# The Fortress of Quelang (Jilong, Taiwan)

Past, Present and Future

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One of the Renaissance techniques exported throughout the world by European powers, but usually neglected by scholars, was military architecture. The first castle in the New World was built in Santo Domingo in 1503, later followed by La Real Fuerza (1558) in Cuba, which was a square fortress but very small in size. This trend continued for centuries, and one of the most outstanding examples is the castle of San Marcos (1672) in Sant Augustin (Florida). This new architecture had been developed in Europe in the 16th century and reached the Far East soon thereafter, brought by the Portuguese (in Malacca, Macao, etc.), the Spaniards (in the Philippines) and the Dutch (in Indonesia, Taiwan, etc.). After the treaties of Westphalia (1648), some of the castles lost their strategic value and fell into ruin. Later, after the Opium Wars, new models of fortifications emerged along the coastline of China, superseding the earlier Renaissance fortifications. This paper explains the history of the fortress of Quelang in its colonial context, showing that it was a model of its type. The present situation of the fortress's old foundations are also discussed.

# EUROPEAN WALLED CITIES IN SOUTH EAST ASIA

Colonial settlements usually developed the model of the citadel, which was a small fortress

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attached to the city that protected. The simplest shape for these fortifications was a square with four bastions. One treatise from the year 1700 defines the citadel as follows: "A fortress of four, five or more bastions, which is attached to a city; so, both names [city and citadel] are related to each other as one of two areas."1 During the 16th and 17th centuries, in the area around present-day Indonesia, Malaysia, the Philippines, southern China and Taiwan, a number of colonial settlements were established that were fortified in a common style: walled cities with bastions at each angle. Usually these cities had an irregular plain-floor conditioned by the topography of the area. This was the case with the first fortifications in cities like Manila, Cavite (1595), Batavia (1619), and São Paulo do Monte (Macao, 1620). But the situation changed with the fortresses that were built between 1615 and 1640. This latter group followed a very similar pattern: "the square four-bastioned compound." Sometimes there would be irregularities in this square, but the perfect square model seems to have been the ideal. We can recognize them in places like Iloilo (1616); the Pescadores (1622), Fort Zeelandia (Tayouan, 1624), San Salvador of Quelang (Jilong, 1626), and Zamboanga (1635).

A comparison of the sizes of the abovementioned fortresses produces astonishing insights. The fortress at Quelang is far the biggest, far larger than the next largest one, which explains the comments of the Dutch General Lamotius imagining the reaction of his subordinate Harouse when he saw it for the first time, before engaging it in battle: "The eyes of Commander Harouse may have experienced a greater

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pleasure when seeing for the first time the Santísima Trinidad Fortress from atop La Retirada."<sup>2</sup>

# THE FORTRESS OF QUELANG: A "SYNTHETIC IMAGE"

Construction on the fortress began in 1626 under the name of San Salvador; later, the Dutch

renamed it Noord Holland. A perfect model of the fortress does not exist because it was remodeled several times. Nevertheless, if we consider the bastions to be the most permanent features, and assuming that none of the renovations altered the original foundations, we can render the "synthetic image" portrayed here. Other elements worth mentioning are the barbicans, which were built in the later stages of the fortress; the well in the center, and the vaults inside some of the bastions that served as cellars for gunpowder storage.

Bastion San Antonio el Grande
Nord Holland bastion

Bastion San Antonio el Chico
Zeeburg bastion

well

Cellars

Main door

Bastion San Juan
Zuijderpunt bastion
Small halve moon bastion

Bastion San Sebastian
Oosterpunt bastion
Bulermberg bastion
First halve moon bastion

The Fortress of Quelang.

Since the barracks

inside the castle were the most changeable structures, we have not included them in this image. As for the names of the bastions,<sup>3</sup> we are sure about the location of San Antonio el Grande, but for the other ones we can only presume which is which.

## ARCHITECTONIC HISTORY OF THE FORTRESS OF QUELANG DURING THE SPANISH PERIOD (1626-1642)

The first textual references to the fortress come from the Spanish Period, during the tenure of the first governor, Antonio Carreño de Valdés (1626-1629). The Spaniards started to build the main fortress as

well as a smaller one, called La Mira, on top of the hill, as soon as they reached the island of Quelang in 1626, as it is stated in the map of Pedro de Vera (1626), because in both places the map reads: "Here fortifications are made."

We know that the planner of the construction was an engineer named Nicolás Bolen, whose surname already belies that he was of Flemish or Dutch

> descent. We know that Bolen arrived at Isla Hermosa at the very beginning with the assignment of designing and supervising the construction of the fortress. We know this job must have been quite specialized, because his salary in Manila as "artilleryman" was 200 pesos a year.4 In addition, we know that his job was done to the satisfaction of his superiors, because in a Royal Treasury Council meeting held in Manila two years after the conquest, in 1628, the Governor General recognized his real qualifications as an engineer, and upgraded his salary to 250 pesos

a year.5 We have no more details about Bolen.

Just as the second governor, Juan de Alcarazo (1629-1632), took office, the Dutch yacht *Domburch* arrived on a spy mission to the northern part of the island. On the map of Gerbrantsz Black from aboard the *Domburch* we can see clearly the main bastion of San Antonio el Grande, and we can count three cannon on each side of the frame. This map also provides a clear picture of the situation of the Spanish garrison: a big house can be identified, probably that of the Spanish Governor (or the church of Todos los Santos), along with a group of thirty tents for the soldiers. The report from aboard the *Domburch* describes the place very clearly:

"The fort lies on a bay that the Chinese call Quelang. It is square and built of stone, consisting of eight points... On the biggest point facing the waterside are six to seven pieces of artillery that guard the entrance of the bay. We saw loopholes in the wall facing the sea. The distance between the fort and the opposite bight on Taiwan is about two musket shots and in between, from our yachts, we could discern two sandbanks. As far as we could see, the bay lying past the fortress measured more than a goteling (sic)-shot in width towards the above mentioned bight on Taiwan. Those coming from the open sea could not see their vessels lying in the bay because they lie behind the said mountains and cliffs. But our junk that passed through the entrance of the bay within fire range of the fortress saw two galleys and two ships. Further off from the fortress towards the sea is a small but rather high mountain, with a redoubt or guardhouse on top [called by the Spaniards La Mira]."7

Alcarazo finished with the construction of Bastion San Antonio el Grande, where twelve cannons were lined up, and La Mira. In addition to these he built the fortress called La Retirada (also called San Millan), which had six pieces of artillery to defend the entrance of the harbor; and he completed the defensive system by building the small tower, El Cubo, in the Boca Chica (or Small Mouth) at the entrance of a small island off the mainland of Formosa.<sup>8</sup>

