

RECEIVED  
JUL 19 1965

JUL 19 1965

HAWAII HISTORICAL REVIEW

VOL. I, NO. 12

JULY, 1965

CONTENTS

OAHU'S ORDEAL: THE SMALLPOX EPIDEMIC OF  
1853 - PART I.....221  
Richard A. Greer

ANNOUNCEMENTS.....242  
THE QUEEN'S HOSPITAL HISTORY ROOM

\*  
+  
\*-0=+  
+  
\*

## OAHU'S OPDEAL--THE SMALLPOX EPIDEMIC OF 1853

## PART I

by

Richard A. Greer

In 1965 Honolulu faces the possibility of a smallpox epidemic; fewer than half of the adult population are immunized.<sup>1</sup> It sounds rather tame: "smallpox, infectious, contagious disease caused by a virus. Marked by red spots that form blisters and may leave scars (pocks). Attack usually gives permanent immunity."<sup>2</sup> But through the summer and fall of 1853, through weeks and months of agony, those red spots were the mark of death in Hawaii.

Certainly the islands were vulnerable--just how vulnerable became terribly clear. Indeed, it is wondrous that they escaped so long. There had been alarms, of course. On April 15, 1837, newspaper readers got a fright:

There is a rumour that the Small Pox has made its appearance in Honolulu. We wish not to rouse up unnecessary fears, but if this disease manifests its existence in our community, extreme caution and watchfulness, will be the only safeguard against its destructiveness.<sup>3</sup>

Actually, there was no safeguard. The Hawaiians' vaccination rate: zero. But the rumor was just that.

Nonetheless, government was concerned. On May 29, 1839, the king signed a quarantine law, inspired by the knowledge that smallpox had struck ships then sailing the Pacific, and that it lurked in American ports visited by vessels bound for Hawaii.<sup>4</sup>

All canoes and boats and all persons not authorized by the board of health were forbidden to visit any foreign ship until it had been examined by a health officer or one of the board of health and pronounced clean. The penalty for violation was a \$40 fine, half to the government and half to the informer.

All vessels having or having had smallpox or any other contagious disease aboard within four months were denied anchorage at any port or roadstead until visited by a health officer or one of the board of health. A shipmaster allowing any contagious person or article to land could be fined as much as \$1,000 or imprisoned for a year.

Vessels having had contagious disease aboard would be at the board of health's direction for not more than 42 days. In quarantine, the vessel should fly a yellow flag at the main top. Anyone going aboard would be fined \$40 and be at the board of health's disposal for not more than 42 days.

It was made the duty of the several island governors to name a board of health for each and every harbor. These boards were authorized to make all necessary regulations. The governors were to appoint health officers to examine all suspected vessels. The vessels' masters would pay \$5 to the health officers.<sup>5</sup>

Hawaii had a narrow escape in the summer of 1841. Smallpox broke out on the Don Quixote, bound from Valparaiso to Honolulu, via Tahiti. The disease got ashore at Tahiti, with drastic results. But by the time the Don Quixote reached Honolulu, she was clean.<sup>6</sup>

Early in October of the same year the U.S.S. Yorktown called at Honolulu. It was another near thing, apparently. The Yorktown's own doctor declared his ship

safe, in these terms:

I wish to report that we have no such disease as smallpox on the war-ship Yorktown, now in this harbor, since the 28th day of August, 1841.

There were a few mild cases similar to small-pox that broke out since that date but we have no such cases now, and in my opinion and knowledge, you should have no fear if we go ashore.<sup>7</sup>

Meanwhile, special attention went to vessels from Tahiti as Hawaiian officials tried to prevent contamination.<sup>8</sup> And another quarantine law took effect in 1842.<sup>9</sup> Among other things, it provided that anyone leaving a quarantined vessel could be fired upon, and that one who knowingly brought a contagious disease ashore would be hanged as a murderer.

How effective were such laws? R.C. Wyllie, a physician who was from 1845 to 1865 foreign minister of the kingdom, in 1844 called them "...nearly impracticable." His views were given in a collection of "Notes on the Shipping, Trade, Agriculture, Climate, Diseases, Religious Institutions, Civil and Social Condition, Mercantile and Financial Policy of the Sandwich or Hawaiian Islands."<sup>10</sup> Note 106 recalled that the minutes of the 1839 missionaries' meeting held eight worthy resolutions on the subject of smallpox; one of these was "...to forestall the ravages of the Small Pox, by encouraging vaccination throughout the Islands."<sup>11</sup> Note 107 recommended immediate government attention to vaccination; Wyllie urged that a vaccination office be opened without delay in all seaports and at all missionary stations, and that vaccination be required. He suggested a small fine against parents who could not show vaccination certificates for their children.

The government had nothing to gain by abandoning quarantine laws, of course. A new statute appeared in the 1845-1846 acts.<sup>12</sup>

But the need for vaccination remained. In September, 1852, the Polynesian stated its belief that there had been no vaccine matter in the kingdom for several years, and that all young people and many adults were unprotected.<sup>13</sup> Smallpox existed in the Pacific and in ports such as Hong Kong; it could come in at any time, and would be deadly to the Hawaiians. The newspaper called for action. Was this not the government's duty?

A week later came the announcement that Drs. Hoffmann and Hardy had ordered vaccine from Boston, while Drs. Lathrop, Ford, Hillebrand and Newcomb had sent orders to the U.S. and to Manila.<sup>14</sup> On Christmas Day the public learned that the clipper Eureka had landed fresh vaccine from Boston via Panama. The vaccine, "...known to be pure and healthy", was consigned to Hardy and Hoffmann; parents of unvaccinated children could now protect them.<sup>15</sup>

Wise indeed were those who acted then. On February 10, 1853, Luther Severance, U.S. Commissioner in Hawaii, wrote disturbing news to the Secretary of State. That very day an American ship, the Charles Mallory, had arrived from California with a case of smallpox aboard.<sup>16</sup> She came off port with a yellow flag flying from her foremast. The pilot, finding disease, left the ship outside and came back to report to the board of health. Dr. S.P. Ford then went out and saw the cook or steward down with a clear case. His report raised alarm in town "...because of the peculiar liability of Hawaiians to the disease."<sup>17</sup> Some who had seen the terrible ravages of measles and whooping cough believed scarce a remnant would survive the deadlier smallpox.

A consultation of physicians decided that vaccinated passengers and the mail bags should land, after bags and baggage had been fumigated. The Charles Mallory got orders to anchor off Waikiki; on February 11, all six passengers (all vaccinated) came ashore. They took salt-water baths, had an entire change of clothes, and went into quarantine for two weeks at today's Kapiolani Park. The mail,

fumigated, was re-sacked, and the old bag destroyed. The Polynesian attacked these measures as too lax; it insisted that both ship and passengers should have been quarantined until the smallpox disappeared.

Dr. Edward Hoffmann took charge of the group at the park. The sick man was brought to Honolulu, but there was no good place to keep him. He was lodged at last in a grass house on a reef island surrounded by water at high tide--quarters offered by Prince Lot Kamehameha. This was the islet called Kahakaaulana; the name applied to a narrow place in the Kalihi harbor inlet where early-day travellers used to swim across to Kalaekao or Puuloa to avoid taking the long detour by way of Moanalua. Here the smallpox victim lived for five weeks.<sup>18</sup> At once the problem of a nurse arose; no one wanted such employment. The invalid spent most of the first five days alone. Then a member of the board of health went out every morning to prepare food for the day, until the sick man could care for himself.

The Charles Mallory was quarantined for 14 days, thoroughly fumigated, and brought into port. All clothing and bedding in the forecabin were burned. The ship then loaded with oil and took on the convalescent, whose grass house was also put to the torch. The government had no funds to pay quarantine expenses; W.C. Parke, marshal of the kingdom, advanced \$1,500 of his own (he was later repaid). On March 31 the Charles Mallory cleared for New London, Connecticut.<sup>19</sup>

Dr. Ford's report of smallpox on February 10 threw Honolulu into a furor. For three days doctors consulted: on the tenth Drs. T.C.B. Pooke, W. Newcomb, G.A. Lathrop, S.P. Ford, B.F. Hardy, and E. Hoffmann; on the eleventh Drs. G.P. Judd, R.W. Wood, Pooke, Hoffmann, Ford, Lathrop, W. Hillebrand, Hardy, and R.C. Wyllie; and on the twelfth Drs. Ford, Hillebrand, Hoffmann, Lathrop, Wyllie, and Judd, together with Mr. E.H. Allen, U.S. Consul.<sup>20</sup>

On February 14 the privy council resolved that Judd should be appointed a committee of one to confer with Honolulu physicians and to report on: (1) the best way to keep smallpox out, and (2) the best way to fight it if it appeared.<sup>21</sup>

The doctors made their recommendations--doubtless already worked out--and these went to the privy council the next day, February 15.<sup>22</sup> The medics advised a strict quarantine of all ships and passengers arriving with smallpox, and urged that people be vaccinated as fast as possible.<sup>23</sup> The council offered thanks, then pointed out that it could not guarantee to bear any great expense. It therefore invited the services of those willing to donate them--whether missionaries, physicians, or others--throughout the islands; they would work under the minister of public instruction. It also asked doctors to furnish "genuine vaccine virus" to that minister. The council picked Judd to report on the location of a pest house and a quarantine ground.<sup>24</sup>

