

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Controlling officer: the Director of Civil Engineering and Development will account for expenditure under this Head.

Estimate 2021–22 **\$2,998.1m**

Establishment ceiling 2021–22 (notional annual mid-point salary value) representing an estimated 2 049 non-directorate posts as at 31 March 2021 reducing by 13 posts to 2 036 posts as at 31 March 2022..... **\$1,264.8m**

In addition, there will be an estimated 68 directorate posts as at 31 March 2021 and as at 31 March 2022.

Commitment balance..... **\$532.7m**

Controlling Officer's Report

Programmes

Programme (1) Tourism and Recreational Development	This programme contributes to Policy Area 5: Travel and Tourism (Secretary for Commerce and Economic Development).
Programme (2) Port and Marine Facilities	This programme contributes to Policy Area 3: Air and Sea Communications and Logistics Development (Secretary for Transport and Housing) and Policy Area 21: Land and Waterborne Transport (Secretary for Transport and Housing).
Programme (3) Provision of Land and Infrastructure	This programme contributes to Policy Area 18: Recreation, Culture, Amenities and Entertainment Licensing (Secretary for Home Affairs), Policy Area 21: Land and Waterborne Transport (Secretary for Transport and Housing) and Policy Area 22: Buildings, Lands, Planning, Heritage Conservation, Greening and Landscape (Secretary for Development).
Programme (4) Slope Safety and Geotechnical Standards	This programme contributes to Policy Area 24: Water Supply, Drainage and Slope Safety (Secretary for Development).
Programme (5) Greening and Technical Services	This programme contributes to Policy Area 22: Buildings, Lands, Planning, Heritage Conservation, Greening and Landscape (Secretary for Development).
Programme (6) Supervision of Mining, Quarrying and Explosives	This programme contributes to Policy Area 24: Water Supply, Drainage and Slope Safety (Secretary for Development).
Programme (7) Management of Construction and Demolition Materials	This programme contributes to Policy Area 23: Environmental Protection, Conservation, Power and Sustainable Development (Secretary for the Environment).
Programme (8) Advice on Development Proposals	This programme contributes to Policy Area 22: Buildings, Lands, Planning, Heritage Conservation, Greening and Landscape (Secretary for Development).

Detail

Programme (1): Tourism and Recreational Development

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	54.1	58.5	57.7 (–1.4%)	58.4 (+1.2%)
				(or –0.2% on 2020–21 Original)

Aim

2 The aim is to plan, design and implement the supporting engineering works for the tourism and recreational developments in Lei Yue Mun, as well as to provide engineering input to the development plans of the Ocean Park and Hong Kong Disneyland Resort (HKDL).

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Brief Description

3 To strengthen the position of Hong Kong as a premier destination for visitors, the Department continued to provide engineering advice to Tourism Commission on the development plans of the Ocean Park and HKDL, as well as to co-ordinate and liaise with these two theme parks and relevant parties.

4 To capitalise on the strength of the Lei Yue Mun area, being one of the most popular tourist attractions in Hong Kong for its seaside ambience and excellent seafood, and to enhance its attractiveness, the Department commenced the construction of a public landing facility and related marine works in Lei Yue Mun to facilitate visitors' access by sea.

5 The key performance measures relating to tourism and recreational development are:

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
commitment balance of projects under planning, design and construction (\$m).....	1,802.2	1,803.1	214.8#
expenditure on works under construction (\$m)	0	0	46.2

The drop in commitment balance of projects under planning, design and construction estimated for 2021 is due to the deletion of a commitment for infrastructure works in relation to the site adjacent to HKDL at Penny's Bay upon expiry in September 2020 of HKDL's option to purchase the site for resort expansion.

Matters Requiring Special Attention in 2021–22

6 During 2021–22, the Department will:

- monitor and co-ordinate with Tourism Commission the development plans of the Ocean Park and HKDL; and
- continue the construction of the public landing facility and related marine works in Lei Yue Mun.

Programme (2): Port and Marine Facilities

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	243.3	264.6	265.2 (+0.2%)	291.3 (+9.8%)
				(or +10.1% on 2020–21 Original)

Aim

7 The aim is to implement the port development programme; design, construct and maintain public marine facilities, including seawalls, mooring areas and piers; maintain adequate water depth in navigation channels in the harbour; and provide advice and services to other departments on matters relating to marine works.

Brief Description

8 In 2020, the Department continued the planning, design and construction of various projects for improving port and marine facilities. The Department completed the residual dredging works at the Kwai Tsing Container Basin and its approach channel.

9 The Department maintained 133 kilometres of seawalls, 323 piers including public piers as well as franchised and licensed ferry piers, all fairways, anchorage areas and major tidal river channels.

10 The Department continued to vet submissions for private marine facilities and to provide advice and services to other departments on matters relating to marine works.