There are no records on the development of the fortress dating from the tenure of either the third governor, Bartolomé Díaz Barrera (1632-1634), or the fourth, Alonso García Romero (1634-1635); but back in Manila in 1636, García Romero wrote a very detailed report (see appendix) on the castle, the number and quality of cannons, etc., at the moment of his departure. Among many other details, he states:

"The principal fortification forms a square that consists of four bastions. Two are of solid stone; only one has the base made of stone, near the moat; the other is made of wood. All four stretches of wall are of solid stone and lack only the parapets".9

We can be sure that San Antonio el Grande was one of the two made of stone; the other must have been

San Antonio el Chico, because it was the first bastion facing the entrance of the harbor. The one that had only a base made of stone must have been bastion San Sebastian, because it was the only one left near the moat. In fact, we will see that the San Sebastian bastion still was under construction in 1638. And the fourth one, made of wood, must have been the southern bastion, which we identify as the bastion San Juan. The four bastions were "well armed with cannons," as the Dutch stated in 1636 after interrogating some Spaniards that they rescued at sea.<sup>10</sup>

In 1636, in the middle of the governorship of Francisco Hernández (1635-1637), the fifth governor, some Spanish soldiers and two missionaries were killed in Tamsui. This fact, together with the general situation in the Philippines, spurred Governor General Hurtado de Mendoza to convene a special summit meeting on 22 January 1637 with all the military commanders in Manila. The main point of discussion was the advisability of withdrawing from the forts on Isla Hermosa and Zamboanga (a recently completed fort), which were located the farthest from Manila towards the north and south, respectively. The council's advice was to withdraw, but Corcuera decided to do so only in the case of Zamboanga, while for the case of Taiwan he would wait for a decision from the king. In the meantime, he only ordered the dismantling of some external defenses.

Consequently, by the beginning of 1637, an order from Manila reached Governor Hernández, telling him to withdraw all troops from Tamsui, after first burning the wooden fortress of Tamsui and punishing the natives for the massacre inflicted on the Spaniards. Also, the order mandated that the cannons of fort Santo Domingo in Tamsui should be transferred to the main fortress of San Salvador in Quelang. This order probably indirectly accelerated the construction work in Quelang.11 The orders also mandated the destruction of La Mira, La Retirada and El Cubo. But in fact the governor in Quelang didn't agree with the order to destroy La Mira because he considered it to be the most important defensive post, and for this reason he was replaced immediately. 12 We also know that before he was replaced, he received orders to improve the living conditions inside the castle, because the incoming governor was expected to arrive in August 1637. He was also ordered to build, inside the castle, the customary accommodations

for the captain of the Pampangan soldiers, as well as a house for the senior chaplain, the barracks for a total of 125 men, and the storehouses needed for their provisions.<sup>13</sup>

The expected new governor was Pedro Palomino (1637-1639), who reached Quelang in August. He came not only with the order to complete the withdrawal from Tamsui (if it was not yet done), but also with the assignment of concentrating all the defenses in the main fortress. This implied additionally the destruction of the three surrounding fortresses: La Mira, La Retirada and El Cubo. We know some details about the construction of the fortress because the Crown accountant, Jerónimo de Herrera, was dispatched by the Governor General to Quelang to check on the performance of Governor Palomino. He made statements from August 1637 to September 1638, which covered the first half period of Palomino governorship; in these statements he recorded all the expenditures from and revenues into the royal coffers, and from these materials today we can learn, for example, how much lime was supplied during these 14 months (see Table 1).

This table offers us more ideas about the construction of the fortress. On the one hand we can see that sergeants Francisco Hernandez<sup>14</sup> and Andres Narváez were involved in the production and supply of lime. This may have been an additional job that officers, with the help of some soldiers, could volunteer to do. But this activity must also have been

open to anyone who could provide this material, as the entry of 27 February 1638 refers to five unspecified lime workers. Regarding the variability of the price—one peso for 10 or 12 (or even 20) cavans—it might have depended upon the quality of the lime, because the same person (Sangley Benua) obtained different prices on two occasions; and on the same day (January 2<sup>nd</sup>) two different suppliers also got different prices.

On the other hand, we can see how the construction work relied on Chinese laborers. They supplied lime, like Sangley Benua (on two occasions) or the group of seven sangleys; but they were also in charge of the construction itself. In the same record, another entry states that on 29 April 1638, Sangley Lanco, a mason, was paid 190 pesos for making 97 fathoms of the wall of bastion San Sebastian, being paid two pesos and four reals per fathom. This reference to the work done on bastion San Sebastian seems to confirm our previous supposition that this was the bastion that had the stone base but no stone walls.

When the Crown accountant Jerónimo de Herrera was preparing to leave Quelang he made a detailed description of the construction work already completed<sup>15</sup> pointing out that:

1. There is a bastion [probably San Sebastian] that was finished around March after several months of work and is now in good condition.

TABLE 1: SUPPLY OF LIME FROM A	LICUST 163	7 TO SEDTEMBED	1638
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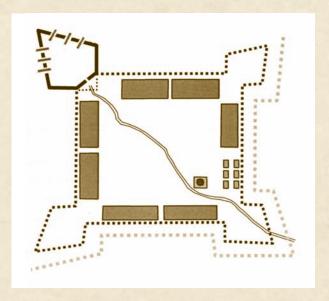
Date	Provider	Cavans of lime	Lime price per cavan
1637, 25 November	Sangley Benua	850	12 cavans = 1 peso
1637, 23 December	Francisco Hernández	2540	10 cavans = 1 peso
1638, 2 January	Sangley Benua	550	10 cavans = 1 peso
1638, 2 January	Sergeant Andres Narváez	1200	12 cavans = 1 peso
1638, 27 February	7 sangleys	1237	12 cavans = 1 peso
1638, 4 May	5 lime workers	1300	13 cavans = 1 peso
1638, 3 July	Sergeant Andres Narváez	180	20 cavans = 1 peso

Source: J. E. Borao, Spaniards in Taiwan, pp. 282-284 (note: 1 cavan = 75 liters aprox.)

