

MARKETING GUIDES

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Unlocking Google's Hidden Potential

Using Google as a Research Tool (Part 1 of 5)

by Stephan Spencer
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If you're like me, you use Google every day to find things—news, technical support, events, tips, research documents and more. Were you to master Google's powerful search refinement operators and lesser-known features, over a year's time you could save days scouring over irrelevant results.

Perhaps even more enticing is the promise of elusive nuggets of market research and competitive intelligence out there waiting to be discovered. This five-part series will show you how to find what you need quickly and with laser-like accuracy.

With well over 8 billion documents in its index, Google is a veritable treasure trove of information. Yet finding just the right document out of those billions—the one that answers your question—can be daunting. There's good news for you, however. The search results you seek are about to rise to the top of the results, thanks to some of Google's search-refinement operators that I'll talk about here, in part one, titled "15 Ingredients to More Refined Searches."

In part two, I'll introduce you to the world of Google's advanced search operators, such as filetype:, intitle:, inurl: site: and daterange:. And in part 3, we will put our new search refinement tools into practice with a real-world example. We will also address various features available from Google's interface, such as Search Within Results, Similar Pages, SafeSearch filtering, spelling corrections, "I'm Feeling Lucky" and the Advanced Search page.

Part four will cover Google's many other search properties, including Google News, Google Local, Google Personalized, Froogle, Google Directory, Google Catalogs, Google Groups and Google Images, as well as some useful third-party sites powered by Google.

Finally, in the fifth and final part we will take a closer look at your secret weapon for online research, Google Answers. And two more Google gurus will weigh in with their opinions on the best time-saving search strategies, query operators, Google sites, and more!

15 Ingredients to More Refined Searches

If your search yields millions of search results, your search query is probably too broad. Rather than culling through pages and pages of search results, use these 15 ingredients to refine your search:

- 1. Multiple words:** Avoid making one-word queries.
- 2. Case insensitivity:** There's no need to capitalize.

3. Superfluous words: Drop overly common words.

4. Exact phrase: Put quotes around phrases.

5. Word order: Order your words in the order you think they would appear in the documents you're looking for.

6. Singular versus plural: Use plural if you think the word will appear in that form in the documents you're looking for.

7. Proximity: Words close together in your search will favor documents with those words close together in the text.

8. Wildcard: * can substitute for a whole word in an exact phrase search.

9. Number range: .. between numbers will match on numbers within that range.

10. Punctuation: A hyphenated search word will also yield pages with the un-hyphenated version. Not so with apostrophes.

11. Accents: Don't incorporate accents into search words if you don't think they'll appear in the documents you're looking for.

12. Boolean logic: Use OR, | and - to fine-tune your search.

13. Stemming: Google may also match on variations of your search word unless you tell it otherwise by preceding the word with +

14. Synonyms: ~ in front of a word will also match on other words that Google considers to be synonymous or related.

15. Query length: 32 words are the maximum for a Google query.

1. Multiple Words

The first key to refined searches is a multiple-word query. A one-word search query isn't going to give you as targeted a search result. Searching for *ohio car buyer statistics* instead of *statistics* will obviously yield a smaller and more specific set of search results.

2. Case Insensitivity

Searches are case insensitive, so capitalizing the word *Ohio* in the above example is unnecessary, as it would return the same results.

3. Superfluous Words

Overly common words like *the, an, of, in, where, who,* and *is* are known as “stop words.” It used to be that Google omitted such words from your query. Google News still ignores them.

Avoid formulating your query as a question. A search like *how many female consumers in ohio buy cars?* is not an effective query. Questions invariably contain superfluous words that probably won't appear in the text of the documents you are searching for (such as the word *many*). Thus, a large number of useful documents will have been eliminated.

4. Exact Phrases

If you're looking for a phrase rather than a collection of words interspersed in the document, put quotes around your search query. Enclosing a query in quotes ensures that Google will match those words only if they occur within an exact phrase. Otherwise, Google will return pages where the words appear in any order, anywhere on the page. For example, a *market research* query returns many more (but less useful) results than “*market research*” would.

You can include multiple phrases in the same query, such as “*market research*” *consultants* “*new jersey*”; such a query would match on documents that contain the word *consultants* in front of or behind the phrase *market research*, but giving preference to pages where *consultants* appears after *market research*.

