

HONG KONG NETWORK EXPANSION

Shatin to Central Link

17 km

10 stations



Railway Development Strategy 2014

5 project proposals submitted



AIM

The expansion of our Hong Kong railway network contributes to our goals by enhancing connectivity and ensuring we meet future transport needs. All new railway projects owned by MTR and those entrusted to MTR by Government take years of careful planning and diligent execution to ensure they meet the community's expectations for safety, efficiency and the environment.

CHALLENGES

- Continue to make progress on Shatin to Central Link
- Continue to cooperate with relevant authorities, including Commission of Inquiry, on their relevant review on Shatin to Central Link
- Carry out a feasibility study on opening the Tuen Ma Line in phases, which requires a careful study into a number of issues
- Maintain knowledge and experience gained during construction projects so they can be applied to future opportunities under Railway Development Strategy 2014

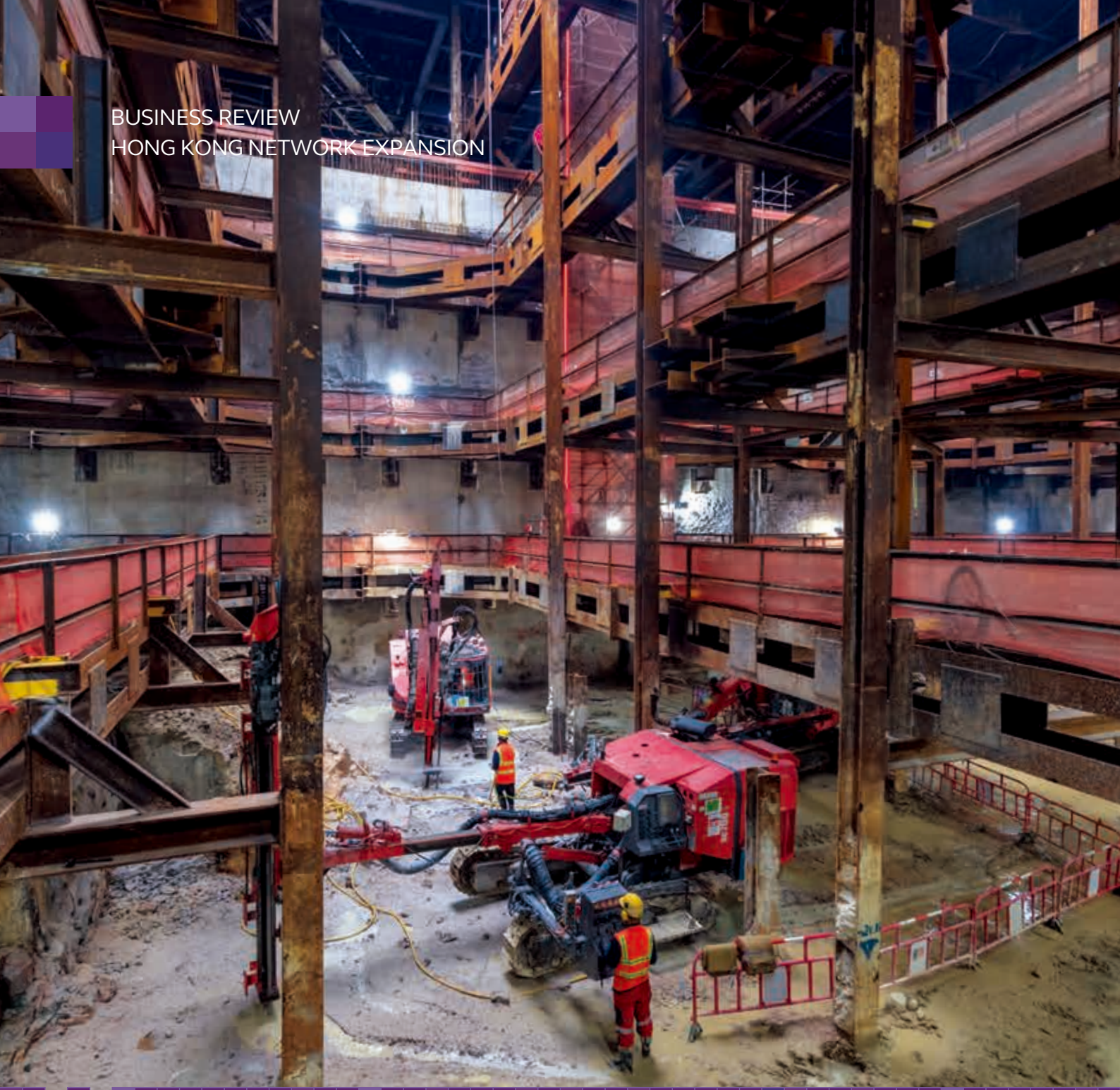


STRATEGIES

- **Delivery Targets:** Implement good project management practices to ensure good progress and safety of the Shatin to Central Link
- **Interfacing Effectiveness:** Strengthen collaboration among internal departments and with key external stakeholders. Enhance integration on the handover of railway extension projects to the operating railway
- **Growth and Development:** Create a dynamic and interactive platform to develop new railway projects and establish a pipeline of future project deliveries in Hong Kong. Leverage opportunities from such projects to grow competency that can contribute to the Company's business diversification and long-term sustainability

OUTLOOK

The delivery on time and on budget is dependent on a number of factors both within and outside of the Company's control, including the timeliness and quality of construction work carried out by contractors, as well as site issues such as terrain and archaeology. While the delivery of the Shatin to Central Link is dependent on a number of factors, including the results of the holistic review of the Hung Hom Station extension mentioned previously, we are looking into the feasibility of the phased opening of the Tuen Ma Line. This requires careful study of a number of issues including necessary modifications to the signalling system. The projects under Railway Development Strategy 2014 are still at the stage of planning.



