

## **Online Appendix A**

### **Outline codebook for the identification of visual disinformation**

Note on the unit of analysis: The coding of visual disinformation should include both textual and visual elements, and focus on the connection or integration between both dimensions. For example: The analysis of an image by itself may not reveal disinformation, whereas it may offer a deceptive representation of the reality that is described in the textual elements of disinformation. In the section that follows, tentative suggestions on how to identify the different forms of visual disinformation central to the proposed typology are included.

### **Communicating legitimacy and adherence to conventional news values through seemingly unrelated images**

For this form of visual disinformation, it is crucial to code for the ways in which images are used to make the textual narrative seem credible, mainstream, and legitimate. Especially on alternative media platforms, stock images (i.e., depicting vaccination without a concrete event or showing the official images of politicians) may not be used as ‘proof’ for a deceptive message, but may rather embed the narrative in a legitimate news-like environment. Indicators to look for are: The way that the image legitimizes a supported position or political actor described in the message by illustrating this actor or position with generic images; The way that the image delegitimizes an opposed position or political actor described in the message with generic images.

### **Illustrating authoritative expert consensus through the inclusion of direct communication by alternative experts**

This expression of visual disinformation may be recognized by the inclusion of screenshots of the social media platforms of (fake) experts quoted in the textual disinformation.

In a more indirect form, alternative experts may be embedded by including visuals of talks or media presences of the described alternative experts. The function of the visuals in this form of disinformation is to embed the voice or positions of alternative experts opposing established experts or facts within disinformation narratives.

### **Emphasizing widespread social support for unconventional truth claims through the inclusion of the vox populi**

For this type of visual disinformation, the experiences of ordinary people or opinion leaders are made central. This can be done by including an image of ordinary citizens or opinion leaders to make their experiences and opinions central as evidence for counter-factual claims. Another way is to include screenshots of social media posts of ordinary citizens in the textual disinformation. The content of these screenshots often contains hostile or delegitimizing statements that support the counter-factual claims legitimized in the disinformation narrative. For this form of disinformation, the visual embedding of the experiences or opinions of ordinary people – often more than one individual citizen – can be used to normalize alternative claims on truth that oppose established expert knowledge or scientific consensus. For example, to support the alternative truth claim that COVID-19 is a biological weapon, visual disinformation narratives may quote ordinary citizens that expressed this position on social media platforms. This may serve as evidence for the statement that “it is not a conspiracy theory if the majority of awake citizens endorse this position.”

### **Offer decontextualized proof for conspiracy theories and disinformation.**

For this form of visual disinformation, the visual elements are used to offer proof for false statements. The images may depict events, political actors, or statistics of a different context than the disinformation narrative. To identify decontextualization, it is crucial to assess

the way that the image/video is referred to in the textual message: (1) is the depicted event accurately and transparently contextualized in the textual narrative?; (2) is the depicted event used as evidence for counter-factual claims?; (3) are all parts of the disinformation narrative connected to the alleged visual proof? Often, visuals may be deceptively used as proof for causal claims, whereas the images only visualize one unconnected part of the proposed causal order. As an example: authentic images of an empty hospital may be falsely interpreted as proof that COVID-19 is a scam. Although claims about the empty hospitals may be true, the forwarded causal claim is invalid: the reason that the hospitals were empty is because of the personnel needed in other locations/sections of the hospital to care for patients suffering from COVID-19.

### **Analyzing the role of legitimacy enhancing visuals across contexts**

Importantly, the role of visuals as legitimacy enhancing tools in disinformation may depend on context. Whereas alternative media platforms may be more likely to mimic established news formats through quoting experts, depicting evidence of factual claims, or using visuals to embed counter-factual claims in news formats, social media may deviate from such objectivity claims. Here, signaling social support through the inclusion of the experiences of ordinary people is a more central legitimization strategy (i.e., through showing their social media screenshots, or using user-generated content as proof for lived experiences). Although decontextualization may be central across platforms, it is important to assess how the affordances and target audience of different platforms may play a role in the function of visuals as legitimizing tools for false statements.