Be careful not to create queries that should not be phrases. In the example of “*market research*” *consultants* “*new jersey*” you might be tempted to simply put one set of quotes around the whole set of words (like so: “*market research consultants new jersey*”). Such a search would return a nearly empty results set, however, because it's not a likely order of words used in natural language.

A shortcut alternative to placing quotes around a phrase is to place a period (without spaces) between each word in the phrase. So, *market.research.consultants* and “*market research consultants*” are equivalent queries to Google.

Sometimes, Google even returns some phrase search results in the middle of the results page, separated by a line and a notice that the following results are phrase search results. For example, search for *to be or not to be* and you'll see this in action.

5. Word Order

It's important to consider the order of the words you use in your search query, because although it doesn't affect the number of results—it does affect the relative rankings of those results. Priority would be given to pages where those words/phrases appear in the order given in your search query.

6. Singular Versus Plural

Consider whether the pages you seek are more likely to contain the singular form or the plural form of a given keyword, and then use that form in your search query. For example, a search for *car buyers females statistics* does not return nearly as good a set of results as *car buyers female statistics*.

7. Proximity

The proximity of keywords to each other is another factor that influences the positions of the search results. The closer the words that you have juxtaposed in your query, the higher they will rank.

8. Wildcard

The asterisk acts as a wildcard character and allows you to space out words from each other if you want Google to give preference to pages that space your keywords apart from each other by a particular number of words.

For example, if you wish to learn more about marketing your own books, you'd be better off with a search for *marketing * books* than *marketing books*, as the latter would return more results discussing books about marketing.

Asterisks can be used as a substitute only for an entire word—not for a part of a word.

The asterisk is even more helpful when used within an exact phrase search. For example, “*standards * marketing*” would match pages that match for the phrases *standards for marketing*, *standards in marketing*, as well as *standards and marketing*, to name a few.

Note that to Google the asterisk signifies one or more words, unless it is used within a phrase (i.e. within quotes), in which case it only represents a single word.

9. Number Range

Your Google search can span a numerical range; you indicate the range by using two dots between two numbers, which could be years, dollar amounts, or any other numerical value.

For example, a search for *confidential business plan 2001..2004* will find documents that mention 2001 or 2002 or 2003 or 2004. The query *confidential business plan \$2000000..\$5000000* will match documents that mention dollar figures anywhere in the range of \$2 million to \$5 million, even if commas are present in the numbers.

As a shortcut, you can leave off the low end of the number range and Google will assume 0, or the high end and Google will assume infinity. For example, *..12* will match on any number below or equal to twelve.

10. Punctuation

Other than these special characters (wildcard and range indicators), most punctuation gets ignored. An important exception is the hyphen. A search query of *on-site consulting* will be interpreted as *onsite consulting OR on-site consulting OR on site consulting*.

Another important exception is the apostrophe, which is matched exactly if contained within the word. So, *marketer's toolkit* will return different results from *marketers' toolkit*, but the latter will be equivalent to *marketers toolkit* (i.e., without the apostrophe).

11. Accents

Accents are yet another exception. A search for *internet cafés manhattan* will yield a different, and much smaller, set of results than *internet cafes manhattan*. So, for a search on *cafés*, more English-language documents would exclude the accent than include it; in that case, it would be advisable not to incorporate the accent into the search.

12. Boolean Logic

You may find that you want to match on both the singular and plural forms of a word. In that case, you can use the OR search operator, as in *“direct marketing consultant OR consultants”*. Note that the OR should be capitalized to distinguish it from *or* as a keyword.

You may be wondering... since there is an OR operator, whether perhaps there is an AND operator as well. Indeed there is. However, it is not necessary to specify it, because it is automatically implied. So don't bother with it.

Google also offers an exclusion operator, but it's not called NOT. It's the minus sign (-). It works as you might expect, eliminating from the search results the subsequent word or quote-encapsulated exact phrase. For example, *confidential “business plan” OR “marketing plan” -template* will not return pages in the results if they mention the word *template*, thus effectively eliminating the sample templates from the results and displaying a much higher percentage of actual business plans and marketing plans. (As

an example of a query with a phrase negated instead of a single word, consider *“marketing plan” -“business plan”*).