11 The key performance measures relating to port and marine facilities are:

Targets

	Target	2019 (Actual)	2020 (Actual)	2021 (Plan)
inspecting each pier (urban: twice a year; rural: once a year) (%).....	100	100	100	100
responding to enquiries on information about marine facilities within seven days (%).....	100	100	100	100

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
expenditure on maintenance works and maintenance dredging (\$m)	89.3	111.5	91.2
submissions processed and advice provided	2 020	2 050	2 050
commitment balance of marine facilities and port projects under planning, design and construction (\$m)	208.0	240.3	174.3
expenditure on marine facilities and port construction works (\$m)	69.9	33.2	37.1

Matters Requiring Special Attention in 2021–22

12 During 2021–22, the Department will continue to upgrade the marine facilities.

Programme (3): Provision of Land and Infrastructure

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	778.1	872.6	859.5 (–1.5%)	903.9 (+5.2%)
				(or +3.6% on 2020–21 Original)

Aim

13 The aim is to provide land and supporting infrastructure for development.

Brief Description

14 The Department is responsible for planning, co-ordinating, programming and implementing provision of land and supporting infrastructure to accommodate various types of development for the public and private sectors to meet the needs of the community.

15 In 2020, the Department continued the reclamation works for the Tung Chung New Town Extension (TCNTE); the site formation and infrastructure works for development of Anderson Road Quarry site; the construction of the advance works for the Initial Sites of Kam Tin South; the construction of heliport of the Government Flying Service Kai Tak Division to tie in with the TCNTE implementation; the infrastructure works of Wan Chai Development Phase II project; the construction of footbridge across Hip Wo Street near the junction of Hip Wo Street/Mut Wah Street in Kwun Tong; the construction of advance works of the Lok Ma Chau Loop development; and the site formation and infrastructure works for development sites at Kong Nga Po. The Department commenced the construction of footbridge at the junction of Sham Mong Road and Hing Wah Street West in Sham Shui Po.

16 For the Kwu Tung North/Fanling North New Development Area (NDA), the Department continued the construction of the first phase development and the detailed design of the remaining phase development.

17 For Hung Shui Kiu/Ha Tsuen (HSK/HT) NDA, the Department commenced the construction of the first phase development and the detailed design of the second phase development.

18 The Department continued the investigation and design of the site formation and infrastructure works for industrial sites in Tuen Mun, Hung Shui Kiu and Yuen Long. The Department continued the detailed design of various projects including the main works package 1 for the Lok Ma Chau Loop development, the development of ex-Cha Kwo Ling Kaolin Mine Site (Phase 2), the footbridge at the junction of Sham Mong Road and Yen Chow Street West in Sham Shui Po, Yuen Long South development – stage 1 works, and the site formation and infrastructure works for the TCNTE. The Department also commenced the detailed design of Yuen Long South development – stage 2 works, phase 1 and the boardwalk underneath the Island Eastern Corridor.

19 The Department completed the preliminary land use study for Lam Tei Quarry and the adjoining areas. The Department continued the studies on re-planning of Tseung Kwan O Area 137 and the planning for phase 2 development at Yung Shue Wan and the feasibility study for the development of the sites at Diamond Hill upon relocation of service reservoirs. The Department also continued the urban and green design study for the future town centre and the district commercial node in HSK/HT NDA; the feasibility study on river revitalisation and flood attenuation facilities for HSK/HT NDA; the feasibility studies on environmentally friendly transport services and fostering a pedestrian and bicycle-friendly environment in HSK/HT NDA and Yuen Long South development; the feasibility study on preliminary technical review on potential sites in Yuen Long Areas 13 and 14 for housing development; and the technical study on potential sites for relocation of wholesale markets in North West Tsing Yi. The Department continued the technical study on partial development of Fanling Golf Course site; and the study on first phase development of New Territories North (NTN) – San Tin/Lok Ma Chau Development Node. The Department also commenced the market sounding exercise as part of the studies on developing multi-storey buildings for brownfield operations, and the feasibility studies for proposed public housing development on brownfield clusters shortlisted by the Planning Department.

20 The Department continued to co-ordinate the overall implementation of Kai Tak Development whilst pressing ahead with the staged design and construction of engineering infrastructure. The Department also continued the detailed feasibility study for the Environmentally Friendly Linkage System for Kowloon East.

21 The Department also continued the pilot study on underground space development in selected strategic urban areas and the technical study on underground quarrying-cum-cavern development as well as the pilot planning and engineering feasibility study on development of selected strategic cavern areas. The Department substantially completed the feasibility study for relocating the Public Works Central Laboratory in Kowloon Bay to caverns.

22 The Department completed the construction of the new cycle track between Tuen Mun and Sheung Shui and commenced the construction of the Sam Mun Tsai cycle track extension. The Department continued the construction of the advance works for the cycle track between Tsuen Wan and Tuen Mun and the investigation and design for the remaining cycle track section from Tuen Mun to Tsuen Wan.

23 The Department continued the detailed design and construction of site formation and infrastructure works for public housing development in Tuen Mun Area 54.

24 The Department continued to take forward the conservation and development initiatives and projects set out in the Sustainable Lantau Blueprint and Lantau Tomorrow Vision. For local improvement works, the Department completed the construction of phase 2 stage 1 improvement works at Tai O. The Department continued the design of phase 2 stage 2 improvement works at Mui Wo and the mountain bike trails connecting Mui Wo and Pui O in South Lantau.

