Dagik Earth: 3-D digital globe for STEAM education in schools and museums

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Dagik Earth is a project to utilize a portable 3-D digital globe for STEAM education in schools and museums. 3-D digital globe is an attractive device to present scientific data of the Earth and planets, and now widely used in science museums. Geo-cosmos is a large one with 6-m diameter in Mirai-kan, Japan. Science On a Sphere (SOS) is developed by NOAA, and installed in more than 150 science museums all over the world. Dagik Earth is much simpler than these systems with much lower cost. It consists of a spherical screen, a PC projector and a PC or tablet. No special equipment is required. The software is freely available for education and science. It is used in classroom from elementary schools to universities, science museums, and science events. The flexibility of the system enables to use the 3-D digital globe in various occasions even outdoors. A join event with music concert was held in Kyoto national museum in August, 2019. The outline of the system, its usage examples and the future plan of the development will be introduced in the presentation.

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