The AND and OR operators can be abbreviated as a plus sign (+) and the pipe symbol (|), respectively. Thus, the previous search query can be fed to Google as *confidential (“business plan” | “marketing plan”) -template*.

13. Stemming

Sometimes, Google automatically matches on variations of a word. This is called “stemming.” Google does this by matching words that are based on the same stem as the keyword entered as a search term.

So, for the query *electronics distributing market research*, Google will match pages that don't mention the word *distributing* but instead a variation on the stem *distribut*: e.g., the keywords *distributor, distributors and distribution*.

You can disable the automatic stemming of a word by preceding the word with a plus sign. For instance, *electronics +distributing market research* will not match on *distribution, distributors, distributor*, and so on.

14. Synonyms

You can expand your search beyond stemming to incorporate various synonyms too, using the tilde (~) operator. For instance, *market research data ~grocery* will also include pages in the results that mention *foods, shopping or supermarkets*, rather than *grocery*.

15. Query Length

Longer search queries are generally better than shorter queries. However, there is a limit. In the case of Google, that limit is 32 words. Any word after that is ignored.

It's highly unlikely you'd ever exceed this limit, unless you're specifying a bunch of sites to restrict your search to.

One thing Yahoo! has over Google is that Yahoo! has no query word limit. This is especially handy if you are restricting your results to a large group of sites, and the number in the group causes you to exceed Google's word limit (using the *site:* operator, covered in the next chapter). ■

Using Google as a Research Tool (Part 2 of 5)

by Stephan Spencer
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If you're like most of us, you use Google almost daily as a search tool. But Google is capable of so much more than simple search. You'd be surprised at what Google can do to make your work life more productive and easier on any number of levels.

In the first installment of this article series, you learned several ways to refine your Google searches. Here, in Part 2, I will take you through 21 time-saving search operators.

If you incorporate these shortcuts into a Google search session, you'll both save time and minimize frustration. Imagine how

much easier it would be to quickly locate a great marketing plan relevant to your industry if you knew how to specifically zero in just on Word documents that have the phrase "marketing plan" in the document title.

Read on to learn how to do this (and much more) with Google.

22 Time-Saving Search Operators

Google has various commands for the search box to restrict your results or to otherwise shortcut the process of accessing the information you want. Here's my Top 20 list, plus one more thrown in for good measure.

Operator	Format Example	Description
filetype:	marketing plan filetype:doc	Restrict search results by file type extension
site:	google site:sec.gov	Search within a site or domain
inurl:	inurl:marketing	Search for a word or phrase within the URL
allinurl:	allinurl: marketing plan	Search for multiple words within the URL
intitle:	intitle:"marketing plan"	Search for a word or phrase within the page title
allintitle:	allintitle: marketing plan	Search for multiple words within the page title
inanchor:	inanchor:"marketing plan"	Search for a word or phrase within anchor text
allinanchor:	allinanchor: marketing plan	Search for multiple words within anchor text
date:	marketing plan date:3	Restrict search results to pages added/updated in last X months. X can be 3, 6, or 12."
related:	related:www.abc.com/abc.html	Display pages of similar content
info:	info:www.abc.com/abc.html	Display info about a page
link:	link:www.abc.com/abc.html	Display pages that link to the specified page
cache:	cache:www.abc.com/abc.html	Display Google's cached version of a page
define:	define:viral marketing	Define a word or phrase
stocks:	stocks:aapl	Display stock quote and financial info for a specified ticker symbol
phonebook:	phonebook: some company, anywhere, wi	Display a phone directory listing
rphonebook:	rphonebook: john smith, anywhere, wi	Display a residential phone directory listing
bphonebook:	bphonebook: some company, anywhere, wi	Display a business phone directory listing
{area code}	212	Display location and map of an area code
{street address}	123 main, chicago, il chicago, il chicago, etc.	Display a street map for a specified location
{mathematical expression}	35 * 40 * 52 520 miles in kilometers, etc.	Do a calculation or measurement conversion

1. filetype:

You can restrict your search to Word documents, to Excel documents, to PDF files, or to PowerPoint files by adding *filetype: doc*, *filetype:xls*, *filetype:pdf*, or *filetype:ppt*, respectively, to your search query.

