Internet censorship in CZ

Past, Current and Future trends

History

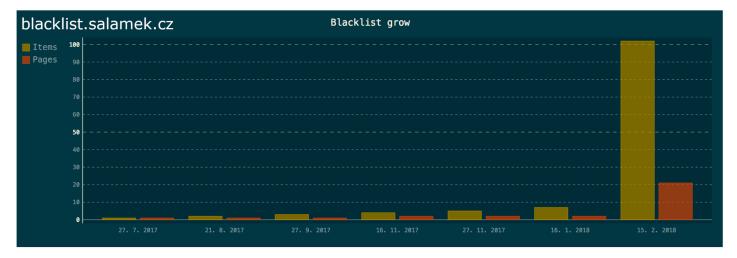
- Effective from 1.1.2017, based on Gambling Law (24/5000)
- Was criticized by local companies and organization, including CZ.NIC, seznam.cz, NIX.CZ and many others, see www.prichazicenzor.cz
- The Constitutional Court, in its decision from 14 February 2017 refused to cancel the respective paragraphs of the law
- Ministry of finance recommended to use DNS-based blocking
- First blocked domain was 1xbet.com

Technical implementation

- Distributed as PDF, created by Acrobat PDFMaker 11 for Word
- Published on MFCR page, every time new URL, old versions are removed
- Parsing and extraction automated by Adam Schubert using Tabula tool. Also he created website blacklist.salamek.cz with API (see curl https://blacklist.salamek.cz/api/blacklist) and pdf mirroring.

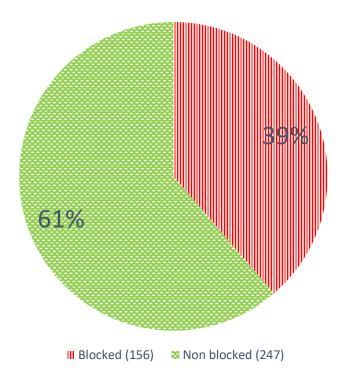
Blocklist content

- Currently 7 versions were published, latest has 102 domains in it
- 96 from 102 are variation of the 1xbet domain (1xbet71.com). Are they trolls? Some of the 1xbet domains are missing in the list.
- ... and its growing!



Checking blacklist Ripe Atlas

• DNS request to resolve **1xbet1.com** been sent to 258 probes from CZ. We got **403 DNS** replies.



Censorship trends in some other countries

- Implementation of the validation device (e.g. "revizor" in Russia)
 which checks if ISP really blocks listed resources
- Understanding that DNS blocking is useless and enforcing IP, TLS SNI and BGP based blocking.
- Legal and technical barriers to use VPN servers, TOR network and anonymizers, secure messengers, etc.
- ... related collateral damages internet become more fragmented,
 BGP leaks, performance and availability degradation for the resources

Thank you!

