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JAPANESE ECONOMIC EXPLOITATION OF CENTRAL PACIFIC SEABIRD POPULATIONS, 1898–1915

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At the turn of the century, Japanese feather and plumage hunters visited most of the isolated, uninhabited atolls of the central Pacific Ocean. The seabird populations of these atolls were decimated to supply exotic feathers for the millinery market to meet an increasing demand created by the European fashion industry. Drawing on scattered archival records, this article reviews the history and dimensions of the feather trade in the Central Pacific and describes the responses of the affected nations.

THE REDUCTION OF SEABIRD POPULATIONS is the subject of much discussion at present. The declines are caused by the destruction of breeding habitats on the one hand and the impact of longline fishing on the other (especially on albatrosses; see Brothers 1991; Alexander, Robertson, and Gales 1997). Resource exploitation and urban as well as recreational development have a corollary impact caused by careless and shortsighted resource management techniques. Yet, at the turn of the century the single most serious threat to the survival of these birds took the form of fashion. All through Europe, and later in the United States and Australia, women's hats were adorned with exotic feathers. To satisfy demand for such feathers, plumage hunters increased the range of their activities and several Central Pacific islands were almost stripped bare of their bird populations.

In a recent publication Pamela Swadling has reviewed the history of the plume trade in Southeast Asia (1996), especially as it affected New Guinea, and has demonstrated that it had considerable antiquity. The demand for feathers to adorn headgear in Southeast and Central Asia was soon sur-

passed by the demand of the European fashion industry. But it was not only the spectacular plumage of the bird of paradise that was sought after. The millinery industry also needed quantities of feathers for cheaper hats for the masses, as well as for applications as mundane as filling pillows and bedspreads. To satisfy these demands, less-glamorous bird species were subjected to predation—almost to the verge of local extinction. In this article I will review evidence of Japanese plumage collecting on Central Pacific atolls and islands, and will place it into the wider context of the early twentieth-century plumage trade.

Many small Central Pacific atolls had never been continually inhabited, for several good reasons: they were prone to storm damage, the rainfall and thus freshwater supply were too small to sustain continuous human life, and land area was too small to establish food gardens. Thus these islands provided ideal undisturbed breeding grounds for seabird populations. Laysan albatrosses *(Diomedea immutabilis),* tropic birds (*Phaethon* spp.), frigate birds (*Fregata major* and *F. minor*), boobies (*Sula* spp.), terns (mainly *Sterna fuscata* and *Gygis alba*), and the like frequented the islands, where they were largely free from predation with the exception of the occasional short-term incursion by the local islanders who hunted them for a few eggs, bird skins, and feathers for the local subsistence economy and to adorn items such as canoes (Eisenhart 1888; Krämer and Nevermann 1938). These incursions were commonly small scale, with small if not negligible impact on bird populations.[1]

By 1900 this changed dramatically: in the European fashion industry the demand for feathers and plumes had increased, and some of the far-flung and unpoliced atolls of the Pacific Islands were the perfect procurement grounds. The effect of these operations on the seabird populations was disastrous. Birds were killed in the millions and entire islands were turned into enormous slaughterhouses.

The Central Pacific comprises a number of major island groups, such as the Bonins, the Volcano Islands, the Marianas, the atolls of the Marshalls and Kiribati, as well as the atolls and high islands of the Hawaiian chain. In addition, there are some isolated islands, such as Marcus and Johnston. Further to the southwest are the Palau group and the Carolines, with the high islands of Chuuk (Truk), Pohnpei, Kosrae, and their outlying atolls. Of these groups, many of the northern islands are in a zone of limited rainfall and with their small and shallow groundwater lenses are not very suitable for sustaining permanent human settlement.

Even coconut palms, the prime crop at the turn of the century, would not thrive on these islands despite planting attempts, such as by the U.S.S. *Supply* on Eneen-Kio (Wake Island) in 1912 (Bryan 1959:4) and on Laysan

with nuts imported from Jaluit Atoll (Olson 1996:117; Ely and Clapp 1973). Thus, these atolls were of limited economic importance after their guano deposits (if any) had been mined (such as on Laysan)—and law enforcement actions by the colonial powers were few and far between. Unannounced activity on these islands was likely to succeed unnoticed, unless the perpetrators were surprised by the traditional users of the islands in pursuit of a similar activity. Such was the case with Bokak Atoll, which will be discussed below.

The Millinery Trade

At the turn of the century, great demand existed for feathers. The millinery industry of France set the fashion styles, which were followed by milliners throughout Europe. During the latter part of the nineteenth century European fashion, copied in the Americas and Australia, saw increasingly elaborate feather ornaments on women's hats (Swadling 1996:84–87). Although the bird of paradise was the prime species sought after, and the most expensive, the demand for exotic feathers and entire plumages was so great that many other species were also harvested. As the fashion descended the socioeconomic ladder, the market for such hats expanded manifold and the demand for less-expensive exotic feathers increased (Doughty 1975). The use of ostrich feathers is well documented, as is the use of feathers of "osprey," which over time became the generic term for a wide range of exotic feathers largely collected from seabird populations. Seabird exploitation had just been banned within the limits of the continental United States and the industry turned to other countries to provide the goods required (Wetmore 1925:96).

The German government established a set of regulations governing the hunting for birds in German New Guinea and regulating the trade in the Marianas through a concession company (see below). In the Pacific atoll trade, the main species predated were the Laysan albatross, black-footed albatross, frigate birds, tropic birds, sooty terns, masked boobies, and almost all minor tern species.

The beginning of Japanese birding expeditions is unclear. It is quite likely, however, that they were the result of the 1882 cruise of the Japanese-chartered, American-owned schooner *Ada* to French Frigate Shoals (Amerson 1971:40), Pearl and Hermes Reef (Amerson, Clapp, and Wirtz 1974), Laysan Island (Ely and Clapp 1973:22), and Lisianski Island (Clapp and Wirtz 1975). The charterers of this vessel caught sharks (for oil, flesh, and fins), a large quantity of turtles, bêche-de-mer, and bird down (Hornell 1934). The expedition may have alerted other Japanese to the profitability of the trade in the off-season from fishing. Other channels of information occurred

through several Japanese traders who operated stations in Micronesia, such as the trepang stations on Wotho and Ujae Atolls in the Marshalls (Jeschke 1906:274). In autumn 1885 Suzuki Tsusenori set out in a Japanese government-sponsored expedition, again in the *Ada,* to the Marshall Islands; and in spring 1887 he conducted another expedition, this time aboard the *Chushin Maru,* visiting the Northwestern Hawaiian Islands from Kure Atoll to French Frigate Shoals (Peattie 1988:11). On return he recommended that the Japanese government annex these islands. His account seems to have created substantial interest in Japan and certainly contributed to the knowledge of their natural and environmental resources (ibid.:13). Further, there were Japanese workers employed on contract in the guano works on Laysan in 1900 (Ely and Clapp 1973:35).

In 1891–1892 the *Ada* again sailed for the Northwestern Hawaiian Islands, where the crew collected turtles and the down of albatross chicks, at least on Laysan and Pearl and Hermes Reef but possibly on all islands visited (Harrison 1990:35).

In April 1909 the American vice-consul in Japan reported an article in a Japanese newspaper that stated that a number of Japanese vessels, seven of which were listed, had visited the Northwestern Hawaiian Islands in late 1908 and early 1909. The letter mentions that these vessels had left Japan on the pretense of deep-sea fishing, but that their real objective was gathering bird skins and feathers on the uninhabited islands.[2]

An article, originally published in the *Japan Times* and reprinted in the *Pacific Advertiser* of 20 April 1909, shows a common cover story employed in the birding trade: the *Sumiyone Maru,* which had sailed for shark fishing in Hawaiian waters in late November 1908, had been disabled by a storm and drifted to Laysan Island, where it arrived on 4 January 1909. About four weeks later eighteen shipwrecked sailors had been "rescued" from that island by the *Niigata Maru,* which had drifted under similar conditions. Both ships had been listed by the American vice-consul as feather-poaching vessels. On Bokak, to provide another example, the Japanese claimed they had "discovered" the island and assumed it to be in Japanese territory. When shown the German flagpole painted in the German imperial colors of black, white, and red and upon reviewing a map of the Marshall Islands, they agreed to being on German soil but then claimed that they had paid a license fee to the Jaluit Gesellschaft (Flower 1909). The need for pettiness and such elaborate cover stories shows that feather poaching was considered by the Japanese operators a doubtful enterprise if not illegal, even before the Northwestern Hawaiian Islands became a bird reservation in 1909.

The materials collected by Japanese crews in the Pacific were landed in Yokohama, classed, and transhipped to the main markets. The main markets for the feather trade were Hamburg, London, and Paris. The North American

(New York) as well as the Australian markets were influenced by Europe. Other substantial markets for the millinery trade were China, Nepal, and Turkey, which were independent of the European fashion industry and had in fact a greater history of feather use (Swadling 1996:59ff.).

Japanese Birding Operations in the Central Pacific

Given the demand for feathers, it is not surprising that various raids have been reported in the literature. Good summaries of the feather trade have been provided by Ely and Clapp (1973) for Laysan Island and by Clapp and Wirtz (1975) for Lisianski. The bird populations on Nihoa and Necker Islands as well as Gardner Pinnacles were spared (Clapp and Kridler 1977; Clapp, Kridler, and Fleet 1977; Clapp 1972), most likely because of arduous access. In the following I will look at the Japanese birding operations at French Frigate Shoals, Kure, Laysan, Lisianski, and Midway as well as Pearl and Hermes Reef in the Hawaiian chain; Marcus, Eneen-Kio, Bokak, and Johnston in the Central Pacific; Christmas Island in the southeastern Pacific; and Pratas Island near China (Figure 1).

Bokak Atoll

Bokak is the northernmost atoll of the Marshall Islands. At 14°32′ N and 169°00′ E, it is located in a zone of very low rainfall (about twelve hundred millimeters per year), which is too little to sustain gardening for food production or to establish a groundwater lens large enough to be capable of sustaining human life.

Eleven Japanese bird catchers were encountered by a group of Marshallese who traditionally came to Bokak to collect feathers. The German government administrator, Wilhelm Stuckhardt, arrested the perpetrators in May 1909. A report in the Japanese newspaper *Jiji* (3 July 1909), written after the arrests, claimed that a first group of seventeen bird catchers was dropped on Bokak in March 1908. This crew was exchanged on 23 August 1908, when eleven new crew members were dropped off, with three of the initial group remaining. About 200,000 processed bird plumes or sets of wings were taken back to Japan. According to the interrogation of the arrested Japanese, however, the second group began its operations on 29 August or 1 September 1908, when the men were dropped by the seventy-five-ton schooner *Hokio Maru.* Departing Yokohama on 9 June 1908 the ship apparently had sailed directly to Bokak Atoll. During the second group's stay on the atoll from August or September 1908 to the arrests in May 1909, three of the hunters died on the island of unspecified causes and were buried there (*Jiji,* 3 July 1909; Stuckhardt 1909b).

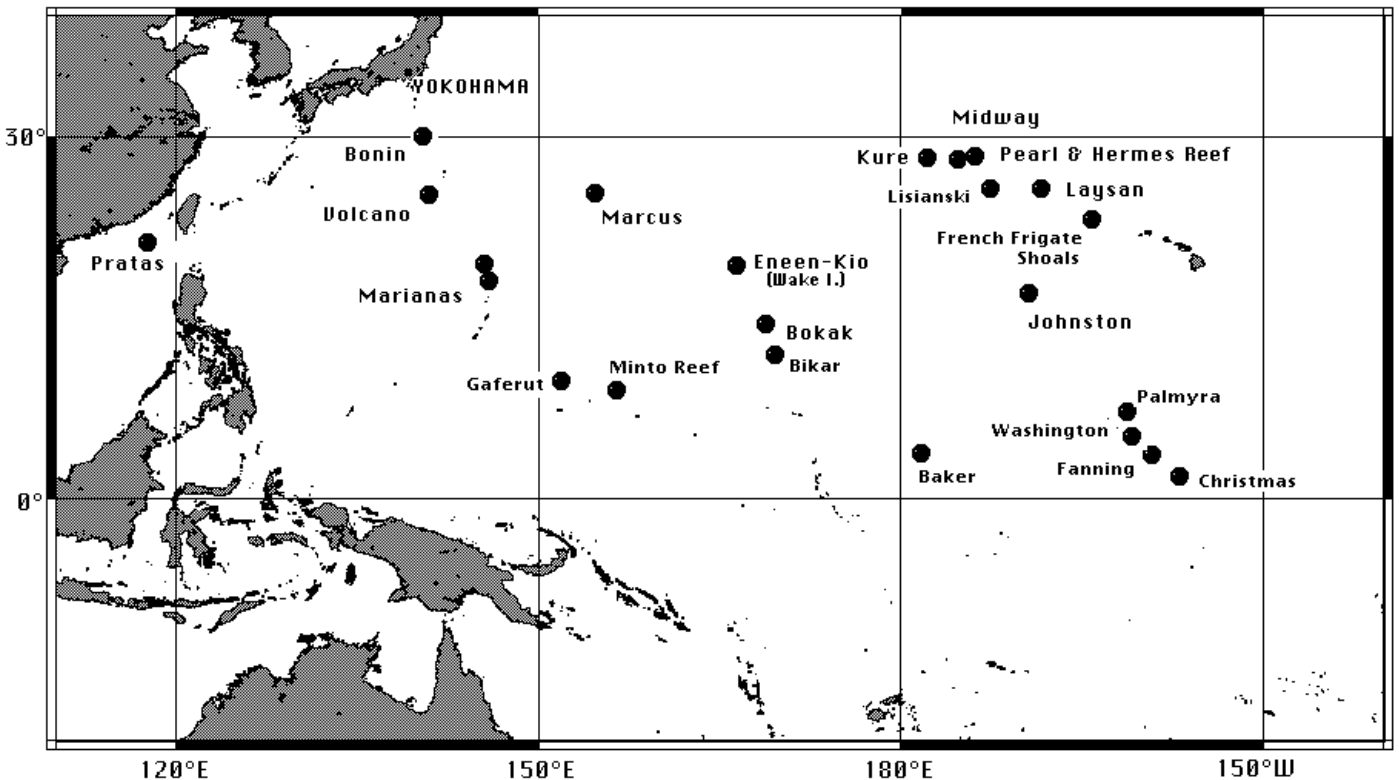

FIGURE 1. **The Central Pacific, showing locations discussed.**

It appears that the foreman, Soitiro Saito, was paid a monthly wage of ¥15 and a percentage of the profit, while the bird catchers were paid solely based on the number of bird plumes (at ¥0.15 per plume) and pairs of bird wings (at ¥0.02 per pair) they collected. Although the *Jiji* article claimed that the vessel had set sail for Minami-Torishima (that is, Marcus Island; see below), Saito said the Japanese trader had sent the crew knowingly to Bokak Atoll for an anticipated duration of six months (until February 1909). All the arrested Japanese believed—at least officially—that Bokak was actually Japanese-owned. The ship had landed all the necessary provisions, tools, and building materials to erect a plumage hunting and processing base on Bokak (Stuckhardt 1909a).