Want a great PowerPoint presentation on email marketing that you can repurpose for a meeting? Simply query Google for *email marketing filetype:ppt*. Need a marketing plan template? Since the template would most likely be a Word document, cut through the Web page clutter with a search of *marketing plan template filetype: doc*. (Side note: Don't link to your own marketing plans if you don't want them showing up in Google's index.)

In fact, Google allows any extension to be entered in conjunction with the *filetype:* operator, including htm, txt, php, asp, jsp, swf, etc. Google then matches on your desired extension after the filename in the URL. Note that there is no space after the colon when using this operator.

2. site:

You can search within a site or a domain by adding the *site:* operator followed by a site's domain name to your query. For example, you could search for *email marketing* but restrict your search to only pages within the MarketingProfs site with a query of *email marketing site:www.marketingprofs.com*.

You can also add a subdirectory to the end of the domain in a *site:* query. For example *email marketing site:www.marketingprofs.com/tls*

To conduct a comprehensive search of all of the associated subdomains of a domain, omit the *www* and instead specify only the main domain. For example, a search for *site:yahoo.com* would encompass not just *www.yahoo.com*, but also *movies.yahoo.com*, *launch.yahoo.com*, *personals.yahoo.com*, etc., The *site:* search operator works even when just the domain extension (like *.com*, *.org*, *.gov*, or *.co.uk*) is specified. Thus, you can restrict your search to *.com* sites with *site:com*, to *.gov* sites with *site:gov*, or to *.co.uk* with *site:co.uk*.

Combining Boolean logic (which was discussed in part 1 of this article series) with the *site:* operator will allow you to search within multiple sites simultaneously. For instance, *email marketing (site:marketingprofs.com | site:marketingsherpa.com | site:marketingpower.com)* searches the three sites simultaneously. The *site:* operator can be specified by itself without other search words to get a list of all pages indexed, such as *site:www.marketingprofs.com*. Again, note that there is no space after the colon when using this operator.

Use this approach to simultaneously search competitor sites for keywords of particular relevance (e.g., related products you want to monitor). Then either create a bookmark to easily monitor the index or create a Google Alert (to be explored later in this article series) to receive an email any time the index changes.

3. inurl:

Use the *inurl:* operator to restrict the search results to pages that contain a particular word in the Web address.

This can be especially useful if you want Google to display all the pages it has found within a particular directory on a particular site, such as *inurl:downloads site:www.bigfootinteractive.com* or all the pages with a particular script name, such as *inurl:ToolPage site:www.vfinance.com*. Again, there is no space after the colon when using this operator.

4. allinurl:

This operator is similar in function to the *inurl:* operator but is used for finding multiple words in the Web address. It eliminates the need to keep repeating *inurl:* in front of every word you want to search for in the URL.

For instance, *allinurl: china exporting* is an equivalent and more concise form of the query *inurl:china inurl:exporting* to find Web pages that contain the words *china* and *exporting* anywhere in the URL, including the filename, directory names, extension, or domain. There *IS* a space after the colon when using the *allinurl:* operator.

5. intitle:

Use the *intitle:* operator (such as *intitle:marketing*) to look for documents where your specified word or phrase matches in the page title (the hyperlinked text in the Google search result, which also appears in your browser's topmost bar, which is usually blue).

If you want to find Microsoft Word documents in which the document title (located within Properties under the File menu in Word) includes the phrase *marketing plan*, you would use the query *intitle:"marketing plan" filetype:doc*. Follow the *intitle:* operator with a word or a phrase in quotes, without a space after the colon.

6. allintitle:

This works like *intitle:* but searches for multiple words in the title. For instance, use *allintitle: channel conflict online retail* to search for documents that contain all four of those words in the title. Note that there is a space after the colon when using this operator.

7. inanchor:

The *inanchor:* operator will restrict your search to pages where the underlined text of inbound links matches your search word. For example, if you wanted to search for *merchandising* but confine your search primarily to home pages, *merchandising inanchor: home* would do the trick, since most sites link to their own home pages using the link text of “Home.”

Follow the *inanchor:* operator with a word or a phrase in quotes, without a space after the colon.

8. allinanchor:

This works like *inanchor:* but searches for multiple words in the link text. For example, the query *web metrics allinanchor: download trial* would invoke a search for pages relating to web metrics that have the words *download* and *trial* in the link text.

Note that there is a space after the colon when using this operator.

