Internet Security for Normal People

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About me

40 years in telecommunications industry

Worked on getting location for 9-1-1 calls

Worked on wiretapping for law enforcement

That has made me paranoid

I am not professionally paranoid, but I am rationally paranoid

I worry about how data is collected and used

How to be Absolutely Secure

Put your computer into a big thick vault

Don't power it up

Don't use it

Using a Computer has Risks

Exposes your thoughts and desires

Exposes your location

Exposes your loved ones

Exposes your financial information

Exposes your health information

Everything has risks

Leaving your house exposes you to thugs, car accidents

Staying in your house exposes you to floods, tornadoes, hurricanes, tree falls, fire, home invasions

The Thing is to Minimize Risk

When outside your home

* Be aware of your surroundings

* Look before crossing a street

* Don't give out your social security number

The Thing is to Minimize Risk

When on the internet

* Be aware of your surroundings
* Think **before** you click
* Be careful of what you share

What do I have to hide

Financial Information

Kids and family members

LOCATION, LOCATION, LOCATION

* where am I now
* statistically where am I at any time
* when I go somewhere I shouldn't
* what stores do I go by

Conversations at home, where ever

Where do I do business

How do I ~~vote~~ *think*

Be Aware of Your Surroundings

If you don't want to share, don't do it in public

Avoid public WiFi

* voids some encryption

* can expose home passwords

* can expose computer or smart phone

To thwart prying eyes, encrypt files

Think <u>before</u> you click

Viruses can be loaded with clicks or apps

Don't click on links in emails

    * check carefully the source of the email (RISKY)

Don't use free apps

Never use apps from untrusted sources

Don't reply if you don't know the sender

Don't click on click bait

Be careful of what you share

Think of social media as a bulletin board broadcast to every mall in the world read by every cretin in the world

Don't post answers to security questions:

- Mother's maiden name
- Address, age
- High school
- Pet's name
- Favorite movie, actor, TV series, etc.
- Friends

Becare of what you share

Photographs

    * kids

    * most have location information embedded in them

Likes and clicks

Controlling what you share

Think

Before you buy, download, click, use, whatever

Permissions

* Does a flashlight need access to contacts and location?

* Is <u>Fill in the blank</u> listening all the time?

* Does **any** app *need* location?

* Restricting what a service can use or share.

Passwords

Use good ones

* 16 characters, lower case, upper case, numbers **AND** symbols

* can be memorable...different words separated by symbols

* misspellings are good

Use different ones on each service

USE A PASSWORD MANAGER

Make sure it is trusted

Be aware of how it synchronizes

Use different user names

Cloud Services

Great for files that you want to post to the world

Maybe not so good for:

 * passwords
 * photographs
 * anything you want to keep private

Big target for information thieves

 * why target individuals, when you can target crowds

Google

Great services

Avoid them

* search with DuckDuckGo

* use g! within DuckDuckGo if you NEED Google search

* don't give them permissions

* don't log in to any Google Service

Common permissions IS EVIL!

eMail

Uses beacons to know when you open an eMail

   * file with a name that identifies you

Links with crazy names to track you

Turn off loading of images

Don't click on eMail links

Unsubscribe to most things

Avoid gmail which reads your emails

Browsing

Use a browser you trust

Use addresses with HTTPS instead of HTTP

Make sure the lock is green

Manage cookies

   Purge fairly frequently

   Disallow third party cookies

Disallow trackers

Turn on Google Autowipe feature

Use incognito modes

Bandwidth Hogs

Turn off autoplay videos in browsers

Delete unused apps

Beware of free apps

Upload tracking information

Download ads

Turn off location and contact sharing in phones

Conclusions

Be aware of surroundings and risk

Avoid risks where possible

Take risks when rewards are great enough

Think before clicking