- 2. In bastion San Juan [probably the southern one], Palomino built a splendid vault that can be very useful to store gunpowder.
- 3. Bastion San Antonio, which was too low and not fortified with quicklime, was improved.
- 4. The house of stone that served as a hospital inside the fort had collapsed. To replace it, a very good hospital was built at a spot by the seashore. The governor also lives in this other house.
- 5. The construction was carried out at very little cost to the Royal Treasury. For many of the men from Pampanga who came recently turned out to be very good officers, because the one who works the most gets promoted to sergeant or bailiff.
- 6. Expenses were reduced because a limestone quarry had been recently opened, yielding 8000 cavans of quicklime

We think that the construction of the fortress was completed a few years before the final engagement with the Dutch. Thus, in those last years of Spanish presence, the bulk of the work consisted of implementing the orders to demolish Fort Santo Domingo in Tamsui, La Mira, El Cubo and La Retirada. Nevertheless, the last governor of Quelang, Gonzalo Portillo (1641-1642) rebuilt El Cubo and La Retirada shortly before the final battle, thinking that without them the main fortress would be defenseless. Probably it was during these last years that the Spaniards added a dry ditch—mentioned in Dutch sources—to isolate the fortress; if needed, the ditch could be filled with seawater. 16

We can presume that in the sieges of 1641 and 1642 the fortress was fully operative, but we don't know for sure because the fight between the Spaniards and the Dutch at the end of August 1642 took place in the hills and the fortress never came under siege. It seems that the Spanish governor Portillo, in view of the numerical inferiority of his troops, decided to surrender, but not without presenting before a testimonial defense with the few newly arrived soldiers. In this way, while avoiding a massacre, he would not be accused of cowardice. The Dutch took La Mira almost without resistance, while a handful of Spaniards put up a strong resistance from La Retirada for five days, until it was totally destroyed. Once the Dutch had taken La Retirada they had the Santísima



The Fortress of Quelang according to the map of Simon Keerdekoe (1654).

Trinidad (as they called San Salvador) totally at their mercy, even though it had enough provisions to survive a siege of eight months.<sup>17</sup> Nevertheless the Spanish governor Portillo made a timid attack, shooting towards La Retirada from the bastions San Sebastian and San Antonio el Chico. The Dutch answered with two cannon-shots, enough for Portillo to confirm his defenseless position. The next day he surrendered a totally unharmed fortress.<sup>18</sup>

According to the 1641 inventory, the fortress had 33 cannons of different sizes, and five more in El Cubo. 19 The cannon that had been placed in La Retirada and in La Mira before they were dismantled had been either placed inside the main fortress or sent back to Manila. This figure matches that provided by the Dutch in the inventory they made after conquering Quelang island; they placed the number of cannons at forty. 20 After this, the fortress underwent a series of reconstructions and demolitions, depending on the strategic requirements of the island's new masters.

# THE FORTRESS DURING THE FIRST DUTCH PERIOD (1642-1661)

Once the Dutch occupied the Spanish fortress, they started wondering what to do with it. Finally on 15 June 1643, there was a meeting in the VOC Batavia headquarters to decide on the future of the

fortress: "to continue as it is now, or to tear it down in part or totally, so it can be used in the most suitable way." After some deliberation, they came to the conclusion that the buildings in Quelang were of no use whatsoever, and that they should be torn down and the garrison used elsewhere. On 11 September 1643, a year after the Dutch seized San Salvador fortress, the VOC transmitted the order that three of the bastions and the walls between them should be destroyed, leaving intact only bastion San Antonio el Grande to guard the entrance of Quelang Bay. This was the order of Governor Maximiliaen Le Maire to captain Harouse:

"To this end, Your Honor has been given a load of crowbars and other tools. One shall start tearing down the castle La Santísima, then the small fortress and then the church, monastery, and the stone houses. If it takes too much effort to demolish the walls with tools, Your Honor shall resort to gunpowder to blow up the more solid parts. If there is no other way of getting the job done, Your Honor can spend 20 to 25 barrels of gunpowder, but no more." <sup>21</sup>

The Dutch renamed the one remaining bastion Noord Holland. The stones of San Salvador were used to build fortifications in Tamsui. This situation continued for twenty years (1642-1662) because as they acquired greater control over Taiwan, they no longer saw the need to maintain a fortress that would defend them against external attack. They enjoyed good relations with the English, and had successfully kept the Spaniards in Manila at bay. The Japanese had closed their doors to all foreigners and the Chinese had their own internal problems to solve on account of the Tartar invasion. This is why the map of Simon Keerdekoe, made in 1654, shows the fortress reduced to its main bastion and complete, as it looked during the Spanish period.

During these twenty years, the main architectonic concern of the Dutch was to keep the Tamsui fort and the redoubt Victoria (formerly La Mira) in good repair. In 1646 governor Caron in Tayouan, after hearing the reports from Tamsui, declared that the fortress could be considered finished.<sup>22</sup> The way he distributed his soldiers also confirmed the hierarchical relationship between the two forts. Tamsui continued to be more important than Quelang; and it was in Tamsui that an under-merchant with authority over both places

was stationed. We can better understand the relative importance of the two forts by comparing the number of soldiers assigned to each:

1646	5 February	22 April	18 May	28 May
Tamsui	63	50	48	45
Quelang	48	40	(no data)	20

After the fort in Tamsui was rebuilt, attention was drawn to Quelang, especially in two respects: the *corps du garde* and the old house of the former Spanish Governor. We cannot be sure if this *corps du garde* corresponded to the house built on top of Noord Holland bastion, or if it was situated at the entrance of the island (in the former El Cubo), or somewhere else entirely. But its roof was in continuous need of repair, as the frequent demand for tiles tells us. In 1651 there are several reports on these problems, stressing that the repair of provisional bamboo dwellings for hospitals, smithies, and so on was very expensive to the VOC, and suggesting that these buildings should be made of stone.<sup>23</sup>

The house of the Spanish governor is described as a very large, and structurally well preserved, although in need of many small repairs to make it habitable. In the meantime it was being used to store provisions, gunpowder and ammunition. The barracks were in good condition, although they could not prevent the soldiers from continuously contracting illnesses.

# THE FORTRESS DURING THE SECOND DUTCH PERIOD (1664-1668)

In 1662 the VOC once again tried a new approach to the Chinese trade, appointing Bort as the fleet commander to negotiate with China. Bort made several trips in 1662, 1663 and 1664, establishing outposts in Fuzhou and Quelang. On 20 August 1664, the yacht *Niewendam* appeared in Quelang. All the Chinese there, about thirty persons, quickly boarded their vessels to escape to mainland Formosa. The VOC found some abandoned Chinese straw-and-bamboo huts and some iron tiles, rattan, lamp oil, and coal. On 27 August, the rest of the VOC fleet arrived in Quelang.

