## DC-DDHT Privacy Pack: Required steps to improve digital privacy:

- Encrypted messaging apps (to be used on phones and other digital devices): <u>Signal</u> (available for iOS and Android). Alternatively <u>ChatCrypt</u> is an "end-to-end encrypted group chat that doesn't store anything in the cloud".
- Encrypted email services: <u>Protonmail</u>; <u>Hushmail</u>. Emails can also be encrypted on services such as <u>Microsoft Outlook</u>.
- Data can be encrypted and authenticated using services such as <u>OpenPGP</u>, which uses public key cryptography.
- <u>Silent Circle</u>: "the world's solution to mobile privacy", providing "a variety of voice, text, video, and file transfer encryption packages for individuals and business users."
- Computer operating system (hard disk)-specific encryption: guides available to encrypting disks on <u>Windows</u>, <u>Mac OS X</u>, and <u>Linux</u>.
- Password managers (creating and securely storing unique, unbreakable passwords): <u>KeePassX</u> is free, open-source, cross-platform and does not store information in the cloud.
- <u>Two-factor authentication</u>: if a password is stolen, two-factor authentication provides an additional layer of protection: <u>DuoMobile</u>; <u>Jumbo</u>.
- Encrypted search engines: Tor Project.
- Google Docs alternative: <u>CryptPad</u>.
- Drop Box alternative: SpiderOak
- <u>HTTPS Everywhere</u> is a Firefox, Chrome, and Opera encrypted browser extension that provides secure communications with a large number of major sites.
- <u>Qubes</u> is an operating system that isolates programs in their own VM (virtual machine).
  - "In our digital lives... All of our activities typically happen on a single device. This causes us to worry about whether it's safe to click on a link or install an app, since being hacked imperils our entire digital existence... Qubes eliminates this concern by allowing us to divide a device into many compartments."
- Privacy International provides services designed to protect users from online tracking (covering <u>Firefox</u>, <u>Chrome</u>, <u>Edge</u>, <u>Safari</u>, <u>Android</u> and more). P.I. also offers advice to users, regarding <u>collecting their data from apps</u> (including Twitter, Facebook, WhatApp, Uber), and <u>minimize targeted ads</u> when using social media.
  - <u>Ghostery</u> is a popular 'browser plug in', which adds an extra layer of protection for browsers such as Chrome, Opera, Firefox, Safari, and mobile systems such as Android, iOS and Firefox Android.
- When phones, laptops and other digital devices are not in use, disable Wifi, Bluetooth, GPS and NFC (near-field communication). Only connect devices to trusted internet connections.
- <u>HavelBeenPWNED?</u> Useful service to check if email accounts or phone numbers have been subjected to data breaches
- VPNs (virtual private networks), such as <u>Surfshark VPN</u> or <u>ExpressVPN</u>, create protected network connections when using public networks.
- More manual steps involve placing covers over cameras on digital devices.