

DRAGAGES HONG KONG

香港寶嘉建築

Dragages came to Hong Kong more than 60 years ago and has since been involved in a wide range of landmark projects across the city that have put it firmly on the international map.

Dragages is much more than a construction company. We are a full-service provider, bringing innovative design, build, finance and operate solutions to our broad client base.

Drawing on our rich combination of local knowledge and international experience, Dragages strives to offer innovation and value to our clients, with an unwavering commitment to the safety of our people and a strong sense of social responsibility towards the communities in which we work.

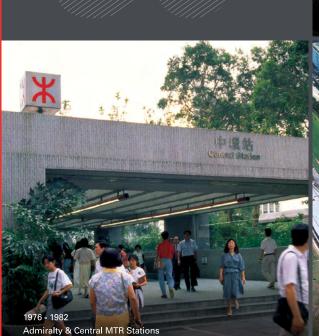
香港寶嘉植根香港逾60年,積極參與多個大型地標性建造項目, 在國際間樹立良好典範。

香港寶嘉的業務並不限於建造 工程,我們為不同類型的客戶 提供創新設計、建造、融資及 營運方案,提供全方位服務。

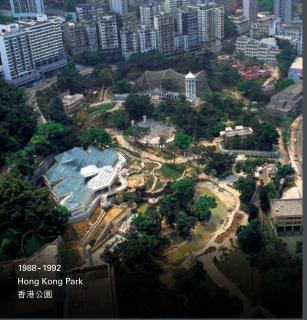
憑藉豐富的本地知識與國際 經驗,我們致力為客戶提供創新 方案,為工程締造更理想的 成效。與此同時,我們積極實踐 對安全的承諾,並於植根的社區 履行企業社會責任。