We have a map of Quelang as seen from the sea, representing the arrival of Bort fleet in 1664. The image rendered by Bort's artist is fairly similar to the map Keerdekoe made ten years earlier.<sup>24</sup> This is the period for which we have better documentation on the fortress, because the post was the only one the Dutch had in Taiwan, and it was expected to have a very strategic value.<sup>25</sup>

This new factory in Taiwan had to function as a relay station for Chinese sugar, gold, silk, and other commodities. Chinese merchants crossing the Taiwan straits were supposed to furnish these goods in exchange for Japanese silver and spices from the Indonesian archipelago or deer meat from Taiwan. The goods were to be stored in warehouses, awaiting the favorable monsoon winds that would take them to far-flung destinations all over Asia. The VOC envisioned a kind of "New Taiwan Factory" that would be large-scale enterprise, which was why the company also invested heavily in improving the defense facilities in Quelang. But, trade never took off.<sup>26</sup>

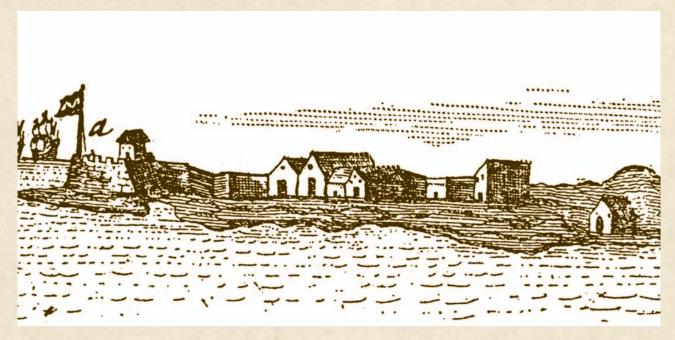
Regarding the structure and building of the fortresses, commander Bort started reconstructing the redoubt Victoria. He also reinforced the bastion Noord Holland, and began working on the reconstruction of the other three bastions of the old fortress San Salvador. Of utmost importance was the bastion Oosterpunt,

also called the Half Moon Bastion, which was the eastern bastion. It controlled the low land east of the fortress and secured the well in the middle of the fortress' square. The northern bastion, called Zeeburg, protected the fortress from sea attack. A document of January 1666 states:

"We currently paid a visit to the army corps of this fortress, the living quarters, the magazine, the hospital and other places worth seeing. The new bastion Zeeburg has been built from its foundations and has reached a reasonable height. The walls between bastion Zeeburg and main bastion Noord-Holland, and on the north side the walls between bastion Zeeburg and bastion Oosterpunt, have been rebuilt in a relatively short period and are rather solid... One weakness is that the walls are too low and should be doubled in height... The commander ordered the construction of a small Half Moon Bastion on the spot were the former southern bastion stood. This small Half Moon Bastion is about to collapse and should be renewed or destroyed, as it cannot offer adequate resistance to enemy attack."27

The bastion Zuijderpunt, also called the Small Half Moon Bastion, was the southernmost bastion that controlled all shipping within the bay. By the end of

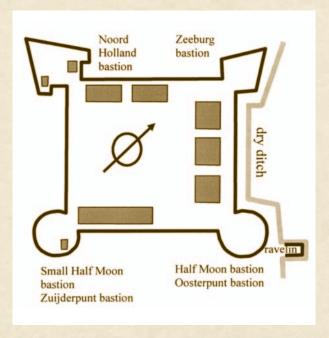
The Fortress of Quelang in 1664. From the Voyagie of Bort (1670).



1665, all these bastions were up and running except for Zuijderpunt, which was in bad condition.

Several defense facilities separated the fortress from the rest of Quelang Island. First, there was a stone bulwark between Oosterpunt and the inner bay beach of Quelang Island. This bulwark contained a gate that was the only passage between the fort and the eastern flatlands. Near the bulwark was a ravelin guarded by two pieces of artillery. From the ravelin, a wall stretched to the sea so that nobody could pass through. Furthermore, a deep dry ditch dating from the Spanish era stretched from bastion Zeeburg beyond bastion Oosterpunt, forming a barrier between the fortress and the flatlands. This ditch could be filled with seawater, turning the fortress into an artificial island, completely cut off from Quelang. Inside the fortress, living quarters for the soldiers were built, along with a gunpowder house, a magazine, houses for the officers and married couples, a smithy, warehouses, and a house for the commanding officer. By the end of 1665, it seems that San Salvador, under its new name, fortress Noord Holland,28 had regained its old glory and it was ready to face an attack by the forces of Zheng Chenggong (Koxinga), which came in May 1666.

Upon their arrival in Quelang, VOC intelligence reported that only a handful of Koxinga's soldiers were stationed in Tamsui.<sup>29</sup> On 4 February 1666 elders of several aboriginal villages (such as Kimaurri, St Jago, Ritsoeck, Kipanas) went to Quelang with news of recent troop deployments in Tamsui. According to the elders' information, 500 soldiers had reached Tamsui from Anping by land. They added that about 700 or 800 of Zheng's troops were already stationed in Tamsui, and that thirty junks with more troop reinforcements were expected to arrive in two months. It was rumored that these soldiers had come to attack Quelang and pillage the aboriginal villages.<sup>30</sup> To deal with this threat, the VOC started to build extra fortifications. On 21 February 1666, the Council of Quelang resolved to start constructing a small redoubt on the foundations of the former Spanish fortress El Cubo.31 The small redoubt was to be called Nobelenburg; however, Cornelis Vichbee's map mistakenly referred to it as "Eltenburg." This redoubt was supposed to prevent anyone from entering the bay through the northeastern channel. As an impending invasion of Zheng's troops became more and more evident, the Quelang Council resolved on

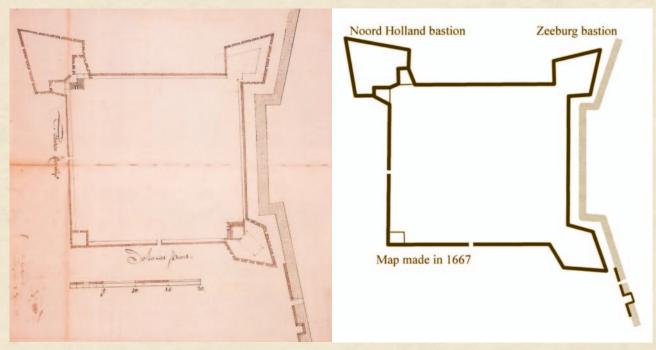


The Fortress of Quelang according to Cornelis Vichbee, 1666.

17 April 1666 to further reinforce its defenses. Orders were issued to finish Nobelenburg as soon as possible, as well as to build the walls of Noord Holland higher, to build extra walls, and to make gabions. Most of the straw roofs of the buildings in the fortress were removed to diminish the risk of fire.

The Zheng army landed on 11 May 1666 and launched a relentless attack on the fortifications for several days. An estimated 6,000 Zheng soldiers participated in the operation, engaging 300 VOC defenders. After a siege of nine days, the Zheng army, with about 1,000 wounded or dead (according to a Dutch account), withdrew to Tamsui.<sup>32</sup> The reconstructed fortress had passed its first serious test.

