Confirmed Minutes of the 175th Meeting of the Advisory Council on the Environment held on 13 December 2010 at 2:30 pm

Present:

Prof Paul LAM, JP (Chairman)
Prof CHAU Kwai-cheong, JP (Deputy Chairman)
Ms Teresa AU
Dr Dorothy CHAN, BBS
Prof FUNG Tung
Mr Michael JEBSEN, BBS
Dr MAN Chi-sum, JP
Dr Alfred TAM
Mr TSANG Kam-lam, JP
Dr YAU Wing-kwong
Dr Ray YEP
Mr Carlson K S CHAN, JP (Secretary)

Absent with Apologies:

Mr Oscar CHOW
Ms Betty HO
Mr Edwin LAU, MH
Prof Joseph LEE
Mr Michael LEE
Ir Dr LO Wai-kwok, BBS, MH, JP
Prof WONG Ming-hung
Mr Simon WONG, JP
Prof Ignatius YU

In Attendance:

Ms Anissa WONG, JP	Permanent Secretary for the Environment
Mr C C LAY	Assistant Director (Conservation), Agriculture, Fisheries and Conservation Department
Mr C T LING	Assistant Director/Technical Services, Planning Department (PlanD)
Ms Esther LI	Acting Principal Information Officer, Environmental Protection Department (EPD)
Ms Josephine CHEUNG	Chief Executive Officer (CBD), EPD
Mr Steve TSOI	Executive Officer (CBD), EPD
Miss Kim KWAN	Executive Manager (CBD), EPD

In Attendance for Agenda Item 3:

Mr C S LIU	Chief Engineer/Project 2 (NTN&W), Civil Engineering and Development Department (CEDD)
Mr K S CHAN	Senior Engineer/9 (NTN&W), CEDD
Mr Michael CHAN	Chief Town Planner/Strategic Planning, PlanD
Ms Carmen CHU	Deputy Study Manager, Ove Arup & Partners Hong Kong Ltd. (ARUP)
Mr Sam TSOI	Consultant, ARUP
Mr John Allcock	Consultant, ARUP
Ms Karmin TONG	Consultant, ARUP

In Attendance for Agenda Item 4:

Mr C W TSE, JP	Assistant Director (Environmental Assessment), EPD

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Agenda Item 1 : Confirmation of the draft minutes of the 174th meeting held on 8 November 2010

The draft minutes were confirmed without amendments.

Agenda Item 2 : Matters arising from the minutes of the 174th meeting held on 8 November 2010

2. There were no matters arising from the minutes of the last meeting.

Agenda Item 3 : Planning and Engineering Study on Development of Lok Ma Chau Loop – Stage One Public Engagement
(ACE Paper 17/2010)

3. The Chairman informed Members that a Member had declared interest before the meeting that her company was involved in the consultancy study related to the Planning and Engineering Study on Development of Lok Ma Chau (LMC) Loop (the Study). To avoid any potential conflict of interest, she did not attend the meeting.

Action

4. The Chairman informed Members that a submission from The Hong Kong Bird Watching Society addressed to the Council regarding the Study was received shortly before the meeting. The submission was circulated to Members for information before the meeting.

5. Mr C S Liu briefed Members on the background of the Study and pointed out that comments received during the two-month consultation period in the context of the Stage One Public Engagement exercise would be taken into account in refining the Preliminary Outline Development Plans (PODP). Ms Carmen Chu and Mr Sam Tsoi briefed Members on the key features of the PODP and development proposals for the LMC Loop and the associated environmental issues.

6. The Chairman noted that the Environmental Impact Assessment (EIA) study on the project was underway. He pointed out that the Council would focus on providing comments and suggestions on the PODP and development proposals at the current stage. Comments in respect of specific details on environmental impacts would be provided upon receipt of the EIA report.