ADDRESSING LIVELIHOOD/ISSUES

改善民生







LINKING AN INTERNATIONAL AVIATION HUB

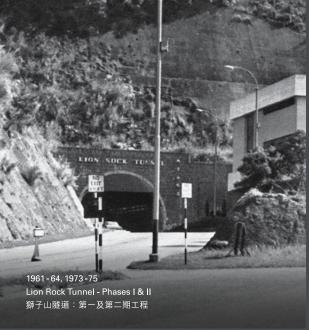
連繫國際航空樞紐

Kai Tak Airport Runway 啟德機場跑道

CONNECTING THE CITY AND BEYOND

接通香港未來





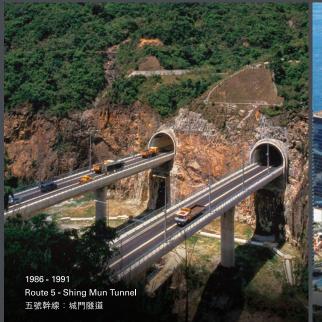
A NEW CHAPTER FOR THE TRANSPORTATION NETWORK

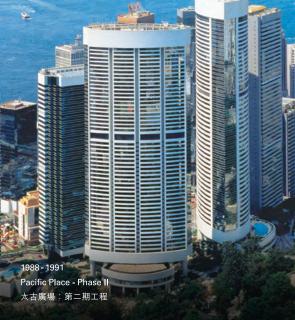
開拓交通網絡新里程

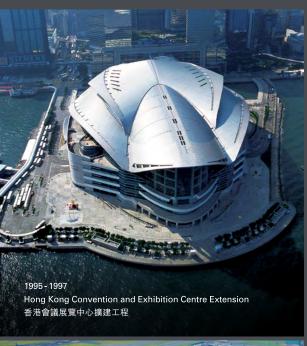


A GOLDEN ERA

黃金時代

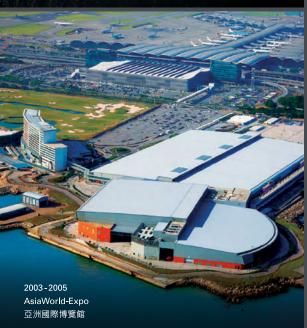






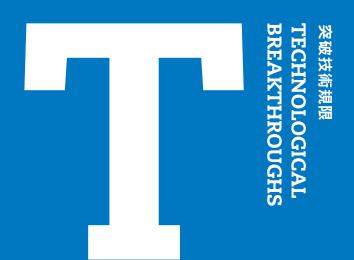






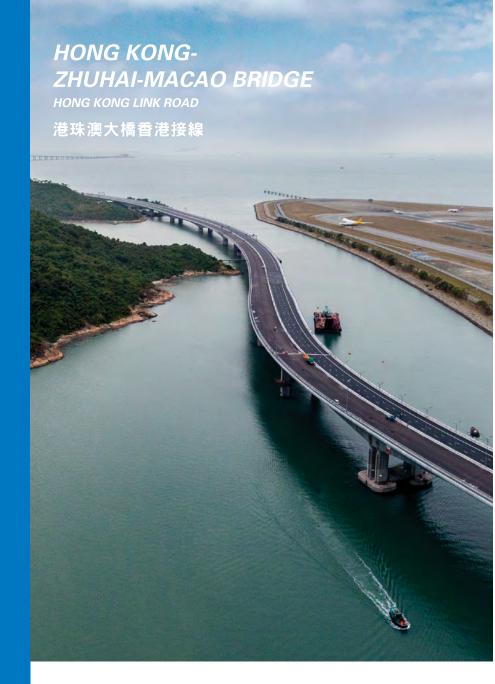






At Dragages Hong Kong, we are always looking for innovative new ways to enhance safety and efficiency, spanning from finance and design to construction and operation. A number of visionary new solutions have been incorporated in our projects, many of which were FIRSTS in Hong Kong.

香港寶嘉一直力求以嶄新方式,於融資、設計、 建造及營運各個範疇,全面提高安全水平和工作 效率,並在眾多項目中引入多項具前瞻性的方案, 成為香港第一。



Record-breaking pre-cast segmental bridge 起用全球最大預製橋樑組件的高架橋

This 9.4km-long dual three-lane viaduct is the FIRST **marine bridge** in Hong Kong designed with a **pre-stressed pre-cast pier structure** and boasts the world's LARGEST span of a **pre-cast segmental balanced cantilever bridge span** at 180m. In total, 5,714 precast segments in 250 different types were used. The project team also reached a RECORD HIGH by erecting 18 segments in a single day using one launching girder.

這條長9.4公里的雙程三車道高架橋為香港首次採用**預應力預製橋墩**組裝的**跨海高架橋。** 大橋當中180米跨度是全球最長的**懸臂分段拼裝式預製橋。**大橋共用了5,714件涉及250 種不同形狀的預製組件建造。工程團隊更刷新香港業界紀錄,在一天內僅以一部吊樑機 安裝18件預製組件。



The world's LARGEST span of a pre-cast segmental balanced cantilever bridge span at 180m 大橋當中180米跨度是全球最長的懸臂分段拼裝式預製橋





First-of-its-kind free-form exoskeleton building 全球首座自由形態外骨骼結構建築

Designed by the late award-winning architect Zaha Hadid, Morpheus is the world's FIRST **free-form exoskeleton** high-rise building. It was constructed using more than 8,000 pieces of **free-form façade glazing**, and 28,000 tonnes of steel. This complex architectural structure demanded absolute precision in terms of work sequence. Through the adoption of the latest technologies and meticulous planning, we realised a 'dream' building and set a new benchmark in building technology.

由已故國際建築獎得主札哈·哈蒂所設計的摩珀斯是世界上首座採用**自由形態外骨骼結構**的高樓。酒店大樓採用超過8,000件**自由曲面弧形玻璃幕牆**及28,000噸鋼結構, 其複雜的建築結構講求絕對精準的工序規劃。工程團隊憑藉嶄新技術與周詳計劃,打造 堪稱建造界的夢之大樓,樹立建造技術的新典範。

Morpheus – the world's FIRST free-form exoskeleton high-rise building 摩珀斯是世界上首座採用自由形態外骨骼結構的高樓

Taking tunnelling technologies to the next level 突破隧道建造技術

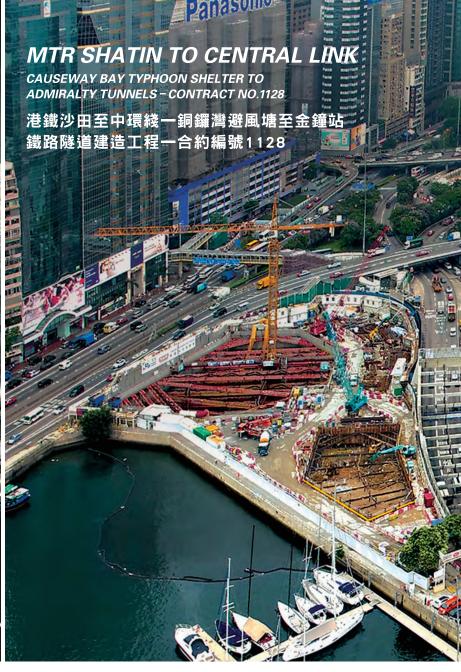
The world's LARGEST **Tunnel Boring Machine** (TBM), 17.6m in diameter, was deployed to construct this DEEPEST, LONGEST, LARGEST sub-sea tunnel in Hong Kong. Three major **in-house TBM innovations** were adopted in TBMs, namely MOBYDIC (disc-cutter monitoring system), SNAKE (a remote control mechanical arm), and TELEMACH (automated disc-cutter replacement arm). TBM cutters were also changed successfully through **trimix saturation dives** of up to 5.8 bars. To cater to complex ground conditions, a **gigantic 15-cell caterpillar-shaped diaphragm wall** will also be built for the construction of cut-and-cover tunnels.

