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# Conflict and Conflict Mitigation in Early Near Eastern Sedentism. Reflections

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In his keynote contribution Ofer Bar-Yosef makes a general statement relating to the combined demographic / environmental reasons for the occurrence of warfare in the Early Neolithic of the Levant. Although we must be grateful to Ofer Bar-Yosef for re-addressing this central issue of Levantine Neolithisation, and the new causes and roles of coalitional aggression under the conditions of settled life (and its environmental background) along with most of the author's ideas should be supported, there are still some important points that appear to be missing in his keynote which must be addressed. These points relate to the innovative social and economic mitigation mechanisms and structures that regulate conflict in sedentary environments, including the conflict to arise through the amalgamation sedentary land use and nature. In my view, there exists a special primacy of environmental factors influencing human conflict behaviour (and *vice versa*) under sedentary conditions, and these are embedded in the general ethos of human aggression under such conditions. Thus, I see it as imperative to discuss Neolithic warfare always in conjunction with early Neolithic conflict management and related social and commodification systems. Indeed, it is only through consideration of these factors, combined with insights from the spheres of human ethology and related fields, that we might better understand how and why aggression, violence and warfare emerged in the early Neolithic. Accordingly, the early Neolithic sedentary ethos – or the somehow provocative *Homo neolithicus* var. *orientalis* - perception in Gebel n.d. a, b – would be a substratum from which our topic could be approached in a more scientific way. Be this as it may, the hitherto essayistic nature by which the subject of warfare is treated is characteristic for our discipline, and the following reflections and comments are certainly no exception.

## Neolithic Ethos and Warfare. On Understandings and Terminology

Aside from the general problem already addressed in the introduction to this Neo-Lithics issue (the limited consultation or non-involvement of disciplines specialized in human conflict in the archaeological conflict discussion) our discourse of the subject suffers from a misrepresentative terminology and implied personal perceptions of the scholars, including modern moral attitudes. Especially the latter require some degree of illumination if an author's particular and personal approach is to be understood successfully by his/her readers.

I fully share the understanding of Joachim Bauer (2008) that human aggression is rather a reactive programme than a human drive or need: Biologically anchored like fear, aggression developed during human evolution to help in situations of danger. Group-minded social behaviour and empathy dominate over aggressive behaviour; aggression, violence, warfare and the like represent rather the *ultima ratio* in the range of choices of human reactions. The complex relationships between kinds of conflict and kinds of violence, including their ritualised features, are determined by the life mode, and certainly sedentary life provided different frameworks than foraging ones. Aggression was certainly set free at different locations and situations in confined territories than was the case in open territories. Furthermore, aggression was related to community organisation, and must have been influenced by a complex system of risk weighting. Warfare, understood here as a coalitional and non-spontaneous (prepared and organized by a strategy) aggression of groups / communities against each other, aiming to reach a balance over a conflict/ subjectively disadvantageous matter, is just one form of violence and stress release. Environmental stress may have been countered by other sorts of violence, too, ranging from intra-community measures to spontaneous massacres against human and faunal competitors in the landscape.

There appears to exist a neurobiologically verifiable (J. Bauer, pers. comm.) need to punish unfair behaviour by others, aside from the general causes of human aggression: fear of physical and psychological pain, death; deprivation from / unbalanced distribution of resources or wealth; unbalanced social relations, social marginalisation, physical and cognitive confinement *etc.* While I see a basically shifted human ethos by Neolithisation (general territoriality becomes a confined territoriality; aggregation in social, economic and cognitive territories supported by a productive commodification, including ritual regimes/religions; general reciprocity becomes confined reciprocity; *cf.* Gebel n.d. a,b) which became the basis of our modern ethos, Joachim Bauer claims (pers. comm.) that the Neolithic ethos is neurobiologically rooted and has not shifted to any significant degree in the last 20.000 to 30.000 years. However, I wonder if the cultural manipulation and control of the human ethos has not reached a new dimension through the sedentary life modes which established in the course of five to six millennia during the Near Eastern Neolithic Evolution.

