

#### Web Accessibility Basics

#### **ATI Virtual Open House**

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# Today's Agenda



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- Session will cover the following:
  - Importance of creating accessible websites
  - Implementing accessible websites/web-based applications, and
  - Basic tips for ensuring your social media is accessible

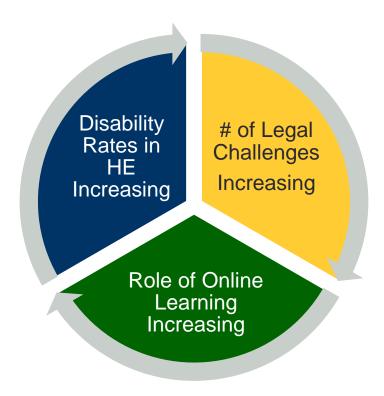
#### ATI's Role...

- In addition to the provision of assistive technology resources, the ATI works to ensures equivalent access to ICT resources for individuals with different learning styles and abilities in the Mason community through:
  - Provision of alternate formats (textbooks, assessments)
  - Captioning/transcription
  - Web and document accessibility
  - Training



# IMPORTANCE OF WEB ACCESSIBILITY

# Trends in Higher Education



 Since Oct. 2013, U.S. DOE's Office of Civil Rights (OCR) has issues over 800 resolution agreements regarding digital accessibility in higher education, public school districts, library systems, etc., OCR Search Letters & Agreements

#### Collective Issues identified from complaints...

#### Instructional Resources

- Inaccessible E-Learning Technologies
  - Educational technologies (i.e., captions, documents, LMS, CMS, supplemental applications, polling, library databases, etc.)
  - Websites/non-academic webbased resources
- All involved students with sensory loss (i.e., blind, low vision, deaf, hard of hearing)

#### Websites

- ~95% of the issues are "hit-andrun" complaints (both nationally and in Virginia)
- Only a handful are based on a specific complaint from an individual with a disability that impacts instructional access (both nationally and in Virginia)
  - E.g., Registration systems, Events, Videos, Health services, etc.

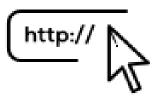


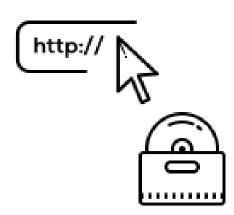
# WEB A11Y SERVICES AND SUPPORT @MASON

## Web A11y Services & Supports

Mason Websites and web/based applications

Architecture Standards Review Board Instructional Resources







# TOP 10 ACCESSIBILITY CHECKS (WHAT ARE WE REVIEWING?)

# Top 10 Accessibility Checks

- Unique Page Titles
- Alternative Text for Images
- Use of Color
- Keyboard Accessibility
- Meaningful Hyperlink Text
- Headings
- Forms
- Tables
- Documents (i.e., identifying formats on website)
- Multimedia (Audio/Video)

# A FEW EXAMPLES...

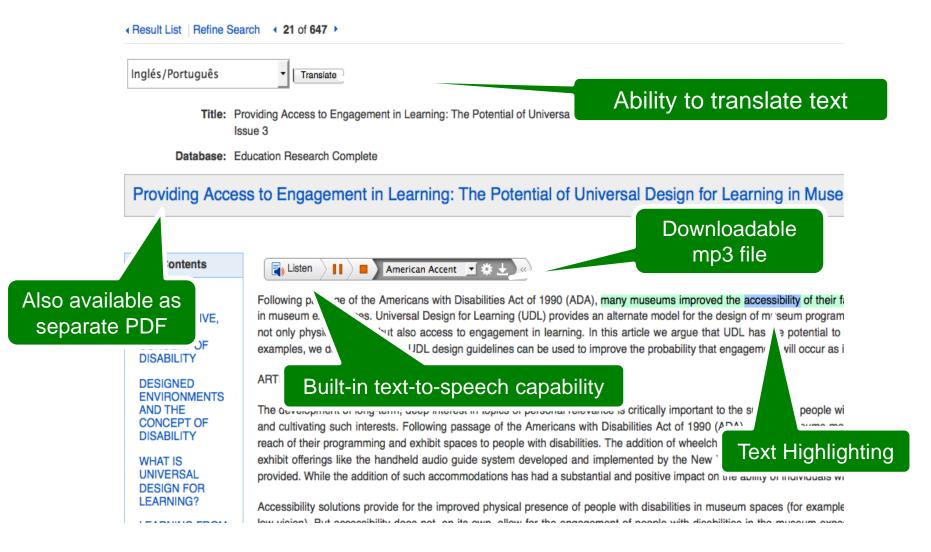
## Choose "Born Accessible" ICT products

Whenever possible, start with ICT resources that are <u>accessible out</u> of the box!

