

# Protecting Your Privacy in the Digital Age



**MOTLOW  
LIBRARIES**

Books are *just* the beginning!



**MOTLOW STATE**

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Motlow State Community College



What is **privacy**?

*“The ability of an individual or group to seclude themselves or information about themselves, and thereby express themselves selectively.”*

**Wikipedia**

*en.wikipedia.org/wiki/Privacy*

## **SOLITUDE**

→ Physical separation from others

## **INTIMACY**

→ Relationship between individuals caused by seclusion

## **ANONYMITY**

→ Desire for public privacy

## **RESERVE**

→ Psychological barrier against unwanted intrusion

***Alan Weston***

*Privacy and Freedom (1967)*

**Privacy** is not  
**Anonymity.**



**Privacy** is to keep information and actions to yourself or others selectively, but others knowing you are involved.

- Locking your office door during a private meeting
- Encrypting an email sent to specific individuals

**Anonymity** is to release information and actions to others without your identity attached.

- Blowing the whistle on a company
- Using a pseudonym and posting items for the public

Why should I **care**?

## **“SAMPLE SIZE IS HIGH”**

→ Analytics can pinpoint using various statistics

## **“EVERYONE USES IT”**

→ While everyone may use it, not everyone lives in the same place

## **“NOTHING TO HIDE”**

→ Free speech, but nothing to say



City	Browser	Users	Users	Contribution to total:
		2,831 % of Total: 100.00% (2,831)	2,831 % of Total: 100.00% (2,831)	
1. <span style="color: #0070C0;">■</span> Murfreesboro	Chrome	278	8.66%	
2. <span style="color: #4CAF50;">■</span> Lynchburg	Chrome	177	5.51%	
3. <span style="color: #FF9800;">■</span> Fayetteville	Chrome	93	2.90%	
4. <span style="color: #FFEB3B;">■</span> Smyrna	Chrome	92	2.87%	
5. <span style="color: #0070C0;">■</span> Murfreesboro	Safari	84	2.62%	
6. <span style="color: #4CAF50;">■</span> McMinnville	Chrome	83	2.59%	
7. <span style="color: #FF9800;">■</span> Nashville	Safari	82	2.55%	
8. <span style="color: #FFEB3B;">■</span> (not set)	Chrome	80	2.49%	
9. <span style="color: #4DB6AC;">■</span> Lynchburg	Edge	78	2.43%	
10. <span style="color: #ADD8E6;">■</span> Nashville	Chrome	65	2.02%	

## THE STATE OF ANALYTICS

Sourced by **Google Analytics** for *library.msc.edu*

City	Age	Users	Users	Contribution to total:
		152 % of Total: 5.37% (2,831)	152 % of Total: 5.37% (2,831)	
1. Murfreesboro	18-24	105	71.43%	
2. Murfreesboro	25-34	21	14.29%	
3. Murfreesboro	45-54	11	7.48%	
4. Murfreesboro	35-44	10	6.80%	

Show rows: 10 Go to: 1 1 - 4 of 4

# THE STATE OF ANALYTICS


Sourced by **Google Analytics** for *library.msc.edu*

City	Source / Medium	Users	Users	Contribution to total: Users
		430 % of Total: 15.19% (2,831)	430 % of Total: 15.19% (2,831)	
1.	Murfreesboro (direct) / (none)	399	91.72%	<p>A pie chart illustrating the distribution of traffic sources. The largest slice is blue, representing 91.7% of the total. Other smaller slices include green (4.37%), orange (1.84%), yellow (0.69%), cyan (0.46%), light green (0.46%), and light orange (0.23%).</p>
2.	Murfreesboro google / organic	19	4.37%	
3.	Murfreesboro symbaloo.com / referral	8	1.84%	
4.	Murfreesboro bing / organic	3	0.69%	
5.	Murfreesboro mscc.mywconline.com / referral	2	0.46%	
6.	Murfreesboro us.search.yahoo.com / referral	2	0.46%	
7.	Murfreesboro duckduckgo / organic	1	0.23%	
8.	Murfreesboro motlowssc.bywatersolutions.com / referral	1	0.23%	