The Polynesian again called for stricter measures than those taken against the Charles Mallory and urged immediate vaccination. Smallpox would nearly depopulate the islands and would drive whale ships away, crippling the economy for years to come.<sup>25</sup> The Weekly Argus maintained that it would be too expensive to send doctors into outlying districts, and advocated the government's sending vaccine to missionaries, together with a royal proclamation ordering immunization. In this emergency, said the paper, the missionaries should be held to their professions. Already vaccine was available in Honolulu, since there had been several successful vaccinations.<sup>26</sup>

Concerning the pest house, Judd reported on February 19 that he had visited places within a five-mile radius of the royal palace. He favored a lot in Waikiki, about three miles away, known as the Bowling Alley Lot. This had been bought by the government in 1845 from Andrew Auld for \$555, and later enclosed with a low fence; the area was eight or ten acres. The low fence was mostly gone, and the bowling alley house had fallen. But the site was dry and cool, served by a good road,

accessible from the sea, and had a nice grove of hau trees for shade, and a well. The bureau of internal improvements estimated that a stone house, 45x20 feet, with two partitions, allowing for three rooms, three doors, and three windows with blinds, would cost \$1,000. A cook house would cost \$100, and a board fence \$2,250.<sup>27</sup>

The government owned another lot of about two acres, seaward of the Stone Church (Kawaiahao), already enclosed with a board fence. On this ground stood a wooden shed some 100x30 feet. An upper story without glass windows or an overhead ceiling ran the whole length; the shed had half doors and one partition. It could house 200 or more. The only objection to this site was its nearness to Honolulu. Quarantine could be enforced, though, by armed guards who could shoot anybody going in or out.<sup>28</sup>

Kahakaaulana was not considered a good choice. It was isolated, dry, and airy, but it was hard to reach and owned by Hawaiians, 36 of whom would be deprived of shelter and of a favorite fishing ground.<sup>29</sup>

Early in March Richard Armstrong, the minister of public instruction, announced that he had got vaccine matter and distributed it to a good extent; vaccination was going on among the islands.<sup>30</sup> At about the same time the Polynesian remarked that both foreigners and Hawaiians were making much use of vaccine; it concluded: "With this and other precautions we trust we shall hear no more of a disease which justly excited considerable alarm when it was first announced among us."<sup>31</sup>

And Honolulu returned to its off-season calm. There was no stir when the American brig Zoe arrived on March 23 or when she left, two weeks later.<sup>32</sup> By the end of April the harbor was emptier than it had been for eight months; only four whalers and two foreign brigs were in. Six months before, 200 sail of vessels had crowded the waterfront.<sup>33</sup>

But a nightmare shattered the springtime nap. On Friday, May 13, a man came to Marshal Parke's office; he told of two Hawaiians sick at Maunakea Street. Parke went--and found smallpox.<sup>34</sup> The news was hurried to the board of health.<sup>35</sup> Drs. Lathrop and Hoffmann examined the patients, a woman and a girl (both of whom recovered), and Lathrop took the case. Another girl had had the disease earlier, but was convalescent; it was from her that two got smallpox.<sup>36</sup> About four weeks before the two Maunakea Street victims were discovered, a girl living in the same yard as Kinikake, Dr. Lathrop's clerk, had applied to him for medicine. She had a light eruption on her face and arms and complained of head and back pains and a dry throat. Kinikake, who had never seen smallpox, suspected only a skin condition. He gave the girl purgatives and an astringent gargle, and in ten days she was well.<sup>37</sup>

On Wednesday, May 11, Kinikake hired quarters in premises occupied by John Langherne Desha on Maunakea Street. He moved in on Thursday, and early Friday morning discovered what he thought to be smallpox. He reported it, and in less than two hours the yard was under tabu.<sup>38</sup> The spot where the smallpox appeared was in the enclosure of one Kaaione.<sup>39</sup> And so began ka wa hepela--the smallpox time--as the ma'i pu'upu'uli'ili'i struck.<sup>40</sup>

When the disease was identified, the street was fenced up--or roped off--and guarded, the infected were separated, and grass houses and clothing burned.<sup>41</sup> One of the guards at Desha's place was Officer W.F. Jordan; he had watched the quarantined passengers in Waikiki during the Charles Mallory affair. Jordan himself came down with varioloid--a mild form of smallpox suffered by those who have been vaccinated or have had the disease before.<sup>42</sup>

At this time of crisis, the Polynesian advised people to avoid the stricken area, keep quiet, and not get into a panic.<sup>43</sup> On Sunday, May 15, pastor Richard Armstrong told his Hawaiian congregation at Kawaiahao to report themselves as soon as they showed symptoms of the sickness. But his son Sam had doubts: "They are so slack," he wrote, "that they will probably not care much for advice."<sup>44</sup>

Where had the smallpox come from? It was a much-argued question.

1. Had it come from the Charles Mallory? Thrum, who was in Honolulu during the epidemic, wrote that general public opinion laid the blame here.<sup>45</sup> But Parke said the vessel could not have been guilty, since "some months" had passed between the Charles Mallory's sailing and the outbreak of smallpox.<sup>46</sup> The Polynesian at first accepted the possibility that the ship was responsible, but later adopted another explanation.<sup>47</sup> "Several physicians" practicing in Honolulu at the time were reported as denying that the charge against the Charles Mallory could be true.<sup>48</sup> Kuykendall likewise ruled out the ship.<sup>49</sup> But Kinikake said that the girl he treated (in April, apparently) afterward told him that her sister in Waikiki had had the same sickness, only much worse, being covered from head to foot. The sister had recovered before Kinikake's informant took sick. The sister made leis for sale in Honolulu, which while she was sick her father brought to town. One lei was always given to Kinikake's girl patient. The father confirmed this; he wanted to take the Maunakea Street victims to Waikiki, saying that he had cured his daughter and could cure them. Kinikake said that he could refer to several Hawaiians and foreigners who knew of these things.<sup>50</sup> But a challenger wrote that from the beginning Waikikians had blamed the smallpox on Honolulu, and that the first case was seen in Waikiki early in June in a visitor from the town.<sup>51</sup>

2. Had it come from the Zoe? The Polynesian finally decided that the smallpox entered in the 100 chests of old clothing brought down from San Francisco by the Zoe and sold at auction in Honolulu, or was carried in by someone from a passenger ship that touched on her way to Australia, where the disease was introduced from California.<sup>52</sup> Dr. Judd's wife, conceding a mystery, wrote that the scourge was supposed to have come in the trunks of old clothes, and that the first sufferers were two women who had washed some of the garments.<sup>53</sup> Severance reported in June that the first case was that of a washerwoman who had washed clothes brought from California.<sup>54</sup> But Parke in his reminiscences denied the Zoe's responsibility, saying that the old clothing had come in "some months" before the first case of smallpox appeared.<sup>55</sup>

3. Had it come from some other carrier? Again in his reminiscences, Parke told this story: The captain of a merchant ship from San Francisco gave his clothes to be washed by the two women discovered ill on May 13. Only a week before the captain left San Francisco, the occupant of the room next to his died of smallpox. The room partition was of brown cloth, and the captain's clothes had hung against it.<sup>56</sup> During the epidemic, however, the marshal admitted that he did not know the means of infection; he did say he believed the culprit to be a sailor from California who had been living there with people who had smallpox. The sailor was known to have had coitus with a woman in Kaione's yard.<sup>57</sup>

The real source will never be identified. But these facts are pertinent: (1) the visits of the Charles Mallory and the Zoe overlapped; the former was in Hawaii from February 10 to March 31, the latter from March 23 to April 7; (2) how effective quarantine and fumigation of the Charles Mallory were is open to question; (3) apparently there was a case in April on Maunakea Street, and quite possibly one in Waikiki even earlier; (4) the possibility of a personal carrier from the Charles Mallory, the Zoe, or another vessel cannot be dismissed. The smallpox victim aboard the Charles Mallory spent two days in Honolulu just before the ship sailed.<sup>58</sup> The only conclusion offered here is that the Charles Mallory cannot be eliminated as a suspect.

Whatever the cause, Honolulu faced the menace of a deadly epidemic. On that black Friday night, R.C. Wyllie drafted an emergency act for the public health at Rosebank, his Nuuanu home.<sup>59</sup> On Saturday he introduced it into the house of nobles and sent a copy to the house of representatives. His explanation: Although he did

not want to supersede an act prepared by A.B. Bates for the representatives, he did want the best act, "...with whomsoever it may originate."<sup>60</sup>

On Monday, May 16, Kamehameha III approved "An Act Relating to the Public Health." It provided: (1) that the king with the consent of the privy council should appoint a commission of three people to act without pay; upon them should rest the duties intended and expressed in the act of May 8, 1851, setting up a board of health for the entire kingdom; (2) that the commissioners should have authority to supply medical attention, food, lodging and clothing at government expense to those sick with smallpox, and to make and publish such public health regulations as they deemed wise, and to enforce these by fines or otherwise through the courts; (3) that a majority of the commissioners could draw from the public treasury needed funds; the minister of finance was authorized to pay the commissioners' drafts from any money belonging to the government, if such drafts were accompanied by accounts showing objects; (4) that the captain of a ship should be responsible for paying for the care of sick people brought into the kingdom; such a vessel would not be cleared until payment had been made.<sup>61</sup> The privy council met on the day the law was approved. Wyllie asked if something could not be done to prevent the spread of the smallpox, and offered suggestions. The council then recommended for the health commission G.P. Judd, T.C.B. Rooke and W.C. Parke. Judd accepted then and there, reserving the right to resign if he felt it his duty.<sup>62</sup>

Judd went to work the same afternoon. He drafted a note delivered to Honolulu doctors:

Dear Sir:

If the Bearer finds you disengaged please come direct to my Office for a few moments consultation, in relation to Small Pox etc. etc.