7. A Member considered that the development plans were of paramount importance as it was a unique opportunity for Hong Kong to set a benchmark for a sustainable low carbon community which would have positive impacts across the border. In formulating the plans, specific low carbon features should be developed on top of broad principles. High standards in terms of carbon footprint and conservation based on Hong Kong, not Shenzhen (SZ), criteria should be used in view of the ecologically sensitive surrounding areas. Mr Sam Tsoi said that low carbon features according to Hong Kong's standards would be adopted for achieving a high level benchmark.

8. A Member considered that it was necessary to build in a mechanism to ensure that the most updated green technologies, such as renewable energy and waste management, would be incorporated by the time of development about ten years later in order to achieve the objective of developing a showcase of low carbon development.

9. A Member considered that more comprehensive proposals under the low carbon community concept should be incorporated. On building energy efficiency, adoption of more energy efficient designs would help achieve the

vision of low carbon development. On land transport, walking and cycling were considered the most sustainable modes of transport. The concept of car-free community currently adopted in Discovery Bay and Ma Wan should be explored. The transport interchanges should be carefully designed. Mr Sam Tsoi explained that the latest requirements stipulated in the "Building Environmental Assessment Method Plus" would be followed to achieve building energy efficiency. Comprehensive cycle track and pedestrian walkway networks would be provided within the Loop. Two transport interchanges with parking facilities were proposed to be located near the east and west entrances to the Loop for motorists to switch to green modes of transport inside the Loop.

10. A Member considered that the anticipated population in the Loop would not be able to support the construction of a rail or a light-rail system. A tram system within the Loop, which was more environment-friendly and financially viable, should be considered. Inside the university campus, the concept of zip cars should be seriously considered. The use of zip cars, which was widely adopted in overseas universities, provided a platform for flexible car sharing by which potential users could rent cars at a duration based on their needs. This would help reduce personally-owned vehicles.

11. A Member suggested exploring the concept of e-mobility for identifying transport alternatives which was particularly suitable for the Loop as a flat land. For transport links outside the Loop, potential environmental disturbance to the ecologically sensitive wetlands in the vicinity should be thoroughly addressed in the EIA study. Mr Sam Tsoi said that further studies would be conducted to minimize disturbance to the surrounding areas of the Loop.

12. On the eastern connection road between Kwu Tung North New Development Area (KTN NDA) and the Loop, a Member noted that this was a new idea not included in the preliminary conceptual plan. He asked about the possibility of constructing a tunnel instead of a land road which would have adverse environmental impacts on the fish ponds and wetland habitat. Mr C S Liu explained that the eastern connection road between KTN NDA and the Loop was essential to facilitate commutation between the two areas. The road alignment and design options would be carefully planned to minimize potential environmental impacts on the surrounding areas. The proposed road would be designed to allow access to the Loop only but not to adjacent wetland areas to avoid illegal dumping or unauthorized developments.

Action

13. On the proposed direct access between LMC Spur Line Station and the Loop, a Member asked about the timeframe of developing the link and whether it would synchronize with the development of Study Area C on the SZ side in view of the increasing flow of travellers between Futian District in SZ and Hong Kong. As regards the possible development of a metro link between SZ and the Loop in the long term, another Member suggested that the transport infrastructure and interchanges be well planned in advance to ensure compatibility with the overall plan of the area, such as by making use of the east or west entrances.

14. Mr C S Liu explained that the feasibility of providing a direct link between LMC Spur Line Station and the Loop by various transportation modes, such as electric bus, footbridge with elevated travellators and automatic people movers was being studied. According to the SZ authorities, the development of Area C in SZ would depend on the review of cargo handling function of Huanggang Port and completion of the new Boundary Control Point at Liantang/Heung Yuen Wai scheduled for 2018. As a long-term proposal, reservation had been made for provision of a pedestrian link across the SZ River at the northern end of the Loop to Area C where a station of SZ Metro Line was planned. Subject to further study and agreement of the two governments, associated boundary facilities might be further considered if the link was to proceed.

