

COUNTER EXTREMISM PROJECT

YOUTUBE – HOME TO ISIS CONTENT

In an effort to better understand ISIS content on YouTube, the Counter Extremism Project (CEP) conducted a limited study on the video sharing platform and identified more than 1,300 ISIS videos uploaded to YouTube over a period of three months, garnering at least 163,000 views.

The purpose of this research was to understand how ISIS content is being uploaded to YouTube, how long it is staying online, and how many views these videos receive.



What is the methodology and technology?



CEP Senior Advisor and digital forensics expert Dr. Hany Farid developed eGLYPH, which recognizes duplicates of images, video or audio recording by 'hashing' – identifying a digital fingerprint in each. This technology can detect duplicated content even when it has been modified (e.g., the resolution of the image and/or speed of the video has been changed).

In order to test YouTube's stated ability to remove ISIS content, CEP attached eGLYPH to a web crawler, which searched video titles and descriptions for pro-ISIS keywords in videos uploaded to YouTube.

How did it work?

CEP's web crawler, armed with hashes of only 229 known ISIS terror-related videos and 183 keywords identified as indicative of pro-ISIS sympathies, set about scanning videos uploaded to YouTube's API every 20 minutes, 24 hours a day over three months.

All video matches were downloaded, and key data recorded including the date and time of upload, the number of views, the account that uploaded the video, and the time of removal (if at all).



Based on CEP's targeted research parameters, CEP found that:

- No less than **1,348** ISIS videos were found to have been uploaded, using a narrow set of 229 previously -identified ISIS terror-related videos.
- These videos earned a total of over **163,000** views of this small set of terror content.
- **60%** of those accounts remained live after uploaded videos were removed for content violations.
- **278** accounts uploaded all **1,348** videos.
- **24%** of videos remained online for more than two hours.
- **76%** of videos remained on YouTube for less than two hours, but still received a total of 14,801 views.
- **91%** of videos were uploaded more than once.

What does this mean?

These figures call into question YouTube's claims of proactive content removal efforts. The fact that a quarter of videos stayed online for more than two hours indicates YouTube's human flagging efforts are failing.

The number of videos that are re-uploaded after already being removed illustrates that YouTube is not appropriately deploying hashing technology that can flag duplicate content. Ultimately, the high number of views on this limited set of videos suggests YouTube is still an important site for ISIS's propaganda efforts.

Recommendations

In order to help prevent the upload and spread of ISIS videos on YouTube, CEP recommends:

- 1 **Banning users:** YouTube should immediately delete accounts that have uploaded ISIS videos.
- 2 **Transparency around hashing:** YouTube should explain how it (and its parent company, Google) participates in the 'hashing coalition' content database announced in December 2016, and list how much content has been removed from the platform as a result.
- 3 **GIFCT industry standards:** All members of the Global Internet Forum to Counter Terrorism (GIFCT), of which Google/YouTube are founding members, should be mandated to hash and remove content produced by groups and individuals sanction-designated by the United States, European Union, and United Nations, as well as material that glorifies or incites violence.
- 4 **Updating the metrics:** 'Time online' is an important metric but total views is also important and should be central to gauging the effectiveness of removal processes.