The small settlement Stuckhardt encountered on Bokak was composed of one living house built from wood and corrugated iron sheeting, a living and cooking house, a building for provisions, a work shed, and a storage shed for processed bird skins. The latter three buildings had been built from local materials in a style similar to Marshallese houses. In addition, there was an iron storage tank for rainwater. According to the Japanese crew members there were plans to replace the temporary buildings with more-substantial ones upon the arrival of new building materials on a Japanese supply ship, expected in July 1909. These plans indicate that the bird population was deemed worthy of at least another season of exploitation. It can be assumed that once Bokak Atoll had been depleted, the likewise uninhabited atoll of Bikar, some 250 kilometers to the south, would have been targeted.

To facilitate the movement of the bird hunters between the various islets of the atoll, and to be able to conduct offshore fishing both for salting and for their own consumption, the Japanese operated a small sampan with sails (Stuckhardt 1909b).

In total three crates of coral, eighteen crates and eight bales of plumes, and ten crates and sixteen bales of wings and feathers were confiscated by Stuckhardt (1909c). The majority of the birds killed were tropic birds and frigate birds. According to statements made by the arrested Japanese, they had prepared a total of 72,400 bird skins and an additional 84,760 pairs of bird wings, not all of which were removed by Stuckhardt (Begas 1909). In addition, 783 pounds of rice were confiscated by Stuckhardt, which contradicts the claim made in the *Jiji* that the Japanese were starving to death.

French Frigate Shoals

French Frigate Shoals, a group of low coral-sand cays located at 23°46′ N and 166°16′ W, is part of the Hawaiian chain. Like the other Northwestern Hawaiian Islands, French Frigate Shoals was visited in 1882 and in 1891 by

the *Ada* and it is likely that during that time birds were taken (Harrison 1990:35). The Tanager Expedition of 1923 encountered the remains of a Japanese tent camp, which Alexander Wetmore, ornithologist on the expedition, describes as stakes and other refuse as well as "a cache" including a "hammer, saw, nails, ship's compass and other similar articles . . . wrapped in a sail and thrust under a log" (Wetmore diary, 25 June 1923; Olson 1996:85). Based on the state of preservation of the canvas it was assumed that the camp had been abandoned sometime in late 1921.

Kure Atoll

At 28°25′ N and 178°29′ W, Kure is the northernmost atoll at the northwestern end of the Hawaiian chain. The atoll encompasses a lagoon of forty-six square kilometers but supports only two small sand cays. Plumage collecting is reported for Kure in the late 1890s (Woodward 1972:8). The atoll was likely visited in the years between 1900 and 1909 as well, as law enforcement visits to the area were very limited.

Laysan Island

Laysan Island in the northwestern Hawaiian chain, located at 24°7′ N and 171°53′ W, some eleven hundred kilometers northwest of Honolulu, is an atoll with a slightly elevated landmass. The island is an important rookery for monk seals as well as seabirds. The first contingent of Japanese plumage collectors was not encountered until 1899, by the U.S. government survey vessel *Nero* (Pomeroy 1951:30; Hill 1901), even though the collecting of feathers and albatross chick down is documented for the *Ada* as early as 1891 (Harrison 1990:35).

In the already mentioned April 1909 letter by the American vice-consul in Japan, the consul reported that seven Japanese vessels had visited Laysan between October 1908 and January 1909. The vice-consul also reported that another vessel, the *Niigata Maru,* was planning to sail again for Hawai'i.

In January 1910 the U.S. Coast Guard revenue cutter *Thetis,* under the command of Captain W. V. E. Jacobs, surprised and apprehended fifteen Japanese on Laysan and eight on nearby Lisianski engaged in killing birds.[3] It appears that one lot of plumes had been shipped just before the *Thetis* arrived (Jacobs 1910; Wetmore 1925:86). An earlier crew had been operating between April and August 1909, when nine crew members had been repatriated and replaced by nine fresh bird catchers, who were among those arrested by Jacobs. A vessel with yet another relief crew arrived in late July 1910 (Anonymous 1910h).

According to a Japanese newspaper report, between April 1909 and 18 January 1910 more than 140,000 birds had been caught (*Hochi,* 22 February 1910, quoted in NLA 1910). The catchers were in the employ of the Yamaguchi Marine Bureau and had departed Shinagawa on 2/3 April 1909, arriving on Laysan on 17 April, where fourteen bird hunters were dropped off. The ship then proceeded to Lisianski, where another nine men were left. The Japanese newspapers claimed a German named Max Schlemmer was involved, having "sold" the Japanese the lease for the islands (Anonymous 1910c; *Japan Herald,* 7 March 1910; *Hochi,* 22 February 1910). In total, thirteen buildings were erected on Laysan. The catching methods caused a substantial stir in the wider community, as the Japanese were reported to have cut off the wings while some of the birds were still alive and then left them to their fate (Anonymous 1910c). Other birds were caught with a long pole, stunned or killed, and then processed.

The quantity of bird feathers collected is staggering. Between mid-April and August 1909 a party of fifteen Japanese had collected and shipped (on the *Tempou Maru* on or about 10 August 1909) from Laysan approximately thirty bales (about one ton) of feathers and seventy bales of wings (Jacobs 1910). At about 1,830 wings to the bale these seventy bales would amount to 128,100 wings, or more than 64,000 birds (Ely and Clapp 1973:39). In January 1910 the poachers—probably the team that had arrived on 10 August—were arrested by Jacobs in the *Thetis.* Jacobs was able to confiscate sixty-five bales of wings, twenty-eight large and three small bags of feathers, thirteen bales of feathers, and two boxes of stuffed birds. This amounted to about one ton of feathers and almost 120,000 wings. Another 800 pounds of feathers and 63,500 wings were found weighed down under two hundred (!) mats but, because they were insufficiently cured for transport, had to be destroyed by Jacobs. Thus, in one year on one island alone, some two and a quarter tons of feathers and more than 310,000 wings had been collected. It can be estimated that some 150,000 birds had been killed on Laysan (Jacobs 1910).

In addition to feathers and wings, the eggs of the albatross were exploited on a large scale. An example of this is reported for Laysan in 1903 (Harrison 1990:37).

Laysan was again raided by poachers in late 1914 and January 1915. A shore party from the *Thetis* found between 150,000 and 200,000 bird carcasses. The species targeted had been the Laysan and black-footed albatrosses, as well as frigate birds and masked boobies. Most had their breast feathers and wings missing (Munter 1915:138–140). When the Tanager Expedition visited Laysan in 1923, Wetmore mentions in his diary the large quantity of bird-bone deposits found in both the beach sand and the intertidal zone (Wetmore diary, 2 and 12 May 1923, in Olson 1996:49, 56).

Lisianski Island

Lisianski belongs to the Northwestern Hawaiian Islands and is located at 26° N and 173°57′ W, some two thousand kilometers northwest of Honolulu. The first record of poachers dates from 1903, when the crew of the USS *Iroquois* found Japanese feather poachers on Midway and Lisianski (Rodman 1903). On 8 January 1904 thirty-eight Japanese were landed on Lisianski from the *Yeiju Maru* (which was eventually wrecked there). Another thirty-nine Japanese were put ashore in February by the *Tiyo Maru.* Both crews were seen by the *Iroquois* on 11 April 1904 (*Pacific Commercial Advertiser* [Honolulu], 16 April 1904) and arrested by the *Thetis* in June 1904, acting on information received from the *Iroquois* (Hamlet 1904). The *Thetis* encountered feathers and cured wings of sooty terns equivalent to approximately 284,000 killed birds.

In concert with the arrest of poachers on nearby Laysan in January 1910, the revenue cutter *Thetis,* under the command of Captain W. V. E. Jacobs, surprised and apprehended eight Japanese on Lisianski. The men were engaged in killing birds and the Japanese settlement there comprised four buildings. According to Captain Jacobs's account, two crews each (one after another) had been operating on Laysan and Lisianski between April 1909 and January 1910, when the later of the two were arrested by Jacobs (1910). As on Laysan, it appears that one lot of plumes had been shipped off on a relief vessel just before the *Thetis* arrived (Jacobs 1910; Wetmore 1925:86).

On Lisianski, Jacobs confiscated nineteen bales of bird feathers, one box of stuffed birds, and one box and sixty-five bags of bird wings. The total number of birds killed was estimated to be 140,000. The earlier relief vessel, which had arrived in August 1909, was estimated to have taken away approximately 108,000 wings (Anonymous 1910g). Yet another vessel arrived in late July 1910 (*Honolulu Evening Bulletin,* 6 August 1910).

Like Laysan, Lisianski was visited by Japanese poachers yet again in late 1914 and early 1915. One and a quarter tons of feathers and some 230,000 wings—equivalent to another 115,000 birds—had been collected on Lisianski. Some had been shipped on the schooner *Tempou Maru* and some was confiscated by the *Thetis* (Munter 1915).

The 1923 Tanager Expedition encountered a Japanese camp on Lisianski, which comprised remains of a roof (about nine meters by three and one-half meters) and other structures, an array of oil tins possibly used for water storage, and the remains of three boats. Based on the decay observed, the camp had been abandoned at least seven to eight years before the expedition arrived (Wetmore diary, 19 May 1923, in Olson 1996:63).

Midway Atoll

Midway belongs to the northwestern Hawaiian chain and is located at 28°12′ N and 177°22′ W, more than two thousand kilometers northwest of Honolulu. The nearly circular reef platform was studded at one time with small sand cays, which totaled five and a half square kilometers, but now comprises only three islets. In 1891 George Munro, surveying Midway Atoll, found no albatrosses, boobies, wedge-tailed shearwaters, or tropic birds on Sand Island (Munro 1960), a lack that Harrison (1990:35) attributed to exploitation by castaway sailors stranded there during the nineteenth century. In view of the documented rates of recovery of bird populations during the twentieth century (see ibid.:56ff.), this depletion was more likely the result of plumage collection activities, as nearby Kure Atoll had also been targeted about that time (Woodward 1972:8).

A naval vessel encountered six Japanese residing on Midway in 1901, engaged in feather collection (Hill 1901). In 1902 a visitor to Midway found both Sand and Eastern Islands thickly strewn with thousands of bodies of wingless and tailless seabirds (Harrison 1990:36). The next mention of bird collectors on Midway occurs for 1903, when the crew of the USS *Iroquois* found Japanese feather poachers working on Midway and Lisianski (Rodman 1903). Finally, one of the Japanese bird hunters arrested in 1911 on Christmas Island (see below) mentioned that over a million birds had been caught by another crew on Midway Atoll in 1910 (Bailey 1977:40–41).

Pearl and Hermes Reef

Pearl and Hermes is a large atoll, located at 27°47′ N and 175°51′ W, some two thousand kilometers northwest of Honolulu. The classical atoll encompasses a large lagoon with a circumference of seventy kilometers. While no Japanese feather collectors were ever encountered on the atoll, patrol vessels are reported as having found evidence of Japanese bird-catching activities (Harrison 1990:36). The Japanese-chartered schooner *Ada* collected twenty kilograms of albatross chick down on Pearl and Hermes Reef in 1891, which according to Harrison probably accounted for all chicks on the atoll (ibid.:35).

The 1923 Tanager Expedition investigated the atoll and Wetmore noted in his diary that they encountered the remains of a Japanese tent camp replete with refuse. Under a nearby pile of coral rocks the skeleton of a Japanese male aged about twenty to twenty-five years old was excavated. Based on the observed decay the body had been buried some three to eight years earlier. Wetmore assumed that the burial and the camp were the remains of a

wrecked sampan (Wetmore diary, 28 April 1923, in Olson 1996:46). The site can also be interpreted as the remains of a Japanese birding camp, which, if the estimate of three to eight years abandonment is anything to go by, would imply use possibly in 1914 or 1915, a period for which activity on Lisianski and Laysan is documented.

Marcus Island

Marcus, at 23°10′ N and 154° E, lies approximately 870 nautical miles northwest of Eneen-Kio. Japanese fishermen had been using the island since the mid-1890s on a regular basis (Bryan 1903). Taking advantage of the weakness of the Spanish government after the Spanish-American War of 1898, Japan annexed Marcus Island outright in May 1899 and retains it to the present day (Anonymous 1899; Pomeroy 1951:30). It would appear that almost immediately after annexation plumage collectors began to decimate the bird population. Japanese plumage collectors were seen on Marcus by an American vessel in 1902, continuing the hunt even though the number of birds caught had become extremely small (Bryan 1903). Bryan mentions that the main species targeted during that year was sooty tern.

In 1902 thirty Japanese engaged in the bird processing on Marcus, with a clear division of labor. There were collectors and there were taxidermists. From March to September 1902 some 50,000 sooty terns were killed. White terns were also collected, but less frequently as they required more care in killing and preparation if the skins were not to be ruined. White tern skins were reported to be more valuable, however, making the extra effort worthwhile.

In 1902 only one albatross *(Diomedea immutabilis)* was seen by Bryan. Reportedly the entire colony had been wiped out in the six years prior to 1902. In processing, the wing feathers were pulled out separately and the breast feathers plucked out. The bird carcasses had then been boiled down and, barreled, shipped to Japan as fertilizer. By 1901 boiling down the carcasses was no longer profitable and the birds were killed for their feathers alone. During peak exploitation, one catcher could kill 300 birds in a day. Heaps of bleached bones were found all over the island (Bryan 1903).

Eneen-Kio Atoll (Wake Island)

Eneen-Kio, located at 19°17′ N and 166°37′ E, is the northernmost atoll of the Marshall Islands chain; it is currently occupied by the U.S. government. Because of its remote location the atoll—annexed by the United States in 1899 (Anonymous 1898; Taussig 1935)—was only infrequently visited by U.S.

naval vessels (see Spennemann 1990b for a compilation of ship visits). At the time of annexation no sign of human habitation was found, which would provide a *terminus post quem* for the onset of Japanese birding on the atoll.

The first Japanese there were observed in June 1902, when the U.S. Army transport *Buford* stood off the atoll and was met by a launch putting off the island. The launch contained eight Japanese, who claimed that they had been left on Eneen-Kio some two months earlier by a Japanese fishing schooner out of Yokohama and that they were fishing on the island. The *Buford*'s master, A. Croskey, suspected that the Japanese were pearling rather than fishing but did not take any action (Croskey 1902). Japanese were next seen by Rear Admiral Evans, who visited the island on 6 February 1904 with the USS *Adams.* Apart from collecting feathers the Japanese were noted to be catching sharks for their fins (Leff 1940:23; Dewey 1906). Shacks and graves of Japanese fishermen, but apparently no poachers, were noted by General J. J. Pershing, commanding the U.S. Army transport *Thomas* in January 1906 (Green 1938; Heinl 1947:66).

By the time of the next U.S. visit to the island, by the USS *Supply* in 1912, no evidence of Japanese feather collectors was found (Bryan 1959:4). However, though not discovered until 1923, an inscription in the bunkhouse of a Japanese plumage-hunter base on Peale Islet (part of Eneen-Kio Atoll) was dated 13 November 1908, stating that the island had been left by the crew on that date (ibid.). Between 1913 and 1922 apparently no U.S. vessel stopped at Eneen-Kio; again, bird hunting could have gone on undetected.

The Tanager Expedition of 1923 encountered evidence of semitemporary or longer-term settlements on Eneen-Kio, apparently of Japanese origin (Bryan 1942, 1959:4; Heine and Anderson 1971). Three camps were encountered, one on the eastern end of Wilkes Islet, one on the northwestern end of Wake Islet, and one on the eastern end of Peale Islet. From the remains the camps appear to have been established by Japanese poachers collecting seabird feathers. To date it cannot be established whether the camps were contemporaneous or were built on separate occasions. The Bernice P. Bishop Museum holds a number of photographs of the Japanese camps, some of which have been reproduced in the recent publication of Wetmore's diary (Olson 1996).