25 The Department continued the site formation and infrastructure works for public housing development in Hong Kong, the feasibility studies, investigation and design for public housing development sites at Tseung Kwan O, three squatter areas in Kowloon East, Ka Wai Man Road in Kennedy Town (Phase 2), Kam Tin South, Chung Nga Road West in Tai Po, Area 48 in Fanling, Long Bin, Tan Kwai Tsuen in Yuen Long and Tuen Mun Central. The Department continued the construction of site formation and infrastructure works for public housing development including Area 54 in Tung Chung, Area 9 in Tai Po, Chung Nga Road, Yan Wing Street in Yau Tong, Pok Fu Lam South, Pik Wan Road in Yau Tong and Wang Chau. The Department substantially completed the construction of site formation and infrastructure works for public housing development at Queen's Hill in Fanling.

26 The Department commenced the design of the site formation and associated infrastructure works for development of columbarium at the western end of Sham Shui Kok Drive in Tsuen Wan and the investigation and design of road improvement at Wo Hop Shek Cemetery for columbarium development. The Department continued the design and construction of subway in support of columbarium development at Shek Mun. The Department continued the site formation and associated infrastructural works for development of columbarium at Sandy Ridge Cemetery, and continued the design of the site formation and associated infrastructural works for development of crematorium and related facilities at Sandy Ridge Cemetery.

27 The Department commenced the construction of the first phase of the site formation and infrastructure works for the establishment of an agricultural park in Kwu Tung South and continued with the detailed design of the second phase of the development works.

28 The Department completed the feasibility study on the Improvement to So Kwun Po Interchange (previously known as North-South Link(s) as alternative to So Kwun Po (Kai Leng) Roundabout) in North District and continued the investigation study on Trunk Road T4 in Sha Tin. The Department continued the feasibility studies on proposed multi-storey complex for logistics and port back-up uses in Kwai Tsing.

29 The Department continued the construction of the Tseung Kwan O – Lam Tin Tunnel, Cross Bay Link, Tseung Kwan O, Trunk Road T2 and Cha Kwo Ling Tunnel and the widening of Tai Po Road (Sha Tin Section).

30 The Department continued pursuing the staged implementation of public infrastructure works and integrated basement to support the West Kowloon Cultural District (WKCD) development.

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

31 The key performance measures relating to provision of land and infrastructure are:

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
area of land formed (hectares).....	24.9	14.4	24.9
road constructed/widened for development (metres).....	11 590	9 290	6 980
commitment balance of land formation and infrastructure projects under planning, design and construction (\$m).....	232,523.7	229,093.6	280,595.8
expenditure on construction for land formation and infrastructure (\$m).....	11,850.6	13,541.8	13,538.0
no. of land formation and infrastructure projects under planning, design and construction	191	193	215

Matters Requiring Special Attention in 2021–22

32 During 2021–22, the Department will:

- continue to ensure that all land and infrastructure required to meet development targets are delivered on time and cost-effectively;
- commence the construction of the main works package 1 for the Lok Ma Chau Loop development;
- commence the investigation and design for partial development of Fanling Golf Course site;
- commence the investigation and design for the first phase development of NTN – San Tin/Lok Ma Chau Development Node; and planning and engineering study for the remaining phase development of NTN – NTN New Town and Man Kam To;
- complete the studies on developing multi-storey buildings for brownfield operations including the market sounding exercise;
- commence the studies related to the artificial islands in the Central Waters and a new major transport corridor to link up the coastal areas of Tuen Mun, North Lantau, the artificial islands in the Central Waters and Hong Kong Island;
- commence the engineering study on Road P1 (Tai Ho – Sunny Bay Section);
- commence the planning and engineering study on Sunny Bay reclamation;
- commence the planning and engineering study for Lung Kwu Tan reclamation and the re-planning of Tuen Mun West area;
- complete the formulation of Lantau trails and recreation plan and commence studies to take forward trails and recreation proposals by phases;
- commence the investigation and design of the relocation of Public Works Central Laboratory to caverns;
- complete the construction of cycle track section between Tsing Tsuen Bridge and Bayview Garden, and continue with the investigation and design of the remaining section of cycle track from Ting Kau to Tuen Mun;
- commence the site formation and infrastructure works for the Phase 1 public housing developments at Kam Tin South in Yuen Long;
- commence the investigation and detailed design for site formation and infrastructure works for public housing development at Cha Kwo Ling Village in Kowloon East;
- complete the detailed design for site formation and infrastructure works for public housing development at Ka Wai Man Road in Kennedy Town (Phase 2);
- commence the construction of subway in support of columbarium development at Shek Mun; and
- commence the investigation and design for the improvement to So Kwun Po Interchange.

