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'Re'-Covering the Past: How Do We Protect and Study Jordan's Threatened Ancient Sites? Approaches at 'Ayn Ghrandal

Emerging from the desert sands of Wādī 'Arabah, Abu Naif appeared one morning at our site, 'Ayn Gharandal. This mysterious stranger, whose village was removed from the Gharandal environs years ago, still knew more about the site's history than any archaeologist to date. Despite spending most of his time in his current village 40 km away, Abu Naif took us to graves previously unknown in this area and showed us modern buildings constructed of ancient materials. Most impressively, he identified multiple structures at the site, as well as occupational phases. We felt we had no other option but to hire him.

Abu Naif is a symbol of many of the challenges facing Jordan's archaeological heritage. Displaced by modern national agendas, his semi-diasporic knowledge of 'Ayn Gharandal represents a microcosm of the problems facing cultural resource management in Jordan in general. Jordan's ancient past is often endangered by its present, with numerous archaeological sites facing threats both natural and man-made. The following paper investigates these threats as they apply to one particular site: 'Ayn Gharandal in Wādī 'Arabah. After describing 'Ayn Gharandal and the challenges facing this recently looted site, the paper evaluates various cultural resource management strategies as they apply to short-term and long-term plans for 'Ayn Gharandal's preservation.

Overview

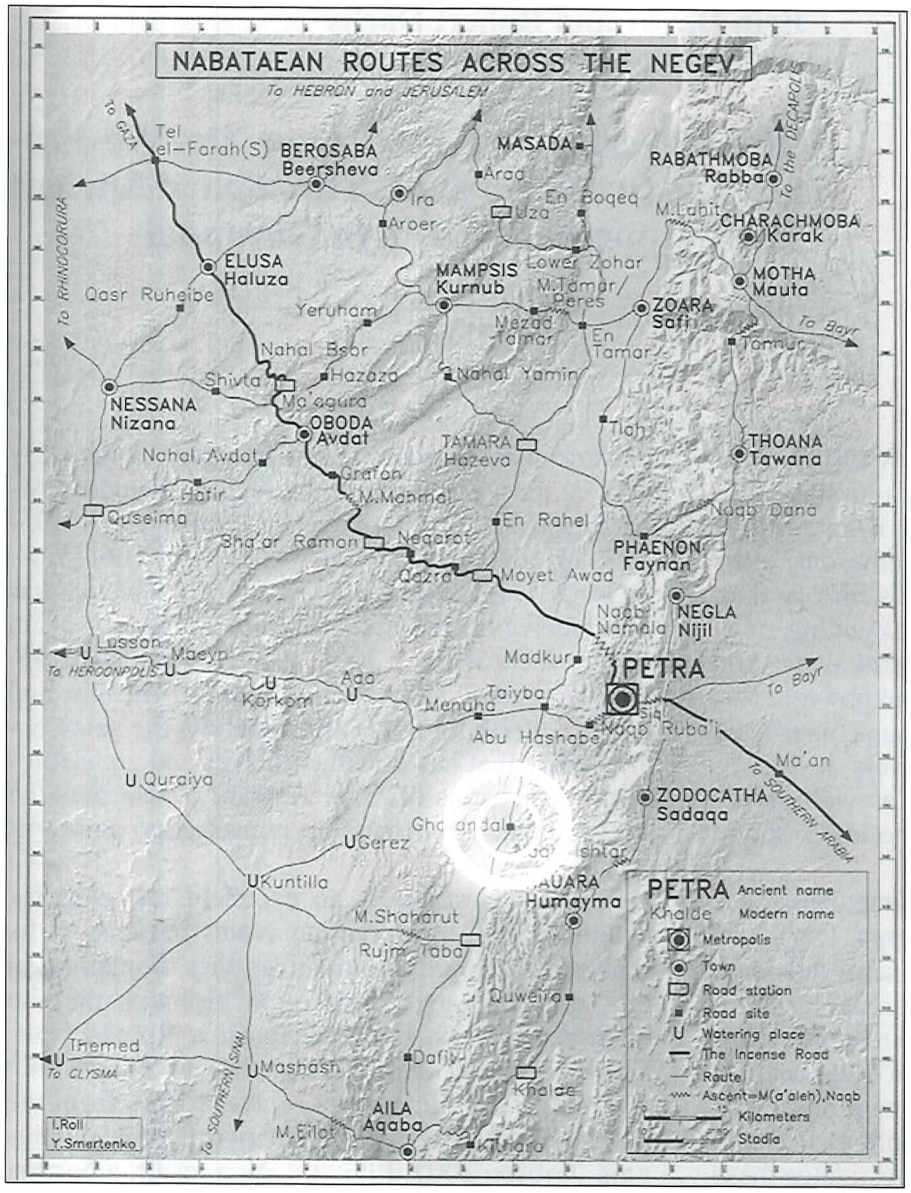
The site lies *ca* 200 m west of the mouth of Wādī Gharandal in the southern 'Arabah, alongside the modern paved road running east from the nearby Dead Sea highway (FIG. 1). 'Ayn Gharandal and its surroundings were visited by many of the early 20th century explorers of the region, including Alois Musil and T. E. Lawrence (Musil 1907: 193-197; Woolley and Lawrence 1915: 105-106; Frank 1934: 231-232; Glueck 1935: 39-40). The site has also received some attention from archaeologists in recent years (Henry 2001: 2-8; Raikes 1985: 95-101; King *et al.* 1989: 212-213; Smith, Stevens and Niemi 1997b: 59-60). Unfortunately, the same accessibility that has drawn explorers and archaeologists to the ruins of 'Ayn Gharandal also puts the site in danger from modern construction and looting.