15. A Member expressed reservation on the proposed building height of up to 15 storeys in view of the possible wall effect and visual impacts. The building height of 15 storeys was considered high-rise for rural areas. Mr Sam Tsoi explained that technical assessments including an air ventilation assessment would be conducted on the outline development plans. The locations and height of the buildings would be refined having regard to the assessment results.

16. A Member shared the concern over the incompatibility of the proposed building height in the Loop with the surrounding areas. He considered that it was undesirable to have high-rise buildings around the fish ponds and wetland areas. Mr C S Liu agreed that the building height in the Loop should be commensurate with those in the surrounding areas in Hong Kong as well as in SZ. To strike a balance between different nature of developments on the Hong Kong side and SZ side, medium-rise buildings ranging from three to 15 storeys were proposed.

Action

17. A Member said that the plot ratio of development around ecologically sensitive areas was generally limited to 0.4. The proposed plot ratio of 1.37 for the Loop could by no means serve as a benchmark of a low carbon community. Another Member enquired about the rationale of the high plot ratio. He noted that the plot ratios of developments at Fung Lok Wai and Wo Shang Wai near the wetland areas were only 0.185 and 0.4 respectively. A Member asked about the reason for the proposed development of a total of gross floor area of about 1.2 million m^2, resulting in the high gross plot ratio.

18. Mr Michael Chan explained that the plot ratio of the Loop should be considered in the wider context of the release of Frontier Closed Area. Majority of the released areas in the Closed Area would be reserved for conservation and recreational purposes. Development was only proposed for areas along the major corridors where cross boundary facilities would locate. The Loop was one of the strategic areas with higher potential for development. The plot ratio of 1.37 was proposed for maximizing the utilization of land resources to meet future development needs.

19. A Member expressed concern over the impacts of the project on the flight path of birds as the development area was surrounded by wetlands, including Mai Po Nature Reserve, San Tin, Ma Tso Lung and Hoo Hok Wai. While it might be difficult to estimate scientifically the actual space required in the flight corridor, the optimization of the flight path in the interconnected wetland areas should be carefully examined. Mr Sam Tsoi explained that a 12-month survey was conducted to identify the patterns of flight path of birds. The findings revealed that the flight path was in general parallel to the meander of the old SZ River.

20. A Member asked whether bird sighting was conducted at the Loop Proper Area. Mr John Allcock explained that surveys had been conducted at various sites around the Loop. Results showed that most of the birds flew across the old SZ River and then followed the meander of the old SZ River towards Hoo Hok Wai in the north. An Ecological Zone of about 100 m wide along the southern flank of the Loop was thus proposed to provide a wide corridor along the existing flight path.

Action

21. A Member was concerned about the impacts of the project on habitats of water birds. He considered that the natural form and size of water bodies in the area should be kept intact and the embankments should be free from disturbance to ensure that foraging activities of water birds would not be affected. Mr John Allcock explained that potential impacts of the project on water birds would be investigated in the context of the EIA study. Preliminary survey showed that additional ecological management scheme for the fish ponds would likely be required. The scheme would probably be in the form of enhancement similar to the scheme for LMC Spur Line project.

22. A Member noted that the Loop area was originally a farmland. It was changed to fish ponds and then used as a dumping ground for mud extracted from the SZ River training works. He asked about the definition of the land use of the Loop for the EIA study as different land use would affect the consideration of ecological compensation. He considered that the proposed ecological compensation was inadequate as compared to other similar projects if the land use was classified as fish ponds. For the Wo Shang Wai development near wetland area, about 90% of the area was reserved for conservation and residential development accounted for only 10% of the site.

23. Mr C S Liu explained that the Loop was created upon the completion of the training works of the SZ River and had been under the administration of the HKSAR Government since 1997. The Loop was basically a flat land filled up during the SZ River training works which was the basis for conducting the EIA study. Mr John Allcock added that the existing conditions of the Loop, which were more or less the same as those in 1997, were adopted as the baseline for considering ecological mitigation measures. The area was mainly degraded dry land. The proposed ecological compensation of about 12 ha at the southern flank of the Loop was equivalent to the size of the loss of existing reedbed and wetland resulting from the proposed development.