Yours truly

G.P. Judd

Honolulu Hale

3 o'clock 16 May

P.S. I will wait until 4--<sup>63</sup>

On May 21 the Polynesian was able to report considerable activity. The commissioners had met, choosing Rooke chairman and J. Hardy secretary. A hospital had been established and ordered fitted up at once. Notices had been issued and widely circulated. The minister of public instruction had been authorized to take every necessary step for general vaccination. Measures had been taken to prevent the spread of disease by ship, and directions given to all pilots and boarding officers. And sub-commissioners had been appointed throughout the islands. Meanwhile, no new cases had appeared in Honolulu, and those existing were coming along well. Guarded optimism was the note.

The sub-commissioners were:

Kauai - J.F.B. Marshall, E.P. Bond, and J.W. Smith, M.D.

Maui - P.H. Treadway, J.R. Dow, M.D., and D. Baldwin, M.D.

Hawaii -

Hilo and Puna - B. Pitman, J.H. Coney, and C.H. Wetmore, M.D.

Kau - the Rev. H. Kinney

North and South Kona - P. Cummins, J. Fuller, and the Rev. J.D. Paris

Waimea and Kawaihae - Dr. Nicholl, Mr. Humphries, and Mr. Macey

Their commissions read thus:

Honolulu, May 20th, 1853

Sir:

You are appointed a commissioner to act with \_\_\_\_\_ and \_\_\_\_\_ for \_\_\_\_\_ under the Royal Commissioners of Public Health agreeably with an Act passed the Legislature 16th May instant.

TO:

Your obedient Servant

J. Hardy

Sec. to the R.C. of P.H.

Now the smallpox began to eat its way, slowly at first, through the city. Mrs. Armstrong was writing a long serial letter to her "very dear son"--one of those in which things are jotted down from day to day as time allows. May 28: There have been eight cases of smallpox...a man died two days since...the board of health is active and prompt...vaccination is going on... is the only one in our family vaccinated with effect, though all have had it done repeatedly...we employ Dr. Hardy...June 1: The smallpox is increasing...we fear death will make sad havoc... "You may hear that some of us, have been hurried into eternity. May no one be called unprepared."<sup>64</sup>

By June 1, eight cases and two deaths had been reported--the deaths coming, according to the Weekly Argus, "...not as much from the virulence of the disease as ...the carelessness of the sick previous to their admission to the hospital." Vaccination was popular; crowds besieged the drug stores daily for vaccine.<sup>65</sup>

The commissioners' second weekly report, printed in the Polynesian on June 4, showed nine cases admitted to the hospital during the week and one death. Smallpox had broken out aboard the schooner Kino'ole during a passage to Lahaina; she returned to Honolulu at once. The commissioners resolved that no one not vaccinated could leave Oahu in coasting vessels. All reported cases had been traced to the spot where the disease first appeared. Fear of widespread pestilence grew; already the smallpox had erupted in a remote part of Ewa. The familiar voice of the kuahaua --town crier--relayed the orders of the R.C.P.H. Near Maunakea Street a little old man with big lungs trudged along. At corners and in the middle of blocks he shouted "E Ho'olohe"--"O Listen"--and gave his messages.<sup>66</sup>

On June 6, Judd told the privy council that the sickness was spreading fast. "The people would not be confined," he said, "and would not regard anything said to them."<sup>67</sup> And two days later Carrie Beckwith wrote to her brother: "...measures have been taken to vaccinate them [the Hawaiian population] but it is almost useless they are so careless--and frightened....There is little fear for the white population as they have different habits of life--though we are all liable to it--all have availed themselves of the vaccination."<sup>68</sup> Meanwhile a doleful clamor--a "piteous, dismal wail"--arose wherever the bereaved mourned their loss, and spread through the town as the smallpox clutched new victims.<sup>69</sup>

At an emergency meeting of the privy council on June 9, Armstrong introduced a resolution advising the king to order June 14 a day of "...humiliation, fasting and prayer, that the Almighty may remove from among us the small pox now spreading everywhere." He also proposed a proclamation, which was approved.<sup>70</sup> The actual call, issued to all pastors of churches and Christian people on Oahu, set Wednesday, June 15, as the day; other islands were to observe the proclamation at their earliest convenience.<sup>71</sup>

The Weekly Argus found all this unworthy: Preaching up national calamities as divine judgment to a people such as the Hawaiians was of doubtful morality, since it tended to confirm a fatalism to which the people were already too prone. Short-comings should not be excused by assigning a natural result to a supernatural cause.<sup>72</sup>

On June 11 the commissioners noted 45 new cases during the past week. By this time the smallpox was scattered over every quarter of Honolulu, Manoa, Palolo, Leiahi, Nu'uuanu, Kailua, Kalihi, and Ewa.<sup>73</sup> A week later the same source listed a total of 114 cases since the smallpox's first appearance, and 41 deaths. For the period June 11-18, 48 new cases and 24 deaths were reported.<sup>74</sup>



By the middle of June, burials were becoming a problem. Dr. William Hillebrand called attention to the Hawaiians' habit of burying inside their houses or in the immediate vicinity; he wrote of a case in which the bodies of a man and a child were thrown together in a low pit under the very mats where a number of people slept. Hillebrand proposed that the commissioners should inter the poor; he urged them to inspect a place where twelve had died and nine were laid up, all in one yard. This spot the doctor pinpointed as the most likely fount of infection in Honolulu, and the site which most needed sanitation.<sup>75</sup>

As the smallpox leaped out of control, E.W. Clark of the American mission reported a fear that people would be swept away in terrible numbers. He estimated a mortality rate of two-thirds among the sick, predicting that such a toll would cut Hawaii's ability to support religious institutions.<sup>76</sup>

The Polynesian, however, maintained that the mortality rate was falling, although the smallpox was running fast through and around Honolulu. From June 18 to June 24, 298 new cases and 38 deaths were reported.<sup>77</sup> While the smallpox plagued the Hawaiians, foreigners suffered a wave of "Maui fever"--a modified type of "Panama fever", whatever that was. Newcomers were especially susceptible; the prognosis was distressing but seldom fatal.<sup>78</sup>

In these exhausting times tempers sometimes flared. Three doctors especially had clashes with the health commission or its members: Newcomb, Hillebrand, and Lathrop. And eventually all three signed a petition to fire G.P. Judd from his government post.

One June day Dr. Wesley Newcomb came into Judd's office and asked him why Judd had put Newcomb's son-in-law, Dr. Hillebrand, in the fort. Apparently some constables, not Judd, had arrested Hillebrand because he wanted to go where the smallpox was raging, in defiance of law. And apparently, too, Hillebrand had not really been thrown in jail. Judd told Newcomb to cool off, to which Newcomb replied that he would do as he liked. Then Judd ordered Newcomb out, demanding an apology. "Dr. said he would not give it," wrote young C.H. Judd in a letter, "and would kick his Ass for him the next time he met him."<sup>79</sup> The letter continued:

If you were here, your heart would bleed. The small pox is raging terribly among [sic] this poor people. Yesterday there were one hundred and eleven new cases--and the number keeps increasing daily.

The yellow flag [the sign of an infected house] attracts your notice on all sides, and where the natives seem to be the most wicked, in the lower parts of the town, there is the greatest ravage and death. It seems as if God is answering the prayers of his people to 'revive his world in this place', by sending his judgement [sic] on us.

Wm. French is not expected to live, and Mr. Simons--the cross-eyed man with yellow hair--and Mr. Turner have it.

Surely this nation in a few years will have passed away. This will probably carry off one third of them.

What can we do to save this dying people? Is there nothing to save them? No! So be it.

A few days later Dr. Hardy brought charges against Newcomb. Six Hawaiians--three of them living in huts near the water and behind John Ii's--told Hardy that Newcomb had been their physician but had deserted them four days previously. Two of the sufferers were dying, and one was in bad condition. Hardy's question: "Is such desertion becoming a loud professor of Christianity?!"<sup>80</sup>

Luther Severance, the U.S. Commissioner, had other troubles to report. On June 19 the U.S. sloop of war Portsmouth arrived in Honolulu. Her captain wanted to give the men a few days ashore, but finding the smallpox raging, he sailed the

next day for Lahaina, where the disease had not yet shown itself. Then on July 1 the U.S. frigate St. Lawrence came. Learning the bad news from the port pilot, she too made sail for Lahaina without dropping anchor or communicating with either Severance or U.S. Consul E.H. Allen.<sup>81</sup>

The same afternoon three Latter Day Saints called on Severance for redress. They represented themselves as American citizens doing all they could to relieve suffering Hawaiians. But they had been kicked and cuffed by a white man acting, as they believed, under the orders of Marshal Parke. The three had been anointing a woman with oil and expelling disease by the laying on of hands; their ministrations were interrupted by one Charley Turner, an Englishman, who laid both hands and feet on the Saints. Severance referred them to the police court, and wrote that the Mormons were charged with doing much mischief by persuading Hawaiians to avoid regular physicians on the ground that the doctors used poisonous drugs. Turner, incidentally, was later fined \$12.00.<sup>82</sup>

Public subscription raised money to feed and nurse the sick, who were in desperate need of help. General opinion had it that the numbers of cases and deaths far exceeded those reported weekly by the R.C.P.H. Many sick people hid in the mountains to escape the police. Bodies were found unburied and partly eaten by dogs and hogs. Other corpses went to the grave without coffins; they were so lightly covered that animals rooted and scratched them up. Hogs, and especially dogs, roamed in and out of Hawaiian grass houses and prowled everywhere. Many said they were chief spreaders of the smallpox. Doctors reported incredible misery everywhere.<sup>83</sup> And as June waned so did any lingering hope that the epidemic would stay its course.

