

Speech by CE at 2021 Hang Lung Mathematics Awards Announcement and Awards Presentation (English only) (with video)

Following is the speech by the Chief Executive, Mrs Carrie Lam, at the 2021 Hang Lung Mathematics Awards Announcement and Awards Presentation today (December 15):

Ronnie (Chairman of Hang Lung Properties, Mr Ronnie Chan), Professor Wei Shyy (President of the Hong Kong University of Science and Technology), Professor Rocky Tuan (President of the Chinese University of Hong Kong), principals, teachers, students, ladies and gentlemen,

Good evening. It is my great pleasure to join you at the 2021 Hang Lung Mathematics Awards Presentation Ceremony. As you have been told, this is already the fourth time I've participated in this splendid, biennial secondary-school event in recent years – twice as the Chief Secretary for Administration and now back for a second time as Chief Executive. Tonight, we are witnessing a new partnership between the Hang Lung Mathematics Awards and the Hong Kong University of Science and Technology which takes over from the Awards' inaugural partner, the Chinese University of Hong Kong. While my congratulations go to the new partnership, allow me to thank Professor Shing-tung Yau – a world-renowned mathematician who came up with this great idea together with Ronnie in 2004, and to the Chinese University of Hong Kong for the solid foundation and school network they helped to build so brilliantly over the past 17 years. My thanks, as well, to the members of the Awards' Scientific Committee and Steering Committee for their essential contributions. I understand that chairmen of both committees, two illustrious mathematicians, Professor Richard Schoen and Professor George Smoot, will speak to us via a pre-recorded video later tonight.

As some of you may know, Mathematics runs in my family and my family members had contributed ideas to my previous speeches on this occasion as well as at the closing ceremony dinner of the 57th International Mathematical Olympiad hosted in Hong Kong back in the summer of 2016. Without their input, I will not be able to talk about algebraic geometry or number theory in my previous speeches. But having done it several times, I have to confess that I and they have run out of ideas for me to speak on the subject of mathematics again from a layman's perspective. In fact, they asked me this question this afternoon: Why did you go to so many Math events? I don't know why actually. So tonight, again because of my self-reliance spirit, I have attempted to do so on my own by relating the discipline of Math to my experience in Governance from someone who has served the community for over four decades.

My principal conjecture is this: like Mathematics, Governance is both an

art and a science and it is their co-existence that will produce the best results. Like other science disciplines, the learning or making of mathematics is driven by observation, which leads to the identification of a problem to be solved and a hypothesis to be proposed. This will then be tested and tested via experiments, or computation, or simply using pen and paper, until a solution is found. On the other hand, as the renowned mathematician G. H. Hardy famously said, there is no permanent place in this world for ugly mathematics; in mathematicians' quest to propose theorem, they are guided by aesthetics as much as intellectual curiosity. No wonder over the dinner table at my home I often heard descriptions like "a beautiful hypothesis" or "an elegant proof".

In practising governance, especially in the realm of public policy, I would say that nothing is an exact science. Behaving like a social scientist, policy makers have to observe, and observe intensively things happening in our society and spot those problems that need to be fixed, preferably with the benefit of research, analysis and feasibility studies. In this day and age where public engagement is often encouraged, officials have to propose options and test their acceptability via consultations and surveys. However, at every step of the process, it is not an exact science. Policy makers have to weigh the pros and cons and strike the right balance. But this characteristic alone does not justify governance as an art. In my view, the greatest virtue of public policies is an intense creativity that typifies an artist – a drive to do things differently or what now usually comes to be described as "thinking out of the box" and a passion to build a better, more beautiful place for our people to live and work.

Whether it is an art or a science, my Government has been placing an unwavering top priority on the development of STEM education in our schools, and I am all in favour of adding "A", that is, the discipline of Art to it. These important disciplines will help drive Hong Kong's ambition and aspirations to develop into an international innovation & technology centre and to become an East-meets-West cultural exchange hub as provided for under our Nation's 14th Five-Year Plan promulgated in March this year. Amalgamating the two, I have suggested in my 2020 Policy Address last year that we should move on to promote Art Tech. My colleagues in the relevant bureaux will be rolling out more initiatives in these respective areas.

Coming back to mathematics, I am proud to see Hong Kong nurturing a large number of talents, judging not only by the awardees of the Hang Lung Mathematics Awards over these years, but also by the results of Hong Kong students in international competitions. For example, in this year's International Mathematical Olympiad, the annual world championship mathematics competition for secondary-school students, the Hong Kong team came home with a gold medal, as well as three silver medals and a bronze. But being high achievers aside, the Government sees a need to encourage schools to step up efforts in fostering the development of students' positive values and attitudes, two of which Ronnie has touched on, in order to help them face opportunities and challenges as they grow up. With this objective in mind, the Education Bureau issued two weeks ago the Values Education Curriculum Framework to all primary and secondary schools. I appeal to principals and

teachers to help us nurture amongst students a sense of national identity and positive values and attitudes such as perseverance, responsibility, respect for others, integrity, law-abidingness and empathy.

This year, more than 60 teams from nearly 40 Hong Kong secondary schools participated in the Hang Lung Mathematics Awards. I know you're all eager for this evening's awards presentation and the announcement of the winners. But to me, each and every student who took part in this year's competition is already a winner. My congratulations to you all, and I would encourage you to continue to pursue your interests with curiosity and passion.

Let me express my appreciation again to Hang Lung Properties for establishing and managing this invaluable, community-wide event since its beginnings in 2004. I am sure you will enjoy this very special evening. And taking this opportunity I wish you all a Merry Christmas and a happy and healthy New Year. Thank you very much.