The Peale settlement had first been seen by the crew of the submarine tender USS *Beaver* in 1922 (Picking 1922a, 1922b). The *Beaver*'s commander, Lieutenant Commander S. Picking, mentions in his report that

> several huts were seen across the lagoon and these proved to be deserted huts which evidently had been used by Japanese who had visited the island for birds, fish or pearls. We found a number of

> sake jars, all of which were empty, and a large still which had been unfortunately used only for distilling water. The Japanese poachers camp at the east end of the northwest island [Peale] was roofed with corrugated iron, gutted and fitted with cistern boxes and earthen vessels. (1922b)

The Tanager Expedition of 1923 found a single wooden shack, a grave, and a shrine on Wilkes Islet. The camp on Peale was far more extensive. It is described in the diaries of Alexander Wetmore (30 July 1923, in Olson 1996: 106–107) and of Edwin Bryan. Bryan assumed the camp to be fourteen or fifteen years old and described it as follows:

> "The camp consists of the remains of two large frame buildings with galvanised iron roofs, about 18 feet wide, one 20 feet long, one 30 feet long; two smaller buildings; one tank, and one storehouse, raised on posts which are guarded with tin. Scattered were a number of barrels, boxes, two large clay water jars, tin cans and metal kettles. Saw part of a Sydney newspaper, a pile of oakum, bamboo frame with lath trays. There was also a boat, a little larger than a skiff. Made a copy of a Japanese inscription inside the bunk house." Later this was translated to read something about leaving the island with the date, November 13, 1908. (Diary entry with annotations, published in Bryan 1959:4)

Although most of the equipment seen on Peale by crew of the *Beaver* and members of the Tanager Expedition was of Japanese origin, there was some evidence of non-Japanese visitors among the poachers. In addition, the Tanager Expedition found a forty-five-foot boat that had been cut into three parts cached under some scrub (ibid.). Wetmore describes a third camp, this one located on Wake Islet, as follows:

> Later I visited the site of an old Japanese camp on the lagoon side of Wake Island near the channel separating that islet from Peale Island. A clinker-built boat 35 or 40 feet long that had been sawed straight through into three nearly equal parts lay partly buried rotting in the sand. English letters were indicated across the stern but the paint had scaled so as to make them illegible. Near at hand was a stone fireplace and a few upright sticks that had supported some form of shelter. Scattered about was the usual camp refuse—some broken bottles, chipped and broken bits of dishes of Japanese design and bits of metal. The camp apparently was eight or ten years old if

> not more. It might appear that men had desired for some reason to conceal their boat and had to cut it to make it possible to draw it out of the water. It was hauled back among heavy bushes nearly 100 yards from the shore. (Wetmore diary, 5 August 1923, in Olson 1996:114)

Near the Wilkes camp was a small Shinto shrine (Heine and Anderson 1971), composed of pieces of rough lumber set in coral mounds and a fifteen-meter-long coral-lined path leading to a central column:

> At the center on the west is a square column of rock four feet square by five high. West of it are four smaller columns of rock about two feet high. East of it are twelve more small columns perhaps more. Some of the columns have a square wooden post at the center, four inches square by 4 or 5 feet long with three notches cut around at the top. Others had three thin boards with angular pointed ends stuck in them. The three largest boards are in the largest shrine, one of them having a series of Japanese ideographs on it. A few bottles and bits of porcelain dish and *Tridacna* shells placed at the bases of the shrines may have contained offerings. (Wetmore diary, 31 July 1923, in Olson 1996:108–109)

By 1935 little remained of the Japanese camps. Remains of a boat and some pottery, some building remains, as well as fragments of the still and the stone alignment of the Shinto shrine were seen by a Pan American Airways work party that arrived that year to build a flying-boat station (Wood 1935; Grooch 1936:95).

Johnston, Christmas, Pratas, and Other Islands

Johnston Atoll, at 16°45′ N and 169°39′ W, lies between the Marshall Islands and Hawai'i. It was visited by the Tanager Expedition in 1923, which encountered evidence of past plumage collection, namely the "remains of several thousand Sooty Terns, Wedge-tailed and Christmas Island Shearwaters . . . complete except for the hand" (Wetmore diary, 13 July 1923, in Olson 1996: 96). In addition the remains of a European-style hut and an abandoned fishing camp were also found.

Christmas Island, located at 1°59′ N and 157°32′ W, belongs to the Line Islands, today part of Kiribati. On 25 February 1911 the HMS *Algerine,* Captain A. K. Jones commanding, was making a routine call to the island to "show the flag" and reaffirm British ownership when it encountered a group

of thirteen Japanese men collecting plumage. They had been landed a month previously by the schooner *Toba Maru* and had already caught 11,000 birds. The *Algerine*'s captain arrested the men and took them to Fanning Island. Seven were returned to Tokyo while six found employment with Father Rougier, at that time owner of Fanning and Washington Islands (Bailey 1977: 40–41). It would appear that no further action was taken.

Japanese poaching also affected islands other than those of the Central Pacific, including Pratas Island in the South China Sea. Concurrent with the expansion of the plumage collectors into the Central Pacific came a move into Southeast Asia. The German consul in Hong Kong, in an aside in a memorandum to the German Foreign Office, stated that Japanese plumage collectors had established a base on Chinese-owned Pratas Island (Tung Sha Do, 20°43′ N, 116°42′ E) in 1908 and had been surprised there by the Chinese. The so-called Pratas Affair attracted substantial regional and international media attention and severely strained Sino-Japanese relations (see *The Times,* 25 June 1909, 5; 3 August 1909, 5; 12 October 1909, 3).

Micronesia, especially the central Caroline Islands, has an abundance of small atolls, many uninhabited. One such is Minto Reef (8°9′ N, 154°18′ E), where a large nesting seabird population was found to be substantially reduced in 1906. At the time the decimation was attributed solely to the Good Friday typhoon of 1905 (Berg 1906). The likewise uninhabited Gaferut (Grimes, 9°15′ N, 159°40′ E) was reported to have had a very large seabird population (Senfft 1905). It is quite likely that additional Japanese activities went unnoticed.

It has also been documented that plumage collectors exploited the bird populations on islands close to Japan, such as the Ryukyus, Pescadores, Daitu, northern Bonins, and the southern Izus. Reputedly five million birds were caught on these atolls and islands in the 1890s (Yomaro Yamashima, biologist quoted in Harrison 1990:109).

Setup of Japanese Birding Operations

From accounts of the birding operations on individual atolls we can develop a picture of the ideal setup aimed at by the Japanese trading houses. Common to all poaching localities is that they had been traditionally uninhabited because of a relative lack of accessibility, water, and resources required to sustain a human population on a prolonged basis. Japanese plumage hunting and processing stations had to import all necessities, so such expeditions could not be mounted ad hoc if they were to succeed.

Although certain islands were visited on separate occasions in consecutive years, others seem to have been visited by several vessels at intervals of about

once every two to four months during the breeding season. The vessels would land new work crews of between ten and forty men, relieve the tired crew, and retrieve the procured feathers and skins.

Bases

The bases consisted of at least a tent camp, such as on the small islets of French Frigate Shoals and Pearl and Hermes Reef. Larger islands, with greater bird populations suitable for exploitation, saw bases with an array of houses, commonly of wood or iron frame with wooden walls (as was the case on Bokak, Laysan, Lisianski, Eneen-Kio, and Johnston) and occasionally supplemented by thatched dwellings (as on Bokak). On Eneen-Kio the living quarters even had glass windowpanes.

On Bokak, for example, the settlement consisted of a living house, a cook house used also as sleeping quarters, a food storage building, a work shed and a storage shed, plus a few thatched dwellings. The larger buildings could be quite substantial, measuring thirty feet by twelve (Lisianski) or even thirty feet by eighteen (Eneen-Kio). The food storage house on Eneen-Kio had been erected on six-foot posts and guarded with tin against rats and land crabs.

Water supply was a major problem. On most bases there was evidence of large water tanks (Bokak, Eneen-Kio) and of water containers in the form of pottery sake jars (Eneen-Kio) or tins (Lisianski, Eneen-Kio). On Eneen-Kio the Japanese had left behind a still. It is possible that stills formed standard equipment on most bases and went unnoticed by the few law enforcement visitors.

Localized fishing and interisland transport were made possible by the presence of small whaleboats and sampans, occasionally with sails, such as were encountered on Eneen-Kio, Lisianski (3), and Bokak.

On Eneen-Kio, where three settlements are known to have existed, a Shinto shrine was observed by members of the Tanager Expedition. It is possible that similar places of worship existed on other atolls but were overlooked by observers because of their unassuming nature.

The fact that the camps in several instances had been abandoned, rather than dismantled and removed, and the fact that boats as well as tools and equipment had been cached (for example, on French Frigate Shoals and Pearl and Hermes Reef) could indicate that the settlements had been abandoned only temporarily, presumably with the aim of returning once the bird populations had recovered.

On Eneen-Kio and Bokak Atoll, the Japanese had stored their supplies and procured feathers in two locations, presumably to be better prepared for eventualities such as storm damage or law enforcement missions.

Procurement Methods

The feather collectors had easy prey with the nesting seabirds, since these birds knew no fear of people according to a number of accounts (Bryan 1903; Drummond-Hay 1939; Irmer 1895; Senfft 1905; Begas 1909). The birds could be grabbed easily and their necks broken, or struck with a stick (documented for Laysan and Marcus). The breast feathers, top choice for the trade, were pulled out and the wings cut off. The carcass of the body, it is said, was dropped where the bird had been caught. In addition, birds were caught and their wings cut off while still alive. Thus mutilated, the birds were left to run and die from blood loss or starvation as they could no longer feed themselves. Those birds that survived the wing (hand) amputation—and those whose wings were merely broken—and were left to starve lost most of their body fat and thus were easier to pluck when killed than well-fed birds. In the end, it was that kind of cruelty to animals that caught the attention of the public and began to bring about change—at least in the Hawaiian Islands.

The trader Frank mentions that one method employed was to drive "the birds, which are very tame and fat, into caves and starv[e] them until they are emaciated, when the feathers are easily removed" (Coffee 1924:98). This would indicate that birding not only occurred on atolls, but also on raised coral limestone islands where such caves are common.

On Marcus the bird catchers would work mainly in the morning or during the evening hours, as this permitted the catching of the adult birds that were out fishing during the day. The equipment used consisted of a bamboo pole and a large basket. Bryan mentions for Marcus that a catcher could fill such a basket in about two hours, each basket containing about seventy-five individuals. On average a taxidermist would prepare fifty skins per day, though the "world record" stood at 130 skins for a single day, according to Bryan (1903).

Alexander Wetmore of the Tanager Expedition describes in his diary the setup of a work house on Eneen-Kio, based on the remains he encountered:

> Another shed, somewhat larger, was a workshop. In this were three or four low tables made of boxes, two by five feet on top, with a tray at either end 6 x 12 inches, one for plaster paris, the other perhaps for arsenic or some other preservative. A short string with a long hook tied at one end was fastened to a nail at the back and probably served to hold the bird's body during skinning. An apron at the front covered the lap of the labourer. There were large numbers of trays 18 inches by four feet to dry birds and a rack of

> bamboo at one side to support them. Barrels and boxes of plaster paris were found and a bale of oakum. In one box were several hundred small sticks with brown oakum wood wound about them, suitable for necks of birds. (Wetmore diary, 30 July 1923, in Olson 1996:106–107)

Choice downs of albatross chicks, it seems, were collected by dipping the dead chicks in boiling water and pulling out the feathers (Amerson, Clapp, and Wirtz 1974:27). The gathered adult feathers and wings were placed on the ground and covered with weighted-down mats to prevent them from being blown away during curing. In 1910 Jacobs encountered 200 such mats in operation on Laysan (Anonymous 1910c). Finally the feathers would be bagged in bales and readied for shipment. Birds wings would be cut off, deboned, and spread out on the sand with a small amount of salt sprinkled on them. If the weather was favorable the wings would be cured in between four and five days. During packing in bags or bales each layer of wings would be sprinkled with naphthalene (or oakum) to stave off infestation with beetles. In case of inclement weather the feathers would be covered with mats weighed down by "stones" (presumably chunks of coral; see Anonymous 1910h regarding Lisianski). The wings were usually cured and shipped whole, to be processed in Japan or another port. A small number of birds would be cured with arsenic, stuffed and shipped whole, possibly for trade to museums and collections as well as displays for feather merchants. The use of whole birds was rare, however, and was commonly limited to birds of paradise (Swadling 1996; Doughty 1975).

The trade was sufficiently lucrative, with an average collecting trip grossing close to US$100,000. According to statements by Japanese arrested on Bokak, the minimum price fetched at Yokohama for a pair of wings from frigate or tropic birds was 0.50 imperial German marks and for a full bird skin between 0.75 and 1.5 imperial German marks (Begas 1909). Prices quoted for the Laysan specimens were US$0.33 per wing and US$6.00 per pound of feathers (Ely and Clapp 1973:41). However, as the German government found out when it wished to sell the confiscated wings and feathers, the Japanese had been more interested in quantity than quality and many of the collected feathers had been so imperfectly cured that their retail value was very low (NLA 1909). A similar observation had been made by William Bryan on Marcus Island (1903:98).

In addition to the "normal" birding and the catching of fish and presumably turtles for consumption by the crew, other resources were also exploited by the crews if they offered themselves. By-catches included coral and sponges on Bokak (Stuckhardt 1909b), albatross eggs on Laysan (Harrison

TABLE 1. **Duration of a Tour of Duty on a Feather-Collecting Expedition**

Island	Dates	Duration	Source
Bokak	Sep 1908–Feb 1909	5 months	Spennemann 1998a
Bokak	Feb 1909–Jul 1909	5 months	Spennemann 1998a
Laysan/Lisianski	Apr 1909–Aug 1909	5 months	Jacobs 1910
Laysan/Lisianski	Aug 1909–Dec 1909	5 months	Jacobs 1910
Laysan/Lisianski	Dec 1909–Jul 1910	7 months	Anonymous 1910g

1990:37), albatross and booby carcasses boiled down for fertilizer on Marcus (Bryan 1903), and shark fins on Eneen-Kio (Leff 1940:23).

The Crews

The average tour of duty for a feather collector seems to have been six months, with about a five-month stay on a given island and approximately two weeks travel time each way. Table 1 compiles the few known "tours of duty" for feather-collecting crews.

The Japanese crews working on the islands were of different sizes, ranging from six in the case of Midway in 1901 to thirty-nine on Lisianski in 1904 (Table 2). If we look at the overall data, however, a pattern emerges (Figure 2). It would appear that the initial trips were made by small crews, that from late 1902 to 1904 quite large crews were employed, and that from 1908 onwards crews of nine to a dozen and a half people were deemed sufficient.