9. date:

The *date:* operator restricts the search results to pages added or updated within a specified number of months. Only certain numbers are allowed with this operator, namely: 3, 6 or 12. Supply that number of months after the operator as follows: *marketing plan date:3*.

11. related:

related: queries show pages that are similar to the specified Web page. Follow this operator with a Web address, such as *related: www.marketingprofs.com*, and you would find Web pages that are related to the MarketingProfs home page.

12. info:

An *info:* query lets you know whether the specified page is known by Google, and it provides the title and a snippet (if available), a link to the page, a link to a cached version of the page (see below for an explanation of this), and a link to view pages that link to the specified page.

Supply a Web address after this operator, such as *info: www.marketingprofs.com*.

13. link:

The *link:* operator displays a list of pages that link to the specified Web page. Follow this operator with a Web address, such as *link:www.marketingprofs.com* to find pages that link to the

MarketingProfs home page. Note that Yahoo! offers a superior tool with the *linkdomain:* operator, which works similarly to Google’s *link:* operator, except it shows pages that link to any and all pages of the specified site. Furthermore, Yahoo!, unlike Google, allows you to append further refinements onto this operator such as excluding links within the same site (for example: *linkdomain: www.marketingprofs.com -site:www.marketingprofs.com*)

14. cache:

The *cache:* operator provides a snapshot view of a Web page as it looked when Googlebot last visited the page. Follow this operator with a Web address, such as *cache:www.marketingprofs.com* to view the page that Google has cached. Note that Googlebot must have downloaded the page in order for this to work. We’ll discuss Google’s cache more in part 3.

15. define:

This is a useful operator for quickly obtaining several definitions from various online glossaries. Curious about the definition of “tipping point”? Simply type in *define: tipping point* into Google.

16. stocks:

Wondering how your competitor is performing on Wall Street? Enter this operator followed by a ticker symbol to retrieve financial information, including latest stock quotes from Yahoo! Finance.

17. phonebook:

Google offers an online phone directory look-up. Simply follow this operator with a name and location (full street address, or just city and state, or ZIP code), or a phone number for a reverse number look-up.

18. rphonebook:

If you specifically want to query Google’s residential phone directory, *rphonebook:* is the operator for you.

19. bphonebook:

Use the *bphonebook:* search operator to search the business phone directory.

20. {area code}

Google also offers an area code look-up. For example, enter 313 and Google returns the geographic location and map corresponding to that area code.

21. {street address}

Queries in the format of a street address automatically return street maps. Follow this operator with a full street address, or a ZIP code, or a city and state. For example, *123 east main street, madison, wi* or *53703* or *madison, wi* are all valid map-based Google searches.

22. {mathematical expression}

Enter any valid mathematical expression, and Google's calculator function will interpret it for you. It will even do measurement conversions for you, such as *8 ounces in cups*. Learn more about what other syntax is valid at the Google calculator page at <http://www.google.com/help/calculator.html>

As you now know, in addition to combing through billions of documents the amazingly versatile Google can double as a calculator, measurement converter, phonebook, dictionary, street map atlas and stock ticker.

As the spokespersons on the infomercials say, "But, wait, there's more!"

Enter a valid package tracking ID into Google and you can also track packages. Or, supply an airline and flight number to Google, and it will return flight times. Google will even return information about a car's history if you query it with the VIN (vehicle information number).

In fact, Google will spit back all sorts of interesting information when it recognizes a particular number format, such as a patent number, FAA airplane registration number, UPC Codes or FCC Equipment ID. ■

Using Google as a Research Tool (Part 3 of 5)

by Stephan Spencer
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Now that you are intimate with the range of Google operators to refine your research searches, it's time to put the knowledge into practice in the real world. It's also a good time to delve a little deeper into the essential features of the Google interface.

Here, in part three, we'll apply the secrets of Google in a search for information about the food industry. Then, I'll share the 20 essential features of the Google user interface—the virtual place where you spend most of your time interacting with Google—and apply those to our search example as well.

A Search for Market Research in the Food Industry

Let's imagine that your task is to find market research on the food industry. Specifically, you are looking for details on frozen vegetable consumption within the US—including consumer demographics, the size of the market in dollars, and so on. You are writing a business plan for the potential launch of a line of frozen organic peas.

Do you try a search on *market research* to start your quest? No, that's far too generic a query. *Market research food industry* is closer, but still there's a lot of noise in the search results to sift through.

