

COUNTRY AND MARINE PARKS BOARD

Conceptual Designs and Stakeholder Engagement on Setting Up of an Open Museum of Historical Relics in Country Parks

1. Purpose

1.1 This paper aims to brief members on the conceptual designs and preliminary findings of the stakeholder engagement for the setting up of an open museum (OM) of historical relics in country parks (CPs).

2. Background

2.1 The Agriculture, Fisheries and Conservation Department (AFCD) commissioned the “Consultancy Study on the Enhancement of the Recreation and Education Potential of Country Parks and Special Areas in Hong Kong” (Enhancement Study) in January 2017 to explore opportunities for enhancing the recreation and education potential of country parks and special areas, aiming to enrich visitors’ experience and meet the growing demand of the public for countryside recreation. The Enhancement Study was completed in 2019 and four enhancement proposals were put forward, including (i) enhancement of existing facilities; (ii) setting up of an OM; (iii) provision of tree top adventure facilities; and (iv) provision of glamping sites and eco-lodges. These proposals were well received and considered worth pursuing.

2.2 CPs are mainly designated for nature conservation, countryside recreation and outdoor education. The setting up of an OM in CPs can serve to highlight and recognise the historical identity and value of CPs, enhance the conservation of historical relics in CPs, maximise the educational value of CPs and promote the visitors’ understanding of the local history.

3. The Consultancy Study

3.1 In September 2022, the AFCD has commissioned Mott MacDonald Hong Kong Limited in association with heritage specialist Dr. KWONG Chi Man (the Consultants) to carry out a consultancy study (the Study) to explore the feasibility of setting up an OM in CPs. Two sites have been shortlisted by the AFCD as potential sites for setting up OMs, namely Pinewood Battery in Lung Fu Shan CP and Shing Mun Redoubt in Shing Mun CP. Both sites are listed as Grade 2 Historic Buildings. The scope of the Study includes (i) a baseline review of similar

local and overseas OMs and formulation of the design scope for the proposed OM in Hong Kong; (ii) a preliminary site investigation for the two potential sites; (iii) preparation of conceptual designs for the OMs at both sites; (iv) stakeholder engagement to collect views on the conceptual designs; (v) recommendation of the most suitable site and undertaking of a detailed study on the following: preliminary environmental review of the recommended site, heritage impact assessment or review of heritage impact of the recommended site, practical design plan for the recommended site, and recommendation of contract strategy, cost estimation, implementation programme and mode of operation for the proposed OM at the recommended site.

3.2 Five overseas and one local examples in similar historical context have been selected for baseline review. Comprehensive review has been conducted on their historical background, museum design, heritage conservation, historical interpretation, educational and promotional activities, as well as operation and management arrangement.

3.3 Drawing reference from the examples reviewed, the following principles and standards regarding heritage conservation and museum design have been set out for the conceptual designs:

- (i) The proposed OM should carefully conserve the historical relics to safeguard the heritage integrity and authenticity, while the historical interpretation should not only focus on the relic itself but also reflect a broader view of the cultural landscape as well as the connections between the features.
- (ii) The design style of the proposed OM shall be in tune with the spirit of the site. To achieve this, the OM should adopt a design with minimal intervention on the heritage and in line with the historical context of the site. In addition, design elements should be visually harmonious to the existing historical and natural settings. Impacts on existing landscape and ecology of the site should also be minimised through appropriate design planning.

4. Conceptual Designs for the OMs

4.1 Based on the principles and standards derived from the baseline review, the Consultants have prepared the conceptual designs for the two potential sites. The key elements of the conceptual designs of each site are briefly described below and illustrated in the appendices.

Pinewood Battery in Lung Fu Shan CP

Site Characteristics

4.2 Pinewood Battery was built in 1905 as one of the coastal batteries guarding the western approaches to Victoria Harbour. Located 307 metres above sea level, it is the highest coastal defence gun battery in Hong Kong. It was converted into an anti-aircraft gun battery in the 1930s and suffered severe damage during the 1941 Battle of Hong Kong. It was the only gun battery in Hong Kong that had served as a coastal defence gun battery and then an anti-aircraft gun battery.

4.3 The Pinewood Battery consisted of two gun platforms located on the upper terrace, a command post, an observation post, an underground magazine with individual compartments, a military latrine, a semi-circular battery path, as well as several shelters. The old battery structures are in ruinous condition showing signs of serious damage sustained in the Japanese invasion in 1941.

