

VDVGE: Volume Data Visualizer for Google Earth

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EXTRAWING is a project for novel and attractive representations of geophysical fluid simulation results and effective transmission of them to the general public. In this project, a GUI-based volume visualization software tool called Volume Data Visualizer for Google Earth (VDVGE) has been developed. By using VDVGE, the user is able to visualize a three-dimensional scalar field dataset obtained from a computer simulation or an observation as volume-rendering-like representation easily. It is exported to the data for Google Earth. This representation method is achieved by laminating surfaces where color contour images visualized from an input dataset are mapped. VDVGE is able to visualize three groups of color contour images (latitude-longitude, latitude-height and longitude-height) and these are mapped on surfaces which are constructed by KML and COLLADA. Fig.1 shows a screen capture of VDVGE. In this figure, 3-D distribution of cloud water near Japan computed by AFES model was utilized as input data and visualized. Fig.2 shows a visualization result on Google Earth.

VDVGE can be downloaded from the following URL.

<http://www.jamstec.go.jp/esc/research/Perception/vdvge.en.html>

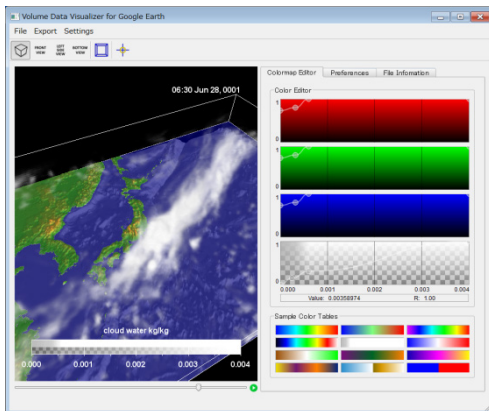


Fig.1: Screen capture of VDVGE.

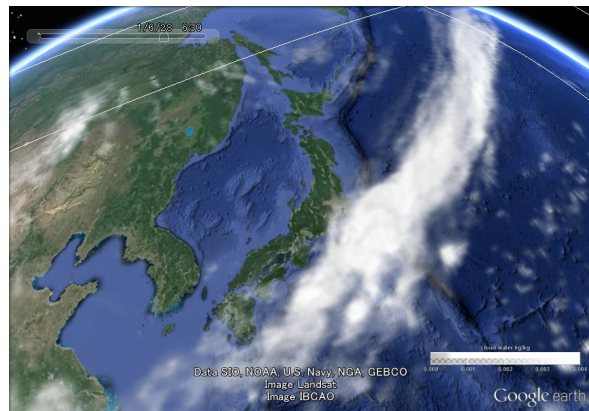


Fig.2: Visualization result on Google Earth.