TABLE 2. **Size of Japanese Feather-Collecting Crews**

Island	Commencement	Crew	Source
Midway	1901	6	Hill 1901
Eneen-Kio	Jun 1902	≥ 8	Croskey 1902
Marcus	Late 1902	30	Bryan 1903
Lisianski	Jan 1904	38	*Pacific Comm. Advert.*, 11 Apr 1904
Lisianski	Feb 1904	39	*Pacific Comm. Advert.*, 11 Apr 1904
Bokak	Mar 1908	17	Spennemann 1998a
Bokak	Aug 1908	14	Spennemann 1998a
Lisianski	Apr 1909	9	Jacobs 1910
Laysan	Apr 1909	14	Jacobs 1910
Lisianski	Aug 1909	9	Jacobs 1910
Laysan	Aug 1909	15	Jacobs 1910
Christmas	Jan 1911	13	Bailey 1977

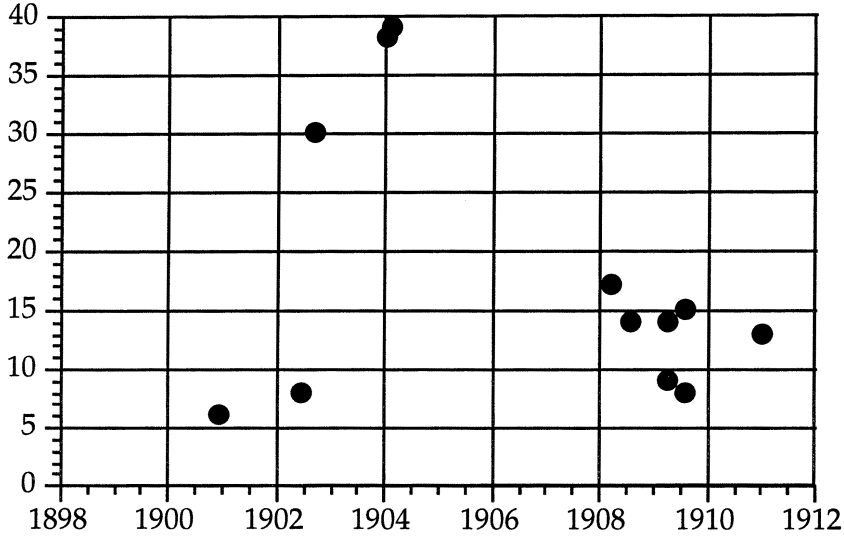

FIGURE 2. **Size of Japanese bird-catching crews over time.** (Sources: see Table 2)

We know from the examples of Bokak and Laysan that not all crew members were replaced. On Bokak Atoll the relief ship arriving in August 1908 placed only fourteen new crew on the island, with three of the previous crew continuing. On Laysan six of the April 1909 crew continued for another term.

Who made up the crews? Clearly the bulk of the crews were Japanese. The German administrator Stuckhardt mentions that one of the eleven Japanese arrested on Bokak was very old and one was "almost insane" (1909b), which would suggest that the bird-hunter crew was a mixed batch of opportunistic Japanese civilians rather than a highly trained group of insurgents. There is some evidence, at least from Eneen-Kio, that non-Japanese were also involved in the trade. The Tanager Expedition found remains of a Sydney newspaper, a European chair, two briarwood pipes, as well as traces of Latin letters on the stern of a whaleboat (Bryan 1959:4).

Considering the level of preparation required to run a birding operation on a small island, it is not surprising that some deaths appear to have occurred. We know, for example, that at least three people died and were cremated on Bokak in 1908/1909 (Stuckhardt 1909b), that some died on Asongsong in the Marianas (Spennemann 1999), that graves were seen on Eneen-Kio in 1906 (Dewey 1906) and that a Japanese grave had been found on Pearl and Hermes Reef (Wetmore diary, 28 April 1923, in Olson 1996:46).

TABLE 3. **Some of the Japanese Vessels Known to Have Been Involved in the Pacific Feather Trade**

Ship	Island	Source
Hokio Maru	Bokak Atoll	Spennemann 1998a
Daisho Maru	Marianas (proposed)	Spennemann 1999
Murashi Maru	Marshalls (?)	Spennemann 1998a
Niigata Maru	NW Hawai'i	See note 2
Niten Maru	Marianas (proposed)	Spennemann 1999
Sumiyone Maru	NW Hawai'i	See note 2
Tempou Maru	Laysan/Lisianski	Jacobs 1910; Munter 1915
Tiyo Maru	Lisianski	Jacobs 1910
Toba Maru	Christmas	Bailey 1977
Toru Maru II	Marianas (licensed)	Spennemann 1999
Yeiju Maru	Lisianski	*Pacific Comm. Advert.,* 16 Apr 1904

Who were the traders? For Bokak we know that a certain Komitaki Hitigiro (Kawashima Company) owned the vessel that dropped the catchers, while the Yamaguchi Marine Bureau of Shinegawa was involved in the Laysan exploitation. From the available historic data, however, it would appear that the vessels (Table 3) were chartered by the traders and that different syndicates were involved, as there is no indication that the same ships were regularly involved in the feather trade.

Geographic Scope and Chronology

As discussed so far, Japanese birding ranged from the Bonin Islands to Bokak, from Pratas to Christmas. The distribution of exploited islands is somewhat contiguous with the notable exception of Christmas, which is far off the main area. This could well indicate that other islands were also exploited but that traces of these activities went unnoticed.

Figure 3 shows the relative frequency with which an island was exploited (as a percentage of all documented events; see Figure 4 for details). The Hawaiian islands of Lisianski and Laysan seem to have been targeted by feather collectors more often than other islands, but this could well be simply an artifact of better detection by more-frequent law enforcement expeditions.

Based on the previous discussion we can compile a table showing the presence and absence of Japanese feather collectors on the various atolls between 1898 and 1916 (Figure 4). It is clear that the Japanese operations gradually moved ever further into the Pacific, first exploiting those atolls closer to Japan, such as Marcus.

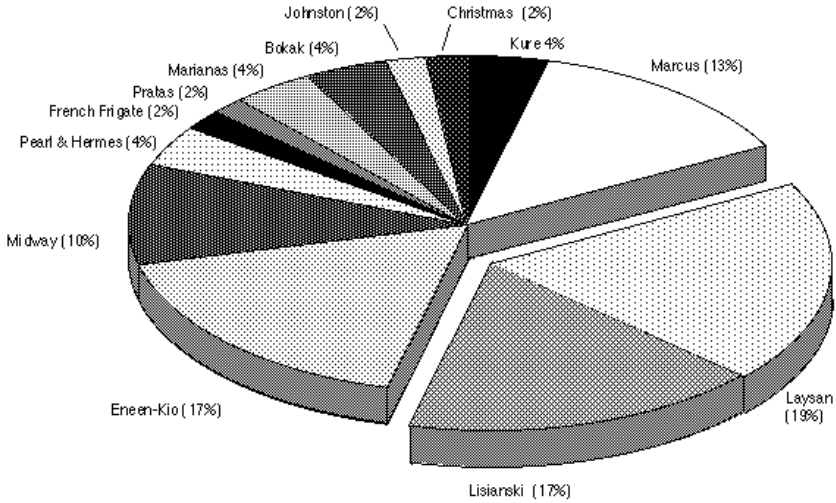

FIGURE 3. **Relative frequency with which an island was exploited as a percentage of all documented events.**

Figure 5 provides a histogram showing the level of known predation throughout the region by number of islands exploited during each calendar year. The major collection seasons were 1901 to 1904 and 1908 to 1910, with very little predation between 1905 and 1907. What is at first surprising is the gap in birding in the years 1912, 1913, and 1914. Since activities resumed in 1914/1915, we can assume that the trade had not completely stopped but had shifted to islands where it went on undetected. The 1911 apprehension of poachers on Christmas Island may provide some indication. As the atolls nearest to Japan were stripped of their bird populations or became increasingly policed, such as the Northwestern Hawaiian Islands, there was a need for other, more far flung locations to be found. On the face of current data it would appear that the Japanese did not exploit the resources on Bikar Atoll (Marshall Islands, 12°15′ N, 170°06′ E). However, in October 1914 the Japa-nese took over the German colonies north of the equator and began to exclude visitors from the area. It is quite possible that the Japanese government condoned birding on the northern atolls of the Marshalls as it had on Marcus.

We should also not forget that there are other suitable "source atolls," such as Palmyra (5°49′ N, 162°11′ W), Washington (4°41′ N, 160°15′ W), Fanning (3°51′ N, 159°22′ W), and Baker (0°13′ N, 176°29′ W). Poaching has not been reported for any of these atolls and islands, which is somewhat

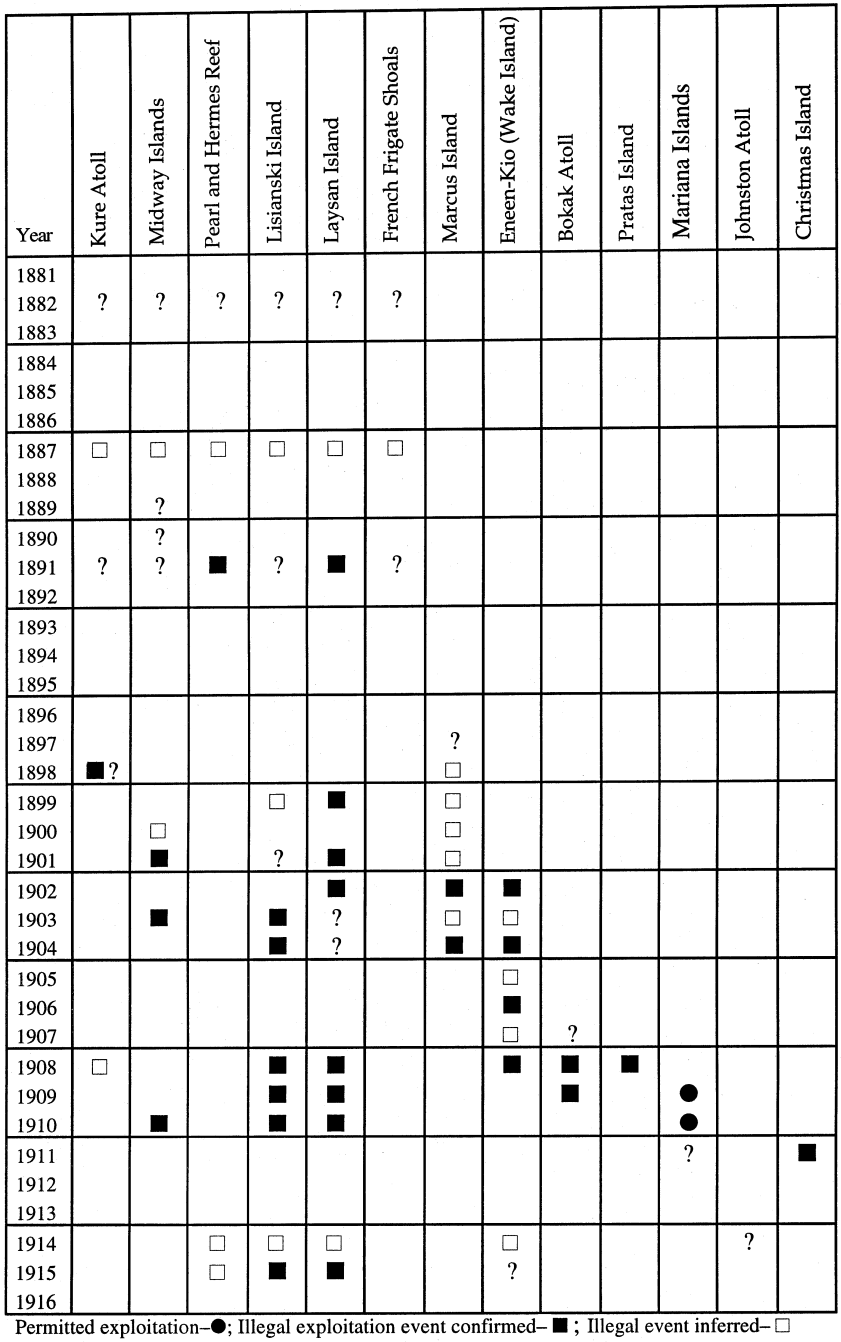

FIGURE 4. **Japanese feather collectors: a chronology of known Japanese feather-collecting activities in the Central Pacific from 1881 to 1916.** (Sources: see text)

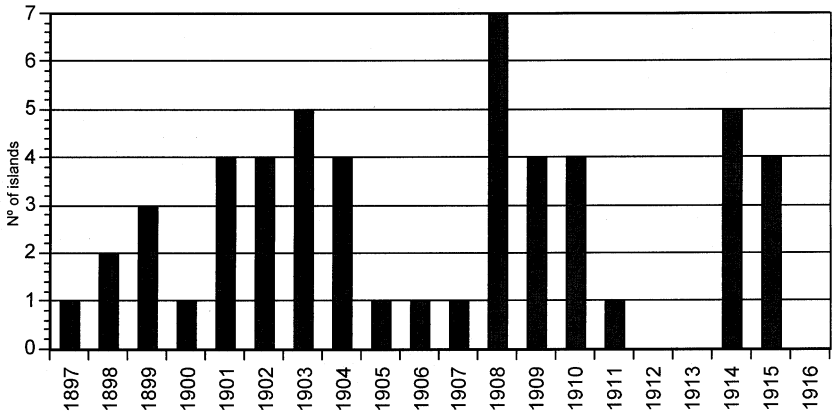

FIGURE 5. **Histogram showing geographic extent of exploitation of seabird populations by Japanese plumage collectors over time.**

surprising in view of the Christmas Island event, especially as all of the atolls mentioned are either en route to Christmas or near already-exploited islands. In the end, as has been noted earlier, on many islands the discovery of poachers was a lucky circumstance (or unlucky, depending on the point of view). Even where the poachers were caught *in flagrante* and where arrests were made, follow-up and ongoing legal enforcement was limited.

Enforcement by the Colonial Powers

How did the affected nations deal with the incursions of Japanese feather collectors? We have information on four countries (Germany, Japan, the United Kingdom, and the United States). Five different legal systems are represented, as U.S. legislation applied to the Hawaiian Islands differed from that governing the outskirts of empire, such as Eneen-Kio.

Japan

Clearly, the Japanese government treated feather and plumage collection as a valid private enterprise and condoned the activities, especially on the Volcano Islands and on Marcus, where it shared a national presence. On Marcus Japan worried more about possible U.S. claims to sovereignty than about the impact of feather collectors. Indeed, when the Japanese government learned that the Bernice P. Bishop Museum was sending a scientific team to Marcus, a Japanese cruiser was dispatched to "show the flag" to rein-

force sovereignty claims, as Japan feared that the U.S. might claim Marcus as part of the U.S.-Spanish settlement (Bryan 1903).

The German Approaches

The German government had mixed attitudes toward bird hunting. The colonial administration, far from Berlin in both space and mail time, had considerable latitude in the development of policies and rules (Hiery 1995a, 1995b). The "bird islands" were seen as a resource to be exploited, and this was advocated by the German administrator, Dr. Georg Irmer, in 1895 when the German Jaluit Gesellschaft was encouraged to exploit the large bird populations on Bokak Atoll (Irmer 1895).

Likewise, in New Guinea the German government condoned and taxed plumage collection but issued a series of regulations designed to license the trade.[4] While laws regulated the extent of the activities and even imposed temporary bans as well as conservation zones, they did not effectively regulate the number of birds taken and thus did not curb excessive predation.