A search for *market research frozen vegetables* would be better still, but not as laser-focused as could be. Let's try it regardless, just for fun.

That search yields, first off, a page from [marketresearch.com](#) listing research reports, and the last one listed is called "Food Markets in Review: Frozen Vegetables," published this year. Sounds promising!

But after clicking through, we find that the report costs \$195. I forgot to mention that your budget is \$5. Thus, buying this report is out of the question.

So let's do a quick check to see if a PDF of the report is floating around somewhere on the Net free for us to download. No such luck: a search for the title "*food markets in review: frozen vegetables*" *filetype:pdf* only yields an excerpt of the report: the three-page Table of Contents.

Let's further narrow our search by wrapping the phrases in quotes—"market research" and "frozen vegetables"—and by restricting matches to PDF documents, since those are likely to offer meaty reports with lots of factual information.

So our new search becomes "*market research*" "*frozen vegetables*" *filetype:pdf*, and we hit pay dirt: search result no. 5 is a 15-page report called "The Demand for Organic Agriculture: A Study of the Frozen Pea Market."

Once we examine the document, however, we find it a bit dated. It refers primarily to data from the 1990s. So we can further refine the search to include mentions of at least 2002 or 2003 or 2004, which could be done as follows: "*market research*" "*frozen vegetables*" *filetype:pdf* 2002..2004.

Unfortunately, many of the top search results returned are from other countries, such as France and China, whereas we're only concerned with the US. Because the US can be referred to in so many ways, we could append to our query these different forms as a group of OR statements at the end. Thus, the query would look like "*market research*" "*frozen vegetables*" *filetype:pdf* 2002..2004 *u.s.* | *u.s.a.* | *usa* | *united states* | *america*.

Note that I didn't include *us* as a search word in the list of US variations, since that would capture a lot of irrelevant results that include the word "us" (the objective case of "we").

However, I have a better idea. Rather than listing geographical names, we could include the names of two prominent competitors in the US market.

Thus, our search becomes "*market research*" "*frozen vegetables*" *filetype:pdf* 2002..2004 "*birds eye*" "*green giant*"—and we get a solitary result back. And, thankfully, it's a good one. It includes a chart and graph with annual sales figures by frozen vegetable/fruit manufacturer for 2001 through 2003 and projected for 2004 and 2005.

More Searching

Let's continue looking for stats but take a different tack entirely. We'll use the tilde operator to capture synonyms as well, because the documents we're looking for could be referring to frozen food, or frozen foods, or frozen meals, or frozen vegetables, or frozen peas, and so on.

Thus, a query of “frozen ~vegetables | ~food” “annual sales” 2002..2004 should do the trick. And it does! It yields a fantastic document in the top search result. That document delivers a range of statistics from the American Frozen Food Institute, including 2003 frozen vegetable sales broken down by type of vegetable; it also offers some interesting consumer information, such as this nugget: on an average trip to the supermarket, 94% of shoppers purchase frozen food sometimes, with 30% always buying frozen food.

Phew. Job well done, and it didn’t require sifting through hundreds of irrelevant search results.

We got some good results in this hypothetical exercise. Yet, right at our fingertips, there would have been more that we could have extracted had we utilized some of the functions built into the Google user interface. Maximizing what you get out of the Google search results requires that you master this range of functionality.

Let’s take a closer look, then we’ll wrap up by applying what we’ve learned about these functions to our hypothetical quest.

20 Features of the Google User Interface

It’s surprising how many useful features are tucked into such a simplistically elegant interface as Google’s. Making the most out of Google is as much about knowing the nuances of this interface as it is about mastering Google’s query operators.

