocks (intended for whom?). On the contrary, it seems to me that these engravings attest to the existence of scenes of genre: elegiac, symbolic, mythological, everyday life or ritual, or what you will, but in any case taking place in a society where domestication was perfectly established. Besides, the technique of milking, also represented in "Bubalin" engravings, surely gives proof of this.

Another *ad hoc* construction frequently used consists in adding intermediate phases to the chronological table proposed in the beginning, which usually produces a worrying inflation of the number of "stages". This process, calling upon hypothetical "transitional phases", entails creating extremely useful boxes for the arrangement of embarrassing works: domestic animals but nevertheless "Bubalin"; "archaic" engravings which are not "naturalistic"; non-archaic" naturalistic" representations; cynocephali (connected with the mythology of hunting) associated with ovaloides (regarded as symbols of the Herders); works of composite styles, etc.

But the awkward facts are now so numerous that it is illusory to think of disposing of them by such artifice, and it is time to break the circularity of the traditional arguments. For all that, we are still awaiting, from the advocates of the paradigm "hunters versus herders", a demonstration of its validity for the study of Saharan rock art. In the absence of such a demonstration, we must affirm that nothing in Fezzân engraved art currently constitutes the least reason to group in a particular chronological class engravings known as "Bubalin" or "hunters". Moreover, among these engravings, the presence of sheep and domestic cattle is

well attested by herds accompanied by human figures, and especially by mounted, saddled, decorated carrier oxen, held on rein and accompanied by dogs. In addition to the domestication of cattle, these groups thus also suppose that of the dog. Furthermore, no dating of incontestably domestic sheep or oxen in the Sahara is known before the VII<sup>th</sup> millennium BP and, in the whole of northern Africa, at this same time, the first domestic dogs appear only in the eastern Sahara. Consequently, Saharan engravings in which these animals appear can hardly be prior to the VIIth millennium BP (argument of domestication), or much later than the VI<sup>th</sup> millennium BP (argument of climatic pejoration). As the criteria of style, superposition, patina and technique in no way dissociate them from the representations of large wild fauna, of necessity we must see here, not the artistic production of alleged "archaic Hunters" supposedly having lived during the Pleistocene, but the engraved work of a single cultural group which, maybe around 6500 BP, had developed a high civilisation. Thanks to their perfect mastery of drawing and stone engraving, sometimes along with their consummate art of bas-relief, the artists of this "Messak Civilisation" (as I propose to call it) left us an exceptional testimony of their world: representations of everyday life, ritual activities or mythological evocations follow one another on the rocks of a land now turned to desert, but where the use of the saddle does seem to be the earliest known, and where the scenes of milking cows could considerably predate their Egyptian counterparts from the tomb of king Aha "the Fighter", successor to Narmer.

### Author

### Jean-Loïc LE QUELLEC

Directeur de Recherche au CNRS
TRACES, UMR 5608, Centre Emile Cartailhac
Université Le Mirail, Maison de la Recherche,
5 allées A. Machado, 31058 Toulouse cedex 9, France
Président de l'AARS («Association des Amis de l'Art
Rupestre Saharien»)
rupes@neuf.fr

### References

ALLARD-HUARD L. (1993) - *Nil-Sahara. Dialogues* rupestres. I "Les Chasseurs. Divajeu, Chez l'auteur.

ANATI E. (1989a) - Symbolisation, pensée conceptuelle et ritualisme chez l'Homo sapiens. Dans: J. Ries, *Traité d'anthropologie du sacré* I:177-208.

ANATI E. (1989b) - Les origines de l'art et la formation de l'esprit humain. Paris, Albin Michel.

ANATI E. (1992) - The rock art of Europe: present and future studies. *Préhistoire européenne* I:9-13.

ANATI E. (1995) - *World Rock Art. The Primordial Language*. Centro Camuno di Studi Preistorici XII.

AUMASSIP G. (1993) - Chronologies de l'art rupestre saharien et nord africain. Calvisson, Gandini.

AUMASSIP G. (1995) - Chronologies proposées pour l'art rupestre nord africain et saharien. Dans *L'Homme Méditerranéen. Mélanges offerts à Gabriel Camps*, pp. 143-156.

DAYTON L. (1992) - Pacific Islanders were World's First Farmers. *New Scientist* 136(1851): 14.

FROBENIUS L. (1933) - Einführung in die Felsbiderwerke von Fezzan (Ergebnisse von der 10.Deutschen Inner-Afrikanischen Forschungs-Expedition, 1932). Wechselaustellungen des Städtischen Apika-Archivs und des Forschungs-Instituts für Kulturmorphologie F.. V. Frankfurtam-Main 2:22-35.

GRAZIOSI P. (1942) - *L'Arte rupestre della Libia*. Napoli, Ed. della Mostra d'Oltremare, 2 vol.

GRAZIOSI P. (1952) - Les problèmes de l'art rupestre libyque en relation à l'ambiance saharienne. *Bulletin de l'Institut Fouad 1er du Désert* II(1): 107-113.

