World War II Underwater Cultural Heritage Sites in Truk Lagoon: Considering a Case for World Heritage Listing

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This paper explores a number of issues in regard to the world heritage listing of the World War II underwater cultural heritage sites located in Truk Lagoon. The destruction of the Japanese Naval Base at Truk was an important event in the American strategy to end World War II and it had a profound effect on the indigenous inhabitants. Divers from all over the world visit Truk Lagoon to dive the 50 shipwrecks and numerous aircraft. The paper investigates the significance of the sites in accordance with the criteria for world heritage listing, and in context with Pacific Island Nations requirements.

Key words: World War II, Truk Lagoon, shipwreck, World Heritage Site.

Introduction

This paper is part of a larger research project to assess the world heritage significance of the World War II underwater cultural heritage sites located in Truk Lagoon, Chuuk. A number of excellent books on the shipwrecks of Truk Lagoon have been published (Lindemann, 1982; Bailey, 2000), primarily aimed at the sport diver, for whom these sites are of world renown. This paper is intended not to duplicate such work, but to discuss the significance of the historic sites to the Pacific Islanders and the international community.

Chuuk is located approximately in the middle of the Federation States of Micronesia (FSM), just over 7° N of the equator, and on a line of longitude (152° E) similar to the east coast of Australia (Fig. 1). Truk Lagoon is about 64 km in diameter and has been formed by a barrier reef enclosing an area of 2,125 sq. km (Fig. 2). It is the most populated region of Chuuk, enclosing 19 high volcanic islands with lush tropical vegetation, warm, clear waters and great abundance of fish—‘a tropical paradise’ (Gladwin and Sarason, 1953). ‘Truk’ was the spelling adopted during the German annexation of Micronesia (1898–1914). In 1986, Truk reverted to its traditional pronunciation and spelling of Chuuk, although many Chuukese use both, particularly in the name of the lagoon.

This paper concentrates on the World War II sites in Truk Lagoon. It is not intended, in highlighting this brief, but significant, period of the history of Chuuk, to diminish the significance of the indigenous culture, traditions, and surviving historic sites. Chuuk has a rich history, and indigenous voyaging, navigation and the associated people and craft are more important to the cultural identity of this region, from which emanated some of the last great Pacific Island navigators (Gladwin, 1970) (Fig. 3).

During World War II, Truk was a major strategic base for Japan’s advance into the Pacific. In 1944 America, as part of its push toward Tokyo, bombed Truk over an 18 month period, effectively taking it out of the war. Today, the
World War II underwater sites in Truk Lagoon provide Chuuk with its single biggest tourist attraction. Scuba divers from all over the world visit Truk Lagoon to dive the sunken Japanese ships and aircraft, ‘a World War II enthusiast’s dream’ (Bailey, 2000: xi) and ‘one of the great undersea wonders of the world’ (Giddings, in Lindemann, 1982).

The author, contracted as a maritime archaeologist with the FSM government, considered world heritage listing of the Truk Lagoon underwater cultural heritage sites an issue worthy of investigation. Particularly because no cultural heritage sites located underwater have been included on the list because of their ‘outstanding universal value.’ This paper will explore some of the background and issues associated with world heritage listing in this region, as well as this type of cultural heritage site. No nomination has been put forward by the FSM government for world heritage listing of the Truk Lagoon sites, and the opinions expressed in this paper are personal and do not reflect the views of the FSM government or any other agency or group.