Show rows: 10 Go to: 1 1 - 8 of 8

## THE STATE OF ANALYTICS

Sourced by **Google Analytics** for *library.mscc.edu*



**Date Last Seen** <sup>?</sup>  
Dec 03, 2021

**Device Category** <sup>?</sup>  
desktop

**Device Platform** <sup>?</sup>  
web

**Acquisition**  
**Date** <sup>?</sup>  
Sep 17, 2021

**Channel** <sup>?</sup>  
Direct

**Source / Medium** <sup>?</sup>  
(direct)/(none)

**Campaign** <sup>?</sup>  
(not set)

[Return to User Explorer Report](#)

Nov 5, 2021 - Dec 4, 2021 <sup>▼</sup>

Sessions (LTV) <sup>?</sup> <b>73</b> Sessions (Current): 28	Session Duration (LTV) <sup>?</sup> <b>15:39:42</b> Session Duration (Current): 04:55:28	Revenue (LTV) <sup>?</sup> <b>\$0.00</b> Revenue (Current): \$0.00	Transactions (LTV) <sup>?</sup> <b>0</b> Transactions (Current): 0	Goal Completion <sup>?</sup> <b>0</b> <sup>&gt;</sup> Goal Completion <sup>?</sup>
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Filter by: 4 selected | Sort by: Descending | Expand All | Collapse All | Export

**Dec 3, 2021** 1 session


<b>1:06 PM</b>	00:00	Direct			1
<input type="checkbox"/>	1:06 PM	Viewed <b>Subject Guides   Motlow State Community College Library</b> /subject-guides	Page title	Page URL	
		Subject Guides   Motlow State Community College Library	/subject-guides	/subject-guides	

**Nov 24, 2021** 4 sessions


<b>12:36 PM</b>	00:08	Direct			2
<input type="checkbox"/>	12:36 PM	Viewed <b>Motlow State Community College Library   Books are just the beginning</b> /	Page title	Page URL	
		Motlow State Community College Library   Books are just the beginning	/	/	


# THE STATE OF ANALYTICS


Sourced by **Google Analytics** for *library.msc.edu*


 Facebook **Grade E**

Facebook stores your data whether you have an account or not.


Your identity is used in ads that are shown to other users 


The service can read your private messages 


This service can view your browser history 


Deleted content is not really deleted 


[View All Points on Phoenix!](#)


[View Documents](#) [Visit Service](#)  Facebook **Privacy Grade E**


 PayPal **Grade E**

You waive your moral rights 


This service holds onto content that you've deleted 


This service still tracks you even if you opted out from tracking 


Third-party cookies are used for advertising 


This service can share your personal information to third parties 


[View All Points on Phoenix!](#)


[View Documents](#) [Visit Service](#)  PayPal **Privacy Grade E**


 Twitter **Grade E**

They store data on you even if you did not interact with the service 


The service can read your private messages 

The service can delete specific content without prior notice and without a reason 

This service can view your browser history 

This service holds onto content that you've deleted 

[View All Points on Phoenix!](#)

[View Documents](#) [Visit Service](#)  Twitter **Privacy Grade E**

WHAT YOU **AGREED TO**  
*Sourced by **Terms of Service; Didn't Read***

## PRISM *2007*

- Collects stored communications based on demands under Section 702 of the FISA Amendments Act of 2008