4.4 After being abandoned in 1941, Pinewood Battery fell into disuse and became part of the Lung Fu Shan CP in 1998. It was then listed as a Grade 2 Historic Building. Over the years, afforestation works have been carried out in the area, turning it into a well-vegetated site. Presently, the area is equipped with a picnic site, toilet, rain shelter, barbecue area and fitness equipment, attracting numerous morning walkers, hikers and tourists, especially during weekends. There is an existing Pinewood Battery Heritage Trail with interpretation panels within the Lung Fu Shan CP. The Battery is located on a section of the Peak Trail between Kotewall Road and the Peak.

Design Approach

4.5 Given that most of the relics of Pinewood Battery are above-ground structures that can be visited in person, it is recommended to set up an OM at Pinewood Battery through providing an outdoor historical trail linking up different points of interest. It is also recommended that the historical narrative along the trail be presented through the following four major themes in chronological order:

- (i) Coastal Defence Period (1900s): covers the Caretakers Quarters and the Gun Platform No. 1 built during the early development of coastal defence.
- (ii) Anti-aircraft Battery Period (1930s): covers the area around Gun Platform No. 2, Observation Post and Command Post, presenting the history of these structures.

- (iii) Battle of Hong Kong (1941): covers the war shelters area, featuring their military architecture and the soldiers' life in the Battle of Hong Kong.
- (iv) Post-war Period (1940s onwards): covers the area near the Splinter-proof Bunker and Stores, highlighting the post-war development and the nature conservation efforts.

4.6 The overall layout plan and major design features are illustrated in **Appendix A**. Signage and interpretation panels can be installed along the historical trail. Historical interpretation can also be provided in the form of audio/videos or augmented reality (AR) by scanning quick response (QR) codes for providing more detailed information and visualising the original structure. The historical information presented in the OM will be inclusive, which not only focuses on the relics themselves but also provides a broader picture, such as the role of the Pinewood Battery in different defence strategies. The general cultural landscape can also be explained in tandem with other relics nearby, such as the position-finding cells outside Pinewood Battery and the boundary stones of the War Department Lot of Pinewood and High West. The setting up of an OM will provide opportunity to unearth the hidden story, such as the underground magazine which is currently buried.

4.7 Guided tours for the public and schools are proposed as the main educational activities to convey historical information and raise visitors' awareness of built heritage conservation. To strengthen the connection of the OM with the surrounding environment, nature appreciation corners are also recommended to feature various nature education elements such as landscape changes, afforestation efforts, and stories about the designation of Lung Fu Shan CP.

Shing Mun Redoubt in Shing Mun CP

Site Characteristics

4.8 The Shing Mun Redoubt was built between 1936 and 1938 as a key part of the defensive line along the Kowloon Ridge (or the Gin Drinker's Line). It is the largest defence position on land in Hong Kong before/during World War II and most likely the only surviving site that has pillboxes, multiple underground tunnels, and open-air concrete firing trenches. During the Japanese invasion of Hong Kong in 1941, the Japanese launched an assault on the Redoubt in the evening of 9 December and captured it on 10 December. The site was then abandoned, and the Government demolished all the pillboxes around 1949-50. Scars of the battle are still visible today, witnessing the intense fighting that took place in the Redoubt.

4.9 The Shing Mun Redoubt was listed as a Grade 2 Historic Building. As an example of military engineering, it comprises five machine gun pillboxes, numerous reinforced firing trenches, an artillery observation post and a headquarters bunker, all connected by an

underground tunnel system. On the whole, the tunnel system built in the late 1930s remains relatively intact, but certain sections of the tunnels are now impassable. All pillboxes and the observation post were demolished after war and are in ruinous condition. Currently, only a few structures such as the firing trench, tunnel entrance/exits and the ancillary observation post alongside the MacLehose Trail can be easily seen, while many features were built underground or at scattered locations.

4.10 The Shing Mun Redoubt was incorporated in the Shing Mun CP and Kam Shan CP in 1977. The post-war afforestation work successfully turned the Shing Mun CP into a well-wooded area. Today, Shing Mun Redoubt is well known to hikers and is of great interest to military historians. There is an existing war relics trail starting from the barbecue site, around 15 minutes' walk from the refreshment kiosk and mini-bus stop at Pineapple Dam. Simple signage and an online guide are provided along the trail, while supporting facilities including toilets, rain shelter, water dispenser and vending machine are provided at the barbecue site.