Chuuk’s environment and society

The Chuuk islands are fringed with many mangroves that support a large and diverse marine life. The fertile high islands contain native trees and plants comprising breadfruit, coconuts, mango, banana, and taro that, in association with fish, have supported a subsistence lifestyle for the Chuukese for many years. However, a significant increase in population, from 9,185 in

Figure 2. Truk Lagoon. (Judi Francis)

Figure 3. Indigenous craft in Truk Lagoon. (Courtesy of the Micronesian Seminar)
1946 to 60,000 in 2002 (half of the population of the FSM), and the move to a cash-based economy, has resulted in a greater reliance on imported food. ‘Government employment is the biggest single source of income in Micronesia’ and in Chuuk (Young et al., 1997). Commercial fishing is the biggest export industry and tourism is a major source of revenue. The World War II shipwrecks are the major tourist attraction. However, most Chuukese gain little from these industries and it is essentially an impoverished society.

Colonial rulers in Micronesia

After nearly 2000 years of independence (Young et al., 1997), the Spanish (1886–1898), Germans (1898–1914), Japanese (1914–1945, from 1919 as a mandated territory under the League of Nations) and USA (1945–1986) took charge of Micronesia, which included the islands of the Marshalls, Marianas, and Carolines (Palau, Yap, Pohnpei, Kosrae and Truk). The USA was designated as trustee under the newly-established United Nations in 1947. In 1986, through the development of a Compact of Free Association with the USA, the four states of Yap, Pohnpei, Kosrae and Truk formed the Independent Nation of the Federated States of Micronesia (FSM), independent but in receipt of American aid in return for the presence of American military bases.

Japan and World War II

Japan, after declaring war on the USA in 1941, was quick to complete the building of its military bases in Micronesia. Truk, because of its deep water and natural protection, was the Imperial Japanese Navy’s Fourth Fleet base from November 1939. The Combined Japanese Navy Fleet were based there from July 1942 to February 1944. It was a strategic supply base for Japan’s advance into the South Pacific, and was regarded by the USA as the ‘strongest naval base in the Pacific with the exception of Pearl Harbor’ (Naval Analysis Division, 1947). However, Japan’s Rear Admiral Chuichi Hara ‘remarked after the war that when hearing American radio broadcasts refer to his bailiwick as “The Gibraltar of the Pacific” he only feared lest the Americans discover how weak it was’ (Morison, 1975: 317). Over 37,000 Japanese lived and worked in Truk, dominating the 9,000 Chuukese. Five airstrips and seaplane bases had been built in Truk, some initially as civilian facilities, and only minimal repair facilities, fortifications and defences had been built when the Japanese Army arrived en masse in January 1944. Although numerous coastal defence and anti-aircraft guns (Fig. 4), pillboxes and bunkers were established in preparation for an amphibious invasion they were not equipped for the massive aerial bombardment that was to come. In addition, American submarines greatly reduced the number of ships, equipment and personnel getting to and from Truk.

The USA strategy for Truk, which initially included an amphibious invasion, was restructured to isolating the base from playing any further role in the war, without a massive invasion and the potential for further heavy casualties (Ito, 1962: 90). Truk needed to be neutralized to stop its resources being used against the Americans in the Marshalls and its drive further west. Once it was neutralized, the Marshalls included a base for the USA to launch further west into the Pacific and on to the road to Tokyo, as well as provide a launching pad for the continual bombing and neutralizing of Truk using B24 and B29 aircraft (Fig. 5).

Impact of the war on the Chuukese

Before the war, Japan provided work, education and health services, in addition to beginning the process of alienating the Chuukese from their land and breaking down their traditional lifestyles. During the war, most Chuukese were forced to leave their homes to accommodate the Japanese military, particularly the 10,000 Army personnel. The Japanese military facilities greatly
modified the islands’ environments, and traditional historic sites in strategic locations were interfered with. The military also confiscated local food, as imported food could not get through the submarine blockade. The continual bombing destroyed local crops and made it difficult to farm or collect fish. Chuukese were forced into slave labour to construct the many military facilities. Starvation and malnutrition became common, and torture and cannibalism were said to have occurred. ‘Those who experienced the intense suffering during the Japanese military buildup and the American campaign describe it as the greatest hardship they ever endured’ (Turner and Falgout, 2002: 112).