## XKEYSCORE *2013*

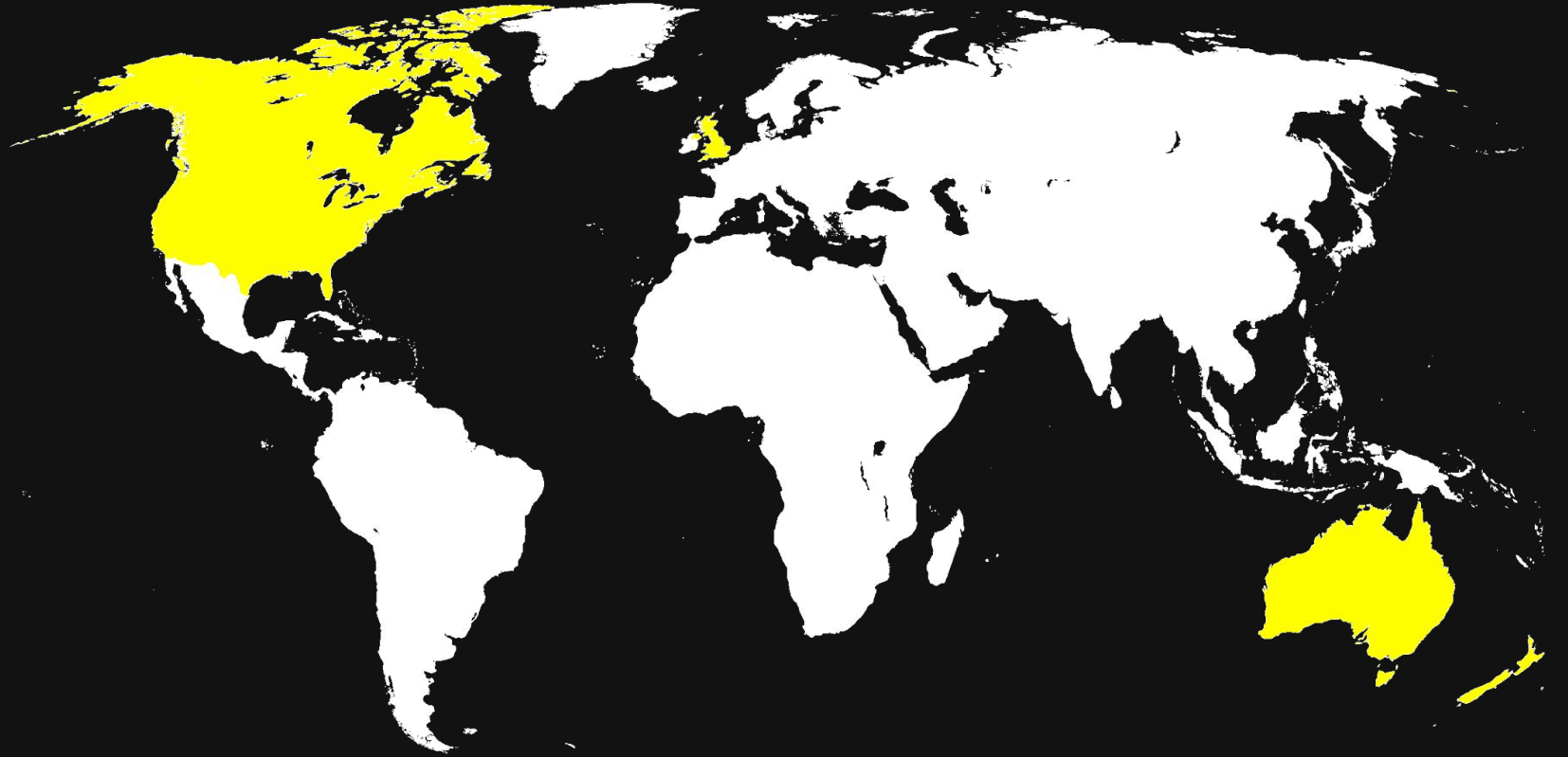
- Secret computer system from the NSA that continually searches and analyzes global Internet data

## 社会信用体系 *2009*

- Known as the **Social Credit System**, a national credit rating and blacklist developed by the government of the People's Republic of China