項目起用全球最大型,直徑達17.6米的**隧道鑽挖機**建造香港最深、最長、最大的海底行車隧道。隧道鑽挖機均配備公司自行研發的嶄新系統一MOBYDIC(負責監測鑽頭刀具及鑽挖地質的狀況)、SNAKE(可遙距操控設有高壓噴水清洗設施及閉路電視的機械臂),以及TELEMACH(自動更換鑽頭刀具機械臂)。此外,工程團隊以**氦氮氧混合氣飽和潛水**方式,在高達5.8大氣壓力的環境下,維修隧道鑽挖機的鑽頭刀具。為克服複雜的地質限制,工程人員將建造長15環、呈毛蟲形狀的巨型地下連續牆,以明挖回填的方法建造隧道。



Excavation of cross passages using mini TBMs – a FIRST in the city 國隊以小型隧道鑽挖機建造連接通道,創下香港隧道工程的先河





TBM U-turn operation – an exemplar in the tunnelling history 隧道鑽挖機轉向工序一創香港隧道工程界先河

This project, Hong Kong's LONGEST land-based road tunnel, was constructed by a combination of TBM, and drill-and-blast methods. In only three months' time, we completed the city's FIRST **180-degree U-turn operation** of Hong Kong's LARGEST **dual-mode Earth Pressure Balanced TBM** within one of the LARGEST caverns – 23m high, 27m wide and 40m long. ROBY 850, **a drilling robot**, is another in-house innovation we adopted which enhances safety, productivity and quality.

項目團隊以隧道鑽挖機、鑽挖及爆破方法建造全港最長的陸路行車隧道,並在短短三個月內,於香港其中一個最大的地下洞穴(高23米、闊27米、長40米),順利將本港最大型雙模式土壓平衡隧道鑽挖機180度轉向至另一管道方向。為改善工地安全、提高生產力和施工質量,公司不斷研發新技術,而**鑽孔機械人**ROBY 850是其中一項。

Tunnelling through one of the world's busiest districts 穿越世界上其中一個最繁忙鬧市的鐵路隧道

Hong Kong's FIRST **Variable Density TBM** was adopted to drive through the city's busiest district. This TBM caters for thin to high-density slurry to tackle shallow, heterogeneous and obstruction-laden ground conditions. To cope with tight space constraints, a **pre-stressed TBM launching structure** was developed, which allowed us to launch a TBM within a 40m-long shaft. This innovative solution also enabled a permanent structure to be part of the launching system.

工程採用了全港首台**可變密度的混合隧道鑽挖機**,並成功穿越鬧市地底。此嶄新鑽挖機可在多變且充斥着地下設施的淺理環境中,因應泥漿和土質鬆軟度作出調節。由於工地空間所限,團隊開發了**先張預應力隧道鑽挖機啟動支架**,成功於40米深的豎井內組裝鑽挖機。此創新設計可在鑽挖機啟動系統中作永久性結構使用。



ROBY 850 – named "SAFETY INITIATIVE OF THE YEAR" in the 2018 ITA Tunnelling Awards 項目團隊憑藉 ROBY 850 鑽孔機械人於 2018 ITA Tunnelling Awards 榮獲 「SAFETY INITIATIVE OF THE YEAR」 獎項



The "starwheel with pre-stressed bars", together with the 40m-deep peanut shaft, earned us the "Gold Award – Temporary Works Excellence Award 2017 – Civil Engineering Works" 我們憑著「先張預應力星形輪鋼架」及深40米的無橫向支撐環形豎井,於「2017臨時工程卓越大獎」土木工程組別中取得金獎殊榮



CORE STRENGTHS

CLIENT FOCUSED: Through listening, sharing and working collaboratively together, we develop long-term working relationships with our clients and partners, based on transparency, respect and trust.

以客為先:透過細心聆聽、技術共享、通誠合作,香港寶嘉與客戶及工作夥伴建立 具透明度且互敬互信的長久合作關係。

QUALITY, SAFETY, ENVIRONMENT: Safety Leadership is an attribute which Dragages displays at all levels of our organisation. The first consideration of every decision we take on site is for the safety and well-being of our people.