The German Marianen Gesellschaft/Pagan Gesellschaft, which had leased the northernmost of the Mariana Islands, in 1909 was interested among other things in the exploitation of birds and employed Japanese bird catchers (Kirn 1910). The company's copra plantations had taken a battering in the typhoons of 1904, 1905, and 1907, and the profits derived from the feather trade, although quite handsome (65,000 imperial German marks according to Junker 1912:251), were not large enough to make up for the loss in copra income. To put this profit into perspective, we should note that the financial return for the feathers and skins was equivalent to about two-thirds of the return from the annual copra production of the island of Saipan (500 tons). The Marianas lease was terminated on 5 June 1911 because one of the conditions—the planting of coconuts—had not been met. The company went into liquidation in 1911, claiming that the Japanese hunters had worked for the competition but had been paid by the Marianen Gesellschaft.[5]

In the above three examples the concessions were offered to German companies. When a Japanese company applied, matters turned out quite differently. In 1907 a Japanese corporation inquired about the possibility of exploiting the bird islands of the Marianas, but was refused a permit. This action needs to be seen in the context of German antipathy to the Japanese commerce then spreading in western Micronesia (NLA 1907).[6]

On Bokak the German government had to deal with an uninvited and unlicensed group of plumage collectors. The atoll, expropriated from the traditional Marshallese owners as uninhabited and hence *terra nullius,* was leased to the Jaluit Gesellschaft for commercial exploitation.

German Enforcement on Bokak

A group of Marshallese from Maloelap Atoll arrived on 27 March 1909 on Bokak Atoll, where they encountered a group of eleven Japanese engaged in the collection of birds and fish (Loani 1909; Flower 1909; Latere 1909). Even though the German district administrator, the *Kaiserliche Bezirkshauptmann* of Jaluit, Regierungsrat Wilhelm Stuckhardt, was reluctant to act, the Jaluit Gesellschaft forced his hand to safeguard its interests (see Spennemann 1998a). Having chartered a schooner Stuckhardt arrested the Japanese on Bokak in early May and confiscated all the goods found—almost seven weeks after the incursion had been first noticed. Although Stuckhardt was informed by the Japanese on the way back that more prepared feathers had been hidden at other locations on Bokak (Begas 1909), he did not turn back to collect them.

After the return to Jaluit Stuckhardt, affording the Japanese neither a defense counsel nor proper interpreter, issued a magisterial judgment confiscating all the goods collected as illegally obtained material in contravention of various colonial laws and regulations on land ownership, customs, and registration of foreigners. Although Stuckhardt allowed a two-week period to lodge an appeal, this was not enough time to even inform the Japanese trading house about the crew's predicament. For unspecified reasons Stuckhardt abstained from pressing charges against the Japanese as individuals. The men were deported on the earliest postal steamer to Hong Kong. The confiscated goods were shipped to the German consul in Hong Kong for action, where they were formally passed on to local German companies for onward sale. Stuckhardt estimated the total value of the confiscated material to be between 78,000 and 150,000 imperial German marks, but the final value realized was less than the expenses of the German government because of a collapse of the feather market and the poor quality of the badly cured feathers (for more detail, see Spennemann 1998a).

On 2 November 1909 the cruiser SMS *Condor* arrived in Jaluit to afford the district administrator the opportunity to inspect various atolls of the Marshalls and to once more show German naval might to the Marshallese chiefs. Stuckhardt had requested that the *Condor* go to Bokak to investigate whether the island had once more been occupied and to confiscate the remainder of the bird skins. At sea, soon after departure from Jaluit, Stuckhardt had to be taken into protective custody after he jumped overboard in an acute attack of persecution mania (Begas 1909). At Bokak Captain Begas found the Japanese buildings still standing, but they had been cleared of all property, food, and tools. No prepared plumage was found, but on one islet thousands of rotting bird carcasses were encountered. Begas commented

that extremely few live birds were to be seen: the Japanese "had made a good job of it." On the way back to Jaluit the *Condor* also stopped to investigate the possible presence of Japanese plumage collectors on Bikar Atoll, another "bird island," which was found to be uninhabited and unpredated (Begas 1909).

In the final analysis the German enforcement action was a hamfisted approach by the German district administrator, who, while apprehending and deporting the Japanese, confiscated only a fraction of the illegally accumulated goods and forwarded them in such a state that the retail value was greatly diminished. As a result, the enforcement action incurred a loss for the German government, which, moreover, did not press any formal intergovernmental complaint with Japan and, to avoid any fallout on bilateral relations, did not press charges against the plumage hunters or the employing trader. Indeed the publicity was downplayed where possible. Even the formal annual report for 1909 filed by Stuckhardt's successor, Georg Merz (1910), merely stated briefly that an expedition was mounted, in the course of which the Japanese were arrested and a large number of bird skins and feathers confiscated.

U.S. Enforcement in Hawai'i

The U.S. law enforcement agencies, mainly the coast guard (then the revenue service) but also the navy, repeatedly encountered Japanese feather collectors on the Northwestern Hawaiian Islands. The collection activities were unlawful inasmuch as the Japanese were illegal immigrants and did not pay any taxes, but the nature of the business itself was not. Moreover, another issue had to be considered: national sovereignty. While the U.S. Navy feared that the presence of Japanese could be construed as an act of constructive possession, the U.S. State Department argued that the occupation of an island by a small number of Japanese feather collectors—in the absence of any U.S. authority or occupation—did not constitute any basis for sovereignty claims: "The settlement of six Japanese on the Midway Islands cannot be regarded by this Government as affording any basis for a claim by the Japanese Government" (Hill 1901).

In the first few years of the twentieth century, feather collecting and plumage exploitation had been outlawed in the territorial United States (Doughty 1975). Responding to pressure by the ornithological unions, and as a direct result of the poaching of seabirds, the Northwestern Hawaiian Islands—with the notable exception of Midway Atoll, which was retained by the U.S. Navy—had been declared the "Hawaiian Island Reservation" for wildlife by an executive order signed by President Roosevelt on 3 February

1909 (Palmer 1913). This reservation was administered by the Department of Agriculture until 1940, when jurisdiction was transferred to the Department of the Interior (Amerson 1971:42).

The executive order now made the Japanese plumage-collection trips illegal. The first arrests under the new status were made on Laysan Atoll in April 1909. The group of Japanese plumage collectors was apparently unaware of the fact that a bird sanctuary had been declared two months earlier. The Japanese could show that Max Schlemmer, who had a lease to the island, had granted them the right to exploit the bird population. Although the plumes were confiscated (Anonymous 1910a), the courts then, quite correctly, ruled that the Japanese had been acting in good faith and directed that they be shipped home at U.S. government expense and that no further prosecution follow (Ely and Clapp 1973:41). The twenty-three arrested Japanese were sentenced to twenty-four hours in jail and also deported, as they were deemed to be mere instruments of organized trading houses (Anonymous 1910h). Schlemmer was acquitted on a technicality but later indicted on a charge of bringing aliens into the country (Anonymous 1910b, 1910d, 1910e).

U.S. Enforcement on Wake (Eneen-Kio)

The U.S. government reacted to the Japanese presence on Wake in a way similar to its early reaction in Hawai'i. In June 1902, when the U.S. Army transport *Buford* encountered eight Japanese who claimed to be fishing, the captain, Croskey, suspected they were really pearling but did not take any action (Croskey 1902). Based on this information, the chief of the Bureau of Equipment, to whom Croskey was answerable, requested the Secretary of the Navy to take action,[7] who in turn took up the matter of the removal of the Japanese with the Department of State.[8] At this point, however, the issue became complicated and its resolution differed from the situation in Hawai'i.

The State Department requested information on the details of Wake's original annexation by the United States and whether the island at that time had been inhabited by Japanese or had shown any evidence of previous Japanese habitation.[9] Concurrently, the news of the Japanese presence on Wake and the U.S. inquiries was apparently carried by some newspapers, which commented on the impending deportation of the Japanese by a naval vessel to be dispatched for that purpose.[10] This brought about a representation by the Japanese ambassador to the Secretary of State. In a diplomatic note the Japanese government indicated that it had "no claim whatever to make on the sovereignty of the island, but that if any subjects are found on

the island, the Imperial Government expect [*sic*] that they should be properly protected as long as they are engaged in peaceful occupations."[11] The Secretary of State considered the matter sufficiently resolved and ruled that no deportation should occur.[12] The Japanese government was so advised and the matter was closed.[13]

Because of Wake's remoteness, the United States was not keen to enforce U.S. legislation. The island was not part of the Hawaiian Island Reservation, so its bird resources were open to exploitation. The Navy Department henceforth would occasionally stop at Wake to observe any activity.[14] Yet, from the records in hand it would appear that until 1922, when the abandoned Peale settlement was seen by the crew of the USS *Beaver,* the U.S. Navy was not aware of the Japanese plumage collection actions of 1907 and 1908 evidenced by the bunkhouse inscription. This neglect somewhat makes a mockery of the U.S. claim of law enforcement in its possessions.

British Enforcement on Christmas Island

And the actions taken by the United Kingdom? The British naval commander simply arrested and removed the Japanese found on Christmas Island, presumably acting on the strength of judicial powers entrusted in Her Majesty's Navy commanders. Commander A. K. Jones does not seem to have taken any further action (Bailey 1977).

Common Denominators

The only systematic enforcement against bird poachers was by the U.S. government on the northern islands of Hawai'i after enactment of the bird sanctuary in 1909. Before that, as well as on the other atolls of the Central Pacific, enforcement was haphazard and, where conducted, executed on economic grounds only. Ecological concerns did not enter into consideration.

There appears to have been little intragovernmental cooperation on the matter. The German minister in Tokyo, for example, sent a message about the Japanese activities on Laysan and Lisianski to Berlin, where it was duly placed in the Hawaiian file. This report, however, was in reaction to Japanese newspaper accounts discussing the arrest and deportation of the poachers by the U.S. authorities (*Hochi,* 22 February 1910, quoted in NLA 1910). Similar reports were not forwarded from the German minister in Washington. Further, there is no evidence whatsoever that the German colonial authorities in the Marshall Islands or the rest of Micronesia were informed about such happenings. The U.S. government seemed to have been more organized when it relayed the message from its consul in Tokyo to Hawai'i.

The common thread among the legal enforcement actions is that offenders were removed and property confiscated; other punishment did not occur. The reason for this state of affairs can be found in the new geopolitical reality of the era. In the battle of Tsushima in 1905 the Japanese navy had decisively defeated the Russian fleet. With that event Japan had established itself as a regional naval power to be reckoned with. In a period of accelerated naval growth none of the three affected governments (German, British, and American) could afford to alienate the Japanese over what was merely a minor trade problem. The Pratas Affair of 1908–1909 was a reinforcing, negative example.

The German consul in Hong Kong, dealing with the aftermath of the 1908–1909 Bokak incident, stressed that the regional and international attention surrounding the arrest of Japanese plumage collectors on Chinese-owned Pratas Island in 1908 had strained Sino-Japanese relations. A repeat of the situation was something the German government was keen to avoid. Thus while the Bokak incident figured in the Japanese press, it could indeed be suppressed in the German press (NLA 1909).[15]

A "soft" approach was deemed necessary or desirable by all involved. In addition, birding per se was not seen as problematic. Indeed, countries such as Germany issued licenses to plumage collectors and thus directly benefited through fees and taxes.

Banning the Plumage Trade

From 1908 to 1915 John Buckland conducted a public-education campaign in the United Kingdom, the British colonies, and beyond against the wholesale slaughter of seabirds for the plumage trade. His lectures were well attended and well reported in the press: newspapers publicized the issues with headlines such as "Cost of Women's Whims: Hats Decked with the Relics of Butchery" (Anonymous 1910f; see also Anonymous 1910g, 1911). In addition, he published articles (for example, Buckland 1909) and submissions to parliamentary commissions of inquiry (Buckland 1908; House of Lords 1908).

Concurrent to Buckland's campaign, the Royal Australian Ornithological Union was very vocal in opposing the plumage trade (Mattingley 1907a; Dickinson 1951) and its publication of photos of a ravaged heron colony in New South Wales caused much public outcry (Mattingley 1907b).

Following an inquiry by the House of Lords into the importation of plumage in 1908, several drafts of a bill regulating sales appeared.[16] Recognizing that the exploitation of seabirds was a matter that could not be controlled by the actions of a single country, the British government in 1909

extended an invitation to major European countries to an international conference specifically to deal with the prohibition of the plumage trade. Support for this initiative, however, was not forthcoming (Downham 1911). The International Fur Seal Conference of 1911, therefore, resolved in its Protocol XI of July 3 to prohibit the plumage trade in the following species: albatross, white tern, sooty tern, and gull. The degree to which this protocol was effective is unclear. Australia had banned the sale of plumes from Papua in 1908 and followed suit with a ban from the Northern Territory in 1913. The Netherlands followed in 1916, banning export from Netherlands New Guinea and the East Indies (Dickinson 1951:218). British national legislation was still being debated in 1914. Appeals for an international conference to ban the plumage trade continued but by July 1914 a conference still had not been agreed to, as France, Holland, Denmark, and Greece indicated that they would not attend and Germany argued that the existing conventions on domesticated animals, especially the trade in chicken, could be used to that effect.[17] Other interests were not concerned about the trade itself but feared that the mass killing of birds would reduce guano production on the islands (Coffee 1924:98).

There can be little doubt that the continued enforcement in Hawai‘i took a heavy economical toll on the feather collectors. But the risks were well worth the gain. The end of poaching was not caused by the increased enforcement, as Harrison infers (1990:37), but by the impact of World War I on the European economies. The continued cost of the war effort in 1915 and 1916 caused many Germans, for example, to trade in their gold marriage rings for iron ones so that the emperor (that is, the government) could use the donated gold to buy raw materials needed for armaments. The ostentatious display of wealth, expressed in the visible form of hats adorned with exotic feathers, became no longer socially acceptable. The hats went out of fashion.

In the 1920s the trade resumed, albeit on a smaller scale, and some import of feathers—now disguised as “horsehair” and “cowhair”—into the United Kingdom was carried on.[18]

NOTES

The idea for this article was derived from archival research conducted on the indigenous title status of Eneen-Kio (Wake Island) in 1992, when I was working as the Chief Archaeologist of the Republic of the Marshall Islands. The issue was taken up again in 1996. I am indebted to staff of the Australian Archives (Canberra), National Library of Australia (Canberra), Bernice P. Bishop Museum (Hawai‘i), and U.S. National Archives (Washington, D.C.), and to Hugo Philipps of the Royal Australian Ornithological Union for assistance with the procurement of archival material and less readily accessible references. Dr. Pamela

Swadling (Papua New Guinea National Museum and Art Gallery) and three anonymous referees provided constructive commentary on an earlier draft, and their efforts are gratefully acknowledged.

1. There is a considerable body of evidence that the initial arrival of humans on Pacific islands created substantial environmental change, which brought about the demise of many local bird populations (see Steadman 1995). Extinction or local extirpation was common on those islands and atolls where human habitation and food production were carried out, but less frequent on islands that saw only occasional visits. For the northern Central Pacific area under discussion, local variations of flightless rails were the most common species made extinct. At least two extinctions not listed in Steadman are on the historical record of the Marshall Islands. Oral traditions mention the presence of a small bird, *annang*, that tasted "sweet" (Krämer and Nevermann 1938:295; Erdland 1914:183, 245), which is reported to have been hunted to extinction in the Marshalls by introduced cats, and a small rail or megapode (genus unclear from archival records) on Bokak Atoll, which was possibly exterminated by Japanese poachers in 1909 (Spennemann 1998b).

2. American Vice-Consul to Japan to Assistant Secretary of State of the United States, 3 April 1909. U.S. National Archives, RG 126.

3. W. V. E. Jacobs in *Army and Navy Register*, 19 February 1910, quoted in Anonymous 1910g.

4. Verordnung betreffend die Jagd auf Paradiesvögel in Kaiser Wilhelmsland, signed Schmiele, 27 December 1892. In NLA 1892–1913. The regulation had been repeatedly amended, the last time on 13 March 1907. See Swadling 1996:232 ff. for a discussion.