There are a number of Chuukese who witnessed the war still living locally and who provide a very real connection with this terrible suffering. A survey of the remaining World War II sites on the island of Tonoas (called Dublon by the USA and Chuukese, and Natsujima (Summer Island) by the Japanese), carried out in 2001/2002, revealed many sites and gave an insight into local memories of the Japanese times (Jeffery, 2003).

**World War II underwater sites located in Truk Lagoon**

On 4 February 1944 a US photographic reconnaissance flight found nearly 60 ships, including the super-battleship *Musashi*, the flagship of the Japanese Navy, two aircraft carriers, four heavy cruisers, three light cruisers, nine destroyers, two submarines and over 30 tankers, repair and transport ships (the majority armed) in two of the four main anchorages centred around the Japanese Headquarters on Tonoas in Truk Lagoon (Bailey, 2000: 100). This alerted the Japanese commanders to a possible strike on Truk, and as a result most of the fleet, predominantly the warships, departed for Palau during the following week. However, many of the transport ships had to remain to unload their cargo.

The USA carried out two aircraft carrier strikes on Truk: the first on 17 and 18 February 1944, called ‘Operation Hailstone’, and the second on 30 April and 1 May, by a fleet of 12 aircraft carriers and a number of battleships, cruisers, destroyers and other vessels. In combination with American B24 and B29 aircraft a total of 6,878 tons of bombs were dropped on Truk (1,813 tons in June 1944). In addition to the loss of over 4,000 Japanese, 120 Chuukese and other Pacific Islanders, and a number of Americans, 52 ships were sunk inside the lagoon and over 400 aircraft destroyed.

**Shipwrecks**

Appendix 1, compiled from primary and secondary archival sources and field surveys, lists the ships sunk at Truk Lagoon (Lindemann, 1982; Carrell, 1991; Hezel and Graham, 1997; Bailey, 2000; Jeffery, 2003). It includes eight warships, some smaller landing craft and 42 armed transport ships and tankers (Figs 6 and 7). In addition, many smaller craft not included in this list were reported to have been sunk (Naval Analysis Division, 1947: 14; Bailey, 2000: 247).
Aircraft
A total of nine Japanese and two American aircraft are known to be located within the lagoon waters, although the number is potentially much higher, since no thorough search has been conducted. Of a total of more than 416 Japanese aircraft, the majority were destroyed on the ground before they took off. Twenty six American aircraft; one to four British planes (the British carried out a carrier attack in June 1945); and five or six B-24s were destroyed during the campaign against the base (Naval Analysis Division, 1947). The Japanese aircraft that have been found inside the lagoon include ‘Zero’ fighters (Fig. 8), dive bombers, a larger two engine bomber, and a four-engine flying boat (Fig. 9).

Legislation and management of the WWII underwater sites
The remains of the World War II Japanese ships and aircraft located under water in the lagoon are protected in three ways: Truk State Law No. 21-5, 1971 (Truk Lagoon District Monument, and its amendments); FSM National Legislation, Public Law 1,048 (1979) Title 26, Historical Sites and Antiquities; and the USA National Historic Preservation Act 1966. The ‘Truk Lagoon Underwater Fleet’, as it is known, has also been declared a USA National Historic Landmark, being one of about 2,500 such sites in the USA and its other jurisdictions and given a ‘threatened’ status as at 2002.

While the management of the Japanese shipwrecks and aircraft located under water (no Chuuk State legislation exists for sites above high water) could be seen to be well-served with legislation, the associated programme of activities which are a key to successful management are not being effectively implemented, and sites continue to suffer. Hezel and Graham (1997) have outlined many issues that need to be addressed, the main ones being curtailing the illegal recovery of artefacts, stopping the practice of dynamite fishing, and putting into place a better mooring system. Two of the live-aboard charter operators have installed a number of screw moorings adjacent to some of the shipwrecks, and more are planned, but sites continue to be damaged from boat anchors.