By early July the market was beginning to be deserted. Everyone was afraid to come to Honolulu. Beef was disappearing, but very few would touch fresh pork. Doctors advised against eating chicken bought from Hawaiians. Fresh fish and vegetables were both scarce and costly, and both were eaten in fear.<sup>84</sup> Business was dull; there were few or no vessels in port. Many of the Hawaiians on whom retail trade depended were either sick or without money. The well fled stricken Honolulu; nearly 1,000 people had sailed for various windward ports by July 2.<sup>85</sup> Some went farther; Severance, for example, sent his son and daughter to San Francisco.<sup>86</sup>

As the crisis deepened, the Weekly Argus spewed bitter comments: Wyllie's recommendations of 1844 had never been carried out, all being left to Providence or accident. Marshal Parke, the sheriff, and the doctors gave service without exception, going anywhere they could day or night with advice, medicine, and cheering words, but without pay or hope of any. The police cheerfully gave food and attention, and buried the dead. All these were better than the gentlemen who had passed the resolutions of 1839 but failed to act. And what was the government doing? It had not even acknowledged the services of those laboring to stem the epidemic.<sup>87</sup>

The government was having its troubles, too. A legislator had quit the city in panic. His going destroyed a majority of one in the lower house on the property tax question; the bill was not brought forward.<sup>88</sup> Nor was Parke without his detractors. Dr. Newcomb, reporting a death resulting, as he said, from a cold bath taken in violation of orders, wrote that a Hawaiian boy had told him that the marshal had used his influence to have patients discharge Newcomb and employ other doctors. Newcomb's question: Had the R.C.P.H. recommended this action to Parke?<sup>89</sup>

But the Polynesian saw a silver lining: Smallpox mortality would be heavy, no doubt, but at Tahiti the same disease had left survivors healthier than ever. Such seemed likely to be the case in Hawaii, with a resulting future growth in population.<sup>90</sup>

The week ending July 1 saw 338 new cases on Oahu, and 189 deaths.<sup>91</sup> Many had died of sheer neglect or total abandonment by friends and relatives, though there were instances of families clinging to each other devotedly until the scourge had

passed.<sup>92</sup> Despite the frightful toll, physicians maintained that the smallpox assumed a mild form that could be controlled when patients followed directions.<sup>93</sup>

By the middle of July deaths in Honolulu proper were decreasing; the sickness, however, was extending into the surrounding countryside and up the valleys. Such cases, reported as occurring in Honolulu, did not reflect the decline of disease within the town.<sup>94</sup> The Polynesian, spurred perhaps by the Weekly Argus, had given credit to those battling the epidemic, also urging those who had recovered to help the destitute victims scattered thickly all through the community. And it predicted that in a few weeks the disease would have run its course, when nearly all likely to catch smallpox would have done so.<sup>95</sup>

This cheerful forecast came on July 2. The succeeding fortnight brought a stunning harvest of death and suffering. Honolulu's foreign residents, dismayed, called a public meeting at the court house on July 18. In the chair: Dr. Wesley Newcomb. The meeting set up a committee of three, which in turn selected a larger committee of twelve (plus all Honolulu physicians ex officio) to draw up a report of recommendations. Members of this larger committee were: W.C. Parke, W.L. Lee, S.N. Castle, R. Coady, C.R. Bishop, D.P. Penhallow, C.C. Harris, E.O. Hall, J.R. Mitchell, T. Spencer, F.W. Thompson, and A.B. Bates.<sup>96</sup>

A second meeting on the nineteenth heard and adopted their report: (1) the R.C.P.H. should get a suitable number of houses in Waikiki and on the Ewa side of Honolulu (not less than two miles from the public market) for public hospitals; (2) they should set up a proper vaccine establishment in Honolulu to get and distribute good vaccine and to vaccinate free of charge all who presented themselves; the establishment should be under the care of a doctor, with the commissioners adopting measures to compel the attendance of every unvaccinated Hawaiian; (3) they should divide Honolulu and its environs into at least 20 districts, and call for volunteers to visit each district daily and report the number of sick; (4) they should get, if possible, suitable vehicles to carry the dead to the burying-ground and the sick to hospital, and an efficient corps to bury the dead; (5) they should get interpreters to accompany doctors; (6) they should destroy such grass houses in Honolulu and its vicinity as might be absolutely necessary, and as requested in writing by any three physicians; all houses and other property to be destroyed should be appraised and the owners paid a fair value; (7) they should continue their efforts to kill and bury the dogs of Honolulu and vicinity. All committee members signed the report; so did Drs. Hoffmann, Hillebrand, Newcomb, and Ford.<sup>97</sup>

On July 20 the R.C.P.H. got the recommendations, and on the morning of July 21 considered them, with the purpose of carrying them out insofar as practicable.<sup>98</sup> It was a significant date. The recommendations shaped the fight against smallpox after the third week of July.

The main line of battle was in the houses and huts of the stricken. Doctors available could not carry the load; many sufferers were never attended by any physician. Medical men said frankly that they could not increase their patients' number without neglecting cases already undertaken.<sup>99</sup> Dr. G.A. Lathrop, for example, reported 568 under his care during July.<sup>100</sup> It was not unusual to find whole families sick, or even to discover only dead bodies in a house.<sup>101</sup> Drs. Rooke, Newcomb and Lathrop worked in western parts of Honolulu, while Drs. Ford, Hoffmann, and Hardy served other divisions. The latter three also headed special hospitals (usually called pest-houses) in or near the city.<sup>102</sup>

Acting on the advice of the foreign residents, the R.C.P.H. at once divided Honolulu into 20 districts; on July 23 the Polynesian called for volunteers to take charge of visiting and inspecting them. And those with carriages or other vehicles for sale were to contact Marshal Parke. He needed wheels to cart the sick to hospital. Volunteers came forward, but not enough; the Polynesian on July 30 sounded

another call. Districts 16, 18, 19 and 20 were still without inspectors.

This was a job for strong men. Their signatures on their district reports identify them:<sup>103</sup>

1 R.W. Holt	8 Geo. McLean	15 J.H. Wood
2 P.R. Mitchell	9 W.L. Lee	(later C.H. Lewers)
3 O.H. Gulick	(later J.W. Marsh)	16 -----
4 A.K. Clark	10 W.G. Davis	17 C.C. Harris
5&12 Geo. Williams	11 J. Bartlett	18 -----
6 Thos. Spencer	13 -----	19 -----
7 C.R. Bishop	14 S.C. Damon	20 -----

Hard work and frustration were the order of the summer. District No. 9, along both sides of School Street, furnishes examples. W.L. Lee, chief justice of the kingdom, reporting:

July 30 - a grass house in the district should be destroyed, two persons having died in it. The house is filthy; perhaps it could be fumigated.<sup>104</sup>

July 31 - Lee sees no hope of getting rid of smallpox in his district for three months. Different members of the several households are taken down so gradually that disease must linger for a long time.<sup>105</sup>

August 1 - whole number of cases to date, 70; whole number of deaths, 20.<sup>106</sup>

August 2 - two more cases and another death.<sup>107</sup>

August 3 - nine new cases and another death. Lee has tried to persuade several of the new cases to go to the hospital, but they won't listen. Only one man, Kaili, will go; he should be removed today.<sup>108</sup>

J.W. Marsh took over the upper portion, mauka of School Street, on August 4. From then until September 30, inclusive, there were 46 cases, 20 deaths, 21 recoveries, and 5 cases moved away and unheard of.<sup>109</sup>

On August 9, Lee reported a total of 95 cases and 30 deaths for the makai part. Marsh's reports for this area south of School Street covered from August 12 to September 30. Here there were 55 cases, 30 deaths, and 25 recoveries.<sup>110</sup> Total figures of Lee and Marsh list 277 cases and 102 deaths, or a mortality rate of nearly 37 per cent.

The mortality rate among Honolulu's dogs was perhaps even more drastic. At the same time it set up the district system, the R.C.P.H. authorized police to kill dogs in and about the town whenever the officers thought the wandering animals might be spreading smallpox.<sup>111</sup>

Many foreigners besides the doctors were constantly busy attending the sick and vaccinating, working without hope of pay.<sup>112</sup> The Rev. Lowell Smith and his family lived near where the smallpox began. For three or four months they spent most of their time caring for the sick--preparing gallons of food daily, carrying or sending it to the sufferers, and sometimes putting it into their mouths. Others did the same; even so, there was much unrelieved misery. The Smiths early lost all dread of the disease, although some 375 members of their congregation died from it. Nine-year-old Emma Smith helped to keep the fire going and ladled soup through the window.<sup>113</sup>

Marshal Parke's men did valiant service, especially in those parts of town--such as the Black Sea and Cow Bay--where great numbers sickened. H.S. Swinton and George Graham delivered food and medicine, had the ill taken to hospitals, and supervised burials. They carried food and supplies around the city, starting about eight in the morning with a wheelbarrow or two loaded with provisions and medicines. At noon they quit for "dinner", then recommenced their rounds. Sometimes they went out again after "supper", on occasion staying at it until midnight or later. This job had to be done; strict orders forbade the sick to visit taro patches. Tea, sugar, rice, and arrow-root were staples. Some abuses cropped up; they could not be avoided entirely.<sup>114</sup>

During the epidemic Honolulu doctors got money for various reasons, as an account showed:<sup>115</sup>

	MEDICINES	SERVICES	BOAT	HORSES
Hillebrand	\$ 356.87	\$1,223.00		
Ford	527.25	673.00	\$31.50	
Hoffmann	1,590.36			\$200.00
Lathrop	1,037.75			
Hardy	982.75			
Rooke	417.00			
Judd		113.00 (3 days)		
Clapp		895.25		
LeTellier		375.00		
Newcomb		2.00		

Medicines furnished by Hoffmann, Lathrop, and Hardy were not all used in their practice, but as they kept drug stores they furnished supplies to the R.C.P.H. for the use of others. Lathrop provided his medicines at cost.