Redoubt Victoria was reinforced after the Zheng attack. The ruins of the former Spanish convent were leveled to prevent the enemy from using it as a battery facility against the fortress. The bastion Oosterpunt (Half Moon Bastion or Bultenberg bastion) proved to be a weak spot in the entire defense system because it was built on sand and had no solid foundation. The walls of the bastion fell beneath the enemy's artillery and even threatened to collapse when the Dutch fired their own cannons. Oosterpunt had to be replaced with a new bastion (with a cellar) on the foundations of the former Spanish bastion, San Sebastian.



Map made in 1667.

Stones from the aforementioned Spanish convent were used as building material. Construction began on 13 December 1666 and the bastion was finished on 15 January 1667 (this was the bastion that the Japanese excavated and photographed in detail in 1936). Inside the fortress, a new smithy and a shop that also functioned as a dormitory were added. The cellar under bastion Noord-Holland was also expanded. Outside the fortress, a new hospital, a carpenter's shed and a pigsty were built. But quite unexpectedly, on October 1668, the VOC garrison abandoned Quelang after blowing up the buildings, leaving the place in ruins.<sup>33</sup>

We know very little about the fortress after the departure of the Dutch, during the long period from 1700 to 1925, although its image appears in Chinese books in an idealized manner, like this one from the end of the 17<sup>th</sup> century.

## ATTEMPTS TO PRESERVE THE RUINS OF THE FORTRESS (1924-1937)

Interest in the fortress re-emerged with a vengeance in 1924, with the first modern attempt to inventory Taiwan's historical relics earmarked for preservation. In that year the Japanese colonial government issued some local governments with a list

of buildings that were targeted for preservation in their respective districts. This was accompanied by an order to look into the status of the conservation of the ruins. The response to this order was scant and unsatisfying, prompting the Central Colonial Government to issue the order again in 1927, urging local authorities to wrap up the investigation.

The implementation of this order moved so slowly that the colonial government had to give local authorities yet another push. First, on 21 September 1930 the Japanese issued the Monuments Conservation Law designating certain categories, such as historical or natural sites, worthy of preservation.34 Second, in the same year they established an Investigation Committee which took charge of gathering information and which produced a new list of historical monuments, including, for the first time, the Noord Holland Fortress. As a consequence, two members of the Committee, Osaki Hidezane 尾崎秀真35 and Ite Kaoru 井手薰, visited all the remaining ruins of Hoping Island (called, at that time, Sheliao Island). Their extensive report, completed in 1931, included Noord Holland.36

Scholars also began to get involved. In November 1931, Prof. Murakami Naojiro 村上直次郎 of Taihoku University published a long article on the

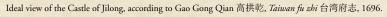
history of the fortress, based on Dutch sources.<sup>37</sup> At the end of the article he mentioned that the southwestern bastion (San Sebastian, or Oosterpunt) was still standing. Soon after this, in July 1932, the Bureau for Internal Affairs of the colonial government published a cyclostyled pamphlet entitled Report on Designated Historical Sites. 38 In Chapter 2 of this work, Prof. Murakami Naojiro repeated his claim that even Zheng Jing 郑经 had attempted a reconstruction of the fortress in 1673, and had installed a garrison of soldiers there. Murakami concluded, "Because this construction dates back to the times of the San Salvador castle, it is worthy of eternal preservation." He ended the article by quoting briefly from the 1931 report by Osaki and Ite. The Committee soon concluded its work, and the colonial government issued the final list of historical sites on 26 November 1933, including Noord Holland.

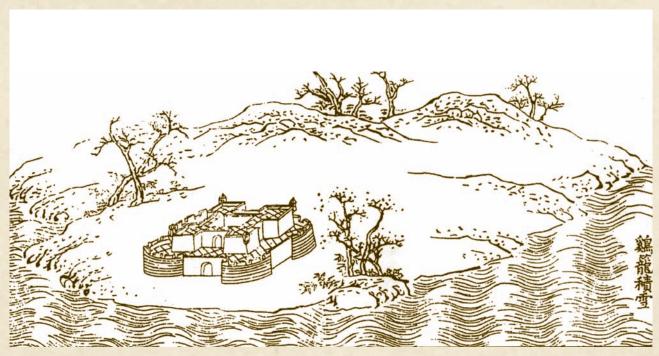
The research by architect Lu Yueh-E 吕月娥 into the development of Jilong Harbor provides us with a view to the other side of the problem. In her Masters' thesis,<sup>39</sup> Lu mentions that the third phase of the development of Jilong harbor took place between 1929 and 1934, and was undertaken because of the increasing scale of trade and fishing in the region. Sheliao Island was remodeled to accommodate, on

its southern side, the fishing port that had previously been located in the inner harbor; this inner harbor was no longer used for business or fishing activities. In addition, the Japanese government began to "feather-bed" the fishery industry by providing equipment and social benefits. The ruins of the fortress were not threatened by these reforms or by the development of the harbor; in fact, the new legislation expressly provided for the protection of this historical spot.

The government's attempt to implement protective measures peaked in 1935 when a second official list of historical sites was published which included a new addition from the Sheliao Island vicinity: Fort Eltenburgh (El Cubo), located on the south-east side. <sup>40</sup> A year later, in July 1936, the Bureau for Internal Affairs formulated a second edition of this list, complete with historical explanations. <sup>41</sup> In fact, "conservationist fever" seemed to spread throughout the island. For example, on 13 March 1936, the counties of Xinzhu and Taidong published lists of historical sites to be preserved (Gaoxiong County followed suit on 8 June 1940).

Early in July 1936, the Jilong government invited members of the Institute of Ethnology of Taihoku University to excavate the castle. Just a







Remains of bastion San Antonio el Grande.

month prior to this, the Office for Research on Taiwan Historical Materials had been formed as a section under the Institute of Ethnology. <sup>42</sup> As a response to the initiative of the Jilong government, some members of the newly established office visited the Jilong fortress on 12 July 1936, and devoted two hours to field research. <sup>43</sup> The Institute postponed the excavation, however, because it was working on another project in Taizhong.

Finally, at the beginning of October 1936, the Office started to prepare for the dig. A chronological account of the project is recorded in the journal of the Institute. Days 9, 12 and 15 of the preparatory phase were headed by Prof. Utsurikawa Nenozo 移 川子之藏 and probably by Prof. Murakami Naojiro himself. Actual fieldwork started on day 19, under Professors Iwao Seiichi 岩生成一, Miyamoto Nobuto 宫本延人, Matsumoto Masanaga 松本盛长, and Nakamura Takashi 中村孝志. The team hired the services of famous Japanese photographer Kobayagawa Tokushirou 小早川篤四郎, who produced a comprehensive collection of one hundred photographs of the excavation, which is preserved in the Archive

of the Museum of Anthropology at National Taiwan University. The excavation team took measurements of the castle's remaining walls and photographed everything of interest, including parts of the bastion San Antonio el Grande. But their main job was to clean the northeastern bastion and to unearth its inner and outer cellars. The only known report on the entire project was a brief account published a few months later in the Miscellany section of the Institute's journal.<sup>44</sup> The photographs were preserved in the Department of Anthropology of National Taiwan University. In 2002, with the kind assistance of the staff of this department, I published some of the most representative pictures in the collection.<sup>45</sup>

The lack of the diary of excavations made very difficult to initially understand the pictures in relation with the fortress shape. Finally, however, a comparison with the Dutch map of 1667 clarified any remaining doubts. In this page we have one photo of bastion San Antonio el Grande (angle 1 of the general floor map).

