

NC TOOLKIT for
Digital Readiness



Session 6 Instructor Guide

Finding & Evaluating Information - Two Groups

OVERVIEW

Session 6 - Finding & Evaluating Information

Session Time

(2 hours)

Description

All kinds of good information can be found online, but unfortunately, just as much bad information is on the internet. In this session, we will talk about where to find good information, how to avoid wrong information, and how to tell the difference between them. This will include a crash course on search engines like Google, library resources, and specific sources for health information, news factchecking, and more.

Objectives

Learners will be able to (ISTE Standards 3a, 3b, 3d):

- Define basic search engine terminology
- Use search engines to find information online
- Identify the source of information found online
- Look for indicators of bias in online information
- Use online fact checking websites
- Identify specific resources for health information online
- Access online library resource

Preparation

- Plan to present your library's online resources and possibly create library accounts.
- Print
 - Adult handout
 - *Google Tips and Tricks* handout, one per family



- Sign-in sheet
- Customize slides with any relevant announcements, Wi-Fi password, etc.
- On the day of, click through googleaday.com questions so you know what to expect.

Just Before Session

- Open slideshow on presentation computer.
- Place sign-in sheet near entrance.
- Talk with assisting facilitators about how you would like them to roam among participants and field individual questions. Answer any questions they have about the session.



OUTLINE

Session 6 - Finding & Evaluating Information

Arrival | 10 Minutes

All participants sign in. Use this time to make sure each family brought their device, they can sign into their device, it is charged or connected to an outlet, and it is connected to Wi-Fi.

Introduction & Agenda | 5 minutes

Introduce facilitators present. Set expectation for communication during session. Explain where students will be while adults train and how switching will work. Outline session schedule and goals.

ADULT TRAINING**50 Minutes****Introductions & Icebreaker | 5 minutes**

Have each participant introduce themselves and answer the discussion question as they do.

- Discussion Question: What's one thing you'd like to use the internet to get information about?

Introduction to Search Engines & Search Strategies | 10 minutes

(Slideshow Overview & Self-Paced Activity)

Introduce basic search engine terminology. Go over specific search engines and their pros and cons.

- Demo: Perform a search and use the different search functions.
- Key terms: search engine, keywords, search bar, Google, Duck Duck Go, results page, sponsored results
- Discussion Questions: What do you see on the results page? How can we tell where this information came from?
- Activity: Narrow a search with additional keywords and discuss what kind of information your keywords produced.



Information Evaluation | 10 minutes

(Slideshow Overview & Group Activity)

- Discussion Question: How do you usually decide whether you believe the things you hear or read, including things that aren't online?
- Video: *Judging Online Info* from GCF <http://bit.ly/infojudge>
- Key terms: top level domain (.com .edu .org), fact checker
- Demo: Evaluate this New York Times article together- <https://nyti.ms/2PZ6CPj>
- Activity: Compare two sites with information on Dihydrogen Monoxide.

Health-Specific Resources | 5 minutes

(Slideshow Overview)

Go over specific websites for finding health information.

- Discussion Questions: What do you think about looking for health information online? What could be some problems with looking for medical information online? What could be good about looking for health information online?
- Activity: Explore medlineplus.gov and nchealthinfo.org

Library Resources | 15 minutes

Overview of library resources for both adults and students.

Wrap-Up | 5 minutes

(Further Resources & Exit Survey)

- Activity: Exit Survey

Switch Group Locations | 5 minutes

STUDENT TRAINING

50 Minutes

Introductions & Icebreaker | 5 minutes

Have each participant introduce themselves and answer the discussion question as they do.



- Discussion Question: What kind of information do you look for online?

What Can Google Do?/ Google Tips and Tricks | 5 minutes

(Group Activity)

- Handout: *Google Tips and Tricks*
- Activity: Try the tricks listed on the handout.
- Discussion Questions: Which of these tips do you think is the most useful? Do you know any other Google tricks?