Programme (4): Slope Safety and Geotechnical Standards

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	416.9	443.0	437.6 (–1.2%)	441.7 (+0.9%)
				(or –0.3% on 2020–21 Original)

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Aim

33 The aim is to exercise geotechnical control on private and public developments, register slopes, implement the Landslip Prevention and Mitigation Programme (LPMitP), provide landslide emergency service, investigate serious landslides, set geotechnical standards, undertake public education and advise private slope owners on slope safety.

Brief Description

34 The checking of geotechnical aspects of building and infrastructure developments continues to play a key role in reducing landslide risk. The Department has been providing specialised geotechnical input in the planning, investigation, design, construction and geotechnical risk management.

35 The Department continued the LPMitP to upgrade substandard government man-made slopes, mitigate landslide hazard arising from natural hillside catchments, and conduct safety screening for private man-made slopes. Among the 166 man-made slopes upgraded under the LPMitP in 2020, 100 affected buildings, 43 affected major roads and public facilities, and 23 affected squatter structures. In 2020, 35 hillside catchments mitigated under the LPMitP primarily affected buildings and important transport corridors, among which none affected squatter structures.

36 The Department continued to maintain an automatic raingauge network to support the operation of the Landslip Warning System. It also provided 24-hour landslide emergency service in collaboration with other departments to remove immediate landslide danger and to restore essential services to the community. Serious landslides would continue to be investigated with a view to improving the slope safety system.

37 The Department continued to promote slope maintenance as well as public awareness and response towards slope safety. The Department continued to advise private slope owners on slope maintenance and improvement works. In addition, 19 guidance documents were produced on slope safety and other geotechnical topics, including reports on lessons learnt from landslides.

38 The key performance measures relating to slope safety and geotechnical standards are:

Target

	Target	2019 (Actual)	2020 (Actual)	2021 (Plan)
providing information about a slope within five days of an application (%).....	100	100	100	100

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
new slope features registered	440	429	450
slope features upgraded and landscaped	165	166	176
natural hillside catchments with mitigation measures implemented	33	35	36
safety screening studies of private man-made slopes completed.....	100	100	100
expenditure for landslip prevention and mitigation (\$m)	1,137.0	1,112.0	1,145.0
geotechnical submissions checked.....	19 850	16 888	16 400
active construction sites audited.....	3 161	1 705	1 640
guidance documents produced	20	19	18

Matters Requiring Special Attention in 2021–22

39 During 2021–22, the Department will:

- ensure adequate geotechnical input to the planning, design and construction of man-made slopes, tunnels and landslide mitigation measures to natural hillsides, and to blasting works by professionally qualified geotechnical engineers and suitably experienced competent persons;
- continue to audit government and private sector projects involving tunnel/cavern works to ensure that the works are carried out to an adequate standard of geotechnical risk management;
- continue to assist government departments in prioritising slopes for engineer inspection and maintenance action;
- continue to enhance the appearance of slopes in conjunction with slope upgrading and landslide risk mitigation works under the LPMitP;
- continue to implement the LPMitP to deal with the landslide risk arising from substandard man-made slopes and vulnerable natural hillsides;

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

- continue to enhance geotechnical guidance on the design and quality control of slope upgrading and landslide risk mitigation works; and
- build community resilience and enhance government preparedness for landslide disasters, in view of the increasing risk arising from climate change, increasing population and slope deterioration.

Programme (5): Greening and Technical Services

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	154.9	163.4	161.3 (–1.3%)	170.3 (+5.6%)
				(or +4.2% on 2020–21 Original)

Aim

40 The aim is to develop greening master plans and implement other landscape measures to improve the environment of Hong Kong, provide ground investigation, construction materials testing, geological surveys and other geotechnical services, and manage Hong Kong’s marine fill resources and mud disposal facilities.

Brief Description

41 The Department commenced the construction for the greening master plans for the Southwest and Northeast New Territories.

42 The Department operates contracts for ground investigation and laboratory testing. In 2020, the Public Works Laboratories (PWLs) continued to serve public works projects by undertaking some 588 000 tests on construction materials. The Department continued technical development on the use of sustainable construction materials (e.g. Ground Granulated Blastfurnace Slag) in civil engineering and geotechnical works in Hong Kong. The Department continued to provide geotechnical advisory services to government departments on a wide range of projects. The Civil Engineering Library, which contains a large collection of geotechnical data on Hong Kong, served about 5 500 users in 2020.

43 Through the Marine Fill Committee, the Department continued to co-ordinate the supply and demand of local marine fill resources to meet development needs, oversee the operation of marine disposal facilities for the disposal of contaminated and uncontaminated sediments, and formulate strategies to ensure the provision of adequate marine disposal capacity.