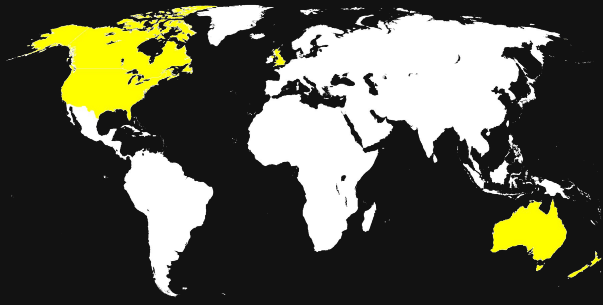


THE WORLD OF **SURVEILLANCE**

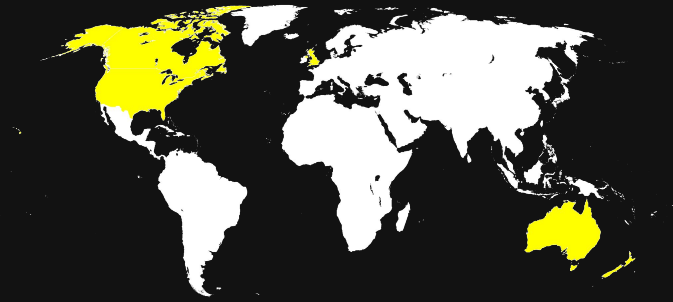


THE WORLD OF **SURVEILLANCE** // **FIVE EYES**





An alliance between the **United States, Canada, United Kingdom, Australia, and New Zealand** to share communications intercepted with one another



Documents have shown that these countries **intentionally spy** on one another's citizens and **share the information**

[theguardian.com/world/2013/nov/20/us-uk-secret-deal-surveillance-personal-data](http://theguardian.com/world/2013/nov/20/us-uk-secret-deal-surveillance-personal-data)

[theguardian.com/world/2013/dec/02/revealed-australian-spy-agency-offered-to-share-data-about-ordinary-citizens](http://theguardian.com/world/2013/dec/02/revealed-australian-spy-agency-offered-to-share-data-about-ordinary-citizens)

[theguardian.com/politics/2013/jun/10/nsa-offers-intelligence-british-counterparts-blunkett](http://theguardian.com/politics/2013/jun/10/nsa-offers-intelligence-british-counterparts-blunkett)

[reuters.com/article/uk-usa-security-britain-idUKBRE95K10620130621](http://reuters.com/article/uk-usa-security-britain-idUKBRE95K10620130621)

[theguardian.com/world/2013/oct/16/nsa-files-australian-spies-scooped-up-thousands-of-email-accounts-to-help-us](http://theguardian.com/world/2013/oct/16/nsa-files-australian-spies-scooped-up-thousands-of-email-accounts-to-help-us)

What can I **do**?

## DON'T PANIC

- **Almost everyone** uses analytics, and there are good cases for usage
- A **free service** does not always mean **you are the product**
- **Common Internet sense** can go a long way toward increasing privacy

## CREATE A THREAT MODEL

- What **threat** matters to you?
- What do you have that's **worth protecting**?
- Who are you protecting it **from**?
- How much **effort** are you willing to put in?



## CHECK YOUR BROWSER

- Most browsers have settings to assist in stopping or assist in anonymizing tracking
- Trusted add-ons are available to provide further protection such as **uBlock Origin**, **ClearURLs**, and more
- Assume that no browser is inherently private by default
- Takes just a few minutes to check quick settings



## LIMIT SOCIAL MEDIA USE

- The more you post publicly, the more everyone knows about you
- Services like Facebook and Twitter use everything you give them
- Fun quizzes can be used to harvest your information
- Uploaded pictures contain EXIF information that can include your location
- Limiting use is easy, but even better is deleting your accounts and not using it at all



## AUDIT YOUR ACCOUNTS

- Check your commonly used accounts and audit your privacy settings
- Use different passwords for every account you have
- Use multi-factor authentication where available
- Sign up for **Have I Been Pwned** to help audit breached accounts
- This can take a bit of time depending on how thorough you want to be



## USE ENCRYPTED EMAIL

- Gmail, Outlook, Yahoo!, and other common email providers are not considered private and encrypted by default
- Email providers such as **ProtonMail**, **Tutanota**, and **Mailbox.org** take privacy seriously
- Switching email providers entirely can take significant time and effort
- Other options to secure existing providers are available such as **Pretty Good Privacy (PGP)** but may not be user friendly

## USE ENCRYPTED MESSAGING

- Facebook Messenger, Snapchat, WhatsApp, and more are **not encrypted**
- Apps such as **Signal** and **Session** are developed with privacy in mind and encrypt everything
- Convincing family and friends to switch with you can be an impossible feat

## AVOID BIG TECH

- Avoid products from **Alphabet (Google), Amazon, Apple, Meta (Facebook),** and **Microsoft**
- Consider using open alternatives such as **LibreOffice, CryptPad, Firefox,** and more
- A near impossible task, especially when many sites and services actively rely on Big Tech for their own



## USE TOR

- A volunteer relay network containing over 6,000 relays
- Assists in concealing your location and usage from anyone performing network surveillance
- Various utilities connect to Tor, including **Tor Browser**, **Orbot**, **Onion Browser**, and more
- Tor is not the end all be all of privacy tools

Who can I **trust**?