But most of the pictures are related with the bastion Oosterpunt (San Sebastian bastion), offering

a clear picture of the state of conservation of this part of the fortress as of 1936, particularly its inner cellar (angle 12), and the nearby foundations (angle 4). These photographs also document daily life on Sheliao Island at that time: its wooden houses, the existence of a small factory to produce probably bricks, a house of leisure, and so on.

Any scholarly report on the excavation that may have been produced, detailing the measurements taken from the castle and all of the team's findings, remains unpublished. Nevertheless, in 2004, and thanks to my assistant Lu Po-hsuan 吕柏萱, I gained access to the "diary of excavation" kept in the archives of the Library of Tenri University (Japan),46 which provided a few more details that do not appear in the pictures. Because the excavation methodology at that time was simple than it is now, these details are still not abundant, but at least they help provide an understanding of the chronology of the excavation work. Considering the discrepancy between the small size of the diary I consulted and the large size of the notebook carried by the archaeologists in the photographs, however, it is still possible that the small

diary at Tenri University was not the main diary of the excavation.

# FINAL DESTRUCTION OF THE FORTRESS

It seems that the archaeological campaign of 1936 was part of the trend toward preserving Taiwan's historical heritage; but then why was the fortress suddenly and totally destroyed in 1937? Part of the answer can be found in the work of Lu Yueh-E. She explains that the period 1935-1943 saw the need for yet another new expansion of the harbor. These years comprised the fourth phase of the construction of Jilong Harbor. Part of this expansion focused on Sheliao Island, where the Jilong Harbor Bureau, an office under the Japanese Colonial Government, started building shipyards next to the fishing port of Sheliao Island. More and more ships were docking at the harbor, creating greater demand for new equipment and facilities. Civil engineers were trying to make a harbor large enough not only to meet the needs of the colony, but most likely to gear up for

Foundation of the wall near bastion San Sebastian.

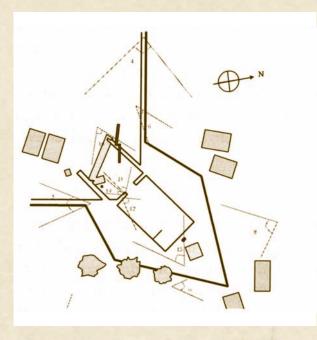


the strategic requirements of the impending war with China. It was at this point that the fortress was subject to a real threat. In fact, all the ruins that remained were demolished; the terrain was leveled and, in 1937, construction began on the first dry dock, which overlapped half of the old fortress.<sup>47</sup>

#### General floor plan.



Floor plan of bastion San Sebastian.



#### THE PRESENT SITUATION

As far as I know, after the destruction of the fortress, few scholars have taken into consideration the possibility that any part of the structure remains. Only local people still know that there was once a fortress on that spot; some very elderly residents even remember seeing it. In the course of Taiwan's industrial development, the shipyards of Jilong played an important role in the island's international trade; but today the shipyards have entered a period of severe decline. The whole situation makes it much easier to think again of the existence of the Quelang fortress, and to consider the possibility of recovering and preserving its foundations, should any remains be left.

It is not easy to find the precise location of the foundations of the fortress in the compounds of the present-day shipyard simply by conventional methods of comparing old maps with modern ones; but still it is possible. First we can locate the fortress on a Japanese map and then, by observing the location of the first dry dock, we can guess with greater accuracy the location of the foundations, because this dock is still extant.<sup>48</sup>

Newer techniques, however, hold greater promise for locating the fortress foundations with far greater precision. Recently, the Ground Penetrating Radar technique (GPR)<sup>49</sup> has been useful for archaeological purposes, and was used successfully at the Dutch fortress of Tayouan in Anping to identify the existence of the remaining foundations of that fortress. At the end of 2002, after learning that a team conducted by Prof. Lee from the Engineering Department of Cheng-kung University had made a reconstruction of the foundations of Anping castle, I suggested the use of GPR.

I contacted Prof. Lee to propose that we do the same kind of research in Jilong as had been done at Anping. The situations of the Anping and Jilong fortresses are quite different, in part because some of the remains of the Anping fortress are still visible, making it easier to locate the rest of the foundations with the help of old maps, whereas in Jilong, everything was destroyed or buried. Even as we began the research, we could not be sure whether the foundations were still there or had been dismantled and reused to build the shipyard.

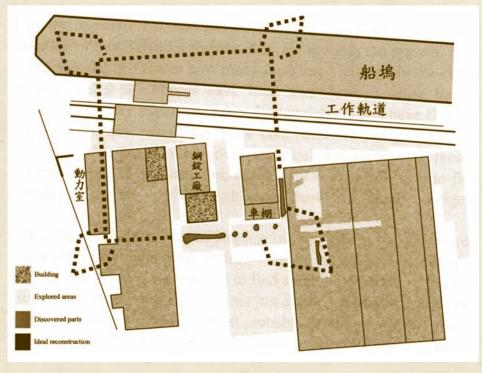
In November 2002, we began exploring the site with the GPR technique. The work was easy to

conduct because the area is quite empty, and the shipbuilding company helped us by removing cars from the area. Nevertheless, some areas that were covered by iron pans or machines were impossible to explore. The results we got were very promising, as they showed two lines of stones, located 1.5 meters underground, that formed an 90-degree angle. We measured the area and transferred these results to a general map. Making two basic assumptions—first, that the angle formed by the irregular lines and points that appear on the map corresponds to the angle

of the walls near Bastion San Antonio el Grande, or North Holland (an assumption that is borne out by comparisons between old maps and Japanese maps), and, second, that the size of the fortress is 99m (as stated by Kees Zadvliet)—we came up with the image on this page as the ideal reconstruction of the location of the fortress, rendered as a floor map and an aerial photograph.

#### THE FUTURE OF THE FORTRESS

We have discussed the "conservationist fever" for historical relics that spread through Taiwan led by the Japanese colonial government, and its failure to achieve some of its goals, such as the preservation of San Salvador fortress. In recent decades, we have also seen numerous Japanese buildings or Chinese sanheyuan 三合院 houses in the center of Taipei torn down because they were too old, run-down, and located in expensive areas. Fortunately, things have changed dramatically in the past years and a new sensibility has taken root. Nowadays in Taiwan there is an "museographic fever" that has led the government's cultural agencies to recover and display the artifacts of Taiwan history. More often than not, however, these



Reconstruction of the location of the fortress, rendered as a floor map and an aerial photograph (below).

agencies have to face the fact that, despite plentiful budgets for building museums, there is too little left to be displayed.