5. Internal file memo, Karl Kirn to head of Reichs-Kolonialamt, 28 October 1910. In Reichs-Kolonialamt, A-III, Akten betreffend die Marianen Gesellschaft, Gesellschaften 10f, No. 10, File 2474, Vol. 1, October 1910 to June 1914 (National Library of Australia, microfilm G8530).

6. In 1908 the German consul in Kobe, Japan, gave a Japanese company run by Tamekuchi Yamada from Hiroshima and Uishi Koiszumi from Tokyo permission to seek from the Saipan office a lease on some bird islands. If none was made available, the Japanese company had the authority to pursue openings in Yap or the Marshall Islands, both of which were reported to have potential (Thiel 1908). The local German administration in the Marianas and the Carolines thwarted the Japanese attempts.

7. Admiral Bradford, Chief of the Bureau of Equipment, to Secretary of the Navy, 8 August 1902, U.S. National Archives, RG 40, Box 431, File 9642–4.

8. Acting Secretary of the Navy to Secretary of State, 9 August 1902. The navy considered Wake to be U.S. property not open to colonization or foreign settlement. Acting Secretary of the Navy to Secretary of State, 20 August 1902, U.S. National Archives, RG 40, Box 431, File 9642–4.

9. Acting Secretary of State to Secretary of the Navy, 16 August 1902, ibid. This information was provided on 21 August 1902: Acting Secretary of the Navy to Secretary of State, ibid.

10. Acting Secretary of State to Secretary of the Navy, 18 August 1902, ibid.

11. Takahira, Japanese Minister to the United States, to Secretary of State, 18 August 1902, ibid.

12. Acting Secretary of State to Secretary of the Navy, 18 August 1902, ibid. *Idem,* 21 August 1902, ibid., File 9642–5. To this the Navy Department concurred, ibid.

13. Acting Secretary of State to Takahira, Japanese Minister to the United States, 26 August 1902, ibid.

14. Acting Secretary of the Navy to Secretary of State, 28 August 1902, ibid.

15. Also mentioned in Voretzsch, German Consul Hong Kong, to Stuckhardt, Amtsleiter Jaluit, 30 June 1909. In NLA 1892–1913. The *Deutsches Kolonialblatt* of 14 August 1909, for example, comments on the successful move of the Samoan chiefs from Jaluit on board SMS *Jaguar,* but makes no comment on the Bokak affair (nor does the *Deutsche Kolonialzeitung* 26 no. 3 [1909], 551). Likewise, neither the *Times* nor the Sydney *Morning Herald* carry a comment on the incident—evidence that the German government was successful in keeping it low key.

16. *A Bill to Prohibit the Sale or Exchange of the Plumage and Skins of Certain Wild Birds,* U.K. Parliament, Bill 81/1910, Bill 263/1910.

17. See file, "Plumage etc of Non-Edible Birds," Governour General's Office, File CP 78/22, Item 1913/349, Australian Archives (ACT Repository). See British legislation, *Importation of Plumage (Prohibition) Bill,* U.K. Parliament, Bill 301/1913, Bill 28/1914.

18. See correspondence by the "Plumage Bill Group" in File A2911/4, Australian Archives (Canberra).

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THE EMBODIMENT OF RESPONSIBILITY: "CONFESSION" AND "COMPENSATION" IN MOUNT HAGEN, PAPUA NEW GUINEA

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We discuss two contexts of responsibility for action in Mount Hagen, confession and compensation. Verbal confessions of either wrongdoing or resentment against wrongdoing are important signs of the exercise of agency, but if they are not made, it is expected that sickness will result. "Substance" thus takes over where "agency" fails, and the two are intimately linked. Compensation payments can be seen as nonverbal equivalents of confession or the logical result of it, and if they are not paid, sickness or a failure of wounds to heal is thought to be likely as a result. In contemporary times both confession and compensation have been deflected toward more individuated and commodified forms through the influence of Christianity and monetization of the economy.

THIS ARTICLE EXPLICITLY SEEKS to set out a relationship between practices of "confession" and the payment of compensation, primarily for Mount Hagen society in the Western Highlands Province of Papua New Guinea.

Links between these two topics, confession and compensation, have not been a prominent feature of the literature to date, and discussions of confession itself are not very common (Michael O'Hanlon's valuable treatment of both themes is cited later in this article), although the theme of concealment versus revelation is often alluded to (e.g., Merlan and Rumsey 1991:224–226; Bercovitch 1998). One author who has explicitly made a connection between these topics is Laurence Goldman in his *Talk Never Dies* (1983), a study of the Huli people of the Southern Highlands Province in Papua New Guinea.

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Goldman, working from within Huli linguistic usages, points out very clearly the parallelism set up by the Huli between disputes, breaches of norms in the group, and bodily sickness, and the concomitant idea that compensation has to be paid in order to heal both social and physical wounds. It follows that the body may be its own witness and itself reveal hidden truths. The Huli emphasis on this idea may have muted the significance of verbal confessions or revelations of wrongdoing.

From the Huli example, however, we can suggest a general point that should hold at least in other Highlands New Guinea cases: the payment of compensation for killings, wrongdoings, insults, or physical woundings must depend on a viable attribution of responsibility. In some cases such an attribution will be self-evident; in others it will be problematic. Where it is problematic, a verbal confession may be sought, but if that is impracticable, unlikely, or difficult to obtain, the final "backstop" of any system is likely to be the body itself. Hence a logical relationship always potentially exists between compensation, confession, and sickness. A reexamination of the New Guinea literature in these terms would likely prove to be rewarding but is not undertaken here. Such a reexamination would take into account also the various logics of divination in relation to sorcery and witchcraft, and compensation or revenge issues that flow from such logics. Here we proceed with our more specific examination of changing historical contexts in Hagen.

What Is Evidence?

What constitutes "evidence" for wrongdoing? In the Mount Hagen area of Papua New Guinea, considerable stress is placed on the idea that the investigators of a case should bring accused persons to the point where they themselves declare what they have done. The admission of responsibility is therefore taken as an ultimate form of evidence. It is also evidence of willingness to undertake the steps to put matters to rights, insofar as this is possible. But there is a further point to this drive in investigatory practice. If a confession is not made, either the accused or the investigators can ask that divination take place, and the results of the divination will be expected to appear in a direct, nonverbal embodied form. If the accused lies, he or she will get sick, a child will, or fellow group members will experience sickness and misfortune. For this process to be set in motion, the accused must verbally deny the charge, then undergo the divination or oath-taking. The results are expected to be "written on the body." The body thus becomes a repository of truth beyond words. But it is significant that verbal action has to be involved. These two components, the verbal and the nonverbal, constitute different vital aspects of personhood, involving agency on the one hand and

substance on the other. Responsibility is linked to verbal statements, to acceptance or denial of facts. The body then acts as a passive but powerful register of the consequences of exercising human agency.

The idea of "confession" involved here is one that has, therefore, a deep foundation in Hagen notions of personhood and truth. However, contemporary notions are also inflected by Christian concepts, which have been taken into Hagen repertoires of thinking and blended with ideas concerning the workings of anger and shame, which are also at issue in questions of confession in disputes. An absence of confession leads to sickness by two different pathways: a guilty person's failure to reveal what he or she has done can cause sickness to his or her kin and also to himself or herself; equally, a person who is *popokl,* angry or frustrated, with others may cause sickness to himself or herself by not revealing the source of the frustration. It is this context of ideas about sickness and confession that has been interwoven with Christian ideas to produce a new constellation of practices, while the basic logic remains the same.

Confession logically precedes restitution or the payment of compensation. However, a context of embodiment may act as a "backstop" for evidential proof in a given case, and the act of paying compensation can be regarded as an admission of responsibility. In this article, we look first at "confession" and then at "compensation" as two contexts that exhibit the same principles. Verbal statements, as declaration of agency, reduce ambiguity, but as denials they may be untrue. Nonverbal actions can also constitute statements but can be given variant interpretations, increasing ambiguity. And all of these processes also shift their forms in historical time.

First, however, we need to show empirically that there is a stress on both fact-finding and "confession" in disputes.

Two Cases: "Tell Us What You Did"

We adduce two cases to show the determined lengths to which investigators may go in attempting to make recalcitrant suspects declare their supposed guilt. Both cases are drawn from dispute contexts of the 1980s and have been reported on at greater length elsewhere, but without the emphasis on the points at issue here regarding personhood, agency, and the embodiment of truth (Strathern 1993: chaps. 3 and 4). The cases both also took place within the general ambit of relations between one group of people, the Kawelka, living at Kuk, and their immediate or more distant neighbors. The disputes were heard outside of the formalized context of village courts, where appointed magistrates hear cases in accordance with introduced procedure while following "custom" in whatever way they choose to. The disputes here

were handled in moots, where there was full community presence and the broadest invocation of factors and knowledge. In the second case the body handling the case was a "trouble committee" set up with government sanctions behind it, but the committee members operated along with others and behaved essentially as a form of moot gathering.

Case 1: The Wandering Pig

In the first case, a man was accused of stealing the pig of another man by finding it in a garden space belonging to the pig's owner, tethering it, and then secretly returning to fetch it and take it to his home. K., the accused, agreed he had tethered the pig but denied that he had removed it or that it had gone to his place. The pig's owner, M., pointed out that the footprints of the pig had been recognized, headed in the direction of the accused's house, at the place Kuning.

Investigators strongly suggested this discovery implied K.'s guilt and also hinted that the mere fact that he had tethered the pig made him guilty of an offense anyway. They established that K. had been playing cards in a local men's house up until a certain time on the evening of the supposed theft and that he had left alone and could have collected the pig and taken it home in the dark. One investigator, a relative of K.'s named Ru, noted: "If you thought that the pig was wandering around and you didn't know who its owner was, then say so. . . . You are not a small boy that we can force you to reveal the truth." A local magistrate weighed in as a bystander, saying that the disputants were both leaders and the facts should be revealed quickly. The owner, M., said K. should reveal whether he took the pig in anger, for some particular reason. Another magistrate grew sarcastic: "So, you thought that M. is your brother, so you tied the pig up for him without a thought to steal it. And later the actual thief broke in to the area, found it, and stole it. . . . Someone else stole the pig, and you, an innocent man, are sitting here under the sun." An observer pointed out that if the facts were not revealed, bad feelings would continue. The second magistrate continued with his sarcastic tack: "This pig was in your care, and you might have secretly tipped someone off. Or else maybe the pig itself wanted to get you into trouble, so it followed you into your area." Other observers argued that people should live peacefully together on the land and suggested that K.'s kin would be happy to contribute to pay for the pig's going astray. K., however, adamantly refused to admit any guilt and declared he was prepared to take the matter to an outside court. Faced with his intransigence, the matter was dropped. The pig, meanwhile, reappeared.

All kinds of personal and community pressures were applied to K., but he was not threatened with a divination ordeal, probably because the pig "turned up" in the nick of time.

Case 2: Who Stole the Car?

The second case concerned a violent attack on the leader Ongka by a set of young men of his own group. The young men suspected that Ongka's son Namba had informed on them after they had stolen a car belonging to the local Department of Primary Industry station.

The case fell into two phases. In the first the young men were interrogated about their reasons for launching their attack. Two levels of process were involved. One was to establish that they had in fact stolen the car. The second was to get them to substantiate their claim that Namba had informed on them or to abandon it, leaving them without even a flimsy excuse for making the attack. Their own words in making the attack incriminated them on the first point. On the second, one of them had reported to the others on seeing Namba in conversation with the station boss. Meanwhile the car, like the pig in case 1, had been recovered. Ongka said he knew nothing about the car or where the thieves had hidden it (in the old Kawelka territory, from which they had migrated to Kuk). Namba said he had said nothing to the station boss about the car. An investigator asked if anyone had seen Namba's lips moving to pronounce the term "car" as he spoke to the boss. It was admitted that this was not so.

The inquiry here was minute and exhaustive; its basis was that if the attackers were mistaken in their ideas, they had no excuse whatsoever for their hasty and violent actions. Interestingly, they did not fabricate evidence, nor did anyone think to ask the station boss himself. The focus of the investigation, ostensibly centered on a minor set of facts, was in fact on intergroup relations. The attackers were rendered culpable and threatened with arrest and being taken to court. They and their kin acceded to the payment of compensation (admitting not only the attack, which was evident, but their total culpability), which was followed by the cooking of pigs and a shared feast to restore relations between the group segments involved. The minute attention to facts and the invitation to the attackers to explain why they did it and to admit they were mistaken were both aimed at reaching the possibility of reconciliation. Neither Namba nor the accused was asked to take a divination test. No one was therefore expected to get sick.

Both cases show an impressive forensic and rhetorical ability by investigators, appealing to a wide range of "personhood notions." Neither case pro-

ceeded to the level of invoking the body as a repository of truth, but the stress on achieving reconciliation was in line with doing so, since hostility and anger can always lead to sickness and further trouble.

Forms of Divination: Language and Embodiment

In cases where verbal investigations have not revealed the truth, there can be resort to divinatory practices. As we shall note in the next section, these have now been largely replaced by holding the Bible and swearing by it, but the logic involved is exactly as it was before. This logic reveals a relationship between language, truth, and embodiment.

In the standard form of swearing as a divination, an accused person takes hold of a sacred plant or object associated with the origins of his or her group and makes a declaration of innocence, invoking the power of the object to cause death in the case of lying. It is thus an act of, almost literally, taking one's life into one's hands. The object is the group's *mi,* the source of its life. It is "laid down" from the origin times, when it was first shown or revealed to an ancestor as the means to increase the growth of the group itself. It is that which is permanent, *tei mel,* "laid down" for all time. The ancestor also took possession of it by holding it *(ömböröm),* just as a descendant who swears by it must do. People regard the *mi* with respect and do not lightly undertake to swear by it in this way.

Ongka, in his autobiography, tells of another test that was used in the past. People suspected of killing someone by sorcery were invited to take part in a firethong divination. They would say:

> "I wonder if you'd like to come up to our place for a little ceremony?" The suspect answered directly: "I didn't kill your man, why are you asking me this?" "Oh, we're embarrassed, it's just a little thing like a bird's song or the feces of a spirit, don't worry, it's nothing big. We're eating food together with you, and one of our children has fallen sick, so come up and we'll try the firethong divination."
>
> The suspect's people argued about whether to go or not, but eventually they went, preparing themselves for violence. The hosts brought out a hardened firethong and a tinder of *kuklumb* leaves and invited them to try it. At first they declined. At length, a big-man would come forward and say, "If there is trouble, we should not fight or kill in revenge, we have pigs and shells with which to pay compensation. Just try out the firethong."
>
> He made the talk "cool" in this way, and one man came forward

> to use the thong. If he successfully made fire, he went free, for he was accounted innocent. Perhaps he had cooked a pig as a sacrifice for his own ghosts and obtained their support? But if fire would not come or the thong broke, they would exclaim, and set upon him at once. (Strathern 1979:73)

The logic involved here is that the creation of fire is a sign of benign influence and goodwill. The aggrieved spirit of the dead would prevent the fire from coming. A similar ritual is performed at the beginning of a sequence in the Female Spirit cult, when a fire is lit to heat the stones for earth ovens to be used in pork sacrifices. If the fire does not light, the performer of the ritual does not have the right bodily condition, and this can result from dissension within the group involved.