44 The key performance measures relating to greening and technical services are:

Targets

	Target	2019 (Actual)	2020 (Actual)	2021 (Plan)
providing assistance at the registration counter of the Civil Engineering Library within ten minutes (%)	100	100	100	100
providing information about geology and natural resources within 4.5 days upon request (%).....	100	100	100	100

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
no. of greening master plans under planning, design and implementation	8	8	8
expenditure on greening works implemented under greening master plans (\$m)	10.2	2.5	45.0
expenditure on term contracts for ground investigation and laboratory soil and rock testing (\$m).....	50.0	57.6	38.0
material tests conducted in the PWLs and in contract laboratories managed by the PWLs (thousand).....	614	588	570
geotechnical advisory cases handled in land-use planning and engineering feasibility studies	2 208	2 156	2 200
geotechnical advisory cases handled in detailed engineering studies and design.....	779	656	675

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
value of marine fill management investigations and studies (\$m)	2.7	4.2	7.3
marine fill management reports and major papers issued	9	9	9

Matters Requiring Special Attention in 2021–22

45 During 2021–22, the Department will continue to:

- implement the greening master plans for the Southwest and Northeast New Territories; and
- provide reliable and efficient construction material testing and ground investigation services to public works projects.

Programme (6): Supervision of Mining, Quarrying and Explosives

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	81.2	82.2	81.5 (–0.9%)	85.6 (+5.0%)
				(or +4.1% on 2020–21 Original)

Aim

46 The aim is to supervise contracts for quarrying in Hong Kong, enforce the Mining Ordinance (Cap. 285), enforce the Dangerous Goods Ordinance (Cap. 295) in connection with the use of explosives, and safeguard the public from the misuse of explosives.

Brief Description

47 The Department made satisfactory progress in respect of supervision of quarrying in 2020. The Department continued to supervise the rehabilitation contract for Lam Tei Quarry, issue permits under the Sand Ordinance (Cap. 147) for importation and transportation of sand, and regulate the use of site crushers on both public and private construction sites. Regular inspections of the quarry site were conducted to enforce safety regulations. The Department is also undertaking studies on potential new quarry sites in Hong Kong with a view to developing new quarries to dovetail with the closure of Lam Tei Quarry.

48 The Department also made satisfactory progress in respect of supervision of the use of explosives during the year. To protect the public from the misuse of explosives, the Department continued to maintain strict control over the storage, handling, transportation and use of explosives from manufacture or importation to use on construction sites.

49 The key performance measures relating to supervision of quarrying and explosives are:

Targets

	Target	2019 (Actual)	2020 (Actual)	2021 (Plan)
issuing a Sand Removal Permit within two days of an application which has satisfied government requirements (%)	100	100	100	100
issuing a Licence to Manufacture Explosives within two days of an application, where pre-licensing requirements have been satisfied (%)	100	100	100	100
issuing a Permit to Remove Explosives within one day of an application (%)	100	100	100	100
issuing a Licence to Store or Use Explosives within two days of an application, where pre-licensing requirements have been satisfied (%)	95	100	100	98
issuing a Mine Blasting Certificate within one day of an applicant passing an examination (%)	100	100	100	100

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
Sand Removal Permits issued	5 239	2 919	1 000
Quarrying			
quarrying and rock crushing contracts supervised	1	1	1
revenue from royalty and rental payments (\$m)	96.7	98.0	95.6
aggregates processed by			
contract quarries (million tonnes)	1.1	1.5	1.4
safety inspections of quarries conducted	12	12	12
Explosives and Blasting			
inspections of pre-licensed sites, magazines, manufacturing plants and stores conducted	401	392	380
licences and permits granted ^β	7 705	7 688	7 300
licences and permits renewed ^β	141	143	150
inspections of blasting sites conducted	565	406	440
no. of blasting activities	1 110	1 099	930
tonnes of explosives consumed	673	709	670
no. of deliveries of explosives	1 062	1 100	930
tonnes of explosives delivered from government explosives depots	71	98	170
warnings issued	0	0	1

β These include all licences and permits except Sand Removal Permits.

Matters Requiring Special Attention in 2021–22

50 During 2021–22, the Department will continue to work with the Security Bureau and other departments in taking forward amendments to subsidiary legislation under the Dangerous Goods Ordinance in respect of the use of explosives. The Department will commence two investigation, design and construction consultancy agreements for two potential new quarry sites.

51 The main blasting projects in 2021–22 will be the Rehabilitation of Lam Tei Quarry contract – Extended Works, the Central Kowloon Route – Central Tunnel contract, the Relocation of Shatin Sewage Treatment Works to Caverns – Site Preparation and Access Tunnel construction contract, and the Trunk Road T2 and Infrastructure Works for Developments at the Former South Apron contract. These projects will largely determine the demand for explosives and number of blasting related activities.

Programme (7): Management of Construction and Demolition Materials

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	1,254.3	1,322.4	1,193.2 (–9.8%)	1,004.6 (–15.8%)
				(or –24.0% on 2020–21 Original)

Aim

52 The aim is to ensure good management and beneficial reuse of inert construction and demolition materials (also known as public fill).

Brief Description

53 In 2020, the Department, on behalf of the Public Fill Committee, continued to scrutinise submissions from proponents of public works projects with a view to reducing generation and maximising the reuse of public fill. The Department also provided proponents of public works projects with guidelines to formulate construction and demolition materials management plans at the early design stage.

