Workshop #1: Environment and the Code - 29 June 2023

We explored how regulations could be adjusted to create a more resilient and innovative high-rise typology which would ultimately result in buildings that are healthier, more vibrant and less carbon intensive, referencing best practices from the region. Key recommended changes in regulations are:

Adopt a performance-based approach over a prescriptive approach

The approach should be such that it incentivizes environmentally better performing buildings, such as:

- GFA relaxation to be implemented by creating buffer zones around the perimeter. These zones could provide cooling, ventilation, porosity, and shading screens.
- Optimal façade design to achieve well performing buildings (thermal performance) to be incentivized by relaxing the zone width allowed for facades.

Promote a high recycling rate of demolition works

The current code could promote a high recycling rate of demolition works, but there is a lack of incentive for developers to achieve this.

- Buildings Department can be part of the process to audit and approve the full inventory of the products and materials that can be reused or recycled from a potential retrofit/demolition project.
- Buildings Department should give permission upon the presence of this pre-demolition waste audit report and offer incentives to those projects that have committed to a high level of recycling rate and followed by completion review to ensure the plan is being executed.
- The lack of recycled material processing plants in Hong Kong is due to the lack of testing facilities for facades, seals, and industrial processes in the back end. However, there is an opportunity to have the processing facilities near the Hong Kong and Mainland China border to be utilized for recycling.

Encourage the use of green building materials in construction

Hong Kong government bodies involved in construction planning and execution to encourage the use of green building materials for envelopes and structures.

- To encourage more developers to find the optimum choice between timber, concrete, steel and innovative structures.
- Building codes need to have a route to allow for innovation in new materials such as timber, bamboo or engineering materials.