

The Chinese University of Hong Kong

Campus Master Plan Executive Summary

1. The Master Planning Process

The Master Plan Report describes the consultative process and the resulting proposals to deliver an overall planning framework for the University campus. It has been formulated to provide planning guidance for the future development of the campus through to 2021 and beyond. The master planning process was carried out in response to the University's desire to accommodate its strategic objectives within the context of the increased undergraduate population and the changing requirements of the academic disciplines.

The Master Plan has been conducted as a process of extensive engagement, consultation and briefing with groups representing the entire University community; it has addressed the historic development of the campus and taken account of the opportunities and challenges to present recommendations to guide the future development of the campus.

The Master Plan Approach

A multi-disciplinary team of planning, engineering, transport and landscape consultants worked closely with the University's Steering Committee on Campus Master Planning and the Campus Development Office. In addition, the views and priorities of the University community were gathered through a wide range of events and activities.

This planning process was conducted over a period of 18 months in four separate stages beginning with information gathering leading to the conceptual formulation and specific proposals and culminating in the finalization of the Master Plan proposals.

2. CUHK Campus: Challenges and Opportunities

Specific objectives of the Master Plan are:

- To reinforce the unique character of the campus
- To assess and define opportunities for providing potential sites for academic, social and recreational activity
- To assess and define opportunities within the college areas to enhance the experience of students
- To define places of high ecological, landscape and cultural heritage value for conservation, protection and enhancement
- To assess circulation and travel modes and define opportunities to improve connections and movement for pedestrians
- To assess and define opportunities within the outdoor environment to enhance experience of the landscape
- To formulate an urban design, conservation and landscape framework based on sustainable principles
- To formulate an implementation strategy for the planning framework and identify necessary follow-up actions.

The response to the objectives of the Master Plan and the views solicited in the stakeholder engagements was the identification of the principal challenges posed by the campus site and the proposals with which they would be addressed.

The challenges of the CUHK campus

Dispersal of campus facilities and buildings

Since the University's foundation, its development has been determined by the transformation of the natural hillside topography into three distinct levels: The campus's organization into the three precincts impedes both social and academic interaction which is further exacerbated by the increased reliance on vehicle use to connect and traverse the levels. While this dispersal helps to distinguish the University's collegiate system, the isolated nature of some college buildings can also serve as a disadvantage.

Hilly topography

The original plan of the University was derived with reference to the best-planned universities in the United States and the United Kingdom which were built during the great tertiary education boom of the 1950's and 1960's. The campus plan of the University should be prepared to suit the hilly site, in which access to the Central Campus and to the colleges is mainly by car or bus on graded roads, winding lengthily up and down the slopes. This road system caters only for low density development, being constrained by the topography, utilities and adjacent developments. The topography of the campus exacerbates the issue of diminishing availability of development sites. Available land is either too steep or within mature woodland, or is used to provide valuable amenity space.

Lack of communal space

Up to now, some of the existing buildings on the hillside campus may require more open amenity places between and beside them that are suitable for informal social interaction or gathering.

Opportunities within the CUHK campus

- The site's outstanding natural beauty and ecological diversity demands a sensitive approach, and since land suitable for building is limited, it needs to be used as effectively as possible.
- A network of stepped pedestrian paths should improve connections across the campus – between individual colleges, the Mall and new colleges. Introducing cascading developments or express lifts will further reduce the inconvenience of vertical distances.
- Improved connections between the various elements of the University would add to its academic and social potential. Consolidation of college precincts into clusters of developments will encourage: increased academic interaction; sharing of facilities; a stronger identity for particular places and a greater sense of community; and shorter walking distances.
- New academic facilities on the main campus should continue to relate primarily to the Mall, conforming to the original model for development.
- Communal life is integral to the University and the collegiate structure has fostered a sense of community. Provision of more communal spaces allowing for academic discussion and informal social gatherings is therefore important in maintaining and developing the campus.

- The spatial organization of the campus should be reinforced with a strategic network of connected open spaces, such as plazas and courtyards. In addition, the design of new buildings should include open terraces or enclosed courtyards.

3. The Master Plan Vision

The vision

The Campus Master Plan composes a vision for the CUHK campus of 2021, together with a planning framework and detailed proposals to enable its implementation.

This vision will crystallize over time, as the Master Plan is used to help guide the detailed proposals for the design of each specific project within the campus.