Fire is instrumental in cooking, and the same logic of the "raw" versus the "cooked" is seen in the case of the taro divination, which was performed in the past. Those suspected of thieving or sorcery were asked to select taro corms, which were placed into an oven for baking and later removed. Whoever had a taro that was not properly cooked was held to be guilty. Angry spirits had prevented the corm from cooking so that the guilt was revealed. By the same logic, nowadays rice that has been the object of sorcery is held to be hard to cook properly; it tends to remain "raw." Improperly cooked rice is therefore by definition suspect. In these instances the taro or the rice becomes the vehicle that embodies the true situation, that is, that a declaration of innocence is false. In extreme circumstances the *mi* itself may be burnt by fire. If this is accompanied by an untrue declaration, the one who swears falsely will swiftly die.

The relationship between language and embodiment here is interesting, because the two are conjoined. A verbal statement is tested by an embodied act. As we shall see next for the Melpa, the verbal and the nonverbal form a communicative continuum.

"Confession" and Christianity

"Confession" as used so far in this article is a gloss for the Hagen or Melpa phrase *nemba mot ndui,* "saying, to make evident." Things that are not said but themselves become evident by showing themselves, as sickness shows in the body, are referred to as *mot ninim,* "it speaks *mot.*" What we would call "nonverbal" is thus encompassed by a verb of "verbal" action in Melpa, demonstrating the communicative locus of the verb *ni,* "to say." Things "speak *mot*" when they are not covered up or occluded, as stars that shine when they are not obscured by clouds and are said to be stones: *ku mot ninim,* "a

stone speaks *mot."* The overt onset of an illness does the same: *rukrung pepa ekit omba mot ninim,* "it lives inside and comes out and speaks *mot*/ reveals itself."

The dramaturgical image-schema of concealment versus revelation is one that is basic to contexts both inside and outside of conflict situations. In the Female Spirit cult, dancers mass behind a tall fence and then burst as if newborn into the midst of a huge throng of spectators who have been eagerly awaiting their arrival (Strathern and Stewart 1997). The dancers for a *moka* prestation prepare themselves privately and individually and then mass together to show themselves on a ceremonial ground. *Moka* gifts themselves may be likened to a snake as it appears at the edge of a brushwood covering: its head may be visible, but the length of its body and tail are not. This imagery refers to the time when people are still collecting pigs for the gift and have not yet revealed how many they have. The revelatory pattern involved is that which Roy Rappaport refers to in relation to Maring ritual: it is epideictic and it converts analogical into digital signals (Rappaport 1968). Things that reveal themselves may therefore be good and favorable as well as unfavorable. "Speaking *mot*" is also a strongly performance-oriented term. Things come into existence when they are *shown* to do so, as a matter of clear evidence.

In dispute contexts revelation may come from various agents: from accusers who finally show some piece of evidence they have, from the accused who decide to tell, from witnesses, or from spiritual powers whose presence has been invoked or whose evaluation has been elicited. In all of these contexts revelation means resolution of the issues at hand and the possibility to move to a phase of settlement in the discussions. Also, revelation may in turn mean that an unpleasant consequence can be averted. For example, if a person accused of stealing a pig stubbornly denies the imputation, the aggrieved and suspicious accuser may take a clandestine reprisal and secretly steal a pig of the accused, provoking an escalation of conflict between them, since the accused guesses from the timing what has happened. Or if a man has had illicit intercourse with a fellow-clansman's wife while she is secluded in a menstruation hut and he falls sick, it is held that he cannot possibly recover from the sickness unless he reveals what he has done and thus enables a purification ritual to be held on his behalf. The menstrual blood must be sucked from his body at certain points through pieces of sugarcane skin and spat onto heated tin drums to neutralize it. If he fails to reveal the situation, the pollution will reach his brain and dry it up totally so that he dies. Since the action of committing adultery with a clansman's wife is considered to be an offense to shared ancestral spirits in the clan, it is a matter of shame and thus may be concealed. An episode of sickness is likely to be

the only event that will induce the man to overcome shame and reveal what he has done, since the sickness shows on his skin and draws comment from others, eliciting eventually his confession and a ritual of reconciliation with the spirits and his kinsfolk through a pork sacrifice.

The context of sickness is the one in which a term such as "confession" comes closest to being an accurate gloss for the Melpa term. Sickness events are heavily loaded with moral significance in Hagen. Sickness may itself result from situations of conflict that precipitate anger/frustration *(popokl)* between people. The relationship between sickness, anger, and revelation is certainly an example of a perduring cultural form or image-schema in Hagen social thought, and its resilience is shown in the fact that it has been a matter of everyday experience in fieldwork since 1964. It has, however, undergone a metamorphosis since it has become intertwined with introduced Christian ideas.

In the original indigenous system, sickness was an expected result of *popokl* and would be experienced by the one who was made *popokl.* It was legitimate, indeed necessary, to express one's *popokl* in order to gain redress. Concealed, it could be lethal. A male wrongdoer ought also to confess, though not out of *popokl,* in order to prevent pollution sickness to his own body or to enable a sickness of his wife and children to be cured (Strathern 1977). In one such case a man failed to reveal that he had had sex with his own mother-in-law, and all of his children and his wife were affected by a sickness (scabies) on their skin. Revealing the cause of an event or condition, then, whether to deal with anger and its threat of sickness or to admit to one's own wrongdoing, is considered essential to righting whatever wrong is implied by the event or condition itself. The expression of *popokl* is therefore legitimate; its concealment is not.

These ideas about *popokl* began to change with Christian influence. In the Christian viewpoint anger, which may be associated with acts of retaliation and revenge, is not considered legitimate, and institutions that are seen as regularly leading to anger are therefore questionable. Polygyny and *moka* exchanges are cases in point. In the 1960s Lutheran and Baptist missionaries argued that Christians should not get too involved in *moka* because these tended to produce anger. The term *ararimb* was used instead of *popokl,* but it is uncertain whether this was a new coinage at the time or an existing variant term. The state of anger/frustration was considered to be undesirable, equated with sin. Confession and removal of anger/frustration was seen as necessary before people could take part in the harmonious ritual of communion. Hence it was the state of anger itself, rather than the actions of others that provoked it, that was seen as undesirable and in need of correction.

Similar changes may have occurred in Santa Isabel in the Solomon Islands, where Geoffrey White remarks on the fact that divulging transgressions in Anglican areas to the priest had taken the place of public "disentangling" discourse that could lead to further "entanglings." White notes also that the Anglican bishop had encouraged confessions of the private type and discouraged public moots (thereby playing a hefty role in social change). A cultural practice was maintained at one level, then, and subverted at another (White 1990:93).

In Hagen, Christianity itself was seen as *min-nga kongon,* "work of the soul" (the part of the person that survives death and can go to heaven or hell), and confession was therefore seen as setting the soul in order and in a good relationship to God. The concept here is subtly altered from the older indigenous context, in which anger had nothing to do with the soul *(min)* but was experienced in the *noman* (the mortal mind), and conflicts had to be settled by removing anger from and aligning the minds of people. The revelation of anger and wrongdoing therefore had to do with ongoing social relations, not with the relationship of the person to God, the future residence of the soul, and its individual immortality.

It is in the Catholic religion that regular forms of "confession" are practiced. The Melpa, however, do not call this Catholic act by the term *nemba mot ndui,* because the information does not become public and does not stimulate acts of social retribution or rectification, although it does prepare the person for communion. Nor is such confession seen as a necessary prophylactic act for the success of a future enterprise, to forestall a disaster, or to pave the way for an atonement of a public kind. In times of fighting, men are supposed to gather in cult-places and reveal any wrongdoing they have been guilty of in relation to their clansmen; this is done in order to forestall the withdrawal of ancestral favor. Conflict and disharmony as well as secret wrongdoing undermine the subtle ties that bind men to the ancestors and the protection they afford, and so any man who has done wrong is exposed to being killed by the enemy: hence the public revelation followed by sacrifice. It is most serious when men hold the *mi* or sacred cordyline (in the case of the Kawelka) and declare that they have done no wrong, because if they lie the *mi* will destroy them at some later point. Here again, a subtle change has recently been slotted in. Instead of taking a cordyline leaf, people of either sex will use the Christian Bible to swear on, explicitly commenting that (1) they have seen this done in courts when disputes are adjudicated and (2) the Bible is like a *mi* that can function in the same way for all groups provided that those who swear by it are Christians. Here the "swearing" can also be called *nemba mot ndui,* to make a public statement, to stake a claim to the truth publicly. The Bible is also a sacred emblem that can be shared

by both sexes and across group boundaries, so it fits with contemporary conditions of life.

In the context of sickness, Christian ideas have also somewhat altered the notion of confession. The newer Charismatic churches (such as Assemblies of God) greatly favor the idea of prayers for healing the sick and use this emphasis as a recruiting device. Sickness, seen as a result of anger, is described as a "heavy" thing *(mbun),* whereas in indigenous practice it is a legitimate protest against wrongdoing. In Christian ideas, as we have seen, anger is also a sin, and therefore the sickness is in a sense itself a kind of wrongdoing. Confession of anger removes it and is held to relieve the associated sickness or the threat of becoming ill. A small sacrifice is usually performed, although never said to be for ancestors. Prayers are said earnestly over the sick person to remove the power of the Devil and to instill the power of Jesus to heal. A dualistic battle of good versus evil is thus set up. The logic here is that of the indigenous system turned ninety degrees. Sickness, produced by anger, is seen as sin rather than as a protest against wrongdoing. The sick person is urged to cast out anger and in effect to turn the other cheek, not to seek the revenge actions that ordinarily might follow from anger. The aim is to put to rights the state of the sick person's *min* as well as to call on Jesus to heal the actual sickness. Sickness as a source of heaviness *(mbun),* then, is seen in this revised schema as resulting from anger, as before, but the cure is differently conceptualized. In cases where the sick person has a grievance against a fellow member of the same church congregation, there will be a meeting to discuss the problem (in the case of Lutherans, this is known as a *sutmang,* a Kâte word introduced in the 1960s by coastal evangelists from Finschhafen). Community action follows, therefore, as before, but the ancestors are not made a part of the whole process, and prayers to God and Jesus are directed toward healing the sick persons and changing the hearts of those who have wronged them. Exchanges and pork sacrifices are not made essential to the process, though it is notable that revealing the causes of feelings or the facts behind the scene is still thought to be important, indeed essential.

Many times during our 1997 visit to Hagen we heard from people that when something unfortunate had happened to them, it was caused by their own wrongdoing by not adhering to the teachings of the church and letting *popokl* block the granting of forgiveness to others. A case in point occurred when one of our female informants, M., explained that her husband, R., had "broken" her house in a drunken rage on grounds that she had stolen some coffee beans of his and that he would not repair the structure or build another house for her because of the *popokl* between them. One way in which the adherents of the Charismatic churches relieve the pressure of their con-

cealed *popokl* is through witnessing (standing in the church in front of the congregation and confessing). This action is especially important nowadays, when many Hageners believe that the end times are close at hand and the year A.D. 2000 will herald in the return of Jesus—at which time those who have confessed their sins and asked for forgiveness will be favored for salvation, while those who have not done so will perish in the consuming fires ignited by the Antichrist (Stewart and Strathern 1997b).

The act of witnessing in the congregation privileges the Christian church in which the words are spoken, thereby strengthening the power of the religion within the community of church adherents and strengthening that community itself. Its functions are thus similar to those of "confession" in the earlier indigenous sphere.

The Charismatic Catholics in Hagen have taken the act of voluntary witnessing one step further. When rumors circulate that a person has fallen from his or her faith in God through "wrong" actions, the religious community gathers at the home of the person and holds a fellowship meeting. During the meeting, which lasts throughout the night and into the early hours of the morning, Christian hymns are sung to the tunes of traditional songs while drumbeats set the rhythm. These songs are a means of communicating more immediately with the heavenly (and perhaps ancestral) realms from which the power of the Holy Spirit is evoked by their ritual actions (Stewart and Strathern 1998).

"Compensation" and Its Embodied Concomitants

In the context of the above discussion, the payment of compensation for a killing can be seen as a nonverbal form of the "confession" through acceptance of responsibility for a death. Moreover, there is a link with the body, since compensation is thought to have a healing quality when it is paid for the infliction of a wound. We can set up the following scheme:

Verbal admission	→	Social reconciliation
Compensation	→	Bodily healing

Where the compensation is for a killing, the "healing" is displaced: the life removed cannot be restored, but new life can be created in its place by the use of wealth.

As with verbal confession, however, there has been a historical shift in the meanings of compensation over time. The term "compensation" itself has entered the indigenous Melpa vocabulary only in the last five years or so. Its use coincides with a shift in both consciousness and practice, from an ethos

of bilateral exchanges leading into *moka* exchange sequences to one of unilateral payments not articulated into any wider planned concatenations or forms of reciprocity between groups. Correlated further with this pattern is a shift from the practice of sending "solicitory gifts" in order to receive a large payment for a death to one in which the victim's group presents a "demand" to the group of a killer, as was first observed in 1995. The ethic of exchange that underpinned transactions in the past has gradually been supplanted since the 1980s by an ethic of payment that corresponds generally to a commodified pattern. Here we explore the history of commodifications of the person and its intersection with practices of compensation for killings over time.

Complications of the Person: Commodification and Violence

In the precolonial social system, violence was always the ultimate sanction of relations between groups and individuals not tied closely together by kinship or affinity. In certain contexts, physical violence was an automatic reaction to provocation, as much an intrinsic expression of group identity as a calculated strategy of reprisal. In this context it was linked to the concept of *popokl,* which if not revealed or acted upon, will result in the sickness of the person who experiences it. Between those categories of persons who were defined mutually as *el parka wamb,* "Raggiana Bird of Paradise people," or major traditional enemies, a permanent state of *popokl* was expected to hold and large-scale compensations were not held between them. Raping of women in warfare and the mutilation or burning of the bodies of male enemies at the boundaries of their territories marked this basic attitude to the bodies of such enemies: the practice was to destroy them, spoil them, render them worthless, and thus insult their living kin. Between "minor enemies," however, it was expected that compensation would be paid for killings and reparations made to allies who gave assistance in fights. Intermarriage took place between these minor enemy/ally categories; there was a sharing of "blood" as a bodily substance between them and an arena in which transactional exchanges of wealth as substitutes for blood were preserved. There is a common ideology among the Melpa and the Duna people of Lake Kopiago in the Southern Highlands Province that, when a dispute occurs between two people and one party is wounded, the wound will not heal until compensation is paid. The wounded party will say *nanga mema pindi:* "replace my blood!" This is a frequently heard demand in dispute encounters resulting in physical violence in Hagen. The claim made is not for blood to be replaced by blood, however, but for a cathexis to be enacted between social relations and bodily condition that amounts to a ramified set

of embodied practices in Hagen culture. The demand is for a payment of compensation in wealth goods (pigs, pork, valuable shells, money), thought not only to ease the hurt feelings of the one who has been assaulted, but also in effect to staunch the flow of blood from this body and restore its balance within that body. Once an agreement has been made to institute social accountability, the wounded person can begin to recover. The value of the body here depends on relationship, on shared substance, or the transacted substitutes for substance. Within this sphere, then, the body gains its value, and that value is defined socially as an expression of the value of the ties that bind persons together. The value is thus communalistic and founded on the embodiment of sociality.