As soon as the smallpox appeared in May, the government set up a hospital to care for the sick. It was the property seaward of Kawaiahao Church described by Judd in his February report; the lot, two and one-fourth acres in area, adjoined Queen Street on one side.<sup>116</sup> Usually called the "government hospital", the institution sat on the land known as Honuakaha. Sometimes the name of the larger district, Kakaako, was applied. Marshal Parke himself picked up the first two cases on Maunakea Street and drove the wagon to the hospital, as no one else would do it. Two more cases discovered the next day were also taken there.<sup>117</sup>

An account book in Hawaiian covers hospital operations from May 14 to June 30. It shows a total expense of \$483.52 for such things as food, blankets, and mosquito nets. The hospital diet included beef, molasses, spices, poi, and rice. Apparently all clothing used was donated.<sup>118</sup>

Dr. Hoffmann's reports from the hospital show the size of its clientele. Paper still in the record is summarized here:

June 1-July 1, 1853--47 cases admitted, 26 deaths, 9 recoveries, 12 under treatment.<sup>119</sup>

July 8-14--15 new cases, 4 deaths, 3 discharged.<sup>120</sup>

July 15-21--17 new cases, 7 deaths, none discharged. Forty patients in hospital.<sup>121</sup>

July 22-29--20 new cases, 12 deaths, 5 discharged (Note: 8 cases came in dying and insane).<sup>122</sup>

July 30-August 4--17 new cases, 10 deaths, 10 discharged. Forty-three patients in hospital.<sup>123</sup>

August 5-12--10 new cases, 8 deaths, 8 discharged.<sup>124</sup>

August 13-19--5 new cases, 8 deaths, 6 discharged. Thirty-one patients in hospital.<sup>125</sup>

September 1-8--2 new cases, no deaths, 6 discharged. Twenty-four cases in hospital, of whom 20 convalescent.<sup>126</sup>

September 9-15--9 new cases, 2 deaths, 3 discharged. Twenty-three cases in hospital, of whom 9 under treatment.<sup>127</sup>

Although the first cases were carted to the hospital, the Hawaiians soon developed a mortal dread of the place. When seized with smallpox, they were prone to hide the fact and to flee up into the mountains and valleys.<sup>128</sup> The Rev. Artemas Bishop reported that because some patients died in hospital, and physicians had opened the throat of a corpse for study, it was bruited about that hospital cases were being killed and their bodies maltreated. In the general panic that followed,

many sought refuge with their friends as soon as symptoms came, thus spreading the epidemic.<sup>129</sup> In some cases at least police took sufferers to the hospital.<sup>130</sup> It must have been a dismal place indeed; Peter Jordan, one of the white prisoners used as a sort of nurse there, drew many complaints of ill-treatment from patients.<sup>131</sup> He was finally transferred when he began to see ghosts.<sup>132</sup> Parke sent a circular to Honolulu doctors asking them to persuade sick people to go to the hospital, and in case of refusal to inform the R.C.P.H.<sup>133</sup>

Three other smallpox hospitals served Honolulu and its vicinity. One was at King and Alapai Streets, at the western edge of the district called Kulaokahua. Opened on June 26, it was under the charge of Dr. B.F. Hardy. From that date until noon of July 31, the Kulaokahua hospital received 117 patients with all grades of smallpox. Of these, 43 died, 39 were discharged, 23 were under treatment on July 31, and 12 were convalescent. Hardy reported that at least one-third of those who had died had been brought in during the last stages of their sickness, and some had lived but a few hours. Hardy's five weeks of hospital practice and his two months' observation in and out of the hospital had convinced him that if all patients in the first stages of the disease could be brought to hospital and suitably attended, mortality would not exceed 30 per cent, which would not be above the average for other countries. The mortality rate among patients tended at home was considerably higher than at the hospital--itself only a dwelling house surrounded by some dozen small huts in the yard.<sup>134</sup>

On July 30, the Polynesian noted that the R.C.P.H., under the direction of the clerk of the bureau of public improvements, were building 40 houses at Waikiki and 30 on the Ewa side of Honolulu, more than two miles from the market. They were to be ready for patients on Monday, August 1.

Dr. S. Porter Ford supervised the Kalihi hospital. Only one of his reports--dated August 17--is in the record. It lists 10 cases in hospital, one new case, and 3 deaths.<sup>135</sup>

It is hard to fix the Waikiki location. In 1852, W.H. Rice built a stone church in Kamoiliili (Moiliili); it was an apana (branch) of Kawaiahae. At the time many hundreds of Hawaiians populated the district.<sup>136</sup> In a report on a hospital for Waikiki, Rice on July 23 wrote that he had tried to get the church for use, but the people objected, partly because of their aversion to having the sick congregated in their midst. Also, it was hard to dig graves in the area; probably none who had died there was buried more than two feet deep. "Intelligent natives" said it would take all day to dig to a depth of four or five feet. Rice recommended setting up temporary houses at Maunapohaku, as the plain in front was comparatively easy digging.<sup>137</sup> Then on August 10, E.W. Clark, reporting on a hospital at Waikikiwaena, wrote that the people had agreed to give over their meeting house for a time, expecting compensation in repairs, such as replastering outside and in, according to the length of time occupied, and leaving the amount to be arranged by Judd, Armstrong and Rice.<sup>138</sup> Mention of the replastering would suggest a stone building--and the district of Waikikiwaena spread around the end of Beretania Street, embracing Moiliili, the site of Rice's church.<sup>139</sup> But Mrs. Rice in her memoirs noted a large temporary hospital just east of Punahou.<sup>140</sup> And the location of the hospital apparently changed during August.<sup>141</sup> The name of the hospital as relocated was Maunapohaku--Rocky Hill--and there is a "Rocky Hill" just behind Punahou. But unfortunately knowledge of the area once called Maunapohaku seems to have vanished.

On August 1, 46 patients were in the hospital, 12 of them convalescent. From that date until August 31, 73 people were received whose names were recorded. Others were received but not recorded because of the sickness of the principal luna in charge; there were omissions also at the time of changing from the old hospital to the one occupied at the end of August. At this latter time Dr. B.F. Hardy, the

supervisor, listed: Whole number of deaths--35; whole number on hand--28; whole number removed--56.<sup>142</sup> W.H. Rice reported subsequent deaths: 11 for the week ending September 2; 8 for the following week; and 5 for the week ending September 29.<sup>143</sup> These figures would indicate that the Maunapohaku operation was a rather modest one. The huts there were described as small.<sup>144</sup>

On August 12, the R.C.P.H. issued a public notice--No. 6. This said that the smallpox appeared to be subsiding in Honolulu, and that arrangements for taking care of the sick in hospitals beyond the city had been completed. People in and about Honolulu who wanted food, medicine and attendance at government expense were to notify Marshal Parke, who was ready to remove patients in suitable carriages to the hospitals. At the time all four government hospitals were open.<sup>145</sup>

Allowing for lost or unfiled reports, it still seems fair to say that the combined efforts of the hospitals benefited a pretty small minority of the sick. The others--or those of them fortunate enough to get help of some sort--depended on home care.

Two other institutions deserve notice. One was a separate U.S. smallpox set-up by Consul B.F. Angel "...to keep the disease out of the vessels."<sup>146</sup> Since nary a case struck the whaling fleet in 1853-1854, Angel's hospital probably did no business. The other was a "vaccine establishment"--known around town as the vaccine hospital--opened on King Street on August 15 under the direction of Dr. William Hillebrand.<sup>147</sup> On July 21, Hillebrand had notified the R.C.P.H. that if he should take charge of a vaccine hospital, he would need an office, a clerk, and two policemen. He would record the date, number of vaccine points introduced, and the names, ages, sex, residences and health (with special reference to syphilis) of subjects, together with the apparent results of any previous vaccination.<sup>148</sup> After seven days the subjects should visit him again to have their arms examined. Hillebrand recommended a law with a light penalty to enforce this. Results of the examinations would be entered in full as to the number and character of pustules. Those with good pustules should be set apart to propagate vaccine, while the unsuccessful cases would be re-vaccinated.<sup>149</sup>

Hillebrand proposed to begin with the eastern part of Honolulu, where as yet few cases of smallpox prevailed. All could not be re-vaccinated; there was no need for it, and not enough vaccine. The doctor offered to serve without pay unless the legislature should see fit to remunerate him. But he would have to be excused from visiting the sick. Hillebrand believed that if there were enough vaccine, he could do the work in a week.<sup>150</sup>

There was not enough. The R.C.P.H. wrote to Dr. J.P. Dow on Maui for "...some pure vaccine lymph unvitiated by influence of the smallpox...", available only in districts not yet beset by the disease.<sup>151</sup> And the Polynesian of July 23 asked people knowing of any cases whence good vaccine could be produced to report to Hillebrand.