Aspects of the Vision

The vision comprises three components:

- To build most sustainably on existing developments in order to strengthen the academic core and surrounding colleges as distinct places, and connect the whole composition within a lattice of pathways
- To maintain the campus as an environment ideal for study and to enhance quality of life for the entire university community by improving integration of learning, working, living and socialising
- To formulate a planning framework to enable evolution of the campus that balances future growth with preservation of its green and serene setting.

Interpretation of the Vision

The Master Plan is conceived to serve as a continually evolving document and six interdependent planning precepts are vital to delivering the fullest benefits as the campus is developed:

- Places for education and research activities
- Enhancing college life
- A pedestrian-friendly campus
- Conserving places of value
- A landscape of vital importance
- Making a sustainable campus

4. The Master Plan Proposals

4.1 Places for Education and Research Activities

A central proposal of the Master Plan is the concept of clustered and zoned development, to enable the efficient use of resources and convenience of access, optimize land use and enhance social and academic interactions. Within this concept, a series of potential development sites are identified with proposals outlined to accommodate the projected future needs of the campus.

4.2 Enhancing College Life

Forming distinct college neighbourhoods is an important principle for strengthening the University's unique college system to enhance communication, the sharing of amenity facilities and pedestrian connections between the colleges and the Central Campus. Two new college sites in the northern campus and options for enhancing each of the existing colleges with new student hostels and landscape improvements are proposed.

4.3 A Pedestrian-Friendly Campus

The Master Plan has a key aim to improve connectivity within the campus by prioritising walking to minimize reliance on the motor vehicle, and by optimizing the performance of all campus transport facilities including the pedestrian network, internal road enhancements and management, park-and-ride, cycle tracks and shuttle bus services. The proposed new developments shall, where appropriate, accommodate within their design vertical access devices to further enhance the campus connectivity for pedestrians.

4.4 Conserving Places of Value

Various places and buildings of value within the campus were collected from consultations during engagement events. They have informed the Master Plan's selection of appropriate sites for potential development. In order to identify places with unique values that should be conserved in future, a methodology is proposed to establish a "List of Places with Cultural Significance". Assessment of the significance of a place can be made with reference to its historical value, identity value, memorial value and/or architectural value.

4.5 A Landscape of Vital Importance

A Landscape Strategy Plan is proposed for identifying the treatment of the different types of landscape zones in the campus and creating a network of open spaces that relate directly with the existing and proposed university buildings. This proposed network, together with potential new nature trails, will enhance the green campus environment and landscape experience.

4.6 Making a Sustainable Campus

The Master Plan aims at establishing the principles for a sustainable campus with a reduced dependency on the earth's natural resources and a reduction in greenhouse gases emissions (per capita), so as to develop a campus with cleaner air, producing less waste, with less reliance on motor vehicles. It sets an environmental target, which is higher than that of Hong Kong government's, by committing to reduce its total energy consumption (per capita) by 25% by 2025. This target reduction should be subject to continual review so as to remain responsive to change within the environmental parameters and the progressive development within the Chinese University campus.

5. Provision for Growth – Potential Development Sites

Potential development sites were identified during stakeholder consultation, within the context of the overall planning framework and the six planning precepts.

5.1 Sites of Immediate Potential

Immediate developments are considered a priority in order to meet the current shortfall in accommodation resulting from an increased student population and enhanced research facilities.

- 5.1.1 New colleges on Residence Lane 1 (site I)
- 5.1.2 Area 39 – Northside Research Campus (site H)
- 5.1.3 Arts and Humanities Hub (site E)
- 5.1.4 Staff Residences (site F)

5.2 Sites of Intermediate Potential

Intermediate developments will contribute towards improved connections within the campus and provision of a pedestrian-friendly environment.

- 5.2.1 Academic Building 1 – Southside Outlook (site C)
- 5.2.2 University Station – Station Court (site G)

5.3 Sites of Long-Term Potential

Long-term developments will provide accommodation beyond the University's planned requirements for 2021.

- 5.3.1 Romney Stores – Eastside Sports Hub (site A)
- 5.3.2 Open car park outside John Fulton Centre – Westside Belvedere (site D)
- 5.3.3 Village Path – Eastside Outlook (site B)

The Master Plan describes each development through a comprehensive planning analysis.

6. Recommendations and implementation strategies

The Master Plan describes strategies for responding effectively to the University's needs. It is not intended to provide definitive solutions for individual developments but rather design guidelines and planning parameters for architects and engineers.

To ensure sustainable development, it is recommended that the Master Plan be overseen by a steering group, appointed by the university, and updated periodically to reflect new developments and changing conditions.