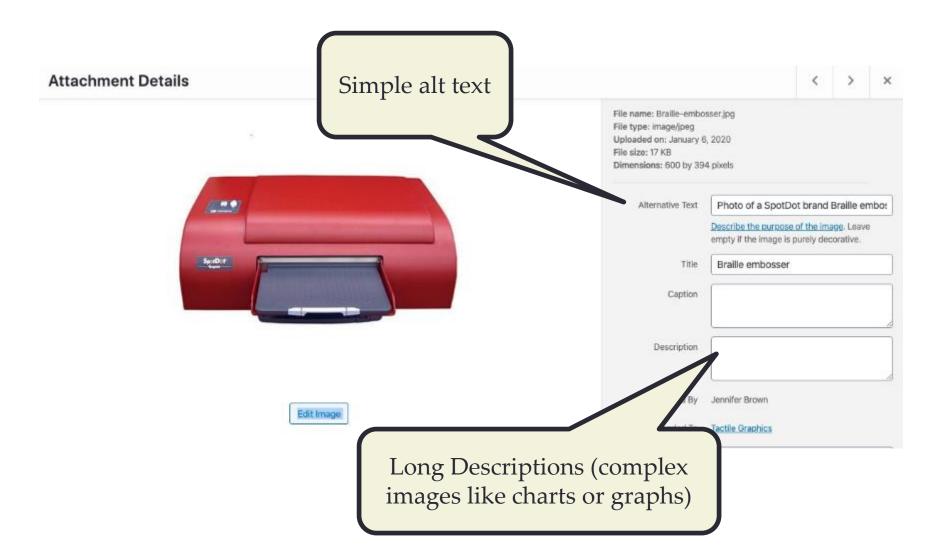


#### **Example:**

#### Library Databases (Full-text HTML, ReadSpeaker)



# **Example:**WordPress (Adding Alt Text)



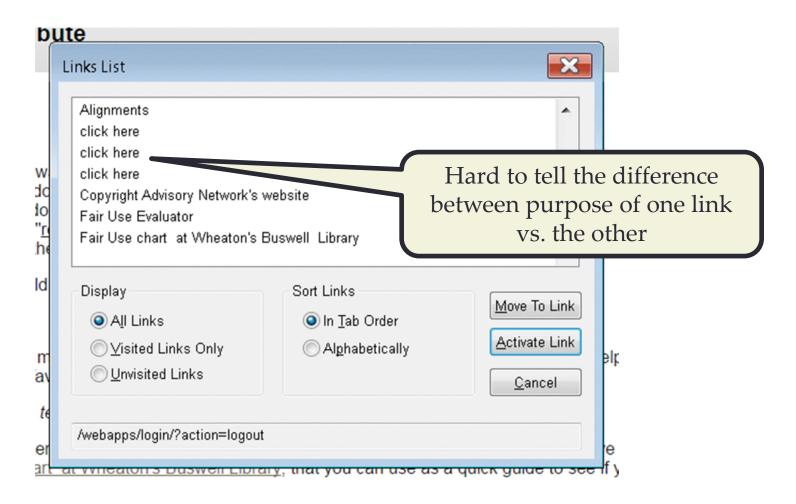
## Use Meaningful Hyperlink Text

Hyperlinks should inform users where clicking the link will take them (WCAG 2.4.4).

- E.g., Using descriptive links, not URLs, "click here", or "read more"
  - E.g., Use <u>George Mason University Home Page</u> as opposed to <a href="http://www.gmu.edu">http://www.gmu.edu</a>



#### Example: Screen Reader Links List (e.g., Jaws)



#### Use of Color

Good color contrast is defined as having a contrast ratio of 4.5:1 (WCAG 1.4.3).

This benefits individuals who may have colorblindness or those with low vision. It is also beneficial for drawing interest to important content.