On July 26 the doctor approved a public notice about the vaccine hospital, but asked that it not be published until a sufficient supply of vaccine was on hand; otherwise, disappointment might result. Meanwhile he continued to inoculate those willing to submit to it, having performed the operation on 24 subjects the day before.<sup>152</sup>

The vaccine hospital opened on August 15; four days later the R.C.P.H. ruled that all those affected by smallpox should report to the vaccine hospital within seven days after vaccination. People concealing and failing to report such illness were liable to a fine of \$5.00.<sup>153</sup> The regulation was posted in Hillebrand's office but not published for general distribution.<sup>154</sup> During the first week Hillebrand vaccinated 90 people at the hospital, while continuing to perform the same service at his home every morning from seven to nine o'clock.<sup>155</sup>

From August 10 to September 15 the establishment vaccinated 920 people--720 up to September 8. Of these, 499 reappeared for examination. Vaccination had taken perfectly in 197, imperfectly in 41, and not at all in 261. The latter two classes were re-vaccinated. A total of 204 subjects did not come in for examination. By this time vaccine lymph had been sent to four places on Oahu, two on Maui, and three on Hawaii. Hillebrand had demonstrated one truth: Vaccine lymph, contrary to some opinion, did not deteriorate by passing through Hawaiian blood. By the middle of September it had gone through five generations without losing efficiency.<sup>156</sup>

From September 22 to October 22, 1,097 were vaccinated, and from October 16 to November 30, the vaccine hospital serviced 1,547.<sup>157</sup> Of the 1,547, a total of 1,475 had reappeared for examination, and the vaccination had taken in 875 cases. The whole number vaccinated from July 20 to November 30 was 4,493.<sup>158</sup>

The vaccine establishment, recommended by the foreign residents, was a fairly late development. But as the epidemic raged through June and July, so did a running fight over the vaccination issue. The question had several facets: (1) How well protected were the Hawaiians when the smallpox entered, and who was to blame for shortcomings? (2) Was there bungling, or perhaps even culpable negligence during and after the Charles Mallory affair? (3) Just how effective was vaccination? Was inoculation better? (4) What should be done for the future?

In 1839 the American mission proposed vaccination. During the twenty-five years following, vaccine was brought in several times, and as many immunized as could be.<sup>159</sup> Laura Fish Judd wrote of the "...great efforts made in former years" to vaccinate extensively; she blamed lack of protection on deterioration of the vaccine during the sea voyages to Hawaii, and in the "native system".<sup>160</sup> The Rev. E.P. Bond examined the arms of several hundred Hawaiians from Kauai and elsewhere; he found at least three-fourths vaccinated, many as long ago as 1839 and 1840. Drs. Whitney and Rooke and members of the American mission had done the work.<sup>161</sup> And Commissioner Severance noted that Dr. Judd had vaccinated a great many Hawaiians years before, while younger ones had been immunized several times in Honolulu, Lahaina and other ports.<sup>162</sup> But critics blamed the missionaries for not having given their resolutions the force of law in those early years when they had preponderant influence over the government. Although detractors granted that some few missionaries had merit, they pointed to mortality lists as proof that little had been done. Again, they said, what good would it have done to vaccinate in 1839, but not to follow through?<sup>163</sup>

Vaccination accelerated after the Charles Mallory scare; it went on "pretty generally" between then and the outbreak of smallpox.<sup>164</sup> On February 15, the privy council appointed R. Armstrong to superintend vaccination throughout the kingdom. He reported progress on March 7; vaccine had been distributed and doctors, missionaries, and others were vaccinating.<sup>165</sup> The vaccine came from Honolulu physicians. All who were asked furnished it, as they could get it free. The doctors also told Armstrong where to find likely donors among their patients, and helped him to select lymph from the arms of those presenting themselves in accordance with a public notice.

The first vaccine went to Drs. Baldwin of Maui, Smith of Kauai, and Wetmore of Hawaii; it was no good. A second batch was good, but progress was hard, Armstrong claimed, because of the "...ignorance and stupidity of the people, in interfering with the pustules before they had run their course...", the careless habits of the Hawaiians, and the presence of other diseases which vitiated the vaccine. Sometimes people living in remote areas took their own measures to get vaccine matter.<sup>166</sup>

Vaccination was far from complete when the epidemic struck. The R.C.P.H. were appointed under the act of May 16, and at that time Armstrong considered his duties ended in all areas except the city of Honolulu. The commissioners asked him to stay



in charge of vaccination there.

The smallpox brought panic, and people readily accepted immunization. Dr. Lathrop, reportedly the most popular physician in town, vaccinated the king and queen and a number of chiefs and commoners at the palace.<sup>167</sup> Armstrong set up vaccination stations; notices posted in churches told where to gather at a certain hour every day. A \$5.00 fine faced anybody who could not prove he had been vaccinated. The places chosen were the Stone Church, the Catholic Church, and Mr. Smith's Church. An intelligent Hawaiian, supplied with vaccine and lancet, stood duty at each post. For the first few days great crowds thronged to the churches. Armstrong himself was so busy that he vaccinated few.<sup>168</sup>

Mr. Rice supervised the eastern division; Armstrong and a doctor went to Kapalama, then northwest of town. On July 17, the R.C.P.H. decided to divide Honolulu into districts, and to assign a physician to each, to make a thorough vaccination at an appointed time. They asked the Governor of Oahu to tabu certain days to those districts, requiring all Hawaiians to stay home at such times to be vaccinated.<sup>169</sup>

But the plan was not fully carried out. A short time later Armstrong arranged to have all congregations in and around Honolulu visited by doctors on Sunday after church services. In August Hillebrand opened his vaccine establishment, and Armstrong's duties ended. Eventually nearly everybody in or near Honolulu was vaccinated, most of them several times.<sup>170</sup>

Medical opinion divided sharply over procedures. From the first, Wyllie favored inoculation as the only sure method; most doctors, however, thought it too dangerous and preferred vaccination.<sup>171</sup> At the end of July a special meeting of physicians considered the question of inoculating Kamehameha III and submitted a recommendation to the privy council.<sup>172</sup> Hillebrand inoculated many--partly at least because of a shortage of good vaccine. From the last week in July to the middle of August, he so treated over 300 people of all ages, being more interested, he said, in saving lives than in boosting inoculation's reputation. In 53 cases there were eruptions; 49 of these patients did well, with only 4 possible fatalities at reporting time (and all of the latter suffered unusual circumstances). Fifteen of the erupted cases were mild, showing from 6 to 10 scattered pustules that dried off in two or three days.<sup>173</sup>

Hillebrand noted that the mortality among the non-inoculated ranged from 30 to 75 per cent in various places. He believed that inoculation could reduce this to a range of from 5 3/5 to 7 1/2 per cent; certainly a 10 per cent mortality rate would be cause for congratulation.

Although 8 of 11 old people inoculated seemed to be recovering, Hillebrand thought it might be better to vaccinate the old and infirm. But at the time good vaccine was out, and it appeared nearly impossible to get enough to make vaccination the general rule; Hillebrand predicted that a general campaign of inoculation would end the epidemic in three weeks.<sup>174</sup>

Early in September the doctor reported again: The whole number of cases from inoculation was 183; of these, 19 ended in death. Not given was the number inoculated.<sup>175</sup> Inoculation won intelligent support--one proposal was to vaccinate all and then, if a family or district had been exposed, to follow up with inoculation of the exposed people.<sup>176</sup> Armstrong concluded that "...Time has given foundation to Wyllie's opinion..."; inoculation was best.<sup>177</sup>

The merit of vaccination was disputed; so also was the question of how and by whom it should be done. Some doctors merely punctured the skin; others scratched it lightly with a lancet. Several "influential and intelligent" Hawaiians vaccinated on their own account; among them were two judges, both members of the house of representatives.<sup>178</sup>

Overall results on Oahu fell short of anticipations, but Armstrong found little

if any difference in effectiveness between the vaccinating done by doctors and that performed by others. It was hard to determine. Although vaccinated Hawaiians were supposed to return for examination on the seventh day, many came too early, too late, or not at all. A report by Dr. Hardy covering 88 cases in Honolulu showed:

35	vaccinated by physicians
13	" " a physician's clerk
28	" " others, not doctors
5	" " unknown persons
3	" " both physicians and others
9	" in 1839
4	" not at all <sup>179</sup>

On July 25, Parke reported 478 cases, 313 vaccinated by doctors, and 165 by others; he could see no difference.<sup>180</sup>

The R.C.P.H. generally followed the course recommended by the privy council and relied on non-physicians working without pay. The practice of vaccination by laymen was described as common in other countries, being accepted without complaint by physicians. Nevertheless, angry words flew over the government's responsibility in the matter; some claimed that in February the doctors advised dividing Oahu into districts and vaccinating everybody. Although the physicians gave their opinions in writing to the prime minister, Armstrong searched in vain for papers substantiating their alleged piece of advice--nor did he remember any such proposal.<sup>181</sup> On this point Armstrong concluded that the privy council could be accused of nothing more than an error of judgment; results did not prove that, had the council accepted the alleged proposal, things would have been better. Armstrong's statistics convinced him that vaccination by physicians was not superior.<sup>182</sup>

Nothing seemed to work in some cases: A doctor vaccinated the son of Kekaulahao of Honolulu, and the scar was pronounced good. But the lad came down with varioloid. Later he was sent to Lahaina. There malignant smallpox seized him. Twenty-four hours after eruption, and while delirious, he bathed in the sea. The eruption receded; 36 hours later he was dead.<sup>183</sup>