'Ayn Gharandal is an excellent test case for examining site preservation issues because of its repeated exposure to human activity. Sometime in the last ten years, construction bisecting the site disturbed at least two structures: a Roman bathhouse and a *castellum* (Kennedy and Riley 1990: 209, Fig. 160)[1]. Furthermore, two rooms from the bathhouse have recently fallen victim to illegal digging (Gibson 2007, FIG. 2)[2]. As a result, a portion of the building's architectural remains were uncovered, including several well-preserved and heavily plastered walls, thereby exposing them to the extreme environmental conditions of Wādī 'Arabah. The exposed structure was at risk, not only to the elements, but potentially also to the robbing of its well-cut ashlar blocks. Upon completion of the 2009 survey season, it became clear that these rooms were disturbed to a depth of *ca* 2 - 3 m, as evidenced by the myriad floor tiles and sub-floor material in the looters' debris (FIG. 3).

Furthermore, 'Ayn Gharandal has remained relatively anonymous. The most recent surveys in

[1] The photograph is dated 29 May 1985 and does not show the electricity poles or paved road.

[2] Letter to the Department of Antiquities linked to an unpublished survey of ancient roads in the region

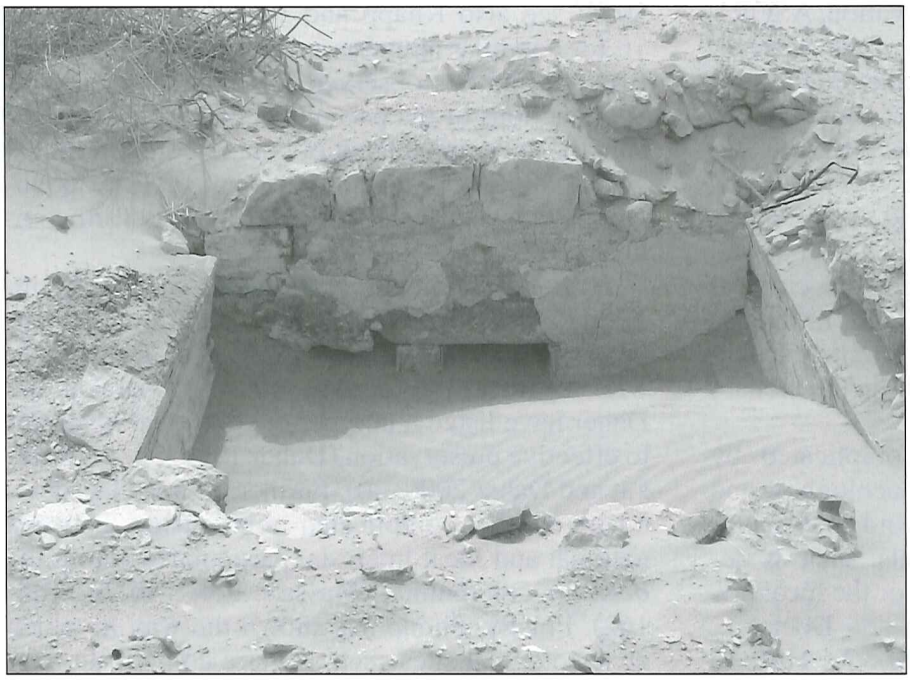


1. Regional map showing location of 'Ayn Gharandal (after Roll 2007).

the region have merely confirmed what had already been hypothesized as early as 1907, *viz.* that the site contains Nabataean, Roman and Byzantine occupation levels (King *et al.* 1989: 212-213; Smith, Stevens, and Niemi 1997b: 59-60). While sites like Petra and Jarash have been the objects of public concern (Massad 2001: 73-75; Shoup 1985: 277; Hazbun 2004: 327), sites like 'Ayn Gharandal yield lower tourist revenues and garner less international attention. For example, the 2004 Jordan Valley Preliminary Land Use Master Plan Project actually lists 'Ayn Gharandal as one of a number of sites that could be "better presented for tourism"[3], yet since that time the site has received little attention and has fallen victim to looting. This begs the question of whether the size and fame of a site should affect its particular preservation plan.

Finally, some explanation of the following cultural resource management (CRM) policy is in order. As members of the American Schools of Oriental Research (ASOR), the directors consider ASOR's policy on preservation and protection of archaeological resources a necessary starting point for the preservation component of research de-

[3] Sandra Chesrown. The Hashemite Kingdom of Jordan, the Ministry of Water and Irrigation, the Jordan Valley Authority and the United States Agency for International Development. Jordan Valley Preliminary Land Use Master Plan Project: Final Land Use Report Volume 1/5. August 2004: 152.



2. Looted northern room of the bathhouse (photo Feb 2009, courtesy of Niemi, T. and Rucker, J.).

3. Bathhouse with mound of looters' debris.

sign. This is all the more justified given the role that ASOR and the American Center of Oriental Research have played in facilitating CRM in Jordan at large (Kana'an and Palumbo 1993: 205-207; Kana'an 1990: 2; Palumbo 1990: 2-3).

Goals of Cultural Resource Management