A Google a Day | 5 minutes

(Self-Paced Activity)

- Activity: Complete activity at agoogleaday.com
- Debrief Questions:
 - » Were the questions difficult to find the answers to?
 - » Did you have to do multiple searches?
 - » Did you have to click on any links or could you find the answers you were looking for in what appeared on the results page?
 - » Did you learn any new search strategies?

Information Evaluation | 10 minutes

(Slideshow Overview & Group Activity)

- Discussion Question: How do you usually decide whether you believe the things you hear or read, including things that aren't online?
- Video: *Judging Online Info* from GCF <http://bit.ly/infojudge>
- Key Terms: *top level domain (.com .edu .org), fact checker*
- Demo: Evaluate this New York Times article together- <https://nyti.ms/2PZ6CPj>. and elephant photo <http://bit.ly/lionele>

Health-Specific Resources | 5 minutes

(Slideshow Overview)

Go over specific websites for finding health information.



- Discussion Questions:
 - » *What do you think about looking for health information online?*
 - » *What could be some problems with looking for medical information online?*
 - » *What could be good about looking for health information online?*
- Activity: Explore medlineplus.gov and nchealthinfo.org.

Library Resources | 15 minutes

Overview of library resources for students.

Wrap-Up | 5 minutes

(Further resources and Exit Survey)

- Activity: Exit survey



SCRIPT

Session 6 - Finding & Evaluating Information

Italicized words are instructions and notes to you, not to be read aloud.

Highlighted text indicates that participants should complete those instructions on their devices along with your demonstration.

Arrival | 10 minutes

- *Allow some time for participants to arrive and get settled so everyone can start together.*
- *Each participant who arrives needs to sign-in (both the adult and the student).*
- *Use this time to make sure each family has a device that is charged, connected to Wi-Fi, and signed in.*

Introduction & Agenda | 5 minutes


- *Introduce facilitators present.*
- *Explain schedule and where the students will be while adults are training.*
- Today, we are going to be talking about how we find information online and how to know whether information is reliable or not.
- *Separate groups.*

ADULT TRAINING

50 Minutes

Introductions & Icebreaker | 5 minutes

- Before we get started, let's all introduce ourselves in case we haven't all been together before. So please say your name and tell us:

 **Discussion Question:** What's one thing you'd like to use the internet to get information about?

- *Give an example by saying your first name and one kind of information you find online like the weather or something related to a hobby like cooking tips.*



- (Almost) everything you've mentioned can be researched online.
- There is so much information online, it can even be overwhelming sometimes.
- The first step to being good at finding information online is knowing how to use a search engine well, so that's what we will talk about first.

Introduction to Search Engines & Search Strategies | 10 minutes


(Slideshow Overview and Group Tutorial)

Search Engine Basics

- A **search engine** is a website that uses **keywords** to find relevant information elsewhere online.


 Question: Can anyone name a search engine? (Google, Bing, Duck Duck Go)

- Every search engine uses a slightly different system and has pros and cons.
- For example, Google is the best known search engine, and most people believe it has the best system for helping you find what you are looking for, even when you don't know exactly what you want. One downside is that Google collects some of your information when you use it and might sell it to advertisers. If you are logged into a Google account, it will store your search history, which you may or may not like.
- In contrast, Duck Duck Go is a search engine like Google but it is better at protecting your privacy. It does not collect your information or share it with anyone. On the other hand, it doesn't have as many features as Google and without storing your information, it often isn't as good at showing you exactly what you're looking for.
- We are going to practice with Google today. We will talk more about privacy and data at one of our other workshops this year.

 Open a browser. You may see Google's homepage immediately. If you do not, type [google.com](https://www.google.com) into the address bar at the top.

- You may have figured out that the address bar often doubles as a search bar but it will react differently in different browsers depending on your settings. If you go to [google.com](https://www.google.com) first, you will know you are always searching Google.
- Next we will choose the **keywords** to type into the search bar. You only need to type words that are important to what you are looking for. If you want to information about dogs, you don't need to type as many words as "I would like information on dogs."




 Let's start by all typing in "dog" and pressing enter or clicking on the search button.