Small text (~4.5:1)

Orange (#FF5D00) on white Purple (#CC21CC) white

Blue (#000063) on gray (#808080)

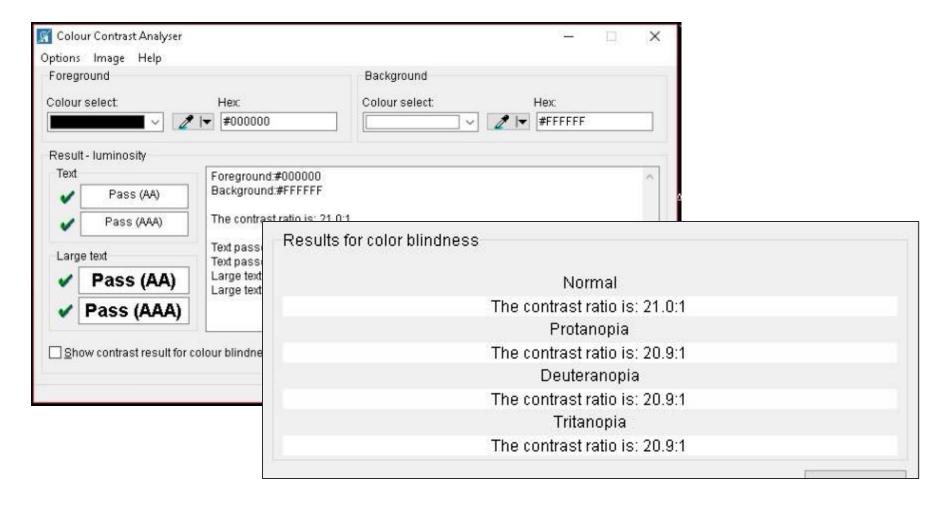
Red (#E60000) on yellow (#FFFF47)

Large text (~3:1)

Gray (#949494) 18 point text on white **Purple** (#**C86ff1**) 14 point + bold text on white

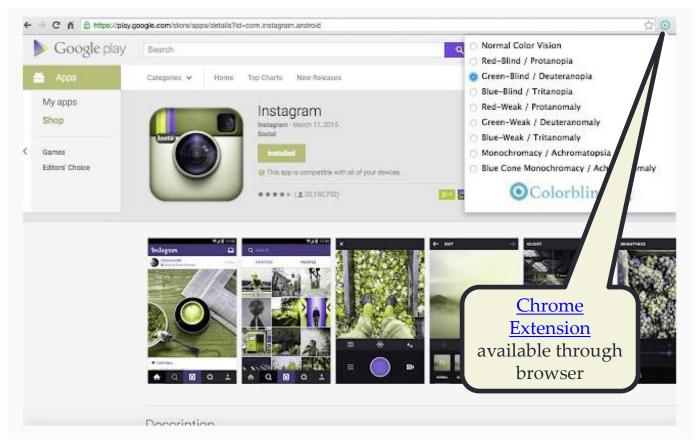
## Colour Contrast Analyser (Paciello Group)

Works with all applications (desktop and web-based)



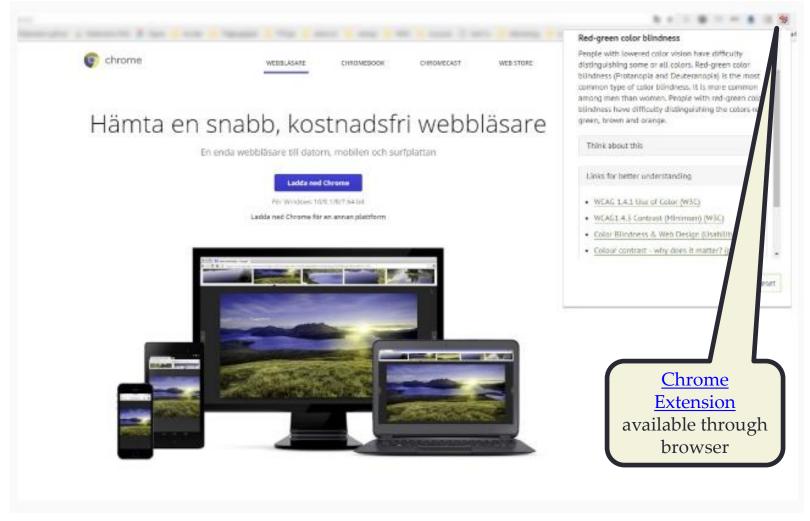
# **Example:**Colorblinding (Chrome Extension)

Works only in the Chrome browser



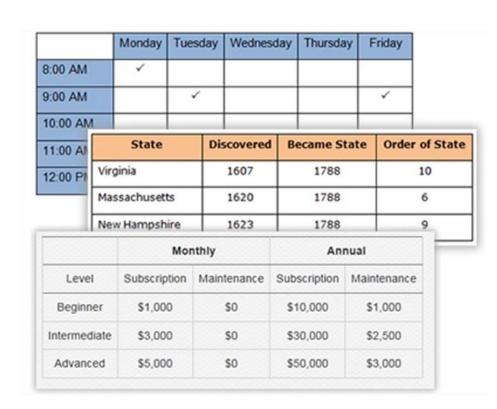
#### **Example:**

#### Web Disability Simulator (Chrome Extension)



# When using tables, keep it simple

- Table headers must be identified
  - Screen readers use tags and scope attributes to identify which cells in the table are row or column headers.
- Make data predictable and easy to navigate (i.e., one column row header, one row for column headers)
- When possible, avoid using split or merged cells