It is the authors' contention that wrestling honestly with various preservation issues at the beginning of an excavation project will aid in long-term solutions throughout excavation, publication and preservation. To that end, ASOR presents seemingly straightforward goals and procedures for preserving sites like 'Ayn Gharandal. Upon closer examination, however, these goals and procedures are revealed as compromises, with the potential to create friction between the archaeological community, local inhabitants and governing bodies.

Beginning with the aim of preservation, ASOR's stated responsibility is stewardship of the archaeological record. Although many archaeological organizations have adopted similar statements, not all groups share the same perspective (Smith and Burke 2003: 177-200). For example, one of the primary values espoused by the World Archaeology Congress is the importance of indigenous cultural heritage for the survival of indigenous cultures (Gero 2004: 288-293). Varying CRM rationales obviously generate different plans for site excavation and preservation, even from within the archaeological community.

Furthermore, CRM is often complicated by competing interests between archaeologists and governing bodies. Archaeologists find themselves trapped between irreconcilable goals, such as development versus site preservation, or the local law versus research agendas (Bergman and Doershuk 2003: 85-98; Arden 2004: 107-108). As Hazbun makes clear (Hazbun 2004: 310-341), nowhere are the competing directives of globalization, cultural tourism, state governments and local communities more complicated than at the archaeological and cultural sites of the Middle East, including those of Jordan (Gray 2002: 308-329; Kelly 1998: 191-205; Addison 2004: 246).

Moreover, well-meaning archaeologists may find themselves embroiled in local disagreements between governments and inhabitants. This is because academic writings about the past are not unmediated access to events as they happened; they are authoritative interpretations of past events (McManamon and Hatton 2000: 1-19; Hodder 1986; Shanks and Tilley 1987; Bernbeck and Pollock 1996: 138-142; Steen 2002: 1-13). For example, Laurajane Smith has evaluated the effects of CRM, as evident in Australia and the United States. Smith shows that CRM places the past in control of contemporary governments, privileges archaeological interpretations above local or indigenous stories, emphasizes certain moments in history over others, and sometimes values stories of the past more than the present condition of inhabitants (Smith 2004; see also Knapp and Antoniadou 1998: 14-16 for a similar situation in Cyprus). Furthermore, Eric Meyers has observed that archaeological reconstructions of the past and actual excavation enable the accomplishment of contemporary political goals, sometimes to the detriment of local populations (Meyers 1992: 170-171; Meyers forthcoming).

In Jordan, Fakhoury has suggested that the interests and roles of local government, municipalities and councils often remain unclear, particularly with regard to the tourism industry[4]. Barakat and Daher have listed a number of additional obstacles to effective preservation (Daher 1999: 33-47; Barakat and Daher 2000: 40). Further, Massad has demonstrated the complicated relationship between national and local interests, particularly within the *bedouin* community (Massad 2001: 50-78, 105-162). Finally, Shoup has shown the way in which archaeological sites such as Petra complicate relationships between state government and local populations (Shoup 1985: 283-285).

