

Audiovisual heritage preservation in Earth and Space Science Informatics: Videos from Free and Open Source Software for Geospatial (FOSS4G) conferences in the TIB|AV-Portal.

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The influence of Free and Open Source Software (FOSS) projects on Earth and Space Science Informatics (ESSI) continues to grow, particularly in the emerging context of Data Science or Open Science. The scientific significance and heritage of FOSS projects is only to a limited amount covered by traditional scientific journal articles: Audiovisual conference recordings contain significant information for analysis, reference and citation. In the context of data driven research, this audiovisual content needs to be accessible by effective search capabilities, enabling the content to be searched in depth and retrieved. Thereby, it is ensured that the content producers receive credit for their efforts within the respective communities.

For Geoinformatics and ESSI, one distinguished driver is the OSGeo Foundation (OSGeo), founded in 2006 to support and promote the interdisciplinary collaborative development of open geospatial technologies and data. The organisational structure is based on software projects that have successfully passed the OSGeo incubation process, proving their compliance with FOSS licence models. This quality assurance is crucial for the transparent and unhindered application in (Open) Science. The main communication channels within and between the OSGeo-hosted community projects for face to face meetings are conferences on national, regional and global scale. Video recordings have been complementing the scientific proceedings since 2006.

During the last decade, the growing body of OSGeo videos has been negatively affected by content loss, obsolescence of video technology and dependence on commercial video portals. Even worse, the distributed storage and lack of metadata do not guarantee concise and efficient access of the content. This limits the retrospective analysis of video content from past conferences. But, it also indicates a need for reliable, standardized, comparable audiovisual repositories for the future, as the number of OSGeo projects continues to grow - and so does the number of topics to be addressed at conferences. Up to now, commercial Web 2.0 platforms like Youtube and Vimeo were used. However, these platforms lack capabilities for long-term archiving and scientific citation, such as persistent identifiers that permit the citation of specific intervals of the overall content. To address these issues, the scientific library community has started to implement improved multimedia archiving and retrieval services for scientific audiovisual content which fulfil these requirements.

Using the reference case of the OSGeo conference video recordings, this paper gives an overview over the new and growing collection activities by the German National Library of Science and Technology for audiovisual content in Geoinformatics/ESSI in the TIBIAV Portal for audiovisual content. Following a successful start in 2014 and positive response from the OSGeo Community, the TIB acquisition strategy for OSGeo video material was extended to include German, European, North-American and global conference content. The collection grows steadily by new conference content and also by harvesting of past conference videos from commercial Web 2.0 platforms like Youtube and Vimeo. This positions the TIBIAV-Portal as a reliable and concise long-term resource for innovation mining, education and scholarly research within the ESSI context both within Academia and Industry.