SHATIN TO CENTRAL LINK



Overall

88.7% complete



Tai Wai to Hung Hom section

99.5% complete



Hung Hom to Admiralty section

75.7% complete

Our near term rail business growth in Hong Kong falls under Rail Gen 2.0. In addition to the Shatin to Central Link, which remains under construction, it covers major upgrades and replacements to the existing rail network, as well as initiatives to enhance customer experience, including through the use of technology. Looking beyond Rail Gen 2.0, the projects announced under RDS 2014 have the potential to increase

Hong Kong's rail network by a further 35 km. In the longer term, Government's "Strategic Study on Railways beyond 2030 – Feasibility Study" to be undertaken in 2019 may expand the rail network even further to cover strategic development areas in "Hong Kong 2030+: Towards a Planning Vision and Strategy Transcending 2030" ("Hong Kong 2030+") and "Lantau Tomorrow Vision".

RAIL GEN 2.0: NEW RAIL PROJECTS MANAGED BY MTR

Following the commencement of HSR operation in September 2018, our Hong Kong rail network now extends to 256.6 km. The Shatin to Central Link, which remains under construction, will add another 17 km route length in the coming few years.

Guangzhou-Shenzhen-Hong Kong High Speed Rail (Hong Kong Section)

We are proud to have been involved as project manager of the Hong Kong Section of the Guangzhou-Shenzhen-Hong Kong Express Rail Link ("Express Rail Link"). In addition to our project management, we entered into a 10-year service Concession Agreement with KCRC to operate HSR on 23 August 2018 and commenced passenger operation on 23 September 2018. The 26-km HSR connects Hong Kong to Shenzhen, Guangzhou

and the 29,000-km high speed rail network in the Mainland of China.

HSR has opened a new chapter for Hong Kong rail transport, providing fast, convenient and comfortable connections to the Mainland of China. Passengers can complete both Hong Kong and Mainland immigration procedures and customs clearance in one place at Hong Kong West Kowloon Station. HSR connects Hong Kong West Kowloon Station with 44 Mainland stations directly without interchanging, providing passengers with an excellent travel choice for leisure or business.

Between 23 September and 31 December 2018, about 5.3 million passengers travelled on HSR, with daily average usage of over 53,000.