Given these challenges to any simplistic notion of preservation, the goal of the 'Ayn Gharandal Archaeological Project is stewardship of the archaeological record. That being said, this goal can only be accomplished by a humble recognition that the archaeological record is not simply 'found' but 'produced'[5], and that the past is contestable ground with very real modern ramifications for local government and inhabitants.

Steps Toward Preservation and Protection

Documentation

ASOR suggests four components of site preservation: (1) documentation, (2) post-excavation site preservation, (3) partnerships with local development planners and (4) protection of archaeological sites in case of war. First, the correct manner of site documentation is far from obvious. Arguments in favor of survey versus excavation have been rehearsed at length; some archaeologists claim the most ethical response is to eschew further excavation, favoring instead the study of existing collec-

[4] All citations of L. Fakhoury refer to Unimed Cultural Heritage II: The Cultural Heritage Legislation in Jordan http://audit2.clio.it/legaldocs/jordan01.htm.

[5] Kehoe (1989: 87) and Trigger (1989: 14) show the way professional archaeology was affected by its location in modern, Western environments. The methods and assumptions of archaeology thus produce a record, which is often determined by archaeology's particular position in modern, western discourse. See also Bahrani (1998:160-61, 163, 171-72) and Gero (2004: 287-288). For a critique of the 'world heritage' conceptual model and the way it privileges western values see Meskell (2002: 564, 568-569). In contrast, Silberman (1998: 185) suggests the increasing national diversification of participation in ASOR indicates a gradual break in the American (and perhaps western) stranglehold on archaeological research and technique.

tions to answer research questions (Barker 2003: 71-84). Thus, excavation has not always been considered the most responsible method of documentation. Moreover, in the Middle East, facts on the ground such as the cost of purchasing the land and the resources required to police sites after excavation may make governments unwilling to excavate.

Conversely, survey data may be abused in interpretations of the past (Greenberg and Cinamon 2006: 229-243; Greenberg and Keinan 2009: 23-28). While surveys are a valuable means of non-invasive data collection, claims based upon them must remain limited. In other words, only excavation can reveal sealed loci under floor deposits or a material assemblage associated with household activity.

For a site that has already been looted, such as 'Ayn Gharandal, the question of documentation is not a simple one. Excavation could attract more looters to the site, but only actual excavation can produce information about the site's occupational history. For example, surveys at the site have produced no Islamic period pottery, but similar fort sites at Ghadian / Yotvata (Davies and Magness 2008)[6] and Hosob / Hatsevah (Cohen 1994: 203-204; Cohen and Yisrael 1995: 223; Erickson-Gini 2004: 273), as well as farmsteads at 'Ayn Avrona (Avner and Magness 1998: 48-49),[7] attest to the presence of Early Islamic period settlements in this region. Without excavation at 'Ayn Gharandal, potential phases of the Islamic period remain silenced.

At the same time, architectural features are often associated with competing cultural identities, making preservation choices particularly fraught (James 2004: 145-146). Further, Fakhoury has claimed that architectural remains in Jordan are both major tourist attractions and the elements most threatened by modern development. For these reasons, 'Ayn Gharandal's seemingly well-preserved architecture entails both a resource and risk. Thus, excavating in the service of cultural preservation and actual site protection can appear to be in conflict.

Post-excavation Site Preservation

Post-excavation site preservation is also more complex than it seems. Meyers has argued that CRM extends the periods of history into the present (Meyers 1992: 170-171). CRM has rightly increased recognition that even recent historical periods qualify as cultural heritage, worthy of preservation[8]. Therefore, at a site with multiple occupation periods, how does the archaeologist decide which phases to preserve?

Many authors have explored the politics of site preservation. An often cited example is the professional and public outcry over Ayodha India where an Islamic mosque may cover an older Hindu temple (Layton, Stone and Thomas 2001; Golden 2004: 184-185; Bernbeck and Pollock 1996: 138-142). Nadia Abu el-Haj has likewise demonstrated that the political clearing of Islamic landmarks in Jerusalem enabled the discovery and preservation of Second Temple remains beneath (Abu el-Haj 2001). Conversely, preserving the most recent remains at a site often prevents further excavation of earlier periods, as some believe to be the case on the Haram al-Sharif. Thus, preservation can actually halt excavation. Moreover, the choice of which cultural heritage to preserve, particularly in the Middle East, is neither simple nor neutral (Greene 1999: 43-60). Even in Jordan, the decision to preserve certain structures cannot be entirely disentangled from a desire to lend legitimacy to the modern governmental system (Maffi 2002: 219)[9].