## **ELECTRONIC FRONTIER FOUNDATION**

eff.org

- An international non-profit digital rights group formed to protect Internet civil liberties

## **PRIVACY GUIDES**

privacyguides.org

- A reliable source of privacy-related tools and information curated by the community

## **TERMS OF SERVICE; DIDN'T READ**

tosdr.org

- Solves the biggest lie on the internet and helps boil down various ToS for companies

## **DUCKDUCKGO**

duckduckgo.com

- An Internet search engine created to protect a searcher's privacy while avoiding the filter bubble of personalized search results



## **MULLVAD**

mullvad.net

- A no-logging VPN service that doesn't even need an email address

## **FREEDOM OF THE PRESS FOUNDATION**

freedom.press

- A non-profit organization founded to fund and support free speech and freedom of the press

## **AMERICAN LIBRARY ASSOCIATION**

ala.org

- A non-profit organization that promotes libraries and library education internationally

## **ELECTRONIC PRIVACY INFORMATION CENTER**

epic.org

- An independent non-profit research center focusing on emerging privacy and related human rights issues



# APPS AND SERVICES

## EMAIL

**PROTONMAIL** [protonmail.com](https://protonmail.com)

**TUTANOTA** [tutanota.com](https://tutanota.com)

**MAILBOX.ORG** [mailbox.org/en](https://mailbox.org/en)

**MAILVELOPE** [mailvelope.com](https://mailvelope.com)

## MESSAGING

**SIGNAL** [signal.org](https://signal.org)

**SESSION** [getsession.org](https://getsession.org)

## PASSWORD MANAGEMENT

**BITWARDEN** [bitwarden.com](https://bitwarden.com)

**LESSPASS** [lesspass.com](https://lesspass.com)

**KEEPASSXC** [keepassxc.com](https://keepassxc.com)

## WEB BROWSING

**FIREFOX** [mozilla.org/firefox/new](https://mozilla.org/firefox/new)

**DDG BROWSER** [duckduckgo.com/app](https://duckduckgo.com/app)

**TOR BROWSER** [torproject.org/download](https://torproject.org/download)

## COLLAB AND OFFICE

**ETHERPAD** [etherpad.org](https://etherpad.org)

**CRYPTPAD** [cryptpad.fr](https://cryptpad.fr)

**STANDARD NOTES** [standardnotes.org](https://standardnotes.org)

**LIBREOFFICE** [libreoffice.org](https://libreoffice.org)

## FILE ENCRYPTION

**VERACRYPT** [veracrypt.fr](https://veracrypt.fr)

**CRYPTOMATOR** [cryptomator.org](https://cryptomator.org)

## MULTIFACTOR

**AEGIS** [getaegis.app](https://getaegis.app)

**RAIVO OTP** *iOS App Store*

## ONLINE SERVICES

**HAVE I BEEN PWNED** [haveibeenpwned.com](https://haveibeenpwned.com)

**TOS;DR** [tosdr.org](https://tosdr.org)





# Q&A

# Protecting Your Privacy in the Digital Age



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**MOTLOW STATE**

MOTLOW STATE COMMUNITY COLLEGE DOES NOT DISCRIMINATE ON THE BASIS OF RACE, COLOR, RELIGION, CREED, ETHNICITY OR NATIONAL ORIGIN, SEX, DISABILITY, AGE STATUS AS A PROTECTED VETERAN OR ANY OTHER CLASS PROTECTED BY FEDERAL OR STATE LAWS AND REGULATIONS AND BY TENNESSEE BOARD OF REGENTS POLICIES WITH RESPECT TO EMPLOYMENT, PROGRAMS, AND ACTIVITIES.

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**PGP KEY** [hyp5r.io/#pgp](https://hyp5r.io/#pgp)