I therefore suggest that the southern corner of Hoping Island—where the old fortress was located, which is now occupied by a shipbuilding factory—



should be put under special protection as soon as possible. But, critics may ask, even if we manage to find the foundations of the old San Salvador fortress, what would be the point of preserving them? Aren't they just another archaeological remnant of European architecture displaced in Asia? I do not think so, for in all likelihood the fortress lies on top of a very rich archaeological site. For centuries, it was one of the main points of entry into Taiwan, and its grounds and submarine environs must contain numerous relics that could greatly contribute to our understanding of the history of Taiwan.

In most developed countries, the shipbuilding industry is no longer sustainable, and the government usually enhances and adapts for public use the spaces the shipbuilders leave vacant. Such was the case, for example, in Bilbao, Spain. To be sure, the existence of the shipbuilding industry on Hoping Island indirectly helped preserve the place from the ravages of construction and ownership division. In that sense, the technical facilities are already in place for it to be converted in a kind of cultural or archaeological theme park; we are not too late. Besides, the government is the main stockholder of the shipbuilding company, which can facilitate the adaptive reuse of the space. But if nothing is done, that magnificent place, the southern cape of Hoping Island that faces the inner part of Jilong Bay, one of the most beautiful coastal scenes of northern Taiwan, could easily be converted in another high-end residential area. If this is the case, the city of Jilong could lose its last opportunity to enhance the cultural status of Taiwan.

Since the end of 2002, I have tried to call the attention of local and national authorities in Taiwan to the importance of preserving this site, but my efforts have achieved nothing. More work needs to be done with the GPR system to see if we still can discover new parts of the foundation in addition to the walls we have found already. But of course, only a final excavation will confirm the existence of the remaining foundations. If



successful, this would provide even greater incentive to design a virtual reconstruction.

The site has many other possibilities because it is located in a wonderful natural area. The future of the shipyard is unsure, since such businesses are rarely competitive in developed economies such as that of Taiwan. But before the area is converted into a luxurious suburb, there is an urgent need for the authorities concerned to undertake archaeological excavations that can prevent the cultural depredation of the region. For example, in one of my attempts to engage in a joint venture with an archaeologist to excavate the remains of the fortress, we saw an old Japanese workshop, complete with old tools and an enormous forge, still standing there untouched. But exactly on that day, workers started to demolish it; we managed to stop the work for a while, but some time later the entire structure was totally razed. To offer some ideas for the preservation of the area, I propose a general concept that is conveyed through the artist's impression, drawn by architect Lin Hao 林豪 on 15 August 2004 (above). I hope that it may inspire the people of Jilong to preserve the traces of their own history. RC

#### **NOTES**

- Sebastián Fernández de Medrano, El architecto perfecto en el arte militar, Brussels, 1700.
- 2 During the last years of the Spanish control of the fortress, the Dutch called the fort *La Santísima Trinidad*, because the island was known also as Santísima Trinidad.
- 3 Most of the documents used in this article come from J. E. Borao, Spaniards in Taiwan.
- A soldier earned 48 pesos a year, while the governor of Jilong earned 516 pesos. See J. E. Borao, *Spaniards in Taiwan*, pp. 336-342.
- 5 J. E. Borao, Spaniards in Taiwan, pp. 126-127.

- 6 Ibid., p. 13-142.
- 7 Ibid., p. 141.
- 8 See the report of Pedro de Jara Quemada in 1644 (J. E. Borao, *Spaniards in Taiwan*, p. 494).
- 9 J. E. Borao, Spaniards in Taiwan, p. 259.
- 10 Ibid., p. 245.
- 11 Ibid., p. 272.
- 12 This was the opinion of Jara Quemada (J. E. Borao, *Spaniards in Taiwan*, p. 494), and others. But Governor General Corcuera stated in the trial he underwent for the lost of Isla Hermosa, that his orders were to keep save the place (J. E. Borao, *Spaniards in Taiwan*, p. 509).
- 13 At that time Corcuera had decided to reduce the number of soldiers on Isla Hermosa. In this document he acknowledges that this number of 125 men is not big, implying that in fact the fortress could accommodate more people.
- 14 He was the former governor. His situation was different because he was permanently in Jilong, and having the rank of Sergeant Major was appointed governor for two years.
- 15 J. E. Borao, Spaniards in Taiwan, p. 285.
- 16 Ibid., p. 670.
- 17 Ibid., p. 428.
- 18 Ibid., p. 434.
- 19 Ibid., p. 343.
- 20 Ibid., pp. 396-397.
- 21 Ibid., p. 463.
- 22 VOC 1160, ff. 199v-202.
- 23 VOC 1183 ff. 777-790.
- 24 Indeed, this bastion remained relatively unchanged for centuries, until 1937, when the Japanese tore down all the ruins of the fortress.
- 25 Until now the most complete study on this matter is the doctoral dissertation by J. L. P. J. Vogels, Het Nieuwe Tayouan: De Verenigde Oostindische Companie op Quelang (1664-1668), Rijksuniversiteit Utrecht, July 1988.
- 26 VOC 888, ff. 207-208.
- 27 J. E. Borao, Spaniards in Taiwan, p. 672.
- 28 VOC 1253, ff. 1294v-2202; VOC 1257, ff. 1297-1299.
- 29 VOC 1257, f. 2196v.
- 30 VOC 1257, f. 1307.
- 31 VOC 1257, f. 1028.
- 32 VOC 1258, ff. 1659-1662. See also Vogels, *Het Nieuwe Tayouan*, cit., pp. 23-36, 43-44.
- 33 Vogels, Het Nieuwe Tayouan, cit., pp. 44-46.
- 34 It is worth mentioning that this law granted the Governor General the right not only to designate but also—under special conditions—to revoke the designation of monuments.
- 35 Osaki was a collector and vendor of local antiquities and aboriginal artifacts. He sold several pieces to the Ethnological Museum of Taihoku Imperial University.

