
From Passive Viewing to Active Listening: Civic Technologies for Peace

Anna De Liddo

Knowledge Media Institute, The Open University
Walton Hall, MK76AA, Milton Keynes, United Kingdom
anna.deliddo@open.ac.uk

Philipp Grunewald

King's College London
Strand, London, WC2R 2LS, United Kingdom
philipp.grunewald@kcl.ac.uk

Abstract

In this paper, we introduce Democratic Reflection, an audience feedback technology to promote active listening, deeper reflection and personal learning through interactive video replays. With the help of Aegis Trust, a British based Non-Government Organization working for the prevention of genocide and mass atrocities worldwide, we engaged 44 citizens

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in a study that tests how our audience interaction technology can support the enhancement of critical thinking and active listening capacities, as well as influence understanding of the contents and emotional engagement with audiovisual materials. By critically reflecting on the project we highlight some pragmatic challenges of using this digital tool with stakeholders in Rwanda.

Author Keywords

Citizen Engagement Technologies, Audience Feedback Interaction, Peace Building, Video Replay Interfaces, Civic Technologies.

Introduction

In 1994 Rwanda experienced large scale genocide. Since then the society has attempted, via various approaches, to work with this experience to prevent a repetition of such an event. Video archival materials are part of the collective memory of the country, and are used extensively by NGOs and peace building organisations as digital storytelling tools to promote empathy and to build peace. One of the main challenges these organisations encounter is to measure the impact of digital storytelling videos, and the changes they affect in the viewers perceptions of the genocide. It is also unclear to what extent the viewing



Figure 1: Aegis Trust works in the UK, USA, Rwanda, Central African Republic, Kenya and South Sudan.

Aegis Trust has been present in Rwanda since 2001. It worked with the Government of Rwanda to establish the Kigali Genocide Memorial (KGM www.kgm/rw) in commemoration of the 1994 genocide against the Tutsi in Rwanda.

experience improves people’s critical thinking, active listening, and other capabilities for peace.

Measuring changes in critical thinking and active listening skills is difficult at individual and collective levels. We therefore resorted to Democratic Reflection, a new civic technology to gauge viewers’ instant reactions to video replays.

Democratic Reflection: A Novel Audience Engagement Technology for Critical Thinking and Active Listening

Democratic Reflection (democraticreflection.org), is an innovative audience feedback tool that allows people watching a video, to instantly express their inner cognitive and emotional reactions to the viewing experience [1]. From this personal interaction, the tool creates a blueprint of both the personal and collective experience viewers are going through, which is then used to generate a series of analytics and visualisations to enhance both personal learning and reflection, and enable the collective assessment of the viewing experience.

Democratic Reflection was tested with over 2000 UK citizen in the 2015 [2], 2017 and 2019 [3] political election debates, and was part of a suit of hypermedia technologies that were reported to improve self-reflection and learning, “change the way people felt about political leaders”, and showed to “change personal assumptions” that people had before using the tool [4].

User Study in Rwanda with Aegis Trust

In 2018 with the support of the ISOOKO EU project (<http://isooko.eu/>) and Aegis Trust (Figure 1) we used

Democratic Reflection to engage a small group (44 people) to actively listen and reflect on a testimonial video (“Ubumuntu”) telling stories from the Genocide in Rwanda [5].

We had two main goals. Firstly, we aimed to capture the impact of the video material on the audience. This information is particularly valuable for Aegis Trust to select the most impactful videos to use in their peace building programmes. Secondly, we aimed to test to what extent Democratic Reflection enabled users to more proactively engage with the video material, to develop empathy, and better understand the genocide.

Testing DR with Video Testimonies from Rescuers

Two groups of Aegis Trust stakeholders were invited to participate in the trials. All of them had existing relationships with the organisation (a potential bias). These two groups represented a stakeholder group called ‘youth’ that Aegis Trust regularly engages with and another called ‘parents’ that Aegis Trust regularly engages with. All participants had previously been to events run by Aegis Trust (a significant number had received training from Aegis Trust).

These two groups were subdivided and split across the control and trial groups. The control group watched the Ubumuntu documentary on their laptops (provided by Aegis Trust at the Kigali Genocide Memorial) in the browser on YouTube. This is the conventional way of accessing the content. The trial group watched the video in the same way but used the Democratic Reflections interface for consumption and engagement with the video.