Design Approach

4.11 The conceptual design of the OM at Shing Mun Redoubt consists of three main parts: indoor historical interpretation core, outdoor historical trail and tunnel exploration. The overall layout plan and major design features are illustrated in **Appendix B**. As most of the relics are scattered and built underground, a new visitor centre is proposed to provide visiting information. It will function as a historical interpretation core providing general overview of the historical content through interpretation panels, an infographic map, photos, videos, exhibits, etc. Advanced technology, such as Cave Automatic Virtual Environment (CAVE), will be explored for providing an immersive experience of visiting the tunnel.

4.12 Outside the visitor centre, visitors will be led through various points of interest on an outdoor historical trail. Similar to Pinewood Battery, historical interpretation by means of interpretation panels, signs and virtual guides through QR codes can be provided along the trail, introducing the relics' features and related historical events. It is also suggested that subject to further technical investigations and assessment on public safety, certain sections of the tunnel system that are in relatively good condition can be open to visitors to provide them with a unique in-person experience.

4.13 To ensure a smooth visiting experience, site enhancements such as provision of safe access and clearing of debris accumulated are recommended for the tunnel and observation post. The conceptual design also includes a lookout point with the scenic view of Shing Mun Reservoir and Tsuen Wan area where visitors can understand the strategic location of the Redoubt and the natural history of Shing Mun, apart from appreciating the natural landscape.

5. Stakeholder Engagement

5.1 A series of stakeholder engagement activities including questionnaire surveys, stakeholder interviews and an engagement workshop have been undertaken since June 2023 to understand the expectations, perceptions and concerns of relevant stakeholders.

5.2 The stakeholders engaged through interviews and workshop included academia, local historians, educationalists, heritage conservation architects, local community representatives, private tour operators, museum operators, green groups and interest groups. All stakeholders of interviews and workshop responded positively towards the setting up of OMs in CPs. While the findings of the questionnaire survey are still under analysis, it is preliminarily observed that more than a half of the 1 009 respondents supported the setting up of OMs.

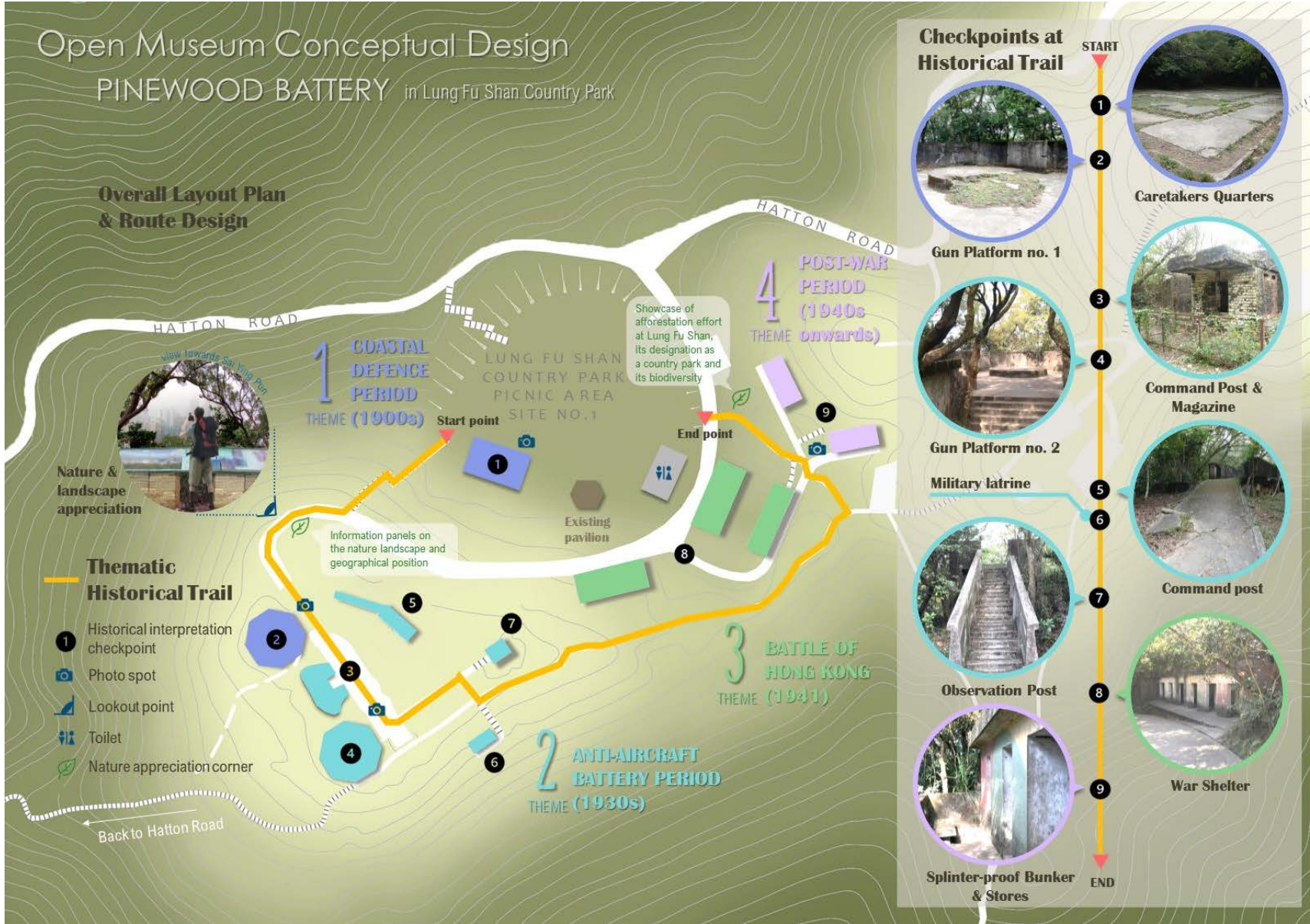
5.3 The preliminary results of the stakeholder engagement indicated general agreement with the objective of setting up of an OM in promoting public understanding of local history. They generally perceive historical value as the most important attribute in site selection. Useful suggestions and information on pursuing the project were provided during the stakeholder interviews and workshop. Among the 16 stakeholders interviewed, 9 preferred Shing Mun Redoubt to Pinewood Battery, having considered various factors such as higher historical significance, more interesting features, greater conservation need and better accessibility. The remaining interviewees opined that while Shing Mun Redoubt is attractive, Pinewood Battery is more accessible and it will be simpler to set up an OM there. The Consultants will analyse and consider thoroughly the views collected through the stakeholder engagement before finalising the proposals.