# **Example:**Screen readers and tables (without markup)

Dept. Code	Course #	Section	Max. Enrollment	Current Enrollment	Room Number	Days
BIO	100	1	15	13	5	Mon, Wed, Fri
ENGL	200	2	15	7	8	Tues, Thurs
PSYCH	100	1	15	15	13	Wed

#### Table Without Markup (Read Left-to-Right, Top-to-Bottom)

Department Code, Class Number, Section, Max Enrollment, Current Enrollment, Room Number, Days, BIO, 100, 1, 15, 13, 5, Mon, Wed, Fri, ENGL, 200, 2, 15, 7, 8, Tues, Thurs, PSYCH, 100, 1, 15, 15, 13, Wed

#### **Example:**

#### Screen readers and tables (without markup) cont.

Screen reader only accesses information from individual data cell

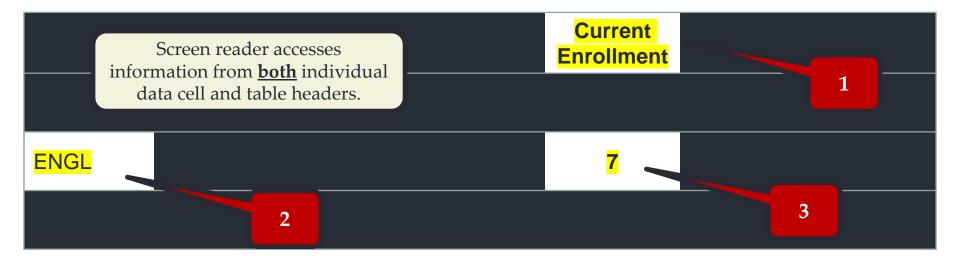
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#### Table Without Markup (Read Left-to-Right, Top-to-Bottom)

Department Code, Class Number, Section, Max Enrollment, Current Enrollment, Room Number, Days, BIO, 100, 1, 15, 13, 5, Mon, Wed, Fri, ENGL, 200, 2, 15, 7, 8, Tues, Thurs, PSYCH, 100, 1, 15, 15, 13, Wed

#### **Example:**

# Screen readers and tables (with tags and scope attribute for column and rows)

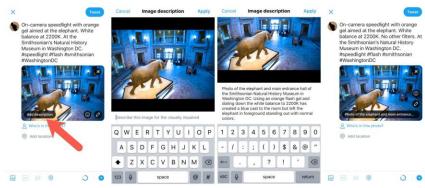


#### Table With > tags and scope attributes

Department Code, Class Number, Section, Max Enrollment, Current Enrollment, Room Number, Days, BIO, 100, 1, 15, 13, 5, Mon, Wed, Fri, ENGL, 200, 2, 15, 7, 8, Tues, Thurs, PSYCH, 100, 1, 15, 15, 13, Wed

## Tips for Social Media

- Follow best practices!
- Some basic considerations below…
  - Alternative text descriptions for images: <u>Facebook</u>, <u>Twitter</u>, <u>LinkedIn</u>, <u>Instagram</u>



- Multimedia accessibility
  - Add captions for video: <u>Facebook</u>, <u>Twitter</u>
  - Link to transcripts for audio
- · Limit use of emoji's





# Next Steps

More Target Training Workshops in coming weeks...

#### Web Accessibility

- Using Automated Testing Tools (e.g., WAVE, ANDI, Colour Contrast Analyser)
- 5 Easy Fixes to Improve the Accessibility and Usability of your website
- Creating Accessible Social Media content

#### **Assistive Technology**

Notetaking Strategies for Online Courses

#### **Document Accessibility**

Making Word, PPT, and PDF Documents Accessible

#### Multimedia

Live Captioning Solutions (using ASR)

# To learn about our workshops...

ATI Website, <a href="http://ati.gmu.edu">http://ati.gmu.edu</a>

#### Office of Provost Newsletter

Starting June 10<sup>th</sup>

#### **Direct Email**

Please email us at <u>ati@gmu.edu</u> if you would like us to contact you directly.

## **Contact Information**

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