The outstanding design of the Express Rail Link was honoured in November 2018 with "Gold Awards" in the Community – Service category at both the "2018 Hong Kong Design Awards" and the international "2018 GOV Design Awards" organised by DRIVENxDESIGN.

Shatin to Central Link

The ten-station 17-km Shatin to Central Link, a project managed by MTR on behalf of Government, is a strategic railway that will extend the existing rail network and improve connectivity. The first phase is the 11-km Tai Wai to Hung Hom Section and the second phase is the 6-km Hung Hom to Admiralty Section. When the Tai Wai to Hung Hom Section is completed, it will extend the existing Ma On Shan Line from Tai Wai via six stations to the West Rail Line to form the Tuen Ma Line. When the Hung Hom to Admiralty Section is completed, it will extend the existing East Rail Line across the harbour to Exhibition Centre Station and Admiralty Station through Hung Hom.



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Upon completion, the Shatin to Central Link will connect several existing railway lines and enhance connectivity of the entire Hong Kong railway network. It will significantly reduce travel time between the New Territories North, Kowloon and Hong Kong. Customers will also benefit from more route choices, particularly in the busy cross-harbour section of the Tsuen Wan Line and the Tai Wai to Kowloon Tong section of the East Rail Line.

Overall, as at 31 December 2018, this project was 88.7% complete, with the Tai Wai to Hung Hom and Hung Hom to Admiralty sections 99.5% and 75.7% complete respectively.

On the Tai Wai to Hung Hom Section, structural works for all stations have been substantially completed with fitting-out, building services and electrical and mechanical (“E&M”) works inside the stations, except for Hung Hom Station where the assessment of structural integrity is still on-going, have been substantially completed.

On the Hung Hom to Admiralty Section, all 11 immersed tube units of the cross-harbour tunnel had been installed in Victoria Harbour in April 2018, and will be ready for track installation to commence by the second quarter of 2019.

At Exhibition Centre Station, construction progress has been affected by late site handover, incomplete entrusted works by other parties and unfavourable ground conditions. As at 31 December 2018, the station was approximately 69% complete. Construction works for Exhibition Centre Station and relevant railway facilities are underway with bulk excavation works expected to complete in the first half of 2019.

To allay public concerns on the possible impacts of building settlements caused by construction activities, excavation works at Exhibition Centre Station were temporarily suspended on 10 August 2018. The works resumed on 29 September 2018 after our project team reaffirmed the continuing safety and integrity of the buildings, structures and utilities near the works sites and on the basis of having a set of revised settlement trigger values agreed with the relevant Government departments.

Admiralty Station is being transformed into a major interchange hub for the Shatin to Central Link, Island, Tsuen Wan and South Island lines. Internal structural works, architectural finishes and building services installation for the station extension are underway.



The Shatin to Central Link project includes replacement of the existing signalling system on the East Rail Line. Dynamic testing of the new system using East Rail Line trains and new trains during non-traffic hours on the whole of the East Rail Line has been progressing well towards target completion in the second half of 2019.

Concerns relating to construction works

Towards the end of the first half of 2018, there were allegations concerning workmanship and timely reporting of certain construction matters relating to three stations of the Shatin to Central Link, in particular regarding works at Hung Hom Station extension. The Company has taken immediate steps to investigate the issues, report the Company's findings to Government and reserve the Company's position against relevant contractors. To address the allegations relating to the



on 29 January 2019, made its closing submission to the COI in which it stated its view that the Company ought to have provided the required skills and care reasonably expected of a professional and competent project manager but that the Company had failed to do so.

