World Meteorological Day 2005 Speech of Mr C Y Lam, Director of Hong Kong Observatory

The World Meteorological Day falls on March 23 every year. This year, its theme is "Weather, Climate, Water and Sustainable Development".

For people like us who grew up in the city, we have lost touch with mother nature for such a long time that we tend to take for granted whatever nature has bestowed upon us. But in the past year, different kinds of figures and events kept reminding us that blue sky and clean water are not something certain. Days of low visibility not due to rain or fog have reached a record high last year. The thick haze and greyish sky became topics of heated discussion. The drought in Guangdong and the salty tide of Pearl River sounded an alarm for fresh water supply. Without clear air and potable water, any claim for "development" is simply a rhetoric. This deserves deep thoughts on the World Meteorological Day.

I would like to take the opportunity to tell you the development of the Observatory.

The financial year 2004 – 2005 has been a difficult one for the Observatory. In support of Government's policy to reduce public expenditure, the Observatory, like other government departments, reduced through voluntary retirement and deleting vacant posts its establishment from 328 staff at the time I took directorship in March 2003 to 287 staff by 1 April 2005 – a cut of 13%. If non-civil service contract staff is included, the number of staff dropped from 350 to 305, also a 13% decrease. Such a reduction in manpower is significant.

Facing such a dramatic change, I and my colleagues were all at one stage very worried, wondering how we could maintain the level of our service, and deal with the ever increasing demand.

I bring up this issue today because I wish to publicly express my appreciation of all my colleagues. In the past two years, the spontaneous show of solidarity of my colleagues and the successful exploitation of innovative ideas and new technologies have absorbed the impact of manpower shortage, and even expanded the scope of our service. Such a fine workforce, just like the blue sky and clean water I mentioned earlier, should not be taken for granted. It should be appreciated and treasured by the public.

I am pleased to report to you that in a departmental opinion survey, the index of staff

morale has increased from 4.1 in 2003 to 5.5 at the end of 2004. The score for job satisfaction has also increased from 5.4 to 6.1. Against a background of reduction in establishment and cut in salary in the same period, I think the team of the Observatory staff is truly unique in terms of their positive and optimistic demeanor. The Observatory also won the bronze award in the "Best Public Image" Award among government departments last year. I wish to thank members of the public for recognizing our efforts by voting for us.

In respect of services, our website was enhanced to include a Personal Digital Assistant version. The content of our website has expanded to include real-time weather photos of selected tourist spots in Hong Kong, weather information for airports in the world, high resolution satellite images zooming in on the Pearl River Delta, forecast weather maps generated by computer models, radar imagery animation, etc. Recently, we have revamped our telephone enquiry system. Through one single number, 1878200, a caller can access all the information provided by the Observatory through telephone or fax.

Last year, we were proud to provide support to the Hong Kong Olympics wind surfing team to enable them to compete with other world-class athletes on equal terms as far as scientific support is concerned. I would like to mention in passing that we have already begun preparation for the 2008 Beijing Olympics. Our staff inspected the 2008 Olympics wind surfing competition venue at Qindao while paying a visit to our counterpart in the mainland. The nowcasting system developed by the Hong Kong Observatory is a contender of a multi-national forecasting demonstration organized by the World Meteorological Organization (WMO) for the 2008 Olympics. This is partly a support for the Beijing Olympics, and partly a world-class meteorological contest.

As for the aviation weather service, the LIDAR at the Hong Kong International Airport became operational in the middle of last year, significantly enhancing our ability to detect windshear. I am proud to report to you that our pioneering work in windshear detection has gained worldwide recognition, and was chosen for report as an exemplary case in the latest issue of the WMO quarterly bulletin. Furthermore, with the Observatory being a world leader in the management of aviation weather service, my colleague Mr Chan Sai-tick was appointed by the International Civil Aviation Organization as a consultant to compile a manual on quality management in aviation weather service. Upon completion, the manual will be widely distributed to countries worldwide for reference.