GRAZIOSI P. (1970) - Recenti missioni per 10 studio dell'arte rupestre nel Fezzan. *Valcamonica Symposium*, pp. 329-343.

GRAZIOSI P. (1981) - L'arte rupestre dell'Uadi Zreda presso Brak, nel Fezzan. *Rivista di Scienze preistoriche* XXXVI(1-2): 3-23.

HELL B. (1994) - Le sang noir. Chasse et mythe du sauvage en Europe. Paris, Flammarion.

HUARD P. &, L. ALLARD (1978) - À propos de l'Exposition Sahara (Cologne. Juin-Août 1978). *Bulletin de la Société Préhistorique Française* 75(7): 196-201.

HUARD P., J. LECLANT, L. ALLARD-HUARD (1980) - *La Culture des Chasseurs du Nil et du Sahara*. Alger, Mém. du C.R.A.P.E. XXIX, 2 vol.

LHOTE H. (1960) - Mission Lhote au Tassili n'Ajjer. *Travaux de l'Institut de Recherches Sahariennes* 1-2:203-212.

LHOTE H. (1965) - L'évolution de la faune dans les gravures et les peintures rupestres du Sahara et ses relations avec l'évolution climatique. *Miscelanea en homenaje al abate Breuil* II:83-118.

LHOTE H. (1976) - Les gravures rupestres de l'Oued Djerat (Tassili-n-Ajjer). Alger, Mém. du C.R.A.P.E. XXV, 2 vo1.

LHOTE H. (1984) - Les gravures rupestres de l'Atlas Saharien. Monts des Ouled-Naïl et région de Djelfa. Alger, Office du Parc National du Tassili.

LUTZ R. (1994a) - Rock Engravings from the Messak Settafet, Libya. Exploration of the western tributary of Wadi Tilizaghen. *Sahara* 6:41-50.

LUTZ R. (1994b) - The Bubalus Rock of Wadi In Elobu. A chronological indicator of early rock art in the Messak Sattafet and Messak Mellet. Fezzan, Libya. Institut für Ur-und Frühgeschichte der Leopold-Franzens-Universität Innsbruck, *Projekt Felbilderforschung in der Sahara*, Letter 10.

LUTZ R. (1995) - The Secret of the Desert. The Rock art of the Messak Sattafet and Messak Mellet, Libya, Innsbruck, Universitätbuchhandlung Golf Verlag.

MORI F. (1960) - *Arte rupestre del Sahara Libico*. Roma, Palazzo di Venezzia, 16 Marzo - 12 Aprile 1960. Roma, De Luca.

MORI F. (1971) - Proposta per una attribuzione alla fine del pleistocene delle incisioni della fase piu antica dell'arte rupestre sahariana. *Origini* V:7-20.

MORI F. (1978) - Zur Chronologie der Sahara-Felsbilder. Sahara, 70000 Jahre zwischen Weide und Wüste, Köln, Museen Köln, pp. 253-261.

MUZZOLINI A. (1980) - L'âge des peintures et gravures du Djebel Ouenat et le problème du Bos brachyceros au Sahara. *Travaux de l'Institut d'Art Préhistorique* XXII;347-371.

MUZZOLINI A. (1983) - L'art rupestre du Sahara central: classification et chronologie. Le boeuf dans la préhistoire africaine. Aix-en-Provence, Thèse de 3e Cycle, Université de Provence, 2 vol,

MUZZOLINI A. (1986) - L'Art rupestre préhistorique des massifs centraux sahariens, Oxford, BAR Interantional Series 318, Cambridge Monographs in African Archaeology 16.

PERRET (1948) - Les gravures rupestres et les peintures à l'ocre du Sahara français et du Fezzan. *Cahiers Charles de Foucauld* X (t.-à-p.), 15 p.

PRICE S. (1995) - *Arts primitifs: regards civilisés*. Paris, École Nationale Supérieure des Beaux-Arts.

REYGASSE M. (1935) - Gravures et peintures rupestres du Tassili des Ajjers. *L'Anthropologie* XLV:533-571.

SANSONI U. (1994) - Le più antiche pitture del Sahara. L'arte delle Teste Rotonde. Milan, Jaca Book.

www.palethnologie.org

SIGAUT F. (1995) - C.R. de C. Wesley Cowan k P.J. Watson (eds.), The Origins of Agriculture. An International Perspective. Washington-London, Smithsonian Institution Press 1992;XVI-224 p., dans: *L'Homme* 132:224-225.

TESTARD A. (1982) - Les chasseurs-cueilleurs ou l'origine des inégalités. Paris, M.S.H.

TESTARD A. (1992) - Article «chasseurs-cueilleurs» dans P. Bonte, M. Izard & al., *Dictionnaire de l'ethnologie et de l'anthropologie*. Paris, P.U.F., pp. 135-138

### To quote this article

LE QUELLEC J.-L. (2008) - «Hunters» and «Herders» in the Central Sahara: the «archaic Hunters» expelled from the paradigm. *Palethnologie*, 1, p. 388 - 397.

Article translated by Hazel King & Karim Gernigon