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[6] The ephemeral Early Islamic layer was dated by radiocarbon data rather than pottery or small finds and would therefore not have been identified without excavation.

[7] Avner and Magness (1998: 53 note 15) claim that the south-east 'Arabah was virtually devoid of Early Islamic occupation, in contrast to the southern Negev. In this point the authors follow Smith, Stevens and Niemi (1997b: 65-67), whose conclusions are based on survey data rather than excavation. Given the deep sand deposits at sites like 'Ayn Gharandal, as well as the ephemeral nature of some Islamic occupation levels, such as at Ghadian / Yotvata, survey data may be misleading.

[8] Rami Daher (1996: 65-81) argues that Jordan has largely ignored the conservation of structures post-dating 1700 AD. The pre-1700 date is stipulated by Article 2 of Law No. 21 for the Year 1988, Official Gazette No. 3540. Maffi (2002: 210-211) suggests that part of this period, the Ottoman era, has been intentionally suppressed in historical studies in Jordan, as evidenced by school text books and museums throughout much of the country. Note, however, that a new law was passed in 2005 (Law No. 49 for the Year 2003), designed to protect post-1700 finds. Still, Jacobs and Porter (2009: 75, 76) note that, in practice, objects pre-dating 1700 are managed by the Department of Antiquities while those post-dating 1700 are handled by the Ministry of Culture, suggesting to the authors that, in a legal sense, Jordan claims ownership over the earlier artifacts but not a genealogical relationship with those cultures. The authors concede that the last decade has seen greater attempts to associate all antiquities in Jordan with a national identity, regardless of time period.

[9] Maffi discusses the preservation of the Umayyad citadel at Amman, claiming it "allows the Hashemite dynasty to give historical depth to the capital of the modern kingdom and to establish a significant link between the modern monarchy and the Umayyad caliphate."

'Ayn Gharandal's survey data also suggest potential problems for site preservation. Among the pottery collected from the fort were several Nabataean sherds (*ca* 48 sherds of 570). Similar sites in the region contained significant Nabataean and Roman remains, such as al-Ḥumayma (Oleson *et al.* 2008: 309-342), Bīr Madhkūr (Smith 2005: 71), Hosob / Hatsevah (Cohen 1994: 204-208; Cohen and Yisrael 1995: 223), and Obodah / Avdat (Erickson-Gini 2002: 113-130). Thus, although the architectural forms of 'Ayn Gharandal's bathhouse and fort are clearly Roman, the pottery and the occupational record at comparable sites suggest 'Ayn Gharandal may have Nabataean levels as well. Assuming Nabataean settlement does exist, difficult decisions about whether or not to preserve or remove Roman-period architecture will need to be made, implicitly muting one of two important periods of cultural heritage.

Local Partnerships

Cultivating partnerships with local land developers is often encouraged in order to protect and preserve archaeological sites. Fortunately, many archaeologists have been involved in assessing the regional impact of forthcoming Red Sea-Dead Sea canal, which will certainly affect 'Ayn Gharandal, given its location in Wādī 'Arabah[10]. Furthermore, as early as 1992 the Jordanian government recognized the need for archaeologists to provide data to government agencies in order to control land development more effectively (Davis 1993: 499-505). This awareness has been the motivation for mandatory listing and registration of archaeological sites, including the former JADIS system and MEGA Jordan (Palumbo 1994)[11].

Unfortunately, the diffuse nature of separate governmental branches and the contested authority between them makes co-ordination difficult[12]. Additionally, Jordan still struggles to co-ordinate the public and private sectors (Barakat and Daher 2000: 40; Greene 1999: 43-60; Hazbun 2002: 232). Thus, involvement with government branches and developers can sometimes prevent site damage, but it remains unlikely that the preservation of archaeological sites will halt major construction projects.

Even development intended to preserve and display Jordanian archaeological sites can become complicated (Gray 2002: 316-320, 325; Hazbun 2002: 338). Fakhoury has shown that sites often lack the revenue to protect against concomitant damage from tourist traffic. Furthermore, Hazbun cites difficulties in Wādī Mūsā in the late 1990s as an example of the way private tourism development, when unchecked by the state, can damage both sites and tourist revenues (Hazbun 2004: 332-333). Finally, Meyers (Meyers 1992: 170-171; Meyers forthcoming), Greenberg (Greenberg 2009a: 262-281; Greenberg 2009b: 35-50) and Bauman (Bauman 2004: 210-225) have shown that 'development' in Israel / Palestine often includes the creation of tourist facilities and roads, which, in their attempt to preserve cultural heritage can actually damage local communities. Porter and Salazar have demonstrated the same phenomenon in central Jordan, where tourism development surrounding sites can impede access by the local population (Porter and Salazar 2005: 365)[13].