## **Online Appendix B**

### **Information on the Methods of the Semi-structured Interviews used as Member Checks**

Between February 3-9, 2024, eight semi-structured interviews with social media users were held. Recruitment was based on a combination of convenience and snowball sampling: the Principal Investigator recruited initial participants from their own network, whilst making sure that these participants were unfamiliar with the study or the professional background of the investigators. Another inclusion criterion was the amount of trust potential participants had in the media, which is known to be a factor corresponding to resilience to mis- and disinformation (see e.g., Humprecht et al., 2020). To make sure to include variety in media trust, a small-scale survey was conducted and disseminated to potential participants. This survey contained two main (batteries of) questions: whether people would be willing to be re-contacted for a small 20-minutes interview, and the extent to which they trusted the media, journalists, and political information most of the time (presented as statements on a scale ranging from 1 (completely disagree) to 7 (completely agree)). Based on the questions, there were 7 potential participants in the high trust group, and 9 potential participants in the low-trust group. A randomizer was used to select four participants in each of these groups. The age of selected participants ranged between 28 and 67 years old. Men were slightly underrepresented, given that five interviewees self-identified as female. In addition, the convenience sample was skewed toward higher educated interviewees (5 higher educated, 2 moderate, 1 lower educated).

All eight semi-structured interviews were held via Zoom (online) and lasted between 32 and 64 minutes. An online setting was chosen mainly for practical reasons: The interviews could all be held in a similar setting, and the lack of travelling time or resources required for the interviewer and interviewees ensured an efficient scheduling and minimal time investment.

Given that all interviewees had previous experience with online meetings, the interview setting was familiar to them. The video-based interface also allowed for the communication of non-verbal cues. The interviews were structured by using an interview guide, which contained two main topics (1) whether interviewees recognized the different ways in which visual disinformation was constructed and (2) their threat perceptions related to the different forms of visual disinformation and the decontextualization of images. For the first topic, the results of the content analysis were presented to the interviewees, who were asked to reflect on the different types of visual disinformation, as well as where they encountered them and why they considered them to be disinformation (or why they did not recognize these forms of decontextualization as disinformation). For the second topic, interviewees were asked to reflect on the potential harms of visual disinformation in general, and the forms of visual disinformation and decontextualization that were revealed based on the qualitative content analysis. If they did not recognize the main themes of decontextualization revealed in the main study, they were asked to more generally reflect on the threats and dangers of online disinformation.

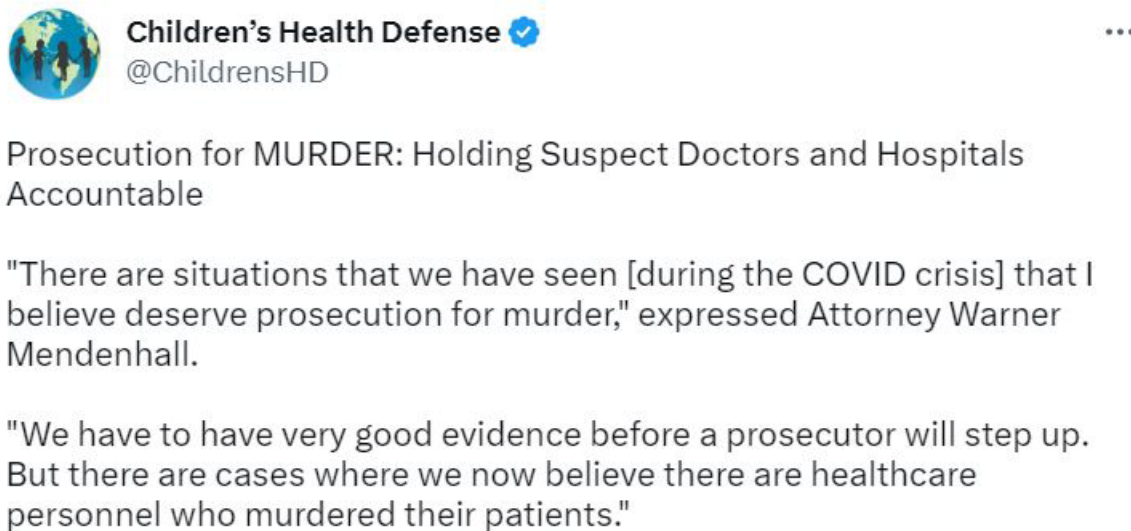
The interview transcripts were transcribed and analyzed in ATLAS.ti. Similar analysis steps as conducted for the qualitative content analysis were followed, which means that unstructured open coding was followed up with focused and axial coding to reveal patterns of meaning and interpretation. During axial coding, we additionally explored the link between the findings of the content analysis and the member checks. Coding was specifically geared at detecting how and to what extent the forms of decontextualization used as prompts in the interviews were recognized and seen as threatening forms of disinformation by the interviewees.