Recent work in Chuuk has attempted to address some of these issues through the implementation of three Historic Preservation Fund Special Projects: a side-scan sonar survey of the underwater sites (Green, 2002: 128); a
Figure 7. The bow gun on the 6,938 ton Fujikawa Maru and showing fresh corrosion on the two metal bitts—a result of frequent dynamite fishing. (Greg Adams, 2002)
Figure 8. The ‘upside down zero’ (a ‘Site Surveyor’ survey commenced on this site in 2002). (Greg Adams, 2002)
Figure 9. The four engine Japanese ‘Emily’ flying boat which has greatly suffered from diver interference (Greg Adams, 2002)
corrosion survey (MacLeod, 2003) (Fig. 10); and interpretation of some sites through production of a booklet, and six signs to be placed on two of the islands (Jeffery, 2003).

The World Heritage Convention

In November 1972, UNESCO adopted a ‘Convention Concerning the Protection of the World Cultural and Natural Heritage’ with aims to ‘Provide for the protection of a select list of properties that are the most outstanding from an international viewpoint’ (WHC, 1972). At 3 July 2003, there were 754 properties on the World Heritage List, of which 582 have been listed because of their cultural heritage significance, the majority being located in Europe. One of the major attractions in listing is the financial benefit it can bring from UNESCO and sponsors. It can also bring potential restrictions on what site owners can do with their properties given the need to preserve them in an authentic state. However, site preservation is primarily the responsibility of a country through its domestic legislation according to a management plan, not through the World Heritage Convention which essentially only recognises places of ‘outstanding universal value’ and establishes a process, and provides facilities to help preserve them.

Article 1 of the Convention states that ‘Cultural Heritage’ is defined as including: ‘a monument, cave dwellings, buildings, groups of building and sites which are ‘works of man or the combined works of nature and man, and areas including archaeological sites which are of outstanding universal value from the historical, aesthetic, ethnological or anthropological point of view’.

Paragraph 24 of the Operational Guidelines for the World Heritage Convention provides six criteria for determining whether a site is eligible to be included on the WHL and which briefly are: that it represents a masterpiece of human creative genius; exhibits an important interchange of human values; bears a unique or at least exceptional testimony to a cultural tradition; is an outstanding example of a type of building or architectural or technological ensemble or landscape; is an outstanding example of a traditional human settlement; can be directly or tangibly associated with events of outstanding universal significance (WHC, 2002).

The process of proposing a site for the WHL is for a State Party to prepare a ‘Tentative List’ of sites it considers to be of ‘outstanding universal value’, and which they intend to nominate during the next five to ten years. In addition to meeting one of the criteria stated above, the World Heritage Bureau requires documentation on site authenticity, management, legal status and ownership.

In the light of this, to justify the suggestion of listing the Truk Lagoon sites, it is relevant to research some of the sites on the WHL that could be compared with the Truk lagoon sites, including: their history (World War II); their setting (the Pacific Ocean); and the nature of the remains (underwater cultural heritage sites/shipwrecks).

World War II sites

There are two World War II sites on the WHL—Auschwitz Concentration Camp, and the Hiroshima Peace Dome. Auschwitz was listed in 1979 using the grounds that it was ‘directly or tangibly associated with events or living traditions, with ideas, or with beliefs, with artistic and literary works of outstanding universal significance’. However ‘the Committee decided to enter Auschwitz … as a unique site and to restrict the inscription of other sites of a similar nature’ (WHC, 1979). The Hiroshima Peace Dome (Genbaku Dome) was listed in 1996 using the same criterion because it is ‘the only structure left standing in the area where the first atomic bomb exploded on 6 August 1945’ http://whc.unesco.org/sites/775.htm. China and the USA both expressed reservations about the listing of the Peace Dome, on the grounds of
singling out one episode and one country among many who suffered, and a lack of historical perspective (WHC, 1997b).