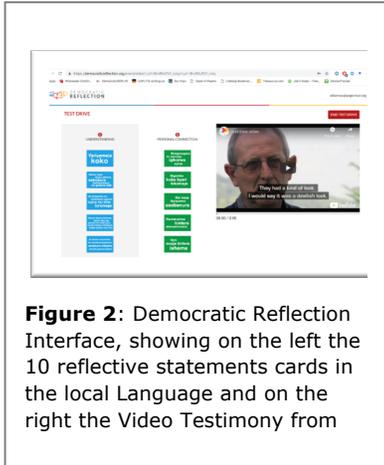


Figure 2: Democratic Reflection Interface, showing on the left the 10 reflective statements cards in the local Language and on the right the Video Testimony from

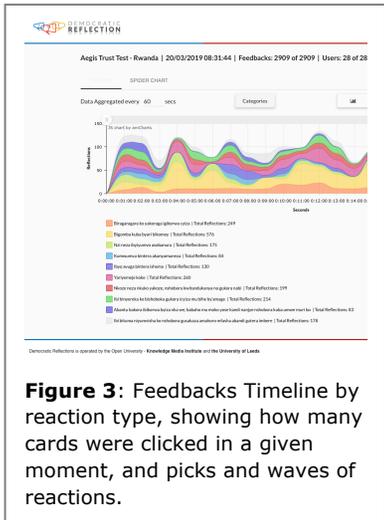


Figure 3: Feedbacks Timeline by reaction type, showing how many cards were clicked in a given moment, and picks and waves of reactions.

The outcomes were then measured via a range of research methods and afterwards trial and control group results were compared to allow for evaluation findings with regards to the Democratic Reflections tool.

After the Test: Visual Analytics and Time Analysis of Audience Feedback

The test was extremely useful to design and refine an awareness rubric and to assess the extent to which the video promoted awareness and empathy. In relation to our aim to use Democratic Reflection to capture the impact of the video replay on the audience, we were able to develop detailed insights on the interaction. For instance, we were able to quantify that people empathic feedback to the video were quite high, with 51 percent of audience reactions showing from medium to very high personal connection to the video. Whereas in terms of understanding of the genocide, the video did not seem to be very effective in promoting personal commitment to act.

The data gathered by Democratic Reflection also allowed comparison of the different users' reactions by demographic. For instance, it enabled the analysis of the difference in empathic and cognitive engagement between man/women or younger/older people. Additionally, the tool also provide timeline analysis to analyse reaction moment-by-moment and identify picks of reactions, which may highlight particularly engaging passages within the video (See Figure 3).

This demonstrate that the tool was particularly useful as video assessment technology and has therefore the potential to be used by NGOs in the selection and

design of video material to promote piece building education.

The statistical analysis from the Rwanda's test and the quantitative analysis of the multimedia experience facilitated by the tool is object of a wider publication. In this short paper we focus on challenges and opportunities of testing digital civic technologies, like Democratic Reflection, in such a dividing context as a post genocide community in Africa. Our reflection suggests the following lessons learned.

Discussion

Building capacity for peace after a genocide is an incredibly difficult challenge, and doing that with technology is even harder. The Rwanda community we worked with has very low digital literacy. Whereas people use mobile devices to support basic life functions, they have very limited access to desktop computers and internet connections. Therefore, we encountered some very pragmatical challenges in running our test: 1) narrow and costly engagement, 2) very limited interest in the technological interaction. 3) cultural framing which may bias the results.

Engagement is Costly. AEGIS Trust, as many NGOs, works mostly on a voluntary base, and need to mediate between a longstanding commitment to the community, and their temporary role of information brokers between designers, researchers and local people. This means that practitioners on the field have very limited time and very limited resources to support the technology testing and the research. Also, the selection of participants is done on a very opportunistic basis, favouring people that have more time or

resources, which per se represents a bias in the sample of people that can be really engaged on the field.

Technological Scepticism. We registered people's lack of interest in the technological interaction. In fact, to access the AEGIS Trust computers, and minimise effort from the practitioners on the field, we created a "fake" interaction context, and asked people to sit in front of a computer and watch a video while being all in the same room. This denaturalised the usage of the technology, which was initially designed for distributed settings, or live staged events interactions. It does not surprise then that users found it a "cold" way to interact and would have rather "talked to each other". Nonetheless, the tool was highly usable, and during the interaction people clicked the feedback cards a lot and continuously.

We recorded almost 3000 clicks from 22 people in 20 min. This is basically more or less 137 feedbacks per person, at almost a rate of 7 cards per minute (which is more than 1 card every 10 seconds). The engagement was steady from beginning to end of the video replay, which means that people did not get "bored" of interacting with the tool. This shows that despite people's lack of initial interest in the technological modality of interaction, this was still an experience which engaged them in a proactive way. Considering that one of the objectives of our research was to change the viewing experience from passive viewing to more active listening experience, this was per se a very positive result.

Cultural Framing. Practitioners reports that, when local people turn up to the testing workshops and interact with international researchers, which are in charge of the data gathering, they always take that very serious.

They really try to do a good job and there is a strong sense of respect toward both the host (AEGIS Trust) and the international partners. This is part of the local culture and means that when we (the researchers) ask local people to use a technology, they will really try to use it, perhaps even just to "please" the people that invited them to the event. This typology of participant is indeed a very different one from the one we tested the technology before (such as for instance UK citizens replaying televised election debates). It is an open question the extent to which this may have biased the analysis of the results of their interpretation. And it is even harder to find technology or testing design solutions which allow to adapt the interaction to different cultural framing.

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