Protection Against Warfare Damage

Finally, many preservation policies address the need to protect sites in the event of war. Barakat and Daher address the severe effects of war on Jordan and Palestine, particularly those of 1948 and

[10] Recent attempts by Jordan and Israel to minimize potential damage to archaeological sites do not erase the highly complex political nature of the Red Sea-Dead Sea canal. Hazbun (2002: 332) shows that the canal project was interconnected with the promise of a tourism boom following peace with Israel. Already in 1993, Shimon Peres had noted "expansive tourism and recreation infrastructure along a 'Red Sea to Dead Sea canal'" as one of many promised economic advantages to Arab-Israeli peace (Peres 1993: 149, 150-153). Hazbun (2002: 337-343) further states that a sustainable boom never materialized, but the accompanying influx of Israeli tourists instead caused local hostility in Jordan. He claims that the influx of tourism, including the management of national heritage sites, and its concomitant economic advantages for the population as a whole were offered as political capital to control resistance to the peace treaty (335-336). Thus, the canal project could be seen as an example of the way various nations exploit rhetoric about heritage and tourism for political ends.

[11] Articles 5 (E) and 6 of Antiquities Law No. 21 for the Year 1988, Official Gazette No. 3540.

[12] Fakhoury lists the government institutions involved in the management of antiquities, including the Ministry of Planning, Ministry of Tourism and Antiquities, Department of Antiquities, Ministry of Municipal and Rural Affairs and the Environment, Ministry of Culture and Ministry of Waqf and Religious Affairs. Regional municipalities involved in antiquities protection include the Aqaba Regional Authority, Petra Regional Planning Council and Jordan Valley Authority. Other institutions include the Higher Council for Science and Technology, Jordanian universities and NGOs such as the Royal Society for the Conservation of Nature, Friends of Archaeology and Petra National Trust.

[13] See also Jacobs and Porter (2009: 86-87). Here the authors note a degree of ambivalence about the changing access to adjacent sites, with some communities desiring excavation and development as a way of underpinning local economies.

1967 (Barakat and Daher 2000: 39). 'Ayn Gharandal saw military activity in 1956, including troop movement and aerial bombing, which killed *ca* 9 people and destroyed a police station (Morris 1993: 410; Hahn 2004: 91)[14].

Despite this incident, the majority of damage to the site has been the result of peacetime activities. Thus, it is problematic that preservation statements discuss the threat of active warfare but not the problems posed by military activity during peacetime. First, military activity areas alter archaeologists' access to sites. Second, military training can disturb archaeological remains; military digging, vehicle movement, artillery practice areas and fixed installations all represent very real dangers to archaeological sites (Canham and Chippindale 1988: 53-65). As a result, armies may be responsible for the destruction of a number of archaeological sites during both war and peace (Kletter 2005).

'Ayn Gharandal is particularly susceptible to military activity. Its proximity to the Jordan / Israel border increases the amount of military activity in the site's vicinity. Furthermore, the Jordanian army removed all local inhabitants from the area in order to construct a military base. More recently, the base was relocated further back into Wādī Gharandal, leaving the area around the site uninhabited, save for one *bedouin* farmer and continual army vehicle movement from the Dead Sea highway back towards the military compound.

