Project Title:

Promotion of STEM Education through the School-based Science and Biotechnology Curricula (2021/22)

1. Support Service Co-ordinator

School-based Professional Support Section, Quality Assurance and School-based Support Division, Education Bureau

2. Network Co-ordinating School

Ho Yu College and Primary School (Sponsored by Sik Sik Yuen)

3. Objectives

The project aims:

- to provide professional training and support to teachers and laboratory technicians of all Participating Schools on Bio-technology and STEM education
- to develop Bio-technology and STEM education learning activities for school-based Junior Secondary Science curriculum to enhance students' knowledge and experimental skills in Bio-technology as well as their creativity and problem solving skills
- to establish an interactive learning community to promote cross-school interaction and academic exchange on professional technological innovation
- to strengthen the promotion of Bio-technology and STEM education in the Participating Schools, as well as further promote Bio-technology and STEM education to other schools to enhance Bio-technology and STEM education in Hong Kong

4. Foci of Support

- To promote cross-school interaction, professional sharing and exchange by organising various teacher professional development activities such as visiting biotech laboratories, seminars, workshops and experience sharing of the Network Co-ordinating School
- To co-plan lessons with teachers of Participating Schools to help them
 develop a school-based curriculum related to Bio-technology and STEM
 education, develop and design appropriate learning activities for Biotechnology education and STEM education, and explore effective learning
 and teaching strategies
- To conduct cross-school peer lesson observation and lesson evaluation to strengthen professional exchange among the Participating Schools

5. Modes of Support

- To lead the Participating Schools to explore appropriate mode of implementation for school-based Bio-technology and STEM education, and provide training and support to the Participating Schools based on the experience of the Network Co-ordinating School
- To co-plan lessons with the teachers of the Participating Schools and conduct cross-school lesson observation to strengthen professional exchange

6. Expectations on Participating Schools

- Participating Schools assign one teacher-in-charge to liaise with the Coordinating School and the related School Development Officer
- Representatives of the Participating Schools attend at least two executive meetings held in the school year with the Network Co-ordinating School and other Participating Schools on formulating strategies and work plans, such as lesson study and observation
- Participating Schools arrange regular timeslots for teachers concerned to attend meetings and participate in various professional development activities, e.g. collaborative lesson planning
- Participating Schools share with other teachers their experiences in school-based curriculum development and the materials and resources they develop, e.g. work plans, learning and teaching materials, research reports, student work. (The copyright of these materials will be owned by the Quality Education Fund.)
- Participating Schools observe strictly their legal obligations and, in all cases, comply with the Copyright Ordinance in developing school-based learning and teaching materials