Some charged that despite vaccination the smallpox spread indiscriminately.<sup>184</sup> But vaccination had its defenders. Dr. B.F. Hardy wrote his belief that its value had been greatly underrated, and that it had saved hundreds, if not thousands.<sup>185</sup> Dr. F.W. Hutchinson of Lahaina reported good results.<sup>186</sup> As late as October 1, "Humanity" asserted that as yet there had been no honest and effectual attempt to vaccinate the whole population "thoroughly, speedily and systematically", and that the R.C.P.H. had not spent a dollar on either vaccination or inoculation.<sup>187</sup> Hillebrand had shown that Hawaiians could be protected as effectively as other races; when he began vaccinating panic ruled. He vaccinated 1,300 people, his experiments showing that not more than 2/5 of the Hawaiians in and about Honolulu were protected--according to "Humanity".<sup>188</sup> And Dwight Baldwin entered the discussion with a long letter on the effectiveness and best method of vaccinating.<sup>189</sup>

The R.C.P.H. were not indifferent to the worth of vaccination. Their support of Hillebrand's vaccine establishment and the attempt to get and distribute good vaccine prove that. In September the commissioners asked Consul Miller to order British vessels to hold their Hawaiian crewmen until the latter produced vaccination certificates; Miller agreed.<sup>190</sup>

He had already shown himself ready to help. On August 30, 1853, he requested the British government to send vaccine. It started for Hawaii in November in a zinc case and reached Miller on February 14, 1854--an opportune arrival, since the health commissioners planned to recommend a law requiring vaccination to the next legislature. And the proposed statute was to be modeled on the British act.<sup>191</sup>

Apparently Liholiho was delegated to draft the act, and requested Wyllie to

furnish a copy of the parliament's 1853 vaccination law. In consultation with Hillebrand, it was decided not to open the zinc case until after the Hawaiian legislature had acted.<sup>192</sup> Meanwhile, however, the privy council passed a resolution of thanks for the vaccine.<sup>193</sup>

On August 10, 1854, the king approved "An Act to Make Compulsory the Practice of Vaccination Throughout the Hawaiian Islands."<sup>194</sup> It provided that

Whereas, the late mortality caused by the Small Pox has shown the necessity of compelling a general and effective vaccination of the subjects of this Kingdom; Therefore, the minister of the interior would appoint four vaccinating officers, one each for (1) Hawaii, (2) Maui, Molokai, and Lanai, (3) Oahu, and (4) Kauai and Niihau. The officers were to select not less than three vaccinating stations in each school district. All children born after June 1, 1854 would be vaccinated within six months after birth, or as soon thereafter as possible. To accomplish this, the officers were to visit each station at least once every six months, vaccinate, and give certificates. The arms of those vaccinated would be examined eight days later to read the results. The fine for failure to have children vaccinated was \$5.00, half to be paid to the informer.<sup>195</sup>

The law had been passed; now the zinc box from England yielded its contents, and--they were worthless.<sup>196</sup> Nevertheless, in the following months vaccination went on.<sup>197</sup>

## NOTES

1. Honolulu Star-Bulletin, October 21, 1964, p. 20.
2. The Columbia-Viking Desk Encyclopedia (New York: Viking Press, 1960), II, p. 1246.
3. Sandwich Islands Gazette.
4. Hawaii's 'Blue' Laws, Constitution and Laws of 1840. A Practical Illustration of the Missionaries' Love for the Hawaiians (Honolulu: Holcmua Publishing Co., 1894), pp. 45-47.
5. Ibid.
6. R.A. Greer, "The Deadly Don," Hawaii Historical Review, I, No. 3 (April, 1963), pp. 52-54.
7. Bill of Health, October 9, 1841, by Dr. W.L. Van Horn, physician of the U.S.S. Yorktown. Foreign Office and Executive, British Consulate. Archives of Hawaii.
8. C. Charlton, British Consul, to Rear Admiral R. Thomas, February 28, 1842. Letter Book, Admiralty, 1839-1847, British Consulate, Honolulu. F.O. and Ex., Archives of Hawaii.
9. Hawaii's 'Blue' Laws..., pp. 152-155.
10. Pertinent portions appeared in The Friend, December 18, 1844, p. 123.
11. Ibid.
12. Statute Laws of His Majesty Kamehameha III, King of the Hawaiian Islands; Passed by the Houses of Nobles and Representatives...A.D. 1845 and 1846...(Honolulu: Government Press, 1846), I, pp. 138-140.
13. September 18, 1852.
14. Polynesian, September 25, 1852.
15. Polynesian, December 25, 1852.
16. Dispatch No. 67, February 10, 1853, Severance to Hon. Edward Everett.
17. Polynesian, February 12, 1853. The running account of events is taken mostly from this source and from W.C. Parke, Personal Reminiscences of William Cooper Parke, Marshal of the Hawaiian Islands, from 1850 to 1884 (Cambridge, U.S.A.: the University Press, 1891), pp. 49-50. Parke gives the ship's quarantine as 21 days, but several others writing in 1853 named 14 days.

18. Polynesian, July 30, 1853; Bernice P. Bishop Museum, Sites of Oahu, Book VI, Vol. 3, p. 285.
19. Polynesian, April 2, 1853.
20. "A Lover of Justice" in Polynesian, August 13, 1853.
21. Privy Council Records, Vol. 7 (November 15, 1852-October 17, 1853), p. 99. Archives of Hawaii. Hereafter cited as PCR, with appropriate dates and pages.
22. Polynesian, February 19, 1853; Lorrin Andrews, Secretary of the Privy Council, to B.F. Hardy, M.D., chairman of the meeting of the medical gentlemen of Honolulu, February 15, 1853. F.O. and Ex., Smallpox Epidemic, 1853, Folder 1. Archives of Hawaii. Records from this source dated 1853, 1854, and 1855 are hereafter cited by folder number only.
23. Polynesian, February 19, 1853.
24. Andrews to Hardy, February 15, 1853, Folder 1; PCR, Vol. 7, p. 101.
25. February 19, 1853.
26. February 16, 1853.
27. Judd to the King, February 19, 1853. Folder 1.
28. Ibid.
29. Ibid.
30. PCR, Vol. 7, March 7, 1853, p. 117.
31. March 5, 1853.
32. Polynesian, March 26 and April 9, 1853.
33. Polynesian, April 30, 1853.
34. W.C. Parke, op. cit., p. 52.
35. Polynesian, May 14, 1853.
36. Ibid.; "Original Minutes of the Commission Appointed to Take Evidence on All Claims Against the Government on Account of Services Rendered during the Prevalence of the Smallpox and to Report to the Legislature of 1856", January 18, 1856, pp. 4, 6. Archives of Hawaii. Hereafter cited as Minutes.
37. Polynesian, August 6, 1853.
38. Ibid.; Minutes, January 18, 1856, p. 4.
39. Polynesian, August 20, 1853.
40. Thomas G. Thrum, "Honolulu Sixty Years Ago," Hawaiian Annual, 1914, p. 96.
41. Dispatch No. 84, Severance to Secretary of State Marcy, June 24, 1853; Thrum, on p. 86 of the work cited above, mentions the ropes, and also writes that he remembered no other such quarantined areas.
42. Minutes, January 28, 1856, p. 30.
43. May 14, 1853.
44. S.C. Armstrong to Brother Willie, May 16, 1853. Richard Armstrong Collection, File M7. Archives of Hawaii.
45. "Hawaiian Epidemics," Hawaiian Annual, 1897, p. 97.
46. W.C. Parke, op. cit., p. 57.
47. May 14 and August 6, 1853.
48. "A Lover of Justice" in Polynesian, August 13, 1853.
49. R.S. Kuykendall, The Hawaiian Kingdom, 1778-1854... (Honolulu: University of Hawaii Press, 1957), p. 412.
50. Polynesian, August 6, 1853.
51. Polynesian, August 13, 1853.
52. Polynesian, May 14 and August 6, 1853.
53. Laura Fish Judd, Honolulu...from 1828 to 1861 (Honolulu: Honolulu Star-Bulletin, 1928), p. 174.
54. Severance to Marcy, No. 84, June 24, 1853.
55. W.C. Parke, op. cit., p. 57.
56. Ibid.
57. Polynesian, July 30 and August 20, 1853.
58. Polynesian, July 30, 1853.
59. Folder 1.
60. Willie to G.W. Robertson, Speaker of the House of Representatives, May 14, 1853. Folder 1.
61. Laws of His Majesty Kamehameha III, King of the Hawaiian Islands, Passed by the Nobles and Representatives at their Session, 1853 (Honolulu: 1853), p. 77.
62. PCR, Vol. 7, May 16, 1853, p. 189.
63. Board of Health Records, January-June, 1853. Archives of Hawaii. Hereafter cited as BH.