While it is not known exactly how many sites are related to warfare, in one way or another, there are a number on the list, including Hadrian's Wall, the Great Wall of China, the medieval city of Rhodes, and the Fortress of Soumenlinna. The listing of just two sites related to a war (World War II) that ‘was thus the most violent and prolonged self-inflicted injury on mankind of which history has record’ and in which ‘was waged by 56 nations and cost well over 50 million lives’ (Pitt, 1968: 2677) would not only appear to offer ‘a lack of historical perspective’ about this war, but also a lack of historical balance between World War II, World War I, and the many other wars, battles and conflicts that have taken place in the world.

**Underwater cultural heritage sites and shipwrecks**

While an area surrounding Robben Island in South Africa, encompassing about 20 shipwrecks, is on the WHL, the value of the shipwrecks was not one of the justifications for listing. Similarly with the Great Barrier Reef, off the eastern coast of Australia. In the World Heritage Newsletter No. 3 December 1997, in a short article on the Protection of the Underwater Cultural Heritage, the following statement was made: ‘It will be recalled that the underwater heritage is not covered by the World Heritage Convention’.

Other statements, however, would appear to support world heritage listing of underwater cultural heritage. For example Henry Cleere the former ICOMOS World Heritage Coordinator, stated (1993: 25) that shipwrecks ‘are not excluded by the terms of the convention itself; however, the Operational Guidelines for the Implementation of the World Heritage Convention, lay down (para. 26) that “Nominations of immovable property which are likely to become movable will not be considered”’. He cites the raising of the *Vasa* and *Mary Rose* as examples. However, Cleere (1993: 25–6) also says ‘if the limitation of the Operational Guidelines quoted above is disregarded (which is legitimate, since these rules are formulated by the World Heritage Committee for its own use and do not have the legal force of the Convention itself), there would seem to be no conceptual or juridical reasons why underwater heritage properties should not be inscribed on the WHL.’ And he concluded by stating that the ‘time would seem to be right for a similar study of the underwater heritage … as is happening with cultural landscapes, industrial heritage and twentieth century architecture, which also do not appear on the WHL’. No study of world heritage listing of underwater cultural heritage sites has yet been carried out.

The ICOMOS International Committee on the Underwater Cultural Heritage (ICUCH), formed in 1991, has been aware of this issue for some years, but it has been concentrating its efforts in assisting in formulating, and gaining the acceptance of, a UNESCO Convention on the Protection of the Underwater Cultural Heritage, and for which the final wording was adopted by UNESCO on 2 November 2001 (O'Keefe, 2002). This Convention places a priority on the in-situ management of shipwrecks and other 100 year old underwater cultural heritage, rather than other forms of management such as excavation, although not excluding it. The author has recently commenced investigating which underwater cultural sites are of ‘outstanding universal value’ in conjunction with ICUCH.

In a recent development, the Sri Lankan government are proposing to apply for an extension of the boundaries of the world heritage site of Galle (16th and 17th century Portuguese and Dutch forts) to include the 25 shipwrecks and other significant underwater archaeological sites located in Galle Harbor (pers. comm. M. Abeyratne, 2003).

**World Heritage Pacific Global Strategy**

At the November 1999 World Heritage Committee (WHC) meeting in Morocco it was acknowledged that ‘the Pacific continues to be most underrepresented sub-region on the WHL and there are still few Pacific Island signatories to the Convention’. It was seen that there was a need ‘to raise the awareness of Pacific Island Member States as to the relevance of the Convention to the conservation of the outstanding cultural landscapes (including spiritually-valued natural features and cultural places)’ (WHC, 1999a: 21). Only one site located in the western Pacific is on the WHL—East Rennell in the Solomon Islands, being the largest raised coral atoll in the world.