品質、安全及環境保護:公司致力把安全領導的概念渗透各個層面。我們作每項 決定前,必先以員工的安全及健康為首要考慮。

FULL-SERVICE EXPERTISE: We provide our clients with a full-service option covering design, finance, construction and management. Hong Kong SkyCity Marriott Hotel is an exemplar of this business model.

全面的專業服務:我們提供一站式服務,包括設計、融資、建造及管理事宜,全面代客籌謀,香港天際萬豪酒店是其中的典範。

INNOVATION: A number of technical FIRSTS have been incorporated in our projects. In 2017, we completed the city's FIRST Tunnel Boring Machine (TBM) 180-degree U-turn operation in just three months.

突破技術規限:香港寶嘉在所承辦的項目中引入多項全港首次使用的創新方案。2017年,項目團隊僅以三個月的時間,於隧道內完成香港首次的鑽挖機180度轉向工序。

PEOPLE: We are committed to the continual training and empowerment of our colleagues. In 2018, we were accredited as a Manpower Developer, in recognition of our outstanding achievements in manpower training and development.

以人為本:我們致力提供持續培訓機會,幫助同事增值。2018年,公司憑藉在人才培訓及發展工作上的卓越表現,獲嘉許為「人才企業」。

CORPORATE SOCIAL RESPONSIBILITY: In 2018, Dragages Hong Kong received the "Excellence in Construction Industry Volunteering Project – Gold Award" in recognition of our long-term commitment to the community and our promotion of social integration.

企業社會責任:公司致力配合社會的長遠發展,推廣社會共融,積極履行企業社會責任,並於2018年獲頒「建造業義工獎勵計劃一金獎」。













BRINGING GLOBAL EXPERIENCE TO EVERY PROJECT

滙聚環球經驗 成就項目佳績

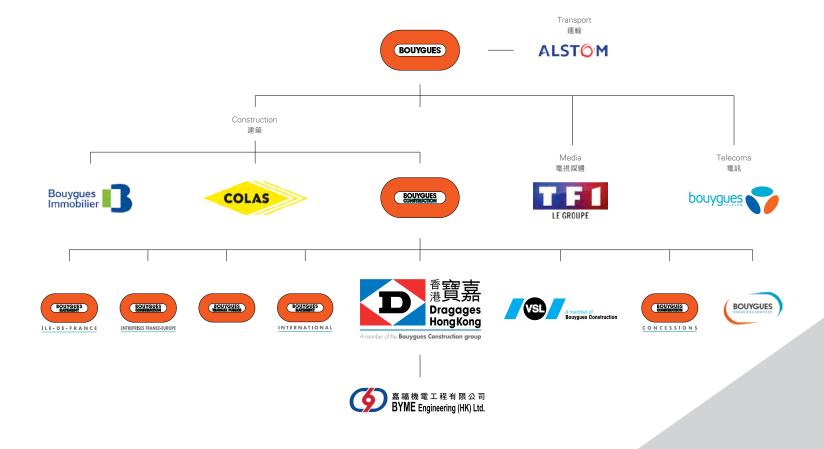
With the support of its parent company, Bouygues Construction, Dragages has grown substantially over the last 60 years. As a global leader across all construction disciplines, and with operations in over 80 countries, Bouygues Construction brings a wealth of international experience and expertise to Dragages Hong Kong.

Together, Bouygues Construction and Dragages combine the power of a large group with the flexibility of a dynamic network of companies. Employing some 47,350 people worldwide, the Group generated sales of €11.7 billion in 2017.

Bouygues Construction, in turn, is part of the Bouygues Group. Founded in 1952, the Group is one of the world's largest industrial groups, with diverse businesses that are world and European leaders in their own right. 香港寶嘉過去60多年的持續成長有賴母公司Bouygues Construction的全力支持,提供豐富的國際經驗及龐大的環球網絡,成就我們的發展。Bouygues Construction 是建造業界多個範疇的翹楚,堪稱環球建造業的領導者,業務遍及全球逾80個國家和地區。

香港寶嘉與Bouygues Construction緊密合作,借助集團旗下的企業網絡,靈活調配資源,發揮協同效應。2017年,Bouygues Construction在世界各地共有約47,350名僱員,營業額約117億歐元。

Bouygues Construction是Bouygues集團的成員。集團於1952年創立,是世界最具規模的多元化工業集團之一,旗下業務在不同領域雄踞世界及歐洲企業龍頭地位。



Dragages Hong Kong Limited 香港寶嘉建築有限公司 www.dragageshk.com