- This takes us to the **results** page, which shows us the results of our search in many different forms.
- None of these results are produced by Google. Everything here comes from a different website, and Google has organized it based on what it thinks you are looking for.


 Discussion Question: What do you see on this page?

- *Make sure you cover these parts. It will be easier to show if you switch to a live browser to highlight each section as it is mentioned:*

- » Titles of webpages – You would click on the title to open a page.
- » URLs – The URL is listed below the title.


 Labels of different kinds of content (images, news, etc.) – You can click on the different labels under the search bar to choose the kind of results you would like to see. Click on a couple to see how this changes the results page and then return to "All".


- » Search bar with current search terms – The search bar shows you which keywords have brought you to these results.
- » Sponsored results (if you see none, search for dog food) – The first results are often websites that have paid to be listed on the results page more often. They are sometimes in other places on the results as well. On Google, they will say "Ad" next to the URL.

 Discussion Question: How can we tell where this information came from?

- The URL listed below the title of the webpage shows us where the information is from on most of the results. We might investigate who owns that website to learn more about it.

Refining Search Terms

 Let's say we're thinking about getting a pet dog. Add some keywords to find more information about that.

 Discussion Question: What keywords did you add?

- The keywords you add will narrow down the information you are looking for. For example, you might add "dog breeds" if you want to decide what kind of dog you want. You might add "dog adoption locations in [your town name]" if you're looking for a place nearby to get a dog.
- Adding a few extra words can drastically change your results, so think carefully




about choosing your keywords. If you don't get exactly what you want, try a few different searches.


Information Evaluation | 10 minutes

(Slideshow Overview and Group Activity)

- There is so much information online, but unfortunately there is as much incorrect information as there is correct.

 **Discussion Question:** How do you usually decide whether you believe the things you hear or read, including things that aren't online? (e.g. depends on who says it and *whether they are likely to know this information, where you read it, how old the information is, etc.*)

- Many of the same methods we use all the time to decide if information is likely true work for evaluating information we find online.
- Let's watch a video that will give us some advice, especially for news on the internet.
- Video: Judging Online Info from GCF <http://bit.ly/infojudge>
- I just want to add one thing to the video about how to know who owns a website. Top level web domains, that three letter ending to a URL like .com, can be useful.
- The domain can sometimes tell you who created the website you are viewing.
 - .gov is only available to government agencies.
 - .edu is only available to educational institutions.
 - .org is usually owned by non-profits, but non-profits are sometimes connected to businesses and other groups that may add bias to their information. Learn more about the mission of the group that owns the website to decide if it is trustworthy.
 - Other domains like .com or .net can be purchased by anyone, so they don't tell you much about the website. You'll have to dig deeper.
- So to review, we want to check out where the information is from, if it has bias, and check multiple sources.

 Go to <https://nyti.ms/2PZ6CPj> and use these suggestions to decide if the information is reliable.

- *After giving time to skim the article, work through these questions together to discuss whether the information presented is reliable.*
 - Where is the information from?



- » How old is the information? Would that change its accuracy in this case?
- » Who wrote it or paid for it?
- » What are their sources?
- » What is the purpose of this site?
- Look out for bias.
 - » Emotional language and generalizations are a red flag.
 - » Focus on the facts.
 - » Check multiple sources and consider multiple viewpoints.
- Use fact checkers: <http://www.snopes.com>
- This photo may have looked like it had been tampered with, and this article may have contained information that we wouldn't believe right away, but we learned that the information was reported by a trustworthy website that cited a reliable source for this topic. Snopes also corroborated the information using multiple sources, so it is almost certainly true.
- Let's look at another example. This time, just look at the website I give you, and we'll check another source together at the end.
- *Assign half of the group to each link and give them a few minutes to read.*
 - <http://bit.ly/info5test>
 - <http://bit.ly/info3test>
- *After allowing time to read, ask these questions from one group and then the other:*
 - What information was this article sharing? (a warning/info about safety)
 - What substance is it talking about? (dihydrogen monoxide/oxidane)
 - Who wrote this information? (no author/oxidane foundation)
 - What is the purpose of the website? (to warn you of an unsafe substance/to tell you oxidane is safe)
 - What evidence is there that it is or isn't reliable information?
 - » <http://bit.ly/info5test> - No author. Uses emotional language to evoke fear or anger. No sources or scientific information to backup claims. It is not clear if the author has anything to gain from us believing it is dangerous. Website looks unprofessional.
 - » <http://bit.ly/info3test> - No date. The Oxidane Foundation, who created the website, might have something to gain by making us believe it is safe. No sources to backup claims. Website looks like a reliable website.
- Let's see what Snopes has to say: <http://bit.ly/info4test>