In colonial times this sphere of embodiment was extended to pockets of previous major enemies, via intermarriage and the alliance-seeking activities of big-men. Precolonial practices preserved their earlier meanings, stretched into a larger arena and supported by pacification and an influx of shell wealth. The Melpa remained in control of their own definitions of the value of a body, because shell wealth operated only within their own system, even if it came from outside or the supply of shells came from colonial sources. With the shift to money, accelerated around the time of Papua New Guinea's national independence, this local independence was eroded (Strathern and Stewart 1999). Shells were abandoned when the people's attention shifted to money as a scarce valuable, and at the same time people were drawn increasingly into activities that could secure for them a monetary income. Coffee grown on clan land gave that land a monetary dimension as well and thus gave a new meaning to old acts of destruction in warfare: enemies concentrated on slashing down coffee trees and hacking trade stores to pieces in addition to the earlier practice of burning down dwelling houses. Also with cash-cropping practices came a dynamic shift in gendered roles and status, as women were able to acquire wealth in ways not previously conceivable. Their earnings flowed readily into compensation payments. With the introduction of education, younger men and women entered the nexus of business and politics, funneling cash back into their home areas as a means of building political factions to secure election to positions in the introduced governmental system, an arena previously suppressed in colonial times.

Money became a dominant component in *moka* gifts between allies, but transactions in it between major enemies halted, along with the regrowth of political competition between them. Such political blocs became the basis for the major factions in the new political system. The colonial expansion of the precolonial system fell to pieces, revealing again the edges of identity and hostility along which the value of a body or person was nullified. Battles between major enemies in the latter half of the 1980s were deeply exacer-

bated by the introduction of guns, making it possible to kill many people and to do so without even knowing who they were. The consumption of alcohol led to heightened violent encounters. The scale of these killings made it difficult even to contemplate making compensation payments to cover them.

In addition, new layers were added to the arena of compensation payments at large. Members of language groups that previously had lived separately now dwelt side by side in resettlement areas laid aside for cash-cropping and available to land-short farmers within the wider region. Disputes and killings between these groups tended to escalate rapidly, bringing in large numbers of kinsfolk or coethnics on either side. Identities were "blown up," without the mechanisms to mediate between the parties (Strathern 1992). Claims for compensation were enlarged and the amounts demanded purely in cash, or with notional stipulations of numbers of pigs that could obviously not be met. Most significant, a pattern of killings of prominent businessmen and politicians began to make itself felt. In two cases that became widely publicized in the national media, leaders from the Enga language area west of Hagen were killed and the killings traced to gangs or hired assassins from the Hagen tribal groups. The amounts demanded for these deaths skyrocketed and were based on a kind of actuarial, future-based assessment of their individual worth, running into figures far beyond those collected for the settlement of interclan disputes in the past.

The inflated demands were at this point met by markedly deflated offers on the part of the Hageners (Melpa). Where millions were being demanded, only a few thousand kina (PNG currency) were collected. Where amorphous collectivities of coethnics faced each other and where the blame or responsibility for the killings could not unambiguously be attributed, it was impossible for compensation to retain its precolonial structure of meanings. The individual values of the bodies of the two prominent Engans were linked to an ethnic, not just a group, identity, replacing the old fusion of the big-man and his group with a new monetary-based equation. Such huge demands for payments were focused largely on men who had attained prominence in the introduced capitalist system, and the payments for their deaths thus became categories of payment in an indigenized capitalist nexus rather than in a capitalized indigenous nexus as before.

Even in contexts where businesspeople or politicians were not involved, the destruction of trust between groups was such that the form of payments altered. There was no possibility to create interpersonal networks between individuals as a means of underpinning and prolonging temporally the effects of wealth transfers. Instead groups nervously confronted one another, weapons at the ready, handed over payments en bloc while watching for treachery, and left rapidly. Needless to say, such events could not pro-

duce peace. To a great extent, the threat of assassination by hidden gunfire lay behind the collective fear and unease displayed on these occasions, and it enormously curtailed the effects of the indigenous oratory that was designed to form a bridge between groups and signal their consensus.

There was only one context preserved from this progressive degeneration of the compensation system: ally-payments made with pigs. In the first half of 1991, there occurred an amassing and disbursement of large numbers of well-grown pigs by the Kawelka to a diverse set of allies, all of whom had lost men in helping the Kawelka against their major enemies in the previous five years. The pigs were either home-reared or purchased with money. In this context traditional oratory and discourse prevailed. Pigs are not fully commoditized: their status as substitutes for human life remains intact because they have no place in the outside system other than as an occasional trading resource. The concept of "eating" and thereby achieving satisfaction in the replacement and sharing of substance applies to them. The compensation, accompanied by the slaughter of many of the pigs, their consumption, and their implicit dedication as sacrifices to ancestral ghosts and those of the recent dead, succeeded in creating harmony between those involved. But this event, hard as it was to organize and extremely expensive for the Kawelka, still fell far short of neutralizing the major axes of future violence, since the payments were made solely to allies, not to the major enemies with whom all scores remained unsettled. Rumors that killings of such enemies or by such enemies had been effected by sorcery and trickery or by assassinations in distant parts of Papua New Guinea kept alive the deep sense of enmity and suspicion in the region and guaranteed the possibility of further violence in the future.

From one perspective, then, no change has occurred. Major enemies remain major enemies, and there is a state of permanent hostility with them. But this picture has to be set against a background of kaleidoscopic changes in economy, government, and ritual. The processes were set in motion in colonial times. The commodification of land and wealth has sharpened oppositions between enemies, and the inflated "rates" of compensation have produced a breakdown in the flow of payments. Whereas the substitution of exchange for violence in the past was able to produce an aura of security, nowadays people feel much more vulnerable in their bodies, especially with the advent of guns. Violence has begun again to define the edges of identity, upsetting the substitution of wealth for killing and defining an expanded arena of killing in which some bodies once more become worthless, while others attain a factitious or cargoistically inflated value in monetary terms.

Individuation, Conscience, and Collective Contexts: Two Comparisons

The introduction of Christianity into our analysis prompts us to set our findings into a wider comparative framework, such as is provided by Hepworth and Turner in their general study of confession, deviance, and religion (1982). These authors examine the development and impact of ideas of conscience and confession from medieval times in the Catholic church in Europe, through the individuation of conscience and the sense of guilt in Protestantism, and thence to the place of notions regarding confession and therapy in psychoanalysis. They compare European witchcraft trials to confessions in other contexts, citing, for example, the remark made by I. M. Lewis that a public confession of tensions can help to "restore social harmony in a ceremony where the village shaman gives expression to the consensus of the local community" (Hepworth and Turner 1982:39, referring to Lewis 1971).

Hepworth and Turner are concerned with confession only in the sense of the admission of wrongdoing, or sin in the Christian religious context, and its place in bringing to a close processes of investigation, enabling counteraction to be instituted (e.g., incarceration, restitution, death) and marking social boundaries of inclusion and exclusion. The last of these functions is of particular interest here, although equally significant is the point that rituals of confession are supposed to lead to a reestablishment of the social order, as in the historical examples from Europe in which confessions of violence by "unruly knights" acted to constrain their violence, and confessions of sexual misdemeanors by female members of landed houses served to protect property interests. For Hagen confessions of forms of "theft" (of property or of sexual intercourse, for example) within the clan group served periodically to cleanse the group of suspicions of wrongdoing and generated the compensatory gifts and exchanges that were needed to restore group fertility. The *mi* was the very symbol of in-group morality in this regard. A voluntary statement of wrongdoing would thus announce that the confessor had transgressed social boundaries and wished to be readmitted within them. The mechanism for readmission was the payment of compensation accompanied by sacrifice to ancestral ghosts. (In the European context, in-group morality was also upheld, through either the rehabilitation or the stigmatization/extinction of the confessor.)

Confession in Hagen prior to the growing significance of Christian ideas thus reflected a collective context, but it also had an element that tied persons in an embodied fashion into that context, since it operated in tandem with ideas regarding sickness. Unconfessed, hidden wrongdoing leads to

sickness that cannot heal unless a confession is made: the concordance between body and society is exact, since social wrong leads to physical illness. Individual "guilt" leads to "self-punishment" in the body itself.

Formulating the Hagen ideas in this way makes it possible to see how such ideas can be subtly altered, as we have argued, to bridge the gap between indigenous and introduced notions of responsibility. However, it is necessary to recognize the specific elements that must come into play before confession of a "European" type can appear. Hepworth and Turner formulate these as a theory of individual guilt, a moral order against which individual sins are committed, a system of authority that can receive and absolve sins, and a variety of techniques to deal with confessions (1982:67). Notions of individuality and hierarchy are crucial here, and they operate differently from the relatively egalitarian and community-oriented ethos in the Hagen system, although the body in Hagen stood, as it were, both on the side of individuality and on the side of society.

There is another complication in the Hagen situation, since "confession," in the sense of "revelation"—making known what was hidden—could be used to point to another person as the wrongdoer and thus functioned as an accusation. Here the confessor placed himself or herself inside the social boundary and declared the other to have transgressed it. The catch is that in both cases "anger" worked the same way: it could cause sickness unless revealed. Virtue and self-interest thus conduced to making one's anger known. This context has been somewhat elided by the Christian "interpretive turn," leaving problematic the question of redress against wrongdoing. The Christian is not supposed to become *popokl,* since now *popokl* itself is seen as sin. This Hagen twist on Christian ideas gives the confession complex today its particular hybrid quality, since the rules of its contemporary discursive formation (in a Foucauldian sense as explicated by Hepworth and Turner [1982: chap. 4]) are an attempted conflation of different thought-worlds through the selective alteration of points where they intersect in the relationship of anger/frustration to the body.

Introduced Christian ideas have, then, been partially blended in with indigenous Hagen notions, but only by a form of matching that simultaneously transforms both elements. It is interesting to compare this production of a third form from two originals (a reproduction with difference) with what happens when we make a comparison between Hagen ideas and practices and those of the Komblo people on the North Wall of the Wahgi, eastern neighbors of the northern Melpa speakers, as described by Michael O'Hanlon (1989). O'Hanlon's exposition shows clearly that while, on the one hand, Melpa and Wahgi (Komblo) ideas show a core of shared ontological propositions, the application of these to political life is somewhat different

in the two cases. On the other hand, the comparison shows that dominant features of the Wahgi appear in muted or secondary form among Melpa. The Komblo are a former refugee group who were reestablished in their area with the help of allies. Understandably, they are much concerned about group solidarity, strength, historical viability, and possible threats to it. Like the Melpa they consider that hidden wrongdoing will cause misfortune unless and until it is revealed and made a part of public discussion. The Wahgi phrase for this is *yu ne penem kele,* "throwing the talk into the open" (O'Hanlon 1989:66, 127), equivalent to the Melpa *nemba mot ndui,* "saying to make evident/revealed." At this level Melpa and Wahgi ideas are identical. Both peoples also say that wrongdoing that results from anger within the group or produces such anger can cause harm to group members and their enterprises, as long as the wrongdoing is not revealed. This point is simply a specification of context for the first level of ideas. From this point onward, however, the idea systems show some divergence.

The Komblo do not appear to have the Melpa notion that anger can cause sickness to oneself, an assertion that Melpa apply equally to both sexes. Rather they stress the male sphere and the damaging consequences of anger between in-group males (O'Hanlon 1989:66, 149). Further, they are greatly exercised by the prospect of in-group betrayal, in which an angry man may give away secrets to an external group through a pathway of matrilateral kinship; this betrayal is held to result in misfortune, death, loss of fertility, and especially the loss of an ability to attract brides through epideictic displays of male finery and dancing in the *gol* pig-killing rituals. The process of betrayal may be preempted by a revelation of anger and presumably by attempts to redress its causes; but if the aggrieved person proceeds to the point of betrayal, it is described by the Wahgi as *kum,* "witchcraft," a striking usage that linguistically parallels the Hagen term for witchcraft but seems to have a markedly different emphasis. In Hagen *kum* refers to cannibalistic witchcraft, stereotypically perpetrated by women married into a group, and serves as an antisymbol of proper external exchange relations (Stewart and Strathern 1997a). *Kum* in Wahgi serves as an antisymbol of proper in-group solidarity. Highly complex rhetorical claims are made in Wahgi around this theme. O'Hanlon details a speech made by a Komblo leader of the Kekanem clan, Kinden, in which he revealed that he had made *kum* against a neighboring group with whom he was angry and had magically enabled his cross-cousins in another group to outshine the others by rubbing grease into their skins and inserting plumes of his own into their head-nets (note here the strongly embodied context of this "laying on of hands"—and plumes) (1989: 131). Later his cross-cousins ungratefully made boasts against his own group, the Kekanem, saying they were dying out for failure to attract

girls. Kinden then withdrew his hidden support and revealed the talk (ibid.:133).

Kinden's actions would not be described as *kum* in Hagen. However, the processes of switching allegiances in an interplay between matrilateral and agnatic allegiances are well known in Hagen, as they are in Wahgi. Nevertheless, the emphasis in Wahgi on the theme of betrayal seems to be overwhelming by comparison. The Wahgi *gol* celebrates in-group male solidarity and male power in attracting brides through dancing and decoration. Threats to such solidarity belong to the realm of politics and are the antithesis of "fertility." In Hagen, by contrast, the aim of achieving and expressing intergroup alliance by a multiplicity of *moka* exchange partnerships was added to the imperative of group solidarity.

Threats to exchange, symbolized in the image of consuming greed or *kum,* therefore were the focus of anxiety. It is not simply that individual financial capacities were involved (O'Hanlon 1989:130). There was a moral component as well, since the individual efforts to excel in exchange added up to a display of group status. For this reason, it is not surprising to note that in Hagen the same basic kinds of assessments of dance decorations and movements were made as in Wahgi: groups with dancers who moved awkwardly or had dull decorations were spoken of disparagingly as having internal troubles and as likely to lose a member of the group (*ti kawa ndomba,* "one will be cut down [die]"). Conversely, in Wahgi, a secondary discourse extolled the individual success of some dancers against others, as shown in the narrative by Kinden. The two cultural scenarios thus both contrast and complement each other in terms of dominant versus muted characteristics. And both stress the importance of revelation as a means of creating and altering the boundaries of social inclusion and exclusion, as Hepworth and Turner argue. This two-step comparison between Hagen ideas and Christian ideas, on the one hand, and Hagen and Wahgi ideas, on the other, indicates that quite significant transformations occur simply by the switching of one element or by its greater elaboration. Such an examination of cultural structures may help us to understand the processes whereby changes occur and how the universality of a theme such as confession is partnered by its local specificities.

Conclusion

We have followed the historical turns of practice in relation to confession and Christianity, on the one hand, and compensation and money, on the other. Both confession and compensation form part of the wider logic of settlement by reconciliation in Hagen. Confession may lead to compensation,

and compensation is itself an equivalent of confession, a revealing of the truth accompanied by a corrective action in relation to it. The body is the ultimate marker of the validity of both: failure to confess leads to sickness; failure to compensate leads to bodily revenge; and a proper compensation heals the body that has been wounded. Verbal and nonverbal, mental and corporeal acts go together and conduce toward the same totalization of action and being. Ultimately, both confession and compensation are about definitions of personhood. An insistence on confession makes the agency of the person the focus, and agency is underpinned by substance, so that if agency fails, substance linked to spiritual powers takes over (cf. Strathern 1996). Compensation practices recognize the substitutability of wealth for the person, and contemporary problems reveal the incipient commodification of the person-body complex resulting from the effects of monetization in the economy at large. Concomitantly, a change in the focus of confession from communal inquiry to a more private statement made to God indicates a similar change, at least within the religious realm, of the definition of personhood, toward a new kind of individuation.

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