In this contribution I use the neutral term *conflict* in order to force definition for each concrete piece of evidence for Neolithic strife. The overall use of the

terms aggression, violence, warfare, raids, and the like is at least meaningless if not evaluated and described for the subsystems in which they occur and are relevant, *i.e.* local environment (biotic and abiotic resources); regional and long-distance biotic and abiotic resources; technological and innovation frameworks; social structure; economic system; as well as ideological and cognitive regimes. While the task of identifying and describing the nature of conflict should be subject of an interdisciplinary approach, a tool to provide an initial characterisation of the type of conflict could be simple if three different levels are involved: the ethological, the societal, and the political level. Accordingly, *aggression* remains a matter of ethos, *conflict* is firmly situated in societal contexts, and *warfare* receives its political dimension.

Significantly, most conflicts relate to disturbed and shifting integrities of tangible and intangible territories. Thus the territoriality approach (see below) is essential if we are to work on Neolithic conflict and conflict mitigation; at the same time, this is also an integrative tool for the various disciplines to be involved in research, *e.g.* behavioural ecology; psychologies of the environment, evolution and religion; cognitive neuroscience; neurobiology and social biology *etc.*)

A thorough analysis of disturbed territories is essential, as are studies which might inform us as to how imbalances in one territory might affect related territories (for an example, see below). Normally, a territory is considered optimal and flourishing if it provides stability through its size and balanced advantages to all, and if the costs of defending the territory are low in relation to the efforts involved in exploitation, acquisition, production, integration *etc.* Furnished with these tools, we might not only be able to identify Neolithic conflict levels and cases, but also reconstruct the organisational nature of an aggressive act. In this case, questions as to whether Neolithic warfare involved either fighting in organized formations or in the form of raids as known from modern primitive societies might even become obsolete.

### **Space Commodification and Properties. On Early Neolithic Territoriality**

Territoriality in physical environments and intangible spheres develops when social units settle down in an area by claiming resources and establishing regimes through use, including the overworldly territories of belief systems, using ingredients of nature *etc.* The growth of groups and the availability of the resources in a region render territories subject to conflict when neighbouring claims start to overlap. At that moment territoriality becomes a matter of the exclusion of competitive beings and elements, and the formation of a stronger group identity among the beneficiaries (cohesive groups with coordinated activities). The main criteria of collective territorial behaviour are certainly the existence of stable social frameworks that enable

claims and allow defence and territorial concessions. What differentiates the forager territoriality from sedentary territoriality lies in its productive milieu through which it operates and exists. “Political” territoriality however only develops when physical territories become important for the organisation of groups.

Three sorts of Neolithic territories might have existed (modified after Altman 1975 for the Near Eastern Early Neolithic):

1. Primary Physical Territories (intra-site and external): permanently, or nearly permanently, occupied; recognised by neighbours as a relatively permanent ownership; closely identified with the group through use of space; occupants in full control of use; intrusions by others understood as encroachments.

2. Corporate Physical Territories (intra-site and external): occupation repeated but not continuous; not subject to individual but to corporate ownership; use bound by certain conditions and functions; surveillance of use by representatives of social units.

3. Obtainable Physical Territories (intra-site and external): large number of individuals and groups interested in the use of the territory; rights to it disputed among these individual and groups, with a high potential for conflict; control of territory is subject to mutual agreement and corporate defence; uses of territory restricted or limited; its transfer into permanent ownership requires mutual acceptance or forced acquiescence.

A major cause of Neolithic territorial aggression was probably territorial crowding. Indeed, since the early Neolithic this factor must have been a major agent influencing all socio-economic and cognitive developments, including our post-Neolithic history: Increasing sedentism produced more confined territories in which aggregation, commodification, and innovation processes were the only factors capable of regulating pressures. When these processes failed to provide the necessary balance within the increasing number of confined territories, systems began to collapse. Such collapses could have been peaceful implosions (the vanishing of cultures, the adaptation of new life modes), but must have been – depending on the pressure system involved– also induced by accompanying aggressive acts. On the local and regional scale, raids and even organised warfare might have become one option of regulation. As mentioned previously, such options occurred only if mitigation initiatives through aggregation, commodification, and innovation measures became exhausted; this notion has to include the understanding that aggregation, commodification and innovation would have ultimately brought about growth themselves and thus triggered the very conditions which they primarily set out to avoid. Territorial aggression may have disappeared temporarily from larger regions, *e.g.* when the vast