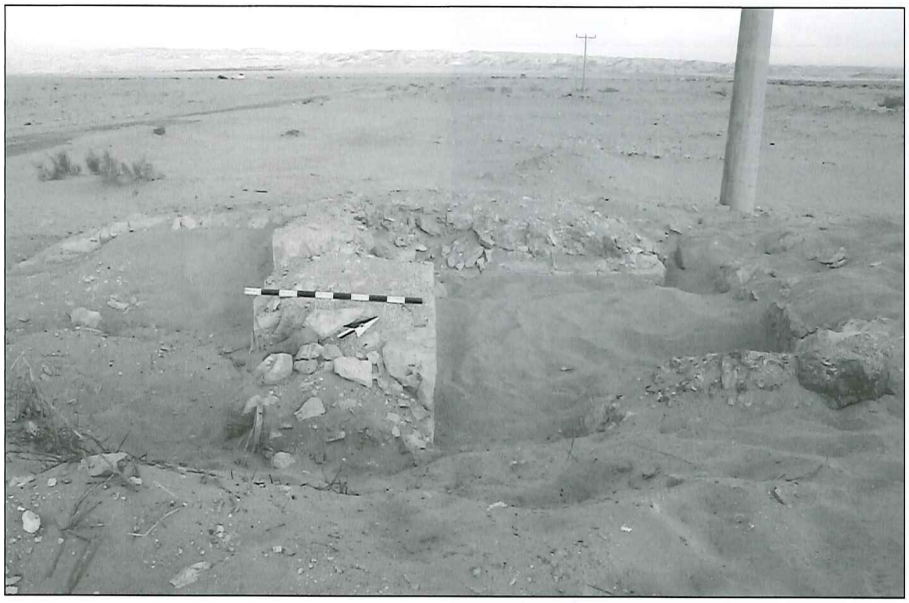
The road which runs through 'Ayn Gharandal and the power lines inserted in the bathhouse probably relate to these various army construction activities (FIG. 4). Army personnel also continue to visit the site. As a result, direct interaction with the army stationed nearby is an important part of the project's preservation plan and should probably be considered a larger part of Middle Eastern site preservation in general.

Other Issues in Stewardship

Antiquities Trade

In addition to ASOR's suggestions for site preservation, the statement addresses the antiquities trade, publishing and curating artifacts, and public outreach. While policies focus on appropriate responses to already looted antiquities, no suggestion is offered concerning archaeologists' responsibility to prevent looting at their own sites. In other words, the prevention of demand for antiquities is discussed, but what about the prevention of supply? Likewise, Jordanian antiquities law focuses on the trade in antiquities rather than excavators' responsibility to protect their sites from looting[15].

Thus, we return to the question, 'is it ethical to excavate?' For a site, like 'Ayn Gharandal, that has



4. Electrical power lines running through the bathhouse and fort.

[14] This attack is discussed in the Yearbook of the United Nations, 1956 Department of Information, United Nations, New York: Political and Security Questions, December 31, 1956. UN Security Council document S/1295 dated 12 March 1949 reveals that the Jordanian army held a "fixed position" at Gharandal prior to 7 March of that year.

[15] Articles 10 and 23-29 of Antiquities Law No. 21 for the Year 1988, Official Gazette No. 3540.

already been looted at least once if not repeatedly, this question is even more acute. On the one hand, looters already know about 'Ayn Gharandal, lessening the chance that excavation is going to produce increased looting. In fact, ignoring the site simply leaves more material for looters to destroy. On the other hand, visible architectural remains could draw more attention to the site, given its prominent location and easy access from the Dead Sea highway. For the moment, the 'Ayn Gharandal Archaeological Project is committed to backfilling areas until these long-term risks can be accurately assessed, however, the nature of architectural finds could alter that decision in the future (FIGS. 5 and. 6)[16].

Publishing and Curating Finds

Archaeologists are encouraged to observe high standards in the publication and curation of finds. While excavators in Jordan and many other countries in the Middle East control the means and timing of site publication, curation is often out of the excavator's hands. Objects deemed valuable are turned over to the Department of Antiquities for storage or for display in one of Jordan's museums[17].

5. Backfilling the bathhouse.

6. Bathhouse after backfilling.

[16] This is in compliance with Article 17 of Antiquities Law No. 21 for the Year 1988, Official Gazette No. 3540.

[17] Articles 5, 7, 8, 21 and 24-25 of Law No. 21 for the Year 1988, Official Gazette No. 3540.

That having been said, objects in museum collections the world over are value-laden, with a long history of museum exhibits being used to justify any number of national or cultural agendas (Hinsley 1989: 79-96; Trigger 1989; Bahrani 1998: 170; Kersel 2004: 46; Prentice 2001: 5-26). In Jordan, Irene Maffi has argued that museums created in the 1990s serve the government's interests, both in educating the population and in propagating an international image abroad, but that these same museums also silence local interpretations of history (Maffi 2002: 208)[18]. Thus, if ethical preservation is the concern of archaeologists, it may not be sufficient to merely save objects through excavation. Some consideration should also be given to the means by which and to what ends artifacts are then configured in museum displays.

Public Outreach

Finally, an oft-touted solution to preservation problems is community involvement (McManamon and Hatton 2000: 1-19). In Jordan, in particular, community education has been a stated goal of CRM throughout the '90s and into the present century (Davis 1993: 499-505) and has been successfully employed at sites like Umm al-Jimāl and Ḥisbān. 'Community archaeology' has also been effective in areas around Jerusalem (Greenberg 2009b: 35-50).