24. The Chairman considered that it was a challenging task to formulate development plans for the Loop, given its historical land use, constraints and environmental problems. It was not desirable to use the existing condition of a degraded dry land as the baseline for the EIA study. To fulfill the public's expectation for the Loop to be a showcase of sustainable low carbon community, high level of environmental standards had to be adopted and the environmental issues had to be dealt with properly. For example, the plot ratio and energy

performance of the Loop should be benchmarked with the best standards in Hong Kong.

25. A Member suggested expanding the area of the Ecological Zone as it only accounted for about 15% of the site. It was also difficult to prove in scientific terms that the corridor of 100 m wide would be sufficient as a flight path for birds. The Ecological Zone could form part of the Education Zone as it could serve the purpose of environmental education.

26. A Member highlighted the importance of formulating the plans in a holistic manner at the conceptual planning stage. A comprehensive study should be conducted on the ecological impacts of the project on both the Loop and the surrounding areas to ensure that ecological compensation would be considered in an integrated approach. All concurrent and planned development projects in the vicinity should be taken into consideration for achieving more systematic and structured development of the area as a whole. Moreover, both quantity and quality of ecological compensation in terms of size and various parameters should be fully justified in the EIA study. Measures had to be taken to avoid creating a fragmented habitat especially with buildings of 15 storeys high. Another Member suggested conducting a study on the ecological function of the Loop including its supporting function in relation to the surrounding wetlands.

27. A Member considered that the proposed plan of the Loop and its surrounding areas seemed to show a case of landscape fragmentation. The rural landscape was fragmented by new town development while fish ponds and hills were fragmented by the KTN NDA. He suggested that consideration be given to a more focused development of the area and a larger trunk of rural land be kept intact for better ecological conservation.

28. The Chairman asked whether development plans in areas surrounding the Loop had been taken into account. Mr Sam Tsoi explained that the study area comprised the Loop (i.e. Area A) and the adjoining area in Hong Kong (i.e. Area B). A separate planning study was also commissioned by the SZ authorities for the adjoining area in SZ (i.e. Area C). Area B was mainly intended for the provision of connection roads and infrastructure facilities to serve the development of the Loop. Mr C S Liu added that review findings showed that sites along LMC Road in the southern part of Area B would have scope to support some rural low-rising commercial activities to complement the

development of the Loop. There were no development proposals for other areas surrounding LMC Loop, including Hoo Hok Wai in the northeast of the Loop which was mainly grassland, wetland and fish ponds. In the proposed KTN NDA towards the east of the study area, supporting facilities such as residential developments for university staff and facilities for education institutions were proposed to complement the development of the Loop. The Chairman suggested exploring the feasibility of designating some surrounding areas as conservation areas.

29. In reply to a Member's enquiry about the site as a low-lying area, Mr C S Liu explained that the Loop area had been filled up to a level of about 4.5 m above principal datum. To avoid potential problem of flooding, the site would be further filled up by 1 to 2 m. The Member suggested building a terrestrial habitat with low-lying hills with different surface level from the green corridor. The terrestrial habitat could serve a number of purposes, such as creation of structures for wildlife species, screening off noise and enhancing the landscape of the Loop.

30. A Member was concerned about the odour problem arising from the SZ River and contaminated mud. He suggested studying the sulphide level of the contaminated mud in the EIA study in order to formulate effective mitigation measures. A total solution was necessary to address the issue as the proposed mitigation measure of installing indoor odour control system could not solve the problem for sensitive receivers outside the buildings. Mr C S Liu explained that the indoor odour control system was only one of the measures to tackle the problem. As the major odour source was from SZ River, the SZ authorities had a comprehensive plan on upgrading the sewage treatment facilities in order to improve the water quality of SZ River before operation of the Loop in 2020. The progress of improvement in the water quality of the SZ River would be closely monitored.