alluvial lands and steppes of Mesopotamia or the semi-arid fringes of the Levant became subject to new subsistence modes (early hydraulic and pastoral socio-economies) in the later Neolithic. Unlike local territorial infringements, territorial crowding has the tendency for supra-communal, supra-local, and supra-regional overthrows. Territorial crowding includes such phenomena as over-populated villages, insufficient pasturelands for the increase of flocks, the disruption of social hierarchies through the inflation of prestige commodities, competition in social management solutions, and the like, and results in environmental, social, economic, and ideological stress and conflicts which increase with densities. Density in one sphere can easily provoke a hypertrophic milieu. A good example of such a stress system is the recently-debated Mega-Site Phenomenon in the Jordanian mountain ranges (Gebel 2004). Here, the duration and intensity of combined aggregation, commodification and innovation seems to have damaged the social and economic behaviour and values of individuals and groups; it imploded most likely because social answers were not found rapidly enough ahead of prospering socio-economic developments. Consequently, levels of intra- and inter-group aggression must have increased.

The confined reciprocities in Neolithic times implied existential strategies for the joint survival of a sedentary community supported by concession orders and regulated by conflict regimes and – where we might agree with Ofer Bar-Yosef – warfare upon resident occupations. Neolithic human aggression was prompted by additional and different types of motivation (as compared with foraging structures), and conflicts must have reached much larger scales both in terms of quantity, *i.e.* the number of involved belligerents, and quality, *i.e.* weapons technology as well as offensive and defensive strategies. But the human ethos of aggression must not have increased *per se* through sedentarism: Sedentism developed a number of hitherto unknown or unneeded pacifying devices meant to cope with the enhanced conflict potentials created by the new aggregated tangible and intangible territorial densities.

### **Segregation Regimes and Aggregated Life Modes. On Mitigative Commodification**

Our excavations do provide material evidence that reflects conflict mitigation aimed to support solidarity, integrative processes, interest balance *etc.* Conflict mitigation appears to be an ingredient of early Near Eastern Neolithic cultures: It is expressed by the new productive commodification regimes which supported newly emerging corporate structures via all sorts of segregation processes, such as labour division, site specialization, ancestral locations, possibly genderfication, supra-group feasts(?), new social hierarchies, boosting personal “prestige” good sectors, defensive structures(?), possibly even “commodity

coupons” (Gebel n.d. b) *etc.* All this was supported by the establishment of sedentary moral and belief systems, now serving also as the cognitive agents of mitigation and survival of group integrity. In the economic sector, surplus production and storage appear to be the major agents of mitigation. Probably “markets” and “wealth” in the modern sense became regional elements of temporal mitigation and security before their tendency to become elements of conflict emerged.

In spite of the general problem of identifying aggression, conflict or warfare in the archaeological records, I would dare to state that we are generally able to identify more features of mitigative than aggressive behaviour. This of course has much to do with the lenses through which we behold our evidence, and the nature of such evidence. Mitigative behaviour is expressed rather in processes and by repetitious features inside settlements and cultures, whilst warfare is a restricted event that does not necessarily take place within settlements. I am however still far from the somewhat odd conception of a *peaceful* Neolithic society – homicide, skull traumata, sling balls, projectile points *etc.* do exist –, but it is (more) striking to see what has been subject to mitigative commodification in Levantine Early Neolithic societies in order to avoid conflicts. This ranges from the “dead in storage” under house floors to the creation of flexible groundplans (shifting floor levels and wall openings allowing new room associations) adapting to micro-changes in social relations; the diversification of goods and services or crafts; hierarchies in social and production spheres; and most likely also to ritual and symbolic regimes which connected communities beyond the regional level.