There are at least three problems with the application of this model. First, Meyers has suggested that nations use archaeological narratives to present a particular picture of cultural heritage (Meyers 1991: 170-171; Meyers forthcoming). Thus, 'education' of locals is not uncontested ground. For example, both Greenberg (Greenberg 2009a: 262-281; Greenberg 2009b: 35-50) and Abu el-Haj (Abu el-Haj 2001) have shown that participation in archaeological excavations and visits to archaeological sites in Israel can reinforce particular political ideals. Greenberg has then shown that when archaeological education comes under the dominance of a particular national agenda, it actually works against the development of community appreciation and care for archaeological sites. In Jordan, the focus on east bank sites and the centrality of Petra have been used to promote "state legitimacy" and "Jordanian national identity" (Hazbun 2004: 331), not to mention a particular territorialization of the Jordanian state[19]. Ultimately, where multiple communities are interested in and affected by archaeological research, public interaction becomes more complicated (Greenberg 2009a: 265-266).

Second, the ability for local communities to interact with archaeological sites and materials may depend largely on socio-economic status. Porter and Salazar have shown that the commodification of heritage in Jordan often creates unequal access based upon monetary assets. Not only are elements of the archaeological past integrated in new resort settings and expensive handicrafts, but visiting archaeological sites may depend on having the means to travel and pay entrance fees (Porter and Salazar 2005: 364; Jacobs and Porter 2009: 77-78). Ethnographic research by Jacobs and Porter has shown that, at least in central Jordan, the push to construct a national identity by encouraging encounters with Jordan's archaeological sites and material culture has not been effective in rural village environments, such as Dhībān. Rather, the authors found that widely varying local understandings of heritage were much more dominant paradigms (Jacobs and Porter 2009: 80, 84-85).

Finally, it is difficult to involve local inhabitants when sites lie outside villages. While community involvement may be effective when locals live close to a site, have an interest in its condition and are informed about trespassers, many sites in the south of Jordan fall within *bedouin* territory but lack permanent adjacent villages. The inhabitants of 'Ayn Gharandal were actually relocated, thus eliminating any local community that may once have existed around the site. Furthermore, 'Ayn Gharandal's proximity to one of Jordan's major

[18] By contrasting regional museums in Salt, Karak and the Dead Sea with museums in Amman, Maffi shows the way in which central authorities in Amman have influenced the presentation of regional or urban history on the periphery (Maffi 2002: 209).

[19] On the shifting political relationship between Transjordan and the West Bank see Massad (2001: 222-275). See also Malfi (2002: 216-217) for the way Jordan originally incorporated Biblical and / or Christian sites from the West Bank into its tourism industry and Gray (2002: 309 and especially 310). Here Gray suggests that the loss of the West Bank and Jerusalem in the 1967 war stripped Jordan of *ca* 90 % of its tourist assets at the time. Gray (2002: 311) also notes that the Allenby Bridge crossing still allowed travel agencies to market both Jordan and the West Bank together for some time to come. Gray (2002: 313) further shows that the nation's advertising for foreign tourism was revamped in the late 1980s focusing on Petra, Jarash and Aqaba. Although Gray does not connect this shift with the changing relationship between Transjordan and Palestine in the late 1980s or the first Intifada, the timing of this advertising shift is suggestive.

roadways makes it accessible to looters travelling from other areas. For these reasons, the nature of public interaction and education is more difficult to understand and influence. While the project continues to contribute to Jordan's overall knowledge of its archaeological sites through mapping and submitting materials for the national database, local interactions and education remain elusive.

Conclusion

In conclusion, many of the traditional responses to site preservation and protection are more complicated than they first appear. Varying goals between archaeologists, governing bodies and local populations often prevent adequate solutions to which all parties can agree. CRM also encodes conflicting values, including the ethics of documentation, site preservation, land development and military activity, not to mention looters' activities, curation of excavation finds and public outreach.

Ultimately, 'Ayn Gharandal's unique situation draws attention to the difficulty of composing and enacting CRM models, even with the best of intentions. Because archaeologists do not normally study the complex nature of Middle Eastern politics, post-colonial discourse, tourism studies or nation-state formation[20], they run the risk of causing unforeseen harm when laying down the trowel and assuming the mantle of cultural resource managers. Only by recognizing the complexity of these issues and their competing values can archaeologists hope to establish preservation plans that do justice to both the historical record and to the modern communities whose generous hospitality enables historical research.

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