- Both of these websites are describing water. They both use misleading language to confuse the reader and sway them to agreeing with their viewpoint. Even when the facts are true, it is important to look at different viewpoints to understand an entire issue.

Health-Specific Resources | 5 minutes

(Slideshow Overview)

- Let's talk about some specific resources for health related information for a few minutes.

Discussion Questions:

- What do you think about looking for health information online?
- What could be some problems with looking for medical information online?
 - » *(e.g. Health is too complicated and too dangerous to approach without a medical professional's advice. There is bad/conflicting information online, etc.)*
- What could be good about looking for health information online?
 - » *(e.g. Have knowledge of your own health. Get free advice from professionals on non-emergency issues like diet, poison ivy, and acne. Find answers to embarrassing question. Get information to help you prepare to talk to your doctor, understand something your doctor told you, or know what kind of doctor to visit. Some health plans allow you to interact with doctors online to save time and money. etc.)*
- Finding health information online can be a great resource in combination with visits to medical professionals, but it is really important to get that information from a reliable place.
- Using search engines well can help you find good information, but going directly to websites you know are trustworthy can get you to reliable information quicker.

Go to medlineplus.gov.

Discussion Question: Based on the domain, who owns this website?

- National Institute of Health is the government agency on medical and health research, so we should expect it to be unbiased.
- Here you can learn about specific health topics, medications, medical tests, or medical terms in short understandable summaries, and be pointed to additional resources on the same topic.

Spend a couple minutes exploring Medline.



 Now visit nchealthinfo.org.


- Spend a minute on this website and see if you can answer these questions:
 - Who owns this website and do they have authority in this area?
 - » *UNC Health Science Library*
 - » *Yes. They specialize in providing health information.*
 - How is it different from Medline Plus?
 - » *Many of its resources are specific to North Carolina and can help you find medical care offline.*
- Using the internet to research your health can help you be empowered to understand your health better and be more proactive about health decisions. Make sure to use trustworthy websites and continue to reach out to medical professionals when appropriate.

Library Resources | 15 minutes

This time is allotted for you to share what resources are available online from your library. If possible, it might be good to sign people up for library cards during the workshop and give them time to explore your online resources

Wrap-Up | 5 minutes

(Further Resources & Exit Survey)

- All the resources for today are on your handout, plus a few more if you want to learn more about search engines, evaluating websites, or online health info.
-  Please take the exit surveys. This is also a good time to ask any questions you have for us.

Switch Group Locations | 5 minutes

STUDENT TRAINING

50 Minutes

Introductions & Icebreaker | 5 minutes

- Before we get started, let's all introduce ourselves in case we haven't all been together before. So please say your name and tell us:





Discussion Question: What's one thing you'd like to use the internet to get information about?

- Give an example by saying your first name and one kind of information you look for online.
- (Almost) everything you've mentioned can be researched online.
- There is so much information online, it can even be overwhelming sometimes.
- The first step to being good at finding information online is knowing how to use a search engine well, so that's what we will talk about first.

What Can Google Do? / Google Tips and Tricks | 5 minutes

(Self-Paced Activity)

- How many of you know how to use Google to find information online, raise your hand?
- Google has tried to make it easier for you to get the answers you need without ever clicking on any links and we're going to look at some ways to do Google searches that give us information quickly.
- Pass out *Google Tips and Tricks* handout.
- This handout has a few keywords you can add to your search to get a specific kind of result.
- 🔍 Test out these tricks to see if they help you get the information you're looking for faster.