In 1992, UNESCO developed its ‘World Heritage Global Strategy’ to develop a ‘framework...
reference and methodology for the implementation of the World Heritage Convention’, one of the aims of which was to develop regional action plans. The regional action plan for the Pacific was a major outcome of a meeting in Morocco in 1999 which included increasing awareness and understanding, adherence to the WHC, preparation of tentative lists, and developing collaborative strategies (WHC, 1999a: 21–23). The Pacific Island Nations also concluded that ‘World Heritage sites in the Pacific Islands region are likely to be serial sites and multi-layered cultural landscapes, which attest to the history of voyaging, land and sea routes, and of trade, the first landings, activities, settlements and agriculture in the Pacific Islands region. As serial sites they form lines crossing the boundaries between countries and are therefore transborder and transnational sites’ (WHC, 1997a).

One of the concerns of the Pacific Island Nations in 1999 was in regard to the UNESCO Convention for the Protection of the Underwater Cultural Heritage. They were aware that underwater cultural heritage should be protected. However, they noted ‘at the moment, this seems to refer more often to underwater wrecks from World War II, despite the existence of other underwater sites such as sacred cultural sites existing in many areas of the Pacific’ (WHC, 1999b).

World heritage criteria applicable to the Truk Lagoon sites

The world heritage criteria considered most appropriate for the World War II underwater cultural heritage in Truk Lagoon is the same as that used for the Hiroshima Peace Dome and Auschwitz which is ‘directly or tangibly associated with events of outstanding universal significance.’ The sites provide a tangible symbol of World War II which can be used to highlight the impact of, and transformations of, the Chuukese and Pacific Islanders in general. Poyer et al. (2001) through a combination of research and interviewing over 300 Micronesians, found that ‘physical mementos of war hold little historical interest for most Micronesians … but they want to preserve this history and to correct the imbalance that makes Islanders nearly invisible in American and Japanese accounts of the Pacific war’.

The remains in Truk Lagoon also serve as a reminder of the role played by seaborne warfare, and represent over 3,000 shipwrecks and numerous aircraft destroyed during the war and known to be located throughout the Pacific. They are also associated with the development of the aircraft carrier: ‘The strike on Truk demonstrated a virtual revolution in naval warfare; the aircraft carrier emerged as the capital ship of the future, with unlimited potentialities’ (Morison, 1975: 329–32).

In addition, the Truk Lagoon World War II underwater cultural heritage sites could also be considered in accordance with another criterion: ‘an outstanding example of a type of landscape which illustrates significant stages in human history’. The Truk Lagoon sites have been referred to by leading marine biologist Sylvia Earle (Earle and Giddings, 1976: 602) as the ‘world’s largest collection of artificial reefs’, and her visit in 1976 ‘gave us new insights into many aspects of reef ecology’. It is considered that the site meets the World Heritage criteria in this regard as the underwater remains have evolved into a cultural landscape through ‘association with and in response to its natural environment’. Few underwater sites could lay claim to such an association with the natural environment, as well as a highly significant historic event.

Pacific Island Nation context for the Truk Lagoon sites

In terms of the World War II underwater cultural heritage sites in Truk Lagoon within the Pacific World Heritage Global Strategy, Pacific Islanders want to see them considered in context with the sacred cultural sites (underwater and on land) and customs of the region as a whole, and for any heritage listing and conservation to involve partnership with traditional owners.

To include this wider remit a new assessment would need to be made using the world heritage criteria. On face value, it could be argued that the sites do meet the criterion ‘directly or tangibly associated with events of outstanding universal significance’, though whether collectively they meet the cultural landscape criterion is more debatable. In addition, the inclusion of indigenous cultural sites with the underwater sites needs to consider authenticity, land ownership and site management.