There was a breakthrough in the Observatory's time service last year. We began to use satellite technology whereby clocks at different locations of the world were compared to check the time of our atomic clock. Besides maintaining its accuracy to within 1 micro second, our clock contributes to determining the Coordinated Universal Time. The scene of a scientific officer carrying our atomic clock in first class flight to calibrate it overseas has become history.

Internationally, WMO declared recently that the two websites "World Weather Information Service" and "Severe Weather Information Centre" developed and maintained by the Observatory would make the transition from trial run to official operation today, thereby becoming part of the regular machinery of WMO. At the same time, the Observatory continues to shoulder the important task of collating official city weather forecasts all over the world, and coordinate the operation of other language versions of the websites. This is an honour for Hong Kong, and an indication that we are at the forefront of the application of information technology.

Last year, one of our endeavours was to interact more with the public. We organized several public meteorological classes, all of which were over-subscribed. With the help of volunteers of the "Friends of the Observatory", tours of the Observatory were organized to provide members of the public the opportunity to see the historical relics and the ecosystem in addition to the scientific work of the Observatory. These tours were well received by the public and always fully booked. We have also launched an e-bulletin on educational resources on the Internet to provide up-to-date materials on meteorology and geophysics to members of the public and the education sector.

In the coming year, we shall focus on promoting public awareness in disaster prevention and mitigation. A new 8-episode TV programme, the "Meteorology Series" jointly produced by RTHK and the Observatory will be broadcast on TVB Jade every Tuesday at 7 p.m. starting March 22. The Observatory also joins force with the Security Bureau and a number of other government departments to organize a series of activities lasting one year. These activities include exhibitions, lectures, TV publicity programmes, etc. Probably the most interesting activity is a tropical cyclone naming contest to be launched in April, details of which will be announced later.

After the tsunami in South Asia, public interest on tsunamis is high. In response, we shall disseminate more information to the public in future. We shall also design and widely distribute a publicity pamphlet explaining various hazards of the sea. It should be noted that the science of tsunami prediction is not yet mature and there is always some

degree of inaccuracy in such predictions. So the public should not assume that there would always be warning before a tsunami arrives. While on a beach, if you feel an earth tremor and see some unusual sea conditions, you should move quickly to higher grounds without waiting for someone to warn you.

Related to this but planned well before the occurrence of the tsunami in South Asia, we shall buy a broadband seismometer to replace the existing aged equipment. The new equipment will enhance our capability to monitor distant earthquakes.

Another new system is a lightning location system which will be put into operation in the rainy season this year. Members of the public will be able to see from our website the distribution of lightning activity so as to take early precautions to ensure safety. With the support of the meteorological authorities of Guangdong and Macao, parts of the system have been installed in Macao and San Shui. This enables the area of coverage of the system to encompass the entire Pearl River Delta, hence greatly facilitating lightning protection in the region.

Within the department, reduction in establishment puts pressure on our staff. We shall regularly review work processes and the distribution of workload to ensure that there is a better atmosphere and environment for my colleagues to work in. Only in this way they can work with peace of mind and provide quality service to the public.

At this time of the year, people always ask whether the rainfall amount and tropical cyclone activity would be normal this year. In generally, there is no strong signal in the atmosphere or the ocean this year. But indications are that the annual rainfall will be near normal, whereas the number of tropical cyclones affecting Hong Kong will be slightly less than normal. But I have to caution everyone that fewer tropical cyclones does not mean that there is no direct hit, and hence we should not relax precautions against typhoons. The extent of damage inflicted by strong winds and heavy rain depends on how well prepared we are. In fact, it is time now to check whether our homes and workplace are safe in the event of inclement weather. This will avoid putting ourselves in a difficult and dangerous situation when wind and rain strike.

I'll end my speech at this point. My assistant directors and I will be happy to answer your questions.

Thank you.