54 The Department continued to maintain adequate outlets at strategic locations for surplus construction and demolition materials, including the fill banks and the construction waste sorting facilities at Tuen Mun Area 38 and Tseung Kwan O Area 137. A short-term barging facility at Mui Wo and a long-term barging point at Chai Wan were being operated. Inert hard construction and demolition materials were also recycled for use by works projects.

55 The Department continued to deliver part of the surplus public fill for beneficial reuse in the Mainland and to liaise with the Mainland authority to ensure smooth operation.

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

56 The key performance measures relating to management of construction and demolition materials are:

Targets

	Target	2019 (Actual)	2020 (Actual)	2021 (Plan)
issuing dumping licences within three days (%).....	100	100	100	100
issuing dumping licences within half day for applications submitted in person (%)	100	100	100	100

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
public fill received at public fill reception facilities (million tonnes).....	11.2	12.1 [^]	11.9
public fill delivered to the Mainland for beneficial reuse (million tonnes)	7.7	0.9 [^]	1.3
public fill supplied to local projects for beneficial reuse (million tonnes)	12.7	13.5 [^]	10.4
public fill stockpiled at public fill reception facilities as at year end (million tonnes).....	9.2	6.9 [^]	7.1
recycling inert hard construction and demolition materials (million tonnes).....	0.3	0.5	0.6
submissions processed on behalf of the Public Fill Committee	137	138	140
no. of assignment of public fill outlets through trip ticket system	344	336	340

[^] Provisional actual subject to adjustment.

Matters Requiring Special Attention in 2021–22

57 During 2021–22, the Department will continue to supply the surplus public fill to the reclamation works of the Three-Runway System project, the TCNTE project and the Integrated Waste Management Facilities – Phase I project for beneficial reuse.

Programme (8): Advice on Development Proposals

	2019–20 (Actual)	2020–21 (Original)	2020–21 (Revised)	2021–22 (Estimate)
Financial provision (\$m)	40.0	42.0	41.4 (–1.4%)	42.3 (+2.2%)
				(or +0.7% on 2020–21 Original)

Aim

58 The aim is to advise on development proposals.

Brief Description

59 The Department continued to advise government departments on the engineering aspects of development proposals, including private development proposals, for the purpose of improving the environment and the infrastructural support to such proposals.

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

60 The key performance measures relating to advice on development proposals are:

Indicators

	2019 (Actual)	2020 (Actual)	2021 (Estimate)
town plans and planning briefs on which advice and comments are given	92	117	132
public and private development proposals and planning applications examined	2 214	2 091	1 951
town plans, planning briefs, public and private development proposals and planning applications dealt with per post	54.9	52.6	49.6

Matters Requiring Special Attention in 2021–22

61 During 2021–22, the Department will continue to provide:

- timely response to requests from the Buildings Department, Lands Department and Planning Department for advice on lease conditions, Town Planning Board applications, master development plans and building plans. Measures will also be taken to ensure that due regard is given to environmental factors including conserving natural features, reducing impact of engineering works and enhancing quality of the landscape; and
- technical advice and support to the WKCD Authority on the phased implementation of WKCD development.

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

ANALYSIS OF FINANCIAL PROVISION

Programme	2019–20 (Actual) (\$m)	2020–21 (Original) (\$m)	2020–21 (Revised) (\$m)	2021–22 (Estimate) (\$m)
(1) Tourism and Recreational Development.....	54.1	58.5	57.7	58.4
(2) Port and Marine Facilities.....	243.3	264.6	265.2	291.3
(3) Provision of Land and Infrastructure.....	778.1	872.6	859.5	903.9
(4) Slope Safety and Geotechnical Standards.....	416.9	443.0	437.6	441.7
(5) Greening and Technical Services	154.9	163.4	161.3	170.3
(6) Supervision of Mining, Quarrying and Explosives.....	81.2	82.2	81.5	85.6
(7) Management of Construction and Demolition Materials.....	1,254.3	1,322.4	1,193.2	1,004.6
(8) Advice on Development Proposals.....	40.0	42.0	41.4	42.3
	3,022.8	3,248.7	3,097.4 (-4.7%)	2,998.1 (-3.2%)
				(or -7.7% on 2020–21 Original)

Analysis of Financial and Staffing Provision

Programme (1)

Provision for 2021–22 is \$0.7 million (1.2%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for salary increments.

Programme (2)

Provision for 2021–22 is \$26.1 million (9.8%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for filling of vacancies, salary increments, and the increased cash flow requirement for other operating expenses, contract maintenance expenses and plant and equipment.

Programme (3)

Provision for 2021–22 is \$44.4 million (5.2%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for filling of vacancies, salary increments, and the increased cash flow requirement for plant and equipment and non-recurrent expenditure, partly offset by the decreased cash flow requirement for other operating expenses. In addition, there will be a net decrease of eight posts in 2021–22.

Programme (4)

Provision for 2021–22 is \$4.1 million (0.9%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for filling of vacancies and salary increments, partly offset by the decreased cash flow requirement for other operating expenses and plant and equipment.

Programme (5)

Provision for 2021–22 is \$9.0 million (5.6%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for filling of vacancies, salary increments, and the increased cash flow requirement for other operating expenses, partly offset by the net decrease of one post.