31. A Member noted that an on-site tertiary Sewage Treatment Works would be put in place within the Loop and suggested diverting the treated sewage into SZ River to enhance the flow and dilution of the water which might help resolve the odour problem caused by the static water.

32. In response to a Member's enquiry, Ms Carmen Chu confirmed that as the Loop was currently vacant, no relocation of existing residents in the Loop was necessary for the development. The Member considered that it was important to consider a comprehensive plan for managing waste, air and noise pollution problems arising from the development during the construction and operation phases in the EIA study.

33. The Chairman summarized Members' views as follows –

(a) the Council noted the PODP and development proposals for the LMC Loop and supported the proposed green initiatives for planning and developing the Loop;

(b) the Council suggested that more comprehensive green initiatives, such as green transport and energy efficient building designs, be further explored. It was necessary to build in a mechanism to ensure that the most updated green technologies would be adopted at the time of development;

(c) the Council supported the guiding principle of developing the Loop into a sustainable low carbon community and suggested benchmarking the Loop as a showcase for Hong Kong by adopting high environmental standards;

(d) the Council considered that it was important to formulate the plans in a holistic and comprehensive manner in order to achieve a more systematic and structured development of the area as a whole. Measures should be taken to avoid creating a fragmented habitat;

(e) the Council noted the environmental concerns about the proposed development and supported further investigation be carried out to address the concerns and formulate mitigation measures. The Council suggested that –

(i) a comprehensive EIA study be conducted on the environmental impacts of the project, in particular its impacts on the ecological function of the Loop as well as the surrounding areas;

(ii) it was not desirable to use the existing condition of the Loop as a degraded dry land as the baseline for the EIA study;

(iii) a detailed survey be conducted on the flight path of birds and existing water bodies be preserved as habitats for water birds;

(iv) consideration be given to building a terrestrial habitat with low-lying hills, expanding the area of the Ecological Zone and designating some surrounding areas of the Loop as conservation areas;

(v) the proposed plot ratio and building height be re-evaluated having regard to the ecologically sensitive surrounding areas; and

(vi) a more rigorous approach be adopted to solve the odour problem.

Agenda Item 4: Report on the 114th Environmental Impact Assessment Subcommittee meeting
(ACE Paper 18/2010)

34. The Chairman informed Members that the paper reported on the recommendation of the EIA Subcommittee on the EIA report on "Phase III Redevelopment of The Hong Kong Federation of Youth Groups Jockey Club Sai Kung Outdoor Training Camp" submitted by The Hong Kong Federation of Youth Groups.

35. A Member declared that he was a voting member of the Jockey Club. To avoid any potential conflict of interest, he would not take part in the discussion of the item. He left the meeting at this juncture.

36. The Chairman of EIA Subcommittee reported on the recommendation of the Subcommittee on the EIA report. The Subcommittee recommended the full Council to endorse the report without condition.

Action

37. The meeting agreed with the recommendation of the EIA Subcommittee on the EIA report. The Chairman concluded that the Council endorsed the EIA report without condition.

Agenda Item 5: Any Other Business

EIA report of non-selected project

38. The Chairman of EIA Subcommittee reported that since the last Council meeting, the EIA Subcommittee had received the Executive Summary of the EIA report on "Integration of Siu Ho Wan and Silver Mine Bay Water Treatment Works" submitted by the Water Supplies Department. The project was not selected by the EIA Subcommittee for discussion. The hardcopy of Executive Summary of the EIA report was circulated to EIA Subcommittee Members and relevant hyperlinks were circulated to non-EIA Subcommittee Members.

The term of office of the Council

39. As the meeting was the last one of the current term, the Chairman took the opportunity to thank Members for their contribution to the Council.

Agenda Item 6 : Date of next meeting

40. The Chairman informed Members that the meeting schedule in 2011 was being compiled.

ACE Secretariat
December 2010