Some surveys have been carried out and partly cover some of these aspects. For example, in regard to terrestrial sites Colt Denfield (1981: vii) found that ‘[Truk] has in situ as many guns as all of Europe’ and surveys by Craib (1997) and Jeffery (2003) provide a glimpse of the quantity
and quality of the general World War II terrestrial sites. Surveys of traditional terrestrial sites can be found in Edwards and Edwards (1978), King and Parker (1984) and others, and in which it was found that the Japanese occupation and use of the islands had a great impact on these. Many of the terrestrial sites have been modified, and therefore the issue of authenticity comes into question, although their disturbance and change is contemporary to the Japanese colonial period (1914–1945), which is part of the history of these sites. In regard to the complex and sensitive issue of site ownership, it needs to be stated that private ownership of land is an understandable sensitive issue given the wholesale alienation of the land by the Japanese, and is therefore a potential stumbling block to the ‘protection’ of sites. Chuukese are now very guarded about any outside interest in their land.

Either the FSM and/or the USA has had an interest in the following sites for world heritage listing: Nan Madol (Pohnpei); Lelu Ruins (Kosrae); and the Yap ‘Stone Money’. The nomination of Nan Madol (Ayers, 1983), a 1,500 year old canal city comprising over 4,900 ha of residential complexes, ritual structures and tombs, to the WHL was prepared by the USA in 1985 (Anon, 1985), but it is not known if this was presented to the World Heritage Bureau (Fig. 11), as it was compiled just prior to the independence of the FSM in 1986. Anecdotal information obtained since has suggested that the nomination was not progressed because not all landowners were in support. The USA has a policy of requiring 100% ownership consent for world heritage listing (Araoz, 2002).

If the Truk Lagoon sites were singled out by the FSM government for world heritage listing, and it was successful, a number of possible benefits could follow. It is known through listing sites such as the Galle Fort in Sri Lanka that recognition brings an increase in tourism and

Figure 11. One of the many stone buildings in Nan Madol, a 1,500 year old canal city in Pohnpei, FSM. (Bill Jeffery, 2001)
financial assistance for a number of issues, including conservation and research projects. However, in the Galle case, it has escalated housing prices, which means wealthy individuals buy out local owners and it has placed conditions on building renovations which create a number of problems for the local owners.

An increase in tourism and financial support in Truk Lagoon could similarly bring both advantages and disadvantages to the Chuukese. UNESCO are currently investigating establishing a regional (Asia-Pacific) training centre in underwater archaeology in Galle. Perhaps something similar, such as a centre to investigate and monitor the social, tourist and environmental impacts of the World War II sites throughout the Pacific could be established in Truk Lagoon, if it was world heritage listed and received the recognition and financial support required to do this. A possible disadvantage is that any limitations imposed on the Chuukese and their property through listing, and the associated management plan, could alienate their support in the management of the sites.

**Other pre-conditions for world heritage listing of the Truk Lagoon sites**

As a comparison to the collective of terrestrial and underwater sites, it was thought appropriate to consider the issues of authenticity, effective site management and ownership as they relate to just the underwater sites. Although some salvage is reported to have been carried out on the shipwrecks a few years after the war, they remain in much the same condition as when they were sunk in 1944, still containing much of the cargo they were attempting to discharge at the time of the bombing, and showing the great scars inflicted by the bombing and machine. In addition, while some Japanese human remains have been recovered from the shipwrecks on two occasions, some still remain to highlight the war-grave nature of the shipwrecks. It is therefore considered that they meet world heritage's ‘test of authenticity in design, material, workmanship or setting and in the case of cultural landscapes their distinctive character and components’.

The second issue is, are they adequately managed? While legislation is in place, and some resources have been committed toward managing the sites, the current management is ineffective. There are a number of reasons for this, which are further explained in Jeffery (2004). It is considered that a more cooperative management approach might prove valuable if it involved all the stakeholders (the Chuukese community and government, the Japanese and the Americans) contributing in all aspects of management.

