October 25, 2023 Cultural Data Analytics 2023 conference Abstract

Mila Oiva, Tallinn University, Estonia
Ksenia Mukhina, Tallinn University, Estonia
Vejune Zemaityte, Tallinn University, Estonia
Andres Karjus, Tallinn University, Estonia
Mikhail Tamm, Tallinn University, Estonia
Tillmann Ohm, Tallinn University, Estonia
Mark Mets, Tallinn University, Estonia
Daniel Chávez Heras, King's College London, United Kingdom
Mar Canet Sola, Tallinn University, Estonia
Helena Hanna Juht, Tallinn University, Estonia
Abida Bibi, Tallinn University, Estonia
Hadi Nowandish, Tallinn University, Estonia
Maximilian Schich, Tallinn University, Estonia

Explaining Longitudinal Audiovisual News Contents: A Framework for the Analysis of Historical Newsreels

Audiovisual news has been affecting our perceptions of the world for more than a century. Newsreels – the short news films shown in cinemas before the feature films since the 1910s to the 1960s, or in some cases to the 1990s - were the first audiovisual news that preceded the later television and video news. To have a better understanding of the long-term patterns of the audiovisual news culture, newsreels should be explored longitudinally, and by using large sets of data. While the current methodological approaches in film history, computational video analysis, and other relevant fields provide promising contributions, they also contain limitations related to the scope of data used, the systematism of analysis, as well as the modalities and elements to be studied in audiovisual material and its metadata. Here we propose to combine the strengths of these approaches into a multidisciplinary framework for systematically studying large collections of historical audiovisual news to gain a coherent picture of their temporal dynamics, cultural diversity, and potential societal effects across several quantitative and qualitative dimensions of analysis. The core idea is to combine the context crucial to qualitative approaches with the systematicity and ability to cover large amounts of data from quantitative methods. We exemplify the framework template by a case study of the "Daily News" newsreel series produced in the Soviet Union during 1944-1992. The resulting framework supports more nuanced analysis of longitudinal audiovisual news, which expands our understanding of the long-term patterns of audiovisual news cultures.

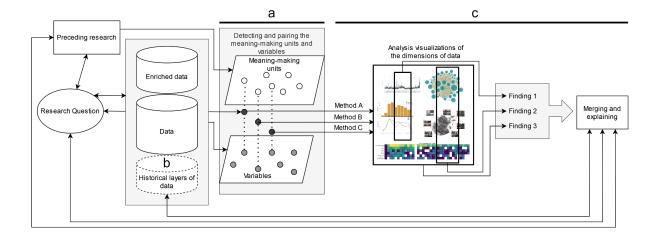


Figure 1: The Newsreel Framework pipeline. The newsreel framework combines qualitative and quantitative approaches into a research pipeline. It contains (1a) pairing meaning-making units with variables, (1b) taking into account the temporal layers of the digitised data, and (1c) combining quantitative analysis with qualitative conclusions.