64. C.C.A. to my very dear son from your mother. Richard Armstrong Collection.
65. June 1, 1853.
66. Thomas G. Thrum, "Honolulu Sixty Years Ago," Hawaiian Annual, 1914, p. 92.
67. PCR, Vol. 7, June 6, 1853, p. 203.
68. Carrie P. Beckwith to My dear brother Willis, June 8, 1853. Richard Armstrong Collection.
69. Thomas G. Thrum, "Honolulu Sixty Years Ago", p. 86.
70. PCR, Vol. 7, June 9, 1853, p. 211.
71. Polynesian, June 11, 1853.
72. June 23, 1853.
73. Polynesian, June 11, 1853.
74. Polynesian, June 18, 1853.
75. Hillebrand to Rooke, June 14, 1853. BH, January-June, 1853.
76. Clark to the Rev. R. Anderson, Superintendent of the ABCFM, June 14, 1853. Hawaiian Mission Children's Library.
77. Polynesian, June 25, 1853.
78. Severance to Marcy, Dispatch No. 84, June 24, 1853.
79. C.H. Judd to Willie, June 26, 1853. Richard Armstrong Collection.
80. B.F. Hardy to R.C.P.H., June 30, 1853. BH, January-June, 1853.
81. Severance to Marcy, Dispatch No. 84, June 24, and No. 85, July 2, 1853.
82. Severance to Marcy, Dispatch No. 85, July 2 and No. 86, July 9, 1853.
83. Dispatch No. 86.
84. Ibid.
85. Polynesian, July 2 and July 9, 1853.
86. Dispatch No. 86.
87. June 29, 1853.
88. Ibid.
89. W. Newcomb to Rooke, July 6, 1853. BH, July 1-11, 1853.
90. July 2, 1853.
91. Ibid.
92. Memorandum, British Consul William Miller, July 9, 1853. British Consular Records, Vol. II. Archives of Hawaii.
93. The Friend, July, 1853, p. 52.
94. Polynesian, July 16, 1853.
95. Polynesian, July 2, 1853.
96. Polynesian, July 23, 1853.
97. Ibid.
98. J. Hardy to C.F. Hussey, secretary of the meeting, July 21, 1853. BH, July 12-25, 1853.
99. Minutes, January 19, 1856, p. 13.
100. BH, August 1-8, 1853.
101. W.C. Parke, op. cit., p. 56.
102. Thomas G. Thrum, "Our Foundation Layers," Hawaiian Annual, 1919, p. 48.
103. BH, July 26-31, 1853; August 1-8, 1853.
104. BH, July 26-31, 1853.
105. Ibid.
106. BH, August 1-8, 1853.
107. Ibid.
108. Ibid.
109. Report for District No. 9, September 30, 1853. BH, September-December, 1853.
110. BH, August 1-8 and September-December, 1853.
111. Polynesian, July 23, 1853.
112. Minutes, January 18, 1856, p. 11 and January 23, p. 20.
113. Mary Dillingham Frear, Lowell and Abigail: A Pealistic Idyll (New Haven: privately printed, 1934), pp. 207-209.
114. Minutes, January 21, 1856, pp. 15-16; Polynesian, September 17, 1853.
115. Money Received by the Physicians of Honolulu from the Health Commissioners as Shown by Their Printed Report. BH, January-September, 1854.
116. In January, 1862, J.O. Dominis and J.W. Makalena were appointed to inspect the site and consider a proper price for "these...premises where those who died of smallpox are buried." Makalena made the survey. At the time the lot was still surrounded by the wooden fence, "which is kind of falling to pieces..." and occupied by "...one broken frame house..." The proper price for the land and everything on it was set at \$500. (J.O. Dominis and J.W. Makalena to Lot Kamehameha,

- minister of the interior, January 23, 1862. Interior Department Land File, January, 1862. Archives of Hawaii).
117. W.C. Parke, op. cit., p. 53.
118. W.C. Parke's bill, May 14-June 30, 1853. Account Book. BH, January-June, 1853. Mr. Jack Matthews of the Public Archives staff provided the general description of the account book's contents.
119. BH, July 1-11, 1853.
120. BH, July 12-25, 1853.
121. Ibid.
122. BH, July 26-31, 1853.
123. BH, August 1-8, 1853.
124. BH, August 9-24, 1853.
125. Ibid.
126. BH, September-December, 1853.
127. Ibid.
128. Severance to Marcy, No. 84, June 24, 1853; "A Lover of Justice" in Polynesian, August 13, 1853.
129. Missionary Herald, L, No. 5 (May, 1854), p. 152.
130. W. Hillebrand Report, June 30, 1853. BH, January-June, 1853.
131. Minutes, January 21, 1856, p. 18.
132. Ibid.
133. Extract, Royal Commissioners of Public Health, September 22, 1853. Hereafter cited as Extract. BH, August 1-8, 1853.
134. B.F. Hardy to R.C.P.H., August 1, 1853. BH, August 1-8, 1853. A land office map of the Kulaokahua Lots prepared in 1873 shows Alapai Street at the extreme western edge of the area; Minutes, January 19, 1856, p. 12.
135. Report in BH, August 9-24, 1853.
136. Ethel M. Damon, Koamalu... (Honolulu: privately printed, 1931), p. 144.
137. W.H. Rice to C.P.H., July 23, 1853. BH, July 17-25, 1853.
138. E.W. Clark to R.C.P.H., August 10. BH, August 9-24, 1853.
139. Land court map of government school lot within the Ili of Mauluki-kepa, Moiliili, Waikikiwaena, Honolulu, Oahu, May 20, 1915. Archives of Hawaii.
140. E.M. Damon, op. cit., p. 146.
141. Report for Mauna Pohaku Hospital, B.F. Hardy, August 31, 1853. B.H., August 25-31, 1853.
142. Ibid.
143. Reports of Deaths at Maunapohaku Hospital, W.H. Rice. BH, September-December, 1853.
144. Minutes, January 23, 1856, p. 19.
145. Polynesian, August 13, 1853.
146. Angel to Marcy, Dispatch No. 3, October 24, 1853. Angel arrived on the clipper ship Courser on August 12 to succeed E.H. Allen as consul.
147. Polynesian, August 13, 1853.
148. Memorandum, J. Hardy, July 21, 1853. BH, July 12-25, 1853.
149. Ibid.
150. Ibid.
151. J. Hardy to Dow, July 22, 1853. BH, July 12-25, 1853.
152. Hillebrand to Dear Sir, July 26, 1853. BH, July 26-31, 1853.
153. Olelo Hoolaka, August 19, 1853. Translated by Mr. Jack Matthews. BH, August 9-24, 1853.
154. Hardy to Hillebrand, August 19, 1853. BH, August 9-24, 1853.
155. Polynesian, August 20, 1853.
156. Polynesian, September 17, 1853.
157. Polynesian, October 22 and December 3, 1853.
158. Polynesian, December 3, 1853.
159. Polynesian, July 2, 1853.
160. Op. cit., p. 174.
161. Weekly Argus, July 21, 1853.
162. Severance to Hon. Edward Everett, Dispatch No. 67, February 10, 1853.
163. Weekly Argus, July 21, 1853.
164. HBH Consul William Miller to H.U. Addington, June 14, 1853. British Consulate Records, 1852 and 1853, Vol. II, Letter Book, Foreign Office, January, 1850 to December, 1853. Archives of Hawaii.
165. Armstrong's Report on Vaccination to the Privy Council, October 24, 1853. Folder 2.
166. Ibid.
167. Minutes, January 18, 1856, p. 6.

168. Armstrong's Report.  
 169. Ibid.  
 170. Ibid.  
 171. Ibid. Dr. H.L. Arnold, editor of the Hawaii Medical Journal, wrote to the author on November 23, 1964: "...though your use of the word inoculation in its original and literal sense is proper on etymologic and historical grounds, it is quite inadvisable from the standpoint of communication. It has been half a century or more since any physician used it to mean what you mean by it here. It now means immunization by introduction of a living vaccine, and is often misused to mean just immunization. I fear its usefulness for your purpose is totally destroyed and you will have to substitute 'introduction into the conjunctival sac'..."
172. PCR, Vol. 7, August 1, 1853, p. 245.  
 173. Polynesian, August 13, 1853.  
 174. Ibid.  
 175. Report, Hillebrand, September 8, 1853. BH, September-December, 1853.  
 176. "A Lover of Justice" in Polynesian, September 3, 1853; S.C. Damon to Gent., August 22, 1853. BH, August 9-24, 1853.  
 177. Armstrong's Report.  
 178. Ibid.  
 179. Ibid.  
 180. Ibid.  
 181. Ibid.  
 182. Ibid.  
 183. "A Lover of Justice" in Polynesian, September 3, 1853.  
 184. Ibid.  
 185. B.F. Hardy to R.C.P.H., August 1, 1853. BH, August 1-8, 1853.  
 186. Polynesian, August 20, 1853.  
 187. Polynesian, October 1, 1853.  
 188. Ibid.  
 189. Ibid.  
 190. Miller to H.W. McCoughtry, Secretary of R.C.P.H., October 15, 1853. British Consulate Letter Book, General Correspondence, 1850-1856. Archives of Hawaii.
191. Wyllie to Liholiho, February 15, 1854; same, February 17, 1854; Liholiho to Wyllie, February 18, 1854; Cabinet Council Minute Book, 1850-1854, February 17, 1854, p. 353. Letters in Folder 2.  
 192. Liholiho (?) to Wyllie, February 27, 1854.  
 193. Polynesian, March 4, 1854. The issue contains a chronologically-arranged series of correspondence regarding the British vaccine.  
 194. Laws of His Majesty Kamehameha III...Passed by the Nobles and Representatives at Their Session, 1854 (Honolulu: 1854), pp. 28-29.  
 195. Ibid.  
 196. PCR, Vol. 9 (December 15, 1854-December 17, 1855), January 8, 1855, p. 47.  
 197. Ibid., February 26, 1855, p. 83.

---

 HAWAII HISTORICAL REVIEW

Richard A. Greer, Editor

Published quarterly by Richard A. Greer at the Kamehameha School for Boys, Kapalama Heights, Honolulu, Hawaii. Telephone: 814-111. Months of issue are October, January, April and July. By subscription only. Rate: \$1.00 per year, postpaid.

---

 ASSOCIATE EDITOR FOR THE ISLAND OF MAUI:

Mrs. Raymond R. Lyons

ASSISTANT TO THE EDITOR:

Mrs. E. G. Greer, Apt. 32, Bishop Museum Grounds, Honolulu, Hawaii 96817

---

 CONGRATULATIONS TO THE QUEEN'S HOSPITAL ON THE OPENING OF ITS HISTORY ROOM. PAY A VISIT TO THIS INTERESTING AND WORTHWHILE PROJECT. PREVIEWED APRIL 29, 1965.
 

---