Initially, most productive commodification appears to have mitigative and regulating purposes, even if characterised by a segregative function. Conflicts appear when the (re)sources of commodification (*i.e.* productive value systems) become depleted and lose their basis or if competing commodification regimes become established. (Neolithic commodification is understood as the prolific milieus in which commodities – new technologies, objects, product standards and innovative substrata, services, exchange standards, ideas, belief systems *etc.* – were constantly created, altered and ex-commodified; commodities are more than goods, they are the social milieus of tangible and intangible things, *cf.* Gebel n.d. b.

Since mitigative conflict behaviour is reflected by commodification acts and processes, the study of commodification is an essential element of conflict study.

### **Large and Small Habitats. On Early Neolithic Levantine Warfare and Environments**

Resident territoriality created philopatrial competition and mentalities that caused groups and group members not only to define and personalize territorial property but also to defend and control it. As already implied,

such territories are not necessarily physical, they can just as easily be ideological; in most cases conflicts over territories are concerned with physical and ideological territories, where one is used to support the (initial) claim of the other. Conflict potentials were likely multiplied by permanent residency, and principles of resident territoriality must have dominated all spheres of Neolithic life. Apart from the physical spaces (including natural resources such as springs, lakes, pathways, arable land, water/soil dams, minerals, hunting grounds *etc.*, as well as built spaces such as settlements, houses, rooms, graves, wells *etc.*) intangible territories were domesticated (commodified), mostly to support the structures of physical territories. Indeed, it is highly likely that Neolithic populations distinguished physical and metaphysical space in quite different ways to how we moderns do.

The conflict/warfare discussion hardly distinguishes between conflict conditions in extensive and more restricted spheres or spaces. Translating this to environmental space and the Levant, one may say that our discussion should distinguish between the different conditions for territorial conflict in the more vast north and central Levantine habitats and the more sensitive and confined ones in the southern Levant. Even in the southern Levant and on a supra-regional level, one can distinguish between environmental conflict potentials within the Mediterranean zones and regions with access to the vast steppes with their migrating ungulates in the semi-arid east.

It is one of my basic theses that the Mega-Site Phenomenon of the LPPNB Jordanian Highlands is a non-violent transgression of a socio-economic paradigm becoming successful while migrating from north to south and exploiting the rich animal protein resources and pastures to the east (Gebel 2004). The rapid establishment and decline of the mega-site culture appears accompanied rather by the emergence and implosion of commodification systems than by violence. But what about the situation prior to the LPPNB mega-sites in the more confined Mediterranean environments west of the Rift Valley? Here, we can expect territorial conflicts over habitats which reached the dimensions of organized warfare between neighbouring communities, and initiated what became later the mega-site socio-economy. I am not sure how “peaceful” the mega-site socio-economy was received by the MPPNB communities in the niches of the Jordanian Highlands; as of yet, it looks like an absorption of the indigeneous MPPNB by the more prolific LPPNB. Concerning the end of the LPNNB mega-site socio-economy we may assume restricted local conflicts over resources, but most likely these were minor through the rapid adaptation of a new life mode and its economy, the pastoralism which already developed during the mega-site times.

If we consider all of the Levant, I would agree with Ofer Bar-Yosef that areas with limited habitats are potential areas of territorial clashes and warfare originating in environmental causes. Such restricted

habitats develop either by overexploitation as a consequence of demographic stress and/or cataclysmic land use, or even by minor climatic and other impacts (flash floods, droughts, earthquakes *etc.*) or a combination of the two. The southern Levant has many such regions in which territorial clashes and warfare could emerge from such a background. When going further north, the Levantine habitats become larger and the network of geographical corridors is more extensive and complex. Here, for example in the alluvial plains and the steppes, territorial infringement and warfare as a consequence of limited habitats may not have played a major role, especially not in times of unfavourable climatic oscillations, and only the general sorts of territorial violation may have existed (vandalism, thefts, contamination *etc.*). Especially the vast grassland habitats of the northern Levant may not have witnessed warfare for environmental reasons until the emergence of the early city states.

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