Programme (6)

Provision for 2021–22 is \$4.1 million (5.0%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for filling of vacancies, salary increments, and the increased cash flow requirement for other operating expenses, partly offset by the net decrease of four posts.

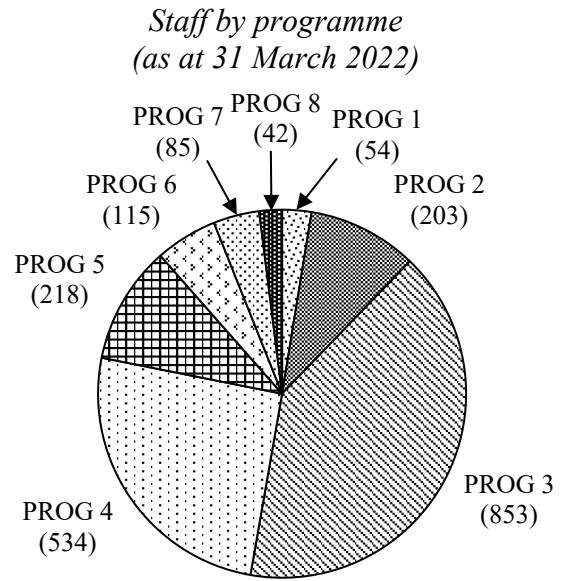
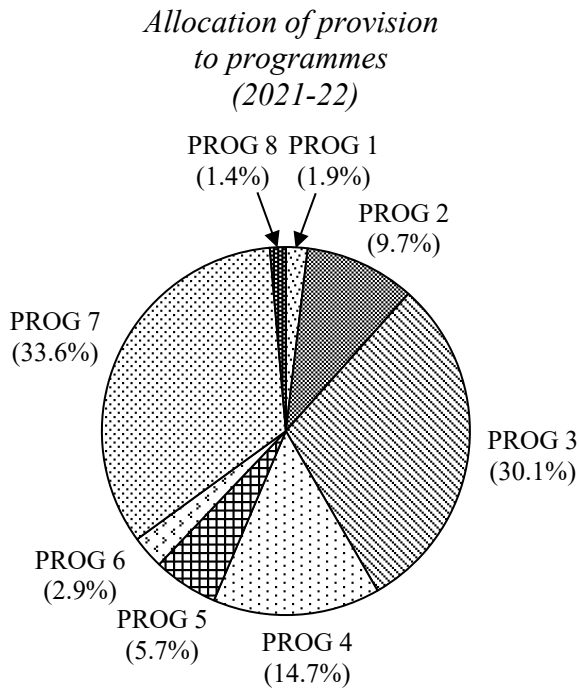
Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Programme (7)

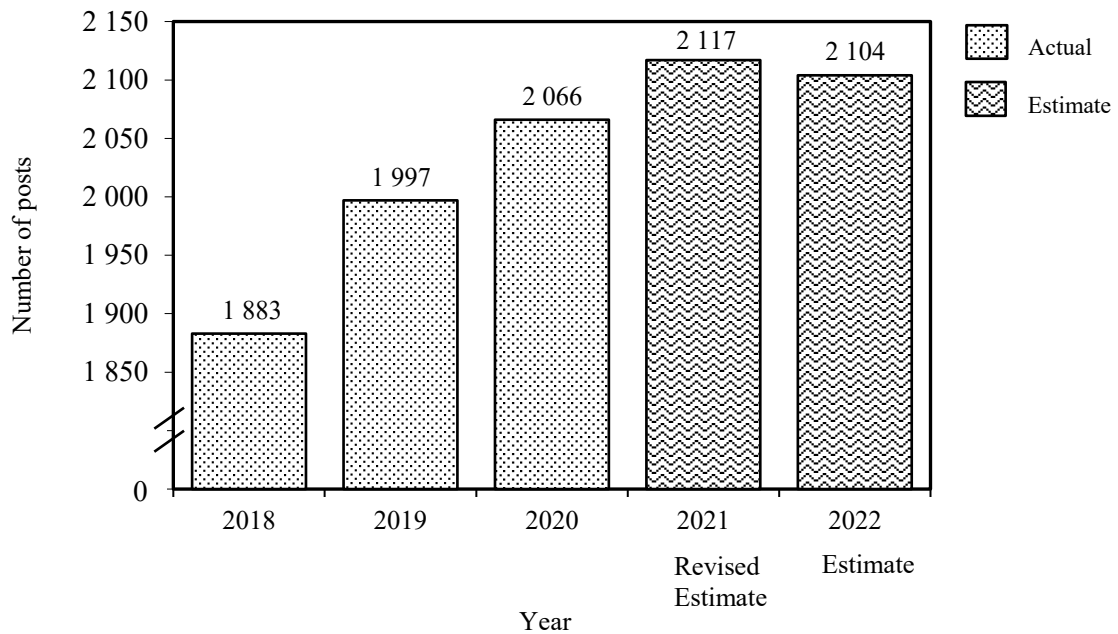
Provision for 2021–22 is \$188.6 million (15.8%) lower than the revised estimate for 2020–21. This is mainly due to the reduced provision for handling surplus public fill.