**Online Supplemental Materials: Figures Illustrating Visuals in Disinformation**

**Figure 1.** Visuals used to mimic legitimate established news sources. Source: <https://www.ninefornews.nl/ex-vicepresident-pfizer-geeft-indringende-waarschuwing-dit-gaat-er-komend-jaar-gebeuren-als-je-niet-wakker-wordt/>



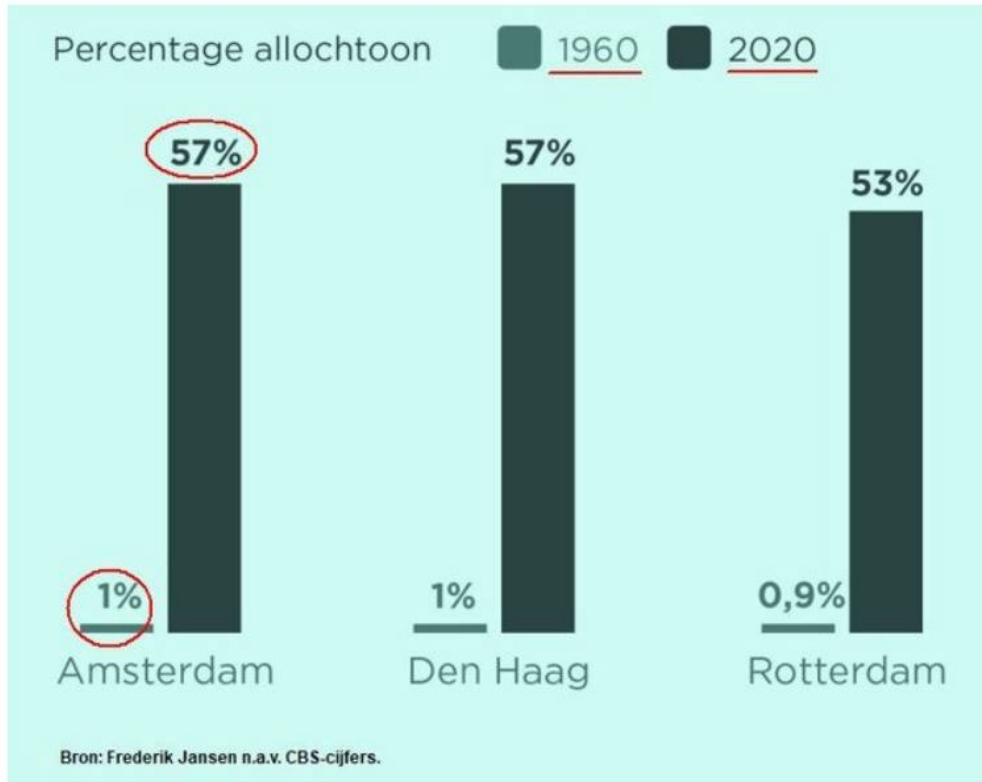
**Figure 2.** Screenshot of video in which alternative doctors are interviewed as experts. Source: <https://niburu.co/binnenland/15439-iemand-die-kritische-coronavragen-stelt-heet-nu-trol?highlight=WyJwbGFuZGVtaWMiXQ==>



**Figure 3.** Social media screenshot legitimizing blame attribution to doctors and hospitals through referencing an authoritative organization. Source: <https://www.cafeweltschmerz.nl/advocaat-artsen-en-ziekenhuizen-zullen-worden-aangeklaagd-voor-moord-tijdens-de-pandemie/>



**Figure 4.** Including screenshot that refers to other anti-establishment media platforms to signal widespread support for counter-factual narratives and conspiracies. Source: <https://www.blckbx.tv/tech-media/arnold-karskens-maak-ons-groter-dan-krijgen-ze-ons-nooit-meer-klein>



**Figure 5.** Using a decontextualized graph to illustrate alternative facts on immigration (accompanying a disinformation narrative on depopulation). Source: <https://niburu.co/binnenland/11920-hoe-de-originele-nederlandse-bevolking-gaat-verdwijnen?highlight=WyJpbW1pZ3JhdGlll0=>