6. Advice Sought

6.1 Members are invited to offer views on the OM conceptual designs set out in this paper and the Appendices. The views and comments will be taken into account in the next phase of the Study.

**Country and Marine Parks Authority
Agriculture, Fisheries and Conservation Department
November 2023**

Conceptual Design for Open Museum in Pinewood Battery (Lung Fu Shan CP)



Open Museum Conceptual Design

PINEWOOD BATTERY in Lung Fu Shan Country Park

Design Features & Educational Programs

Historical Interpretation Panel



Augmented reality (AR)



Nature appreciation



Virtual Tour



Guided tour for public & schools



Historical Interpretation Elements

- Separated into FOUR themes by historical periods
- With focus on historical narrative, instead of weaponry to set the tone of peace

1 COASTAL DEFENCE PERIOD THEME (1900s)

- To present the **history** of the Caretakers Quarters and Gun Platform no.1 built during the **early development of coastal defence**
- To display the **virtual gun and its operation** in the 1900s through AR

2 ANTI-AIRCRAFT BATTERY PERIOD THEME (1930s)

- To present the **history** of structures like the Command Post and Observation Post built during the **anti-aircraft battery period**
- To display the **anti-aircraft gun and its operation** in the 1930s through AR
- To explore the feasibility of opening up the Underground Magazine in later stage

3 BATTLE OF HONG KONG THEME (1941)

- To present the **history** during the **Battle of Hong Kong**
- To feature **architecture** of War Shelters – **camouflage**, building orientation, soldiers' bed, etc.

4 POST-WAR PERIOD (1940s onwards) THEME

- To present the **post-war** development
- To highlight elements for landscape appreciation and **nature conservation efforts**, e.g. afforestation program and the designation of Lung Fu Shan Country Park

Conceptual Design for Open Museum in Shing Mun Redoubt (Shing Mun CP)

Open Museum Conceptual Design
SHING MUN REDOUBT in Shing Mun Country Park

Design of Visitor Centre



Facilities & Educational Programs at Visitor Centre

Visitor information desk & guided tour enrolment counter

Nature appreciation corner

Virtual experience through Cave Automatic Virtual Environment (CAVE)

Visualisation of original structures with AR and VR technology