On 19 February 2019, Government announced that the terms of reference of the COI had been expanded to cover issues relating to the North Approach Tunnels (“NAT”), the South Approach Tunnels (“SAT”) and the Hung Hom Stabling Sidings (“HHS”) under Contract No. 1112. Government stated that it has recently come to



platform at the Hung Hom Station extension, the Company has submitted to Government a holistic proposal for the verification and assurance of the as-constructed conditions and workmanship quality of the Hung Hom Station extension. The verification and assurance works are ongoing and the overall structural integrity and safety of the Hung Hom Station extension will be assessed based on the detailed data collected in the verification process. The Company has also co-operated fully with the COI that has been set up by the HKSAR Chief Executive in Council to investigate matters relating to the diaphragm wall and the platform slab at the Hung Hom Station extension as well as, amongst others, the adequacy of the Company’s project management and supervision systems. The COI process included hearing of evidence from factual witnesses and reviewing evidence from experts on project management and structural engineering issues. Government,



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light that, in respect of the NAT, SAT and HHS, some works-related documentation has been found missing and some of the construction works involving deviations from the designs, plans or drawings accepted by the Highways Department or the Building Authority might have been carried out. In view of the expanded scope of the COI, the Chief Executive in Council has approved a further extension of time for the COI to submit its report to the Chief Executive by 30 August 2019, or such time as the Chief Executive in Council may allow. The COI may submit interim reports on any aspects of the inquiry as it may see fit under the terms of its appointment. On 25 February 2019, the COI submitted an interim report to the Chief Executive on its findings and recommendations on matters covered by the original terms of reference. Government has yet to publish the interim report, in whole or in part, up to the date

of this annual report. Government is now conducting a review on construction documentation / records for the construction works in the Shatin to Central Link project.

To provide additional confidence to the public, the Capital Works Committee of the Board has also reviewed the Company's project management processes and procedures, assisted by an external consultant and has made recommendations for improvements, many of which have already been implemented. The Board also directed the Company's management to strengthen its monitoring and supervision over all Shatin to Central Link contracts.

Programme for Delivery

The programme for the delivery of the Shatin to Central Link is dependent on a number of factors, including the results of the holistic review of the Hung Hom Station extension mentioned previously.



Funding

Government is responsible for funding the Shatin to Central Link (except for certain costs for which the Company is responsible under the existing service concession agreement with KCRC) and the sum entrusted to the Company by Government for the main construction works under the 2012 Entrustment Agreement for Construction and Commissioning of the Shatin to Central Link ("SCL Entrustment Agreement") was HK\$70,827 million. The Company has previously announced that, due to the continuing challenges posed by external factors and difficulties similar to those encountered by most major infrastructure projects in Hong Kong, the Shatin to Central Link Cost to Complete ("CTC") would need to be revised upwards significantly.

The Company completed a detailed review of the estimated CTC for the main construction works under the SCL Entrustment Agreement and the latest estimate of HK\$87,328 million was submitted to Government for review on 5 December 2017. Since submission of this estimate, which shows an increase of HK\$16,501 million (or 23% of the cost of the main works), the Company has been liaising with Government to facilitate its review and verification process. The Company intends to carry out a further review and revalidation of the CTC (including, without limitation, to take account of the outcome of the verification and assurance works and the associated delays referred to above) within 2019. The Company continues to exercise rigorous cost control with the objective of ensuring that construction costs are contained so far as possible.

NEW RAIL PROJECTS BEYOND RAIL GEN 2.0

Beyond the final rail project under construction, Government has identified seven additional rail projects to be implemented under RDS 2014 and we have submitted proposals for five of these, namely the Tuen Mun South Extension ("TMS"), the Northern Link (and Kwu Tung Station) ("NOL"), the East Kowloon Line ("EKL"), the Tung Chung West Extension (and Tung Chung East Station) ("TCW") and the North Island Line ("NIL").

At the request of Government we have provided supplementary information on project proposals we submitted for TMS, NOL and EKL. Project proposals for TCW and NIL were also submitted in January and July 2018 respectively. We are

working closely with Government departments to resolve the technical, operational and financial issues to take these projects to the next stage.

Major transport corridors to meet the longer term transport demand arising from "Hong Kong 2030+" and "Lantau Tomorrow Vision", covering strategic growth areas in the New Territories and major reclamation in the central waters, are envisaged in Government's "Strategic Study on Railways beyond 2030 – Feasibility Study", which is planned to commence in 2019.