The third major issue is site ownership. Japan relinquished claim on its war property through the San Francisco Peace Treaty in 1951, and while it is unclear at this stage if subsequent treaties and legislation have any affect, it would appear that ownership of the World War II underwater cultural heritage sites rests with either the USA or the FSM. In the case of the lagoon, certain village clans claim ownership of the reefs within the lagoon, and the outer reef (King and Parker, 1984: 78), but the lagoon itself appears not to be owned by any particular clan. ‘Establishing a historical park or reserve to manage and protect the sunken World War II wrecks of Truk Lagoon would not have any major effects on the traditional system of marine tenure which exists over lagoon waters. The sunken wrecks are already regarded as public domain. No clan or village has made claim of ownership or use rights to the wrecks’ (Anon, 1989: 75).

**Conclusions**

The aim of this paper was to highlight the issues involved in addressing the potential world heritage listing of the Truk Lagoon World War II underwater cultural heritage sites. In addition to operational issues, these include: should war sites be listed; are shipwrecks movable and therefore ineligible; and what do Pacific Islanders want listed.

Currently, Truk Lagoon would not meet the conditions for world heritage listing. It is the author's view that it does meet two of the criteria – the test of authenticity and possibly having no ownership impediments, but the sites are not adequately managed. World heritage listing does not bring with it a magic wand that solves management problems. It brings recognition that can have a number of benefits but it can also create problems. Effective management must come from within the country, utilising and being proactive with its domestic legislation and a management plan that has a collaborative approach with individuals, groups and government agencies, particularly within Chuuk, but also within the FSM, USA, Japan and other stakeholders.

The Pacific Islands and the FSM in particular is strong in oral histories and traditional
customs, and sites such as Nan Madol in Pohnpei are important links to the past. World War II sites are important in the region as they are associated with an event that transformed Pacific Islanders towards how they live today.

The desktop studies towards World Heritage Global Strategy Action Plans for the Pacific should consider all the necessary Pacific themes in developing the list of sites. In regard one of these themes, the ‘War in the Pacific’, the existing study of significant American sites (Anon, 1986) should be extended to include sites significant to the Pacific Islanders, to the Japanese, and the other nations that took part in the war, such as Australia and New Zealand. Only then would an appropriate list be available from which could be selected the sites of ‘outstanding universal value’.

Considering broader issues, Pacific Islanders do not want the United Nations, through the new Convention on the Protection of the Underwater Cultural Heritage or through the World Heritage Convention, only to have regard for sites that do not fully represent their cultural identity. They would like to see these conventions used to define and conserve ‘transnational serial sites and layered cultural landscapes’ relevant to their cultural heritage, which it is taken to mean could include World War II sites, but not be limited to them. Pacific Islanders must determine their own lists of sites. If they do not include World War II sites, then this should be respected and seen as a reflection of how they regard their cultural identity and how they want to be perceived. With the recent adoption of the wording for the UNESCO Convention on the Preservation of Intangible Heritage (17/10/2003) operating in partnership with the World Heritage Convention, an appropriate balance of tangible and intangible heritage protection in the Pacific Island Nations may perhaps be achieved.

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Appendix 1

Shipwrecks located in Truk Lagoon (For more detailed information see Bailey, 2000 and Lindemann, 1982)

<table>
<thead>
<tr>
<th>Site Name</th>
<th>Ship type during war</th>
<th>Tonnage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aikoku M aru</td>
<td>Armed transport</td>
<td>10,438</td>
</tr>
<tr>
<td>Amagisan M aru</td>
<td>Armed transport</td>
<td>7620</td>
</tr>
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<td>No. 28 class Submarine chaser</td>
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<td>CH A 46</td>
<td>No. 1 class Submarine chaser</td>
<td>130</td>
</tr>
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<td>No. 1 class Submarine chaser</td>
<td>130</td>
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Appendix 1 Continued

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References

Green, J., 2002, The application of side scan sonar and magnetometer to the location of archaeological sites, Bulletin of the Australasian Institute for Maritime Archaeology 26: 119–130.
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