Programme (8)

Provision for 2021–22 is \$0.9 million (2.2%) higher than the revised estimate for 2020–21. This is mainly due to the increased provision for filling of vacancies and salary increments, partly offset by the decreased cash flow requirement for other operating expenses.



Changes in the size of the establishment (as at 31 March)



Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Sub-head (Code)	Actual expenditure 2019–20	Approved estimate 2020–21	Revised estimate 2020–21	Estimate 2021–22	
	\$'000	\$'000	\$'000	\$'000	
Operating Account					
Recurrent					
000	Operational expenses	3,017,542	3,243,844	3,093,200	2,972,284
	Total, Recurrent.....	<u>3,017,542</u>	<u>3,243,844</u>	<u>3,093,200</u>	<u>2,972,284</u>
Non-Recurrent					
700	General non-recurrent	32	1,100	100	12,000
	Total, Non-Recurrent.....	<u>32</u>	<u>1,100</u>	<u>100</u>	<u>12,000</u>
	Total, Operating Account	<u>3,017,574</u>	<u>3,244,944</u>	<u>3,093,300</u>	<u>2,984,284</u>
Capital Account					
Plant, Equipment and Works					
603	Plant, vehicles and equipment.....	420	2,333	2,022	7,257
661	Minor plant, vehicles and equipment (block vote).....	4,831	1,400	2,051	6,567
	Total, Plant, Equipment and Works.....	<u>5,251</u>	<u>3,733</u>	<u>4,073</u>	<u>13,824</u>
	Total, Capital Account.....	<u>5,251</u>	<u>3,733</u>	<u>4,073</u>	<u>13,824</u>
	Total Expenditure	<u><u>3,022,825</u></u>	<u><u>3,248,677</u></u>	<u><u>3,097,373</u></u>	<u><u>2,998,108</u></u>

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Details of Expenditure by Subhead

The estimate of the amount required in 2021–22 for the salaries and expenses of the Civil Engineering and Development Department is \$2,998,108,000. This represents a decrease of \$99,265,000 against the revised estimate for 2020–21 and \$24,717,000 against the actual expenditure in 2019–20.

Operating Account

Recurrent

2 Provision of \$2,972,284,000 under *Subhead 000 Operational expenses* is for the salaries, allowances and other operating expenses of the Civil Engineering and Development Department.

3 The establishment as at 31 March 2021 will be 2 117 posts including 13 supernumerary posts. It is expected that there will be a net decrease of 13 posts in 2021–22. Subject to certain conditions, the controlling officer may under delegated power create or delete non-directorate posts during 2021–22, but the notional annual mid-point salary value of all such posts must not exceed \$1,264,784,000.

4 An analysis of the financial provision under *Subhead 000 Operational expenses* is as follows:

	2019–20 (Actual) (\$'000)	2020–21 (Original) (\$'000)	2020–21 (Revised) (\$'000)	2021–22 (Estimate) (\$'000)
Personal Emoluments				
- Salaries	1,410,179	1,510,161	1,476,000	1,536,000
- Allowances	19,669	23,100	24,260	22,807
- Job-related allowances.....	802	950	771	984
Personnel Related Expenses				
- Mandatory Provident Fund contribution	4,993	6,447	5,576	6,049
- Civil Service Provident Fund contribution	78,806	99,393	90,596	111,471
Departmental Expenses				
- Contract maintenance	1,274,580	1,349,396	1,223,991	1,045,728
- General departmental expenses	228,513	254,397	272,006	249,245
	3,017,542	3,243,844	3,093,200	2,972,284

Capital Account

Plant, Equipment and Works

5 Provision of \$6,567,000 under *Subhead 661 Minor plant, vehicles and equipment (block vote)* represents an increase of \$4,516,000 (220.2%) over the revised estimate for 2020–21. This is mainly due to the increased requirement for new and replacement of minor plant and equipment.

Head 33 — CIVIL ENGINEERING AND DEVELOPMENT DEPARTMENT

Commitments

Sub-head (Code)	Item (Code)	Ambit	Approved commitment	Accumulated expenditure to 31.3.2020	Revised estimated expenditure for 2020–21	Balance
			\$'000	\$'000	\$'000	\$'000
<i>Operating Account</i>						
700		<i>General non-recurrent</i>				
	803	Lantau Conservation Fund	500,000	—	—	500,000
			<u>500,000</u>	<u>—</u>	<u>—</u>	<u>500,000</u>
<i>Capital Account</i>						
603		<i>Plant, vehicles and equipment</i>				
	802	Replacement of the hydrographic survey vessel "Port Works 5"	35,120	420	2,022	32,678
			<u>35,120</u>	<u>420</u>	<u>2,022</u>	<u>32,678</u>
		Total	<u><u>535,120</u></u>	<u><u>420</u></u>	<u><u>2,022</u></u>	<u><u>532,678</u></u>