

Speech-Based Citation of TV Scenes in Social Networks

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How can video content providers use social networks to attract a new audience? We have approached this challenge by developing a system for speech-based citation of TV content in social networks in close cooperation with our industry partner ARD¹.

ARD is the largest public German broadcaster, and houses a popular online archive which is open to the public. Videos from ten national and regional public broadcasting stations are added to the archive every day, yet they are only available within the closed ARD Mediathek website². Our new system allows users to post a temporal video citation to a social network by exploiting the output from automatic speech recognition. Consider a user who encounters an interesting statement from a politician while watching content on the ARD website. In analogy to *Copy & Paste* in the text domain, the user can intuitively select the exact quote in the ASR transcript, and 'paste' it to a social network such as Facebook. A link to the exact position in the video becomes immediately visible to his circle of friends, who are thereby actively attracted to follow the suggestion. They can watch the recommended video scene with a single click, and can easily promote it to their own friends.

We use ASR output as the transport medium for citing video fragments. In addition, we established a document-wide ASR confidence measure which indicates whether the transcript is good enough for video citation, or whether it would rather distract the user. Finally, we developed an In-Clip Search feature using our Spoken Term Detection system, such that users can easily navigate within a document. ASR and STD used for **Social Video Citation** and **In-Clip Search** are based on the system recently evaluated in [1]. Figure 1 shows screenshots taken from the already deployed application, which we propose for demonstration at ASRU 2011.



Figure 1: Screenshots from the ARD Mediathek, illustrating the use of **Social Video Citation**

References

- [1] D. Baum, D. Schneider, R. Bardeli, J. Schwenninger, B. Samlowski, T. Winkler, and J. Köhler, "DiSCo - A German Evaluation Corpus for Challenging Problems in the Broadcast Domain," in *Proc. LREC*, 2010, pp. 1695–1699.

¹<http://www.ard.de>

²<http://www.ardmediathek.de>