Discussion Questions:

- Which of these tips do you think is the most useful?
- Do you know any other Google tricks?

A Google a Day | 5 minutes

(Self-Paced Activity)

- Those tips are good for a certain kind of questions. What if you need to find answers to more complicated questions? Let's see if you can figure out that.
- 🔍 Go to agoogleaday.com and see if you can find the answers to the questions they provide
- 🔍 Discussion Questions:
 - Were the questions difficult to find the answers to?



- Did you have to do multiple searches?
- Did you have to click on any links or could you find the answers you were looking for in what appeared on the results page?
- Did you learn any new search strategies?

Information Evaluation | 10 minutes

(Slideshow Overview & Group Activity)

- There is so much information online, but unfortunately there is as much incorrect information as there is correct.
- 🗣️ **Discussion Question:** How do you usually decide whether you believe the things you hear or read, including things that aren't online? (e.g. *depends on who says it and whether they are likely to know this information, where you read it, how old the information is, etc.*)
- Many of the same methods we use all the time to decide if information is likely true work for evaluating information we find online.
- Let's watch a video that will give us some advice, especially for news on the internet.
- Video: Judging Online Info from GCF <http://bit.ly/infojudge>.
- I just want to add one thing to the video about how to know who owns a website. Top level web domains, that three letter ending to a URL like .com, can be useful.
- The domain can sometimes tell you who created the website you are viewing.
 - .gov is only available to government agencies.
 - .edu is only available to educational institutions.
 - .org is usually owned by non-profits, but non-profits are sometimes connected to businesses and other groups that may add bias to their information. Learn more about the mission of the group that owns the website to decide if it is trustworthy.
 - Other domains like .com or .net can be purchased by anyone, so they don't tell you much about the website. You'll have to dig deeper.
- So to review, we want to check out where the information is from, and if it has bias, and check multiple sources.
- 🔍 Go to <https://nyti.ms/2PZ6CPj> and use these suggestions to decide if the information is reliable.
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- » How old is the information?
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- » What are their sources?
- » What is the purpose of this site?
- Look out for bias.
 - » Emotional language and generalizations are a red flag.
 - » Focus on the facts.
 - » Check multiple sources and consider multiple viewpoints.
- Use fact checkers:
 - » <http://www.snopes.com>

✓ Let's look at one more. Go to <http://bit.ly/lionele>.

- This is a screenshot of something that was shared on social media.

❓ Discussion Question: Do you think it is reliable?

✓ Go to snopes.com and see if you can find any information about it.

- <https://www.snopes.com/fact-check/elephant-carrying-lion-cub>
- When you see anything online, it is important to take a few minutes to decide if it is reliable because it's not always as easy to tell as you might think.

Health-Specific Resources | 5 minutes

(Slideshow Overview)

- Let's talk about some specific resources for health-related information for a few minutes.


❓ Discussion Questions:

- What do you think about looking for health information online?
- What could be some problems with looking for medical information online?
 - » *(e.g. Health is too complicated and too dangerous to approach without a medical professional's advice. There is incorrect/conflicting information online, etc.)*
- What could be good about looking for health information online?
 - » *(e.g. Have knowledge of your own health. Get free advice from professionals on non-emergency issues like diet, poison ivy, and acne. Find answers to embarrassing question. Get information to help you prepare to talk to your parent, your doctor, understand something your doctor told you, or know what kind of doctor to visit. etc.)*




- Finding health information online can be a great resource in combination with visits to medical professionals, but it is really important to get that information from a reliable place.
- Using search engines well can help you find good information, but going directly to websites you know are trustworthy can get you to reliable information quicker.

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This time is allotted for you to share what resources are available online from your library. If possible, it might be good to sign people up for library cards during the workshop and give them time to explore your online resources.

Wrap-Up | 5 minutes

(Further Resources & Exit Survey)



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- 🕒 Please take the exit surveys and feel free to stick around with any questions you have for us.