- 36 Oddly enough, in 1931, when the local authorities finally presented their list of historical monuments to the colonial government, the government of Jilong made no mention of the Noord Holland Castle.
- 37 Murakami Naojirō 村上直次郎, Jilong de Hongmao Cheng 基隆 的红毛城 (The Fort Hongmao in Jilong), Taiwan Times, Nov. 1931
- 38 Shijimingsheng zhidingwujian shuomingshu 史蹟名勝指定物件説明書 (Report on Designated Historical Sites), pamphlet, Printing House of the Presidential Office, May, 1932.
- 39 Lu Yueh-E 吕月娥, Rizhishiqi Jilong gangkou dushi xingcheng licheng zhi yanjiu 日治時期基隆港口都市形成歷程之研究 (Historical Research of the Evolution of the City and Harbor of Jilong during the Japanese Governance), Master thesis in the Department of Architecture of Chung Yang University, 2000. I wish to thank Ms. Lu for the information she provided on the construction of Jilong Harbor, especially for many details and insights related to the implementation of the Monuments Conservation Law.
- 40 Another list came up in 1941.
- 41 Shiji diaocha baogao 史蹟調查報告 (Investigation on Historical Sites), 2<sup>nd</sup> ed., 1936.
- 42 Nanpō Dôzôku 南方土俗, Vol. II, No. 1, May 1937, p. 173.
- 43 Ibid., Vol. IV, No. 2, August 1936, p. 120.
- 44 Ibid., Vol. II, No. 1, May 1937, p. 174.
- 45 See Spaniards in Taiwan, 2002, pp. xli-liii.
- 46 The diary ended in this library because one of the members of the archeological excavation, Prof. Nakamura, donated all his materials to that university, where he ended his scholarly days.
- 47 According to "Taiwan's Harbors," (1938), a dry dock for 20,000-ton ships began construction in 1937 and was scheduled for completion by the Japanese government in 1939. However, according to posterior data published in 1957 by the Jilong government, construction was not completed until 1941. This source also mentions that a second dry dock, for 10,000-ton ships, was scheduled for construction between 1942 and 1945. It was not completely finished owing to the onset of the war (From Lu Yueh-E).
- I have to say that, when I first published my guess as to the location of the fortress in the second volume of *Spaniards in Taiwan*, it was a good approximate location, but not a precise one, because at that time I didn't know of the existence of the map in Figure 6. In any case, I don't believe that Figure 6 is a perfect drawing, because it is a very small part of a larger map representing the whole harbor. The line I added may better represent the location of the coastline.
- 49 Ground penetrating radar (GPR) is an electromagnetic geophysical method that involves transmitting radar energy into the subsurface and receiving radar reflections off of subsurface interfaces. The method is analogous to the seismic reflection method.

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Appendix: Memorial describing of the forts in San Salvador in 16361

Letter of Alonso García Romero, written in Manila, on the 12th of July 1636. García Romero, after finishing his appointment as governor of Isla Hermosa, reported to the Viceroy of New Spain about the situation of the island. He includes a memorial of the situation of the forces.

"Most excellent lord: I served as Governor of Isla Hermosa for two years and subjected the natives in the vicinity to our power, an accomplishment that my predecessors had not achieved in eight years. Over a thousand converted to Christianity; the other towns asked for priests because the scarcity has meant that they receive nothing more than the waters of Baptism. And the commerce, my lord, I established in a way that over 300 Vp worth of cloth and silk of all types were put to use in two years. A quantity of silks, satin, velvet and other goods went back to China due to the lack of money... I enclose a description of the armed forces of Isla Hermosa and the state in which I left them:

a) The principal fortification forms a square that consists of four elevated walled fortresses: two are of solid stone; one is only of stone (and surrounded by) a moat; the other is of wood. All four stretches of wall are of solid stone and lack only the parapets.

Within sight of this fort are another three. The farthest is La Retirada, which, following a straight line, should be 600 paces away. The other two are 500 paces away. All are completely of solid stone. La Retirada is triangular in shape, with passages on each side. It is invulnerable. The others a ... enough to defend an inlet that protects the other fortress... All assist the main fort with the following artillery supply:

In the fortress of San Salvador, which is the principal fort:

- four bronze cannons, each one an 18-pounder
- two fourth-grade cannons of bronze, made like a culverin; each one a 12-pounder
- one cannon-type bronze artillery piece; an eight-pounder
- one sacre of alloyed bronze; an eight-pounder
- one sacre of alloyed bronze; an eight-pounder
- three bronze sacres ...; each a five-pounder
- three falcons, one of cast iron; each one a four-pounder
- two artillery pieces of cast iron; cannon-type; each one a four-pounder.

The San Millán (La Mira) fort has the following artillery:

- one fourth-grade cannon in bronze; a 12-pounder
- two sacres of bronze; each one an eight-pounder
- a bronze falcon; a four-pounder.

The artillery in La Retirada (Fort San Antón):

- a medium-sized low-grade bronze culverin; a 12-pounder
- two bronze sacres; each one an eight-pounder
- a cast-iron blunderbuss; a 20-pounder

The artillery in the turret of Fort San Luis (El Cubo):

- a low-grade sacre in bronze; a seven-pounder
- two bronze falcons; each one a four-pounder

b) The artillery and the condition of the fort called Santo Domingo in Tamchuy. By land, the distance from the main fortress is 15 leagues; 10 leagues when following a straight line. Its site and dimensions consist of three elevated wooden fortresses and a watchtower with a continuing wall that forms an irregular square, as the area is big and the three elevated forts do not form a triangle. I would have wanted to remedy this if I had held that post for a year more.

It has the following artillery:

- a third-grade bronze cannon, each one a 15-pounder
- two bronze sacres, each one an eight-pounder
- a bronze artillery piece, cannon-type; an eight-pounder
- a second-grade ... of bronze; a five-pounder
- a cast-iron falcon; a three-pounder
- two cast-iron blunderbusses; each one a 12-pounder

The following comprise the gunpowder and ammunition in all the fortresses:

- Over 200 quintales of gunpowder in porcelain and clay jars that best conserve them V200
- Over 300 artillery pieces V300
- 18-pound cannon balls V649
- 15-pound cannon balls V433
- 12-pound cannon balls V633
- Nine-pound cannon balls V132
- Eight-pound cannon balls V309
- Seven-pound cannon balls V163
- Five-pound cannon balls V414
- Four-pound cannon balls V804
- Three-pound cannon balls V663
- Two-pound cannon balls V236
- Diamond-tipped bullets in cartridge belts V290

These forts are defended by three companies of the Spanish infantry, each with 80 soldiers, or a total of 240:

- 15 breast-plated pages who are standard bearers, play drums and fifes
- a sergeant major, who is one of the good and strong captains
- two adjutants of the sergeant major
- 8 posts for accountants, paymasters and supply-keepers of the royal house, and other minor officers

#### • 11 artillery men with their constable

- 10 sailors and six cabin boys who go about in the brigantines
- one company (40 men) of soldiers from Pampanga
- another company of 60 spirited natives from Cagayan
- 12 carpenters for the artillery wagons
- 95 Negroes from ... who serve as construction laborers.

<sup>1</sup> J. E. Borao, Spaniards in Taiwan, pp. 258-261.