- 1. I’m Feeling Lucky:** Takes you directly to the first search result
- 2. Images:** Takes you directly to a search results page of Google Images, featuring relevant photos and illustrations
- 3. Groups:** Takes you directly to a search results page of Google Groups, featuring relevant Usenet newsgroup posts
- 4. News:** Takes you directly to a search results page of Google News, featuring relevant news articles
- 5. Froogle:** Takes you directly to a search results page of Froogle, featuring relevant products from online catalogs
- 6. More Google services and tools:** Offers access to Google’s many other sites, such as Google Answers, Google Labs, Google Directory, etc.
- 7. Advanced Search:** In case you don’t remember all the search operators from Parts 1 and 2 and you want to do advanced searching
- 8. Preferences:** Change the number of search results displayed per page
- 9. SafeSearch filtering:** Turn this feature on from within the Preferences page

10. Spelling corrections: Google automatically suggests more popular/likely spellings

11. Cached: A previously archived version of the Web page listed in the Google search results

12. Indented results: Results from the same site are grouped together (two is the maximum displayed per page)

13. More Results: Additional matches from the same site

14. View as HTML: Text extract of a non-HTML document, viewable within your Web browser

15. Translate This Page: Machine translation of a foreign language document into English

16. Date: Displayed if the search result has been freshly indexed within the last day or two

17. Similar Pages: Documents that Google considers to be related to that document

18. Search Within Results: Your subsequent query will be applied only to the current set of search results

19. Search term definitions: Definitions of each word in your query, according to Dictionary.com

20. Sponsored links: Advertisers bid to be positioned here, and pay per click

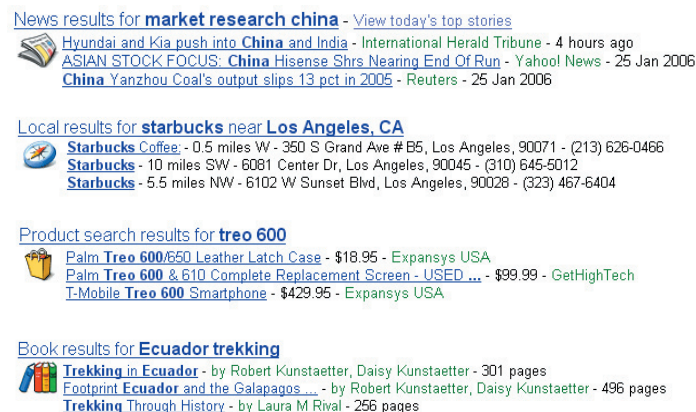
You’ve seen the Google home page many times before. But have you ever been properly introduced? Please allow me to do the honors. The numbers in the red circles correspond to the interface features listed in the table above.



And here’s the Google search results page, affectionately referred to as the “SERP” by those in the search industry. Once again, the numbers in the red circles correspond to the interface features in the table above.



Depending on what you searched for, sometimes you may also see results from Google News, Google Local, Froogle, or Google Print embedded within the Google search results page, such as in these examples:



Let's dissect the Google interface, element by element.

1. I'm Feeling Lucky

This is the button on the Google home page to bypass the Google search results page and jump straight to the first search result.

This is particularly useful if you are confident that the first search result will be the right one.

For example, a search for "toyota" will undoubtedly yield Toyota's home page as the first result; so, if that's where you want to go, you might as well use the I'm Feeling Lucky button.

2. Images

This link will take you to the Google Images search engine, which searches over 1 billion images on the Web, including photos, illustrations, buttons and clipart. Before clicking the link, type in your search query first to bypass the Google Images home page and jump right to the Google Images search results.

3. Groups

This link will take you to the Google Groups search engine, which searches over 1 billion Usenet newsgroup messages dating back to 1981. Usenet is a part of the Internet dedicated to online discussion, and these discussion groups/forums (known as newsgroups) number in the tens of thousands. Type in your search query before clicking the link in order to jump directly to the Google Groups search results.

4. News

This link will take you to the Google News search engine, which searches over 4,500 news sources worldwide, including newswires, magazines, newspapers and academic journals. The Google News archives are updated continuously and cover the previous 30 days.

Type in your search query before clicking the link in order to jump directly to the Google News search results. Sometimes, Google News results are embedded automatically in the main Google search results, depending on the search query used.

5. Froogle

This link will take you to the Froogle search engine, which searches online catalog Web sites that in Google's determination are offering products for sale. Type in your search query before clicking the link in order to jump directly to Froogle's search results. Sometimes, Froogle results are embedded automatically in the main Google search results, depending on the search query used.

6. More Google Services and Tools

This link will take you to Google's many other sites, such as Google Answers, Google Labs and Google Directory.

We will explore many of these sites in Part 4. Unlike the Images, Groups, News and Froogle links, this link does not take you directly to a search results page, nor does it carry over your search query.

7. Advanced Search Page

The Advanced Search page is a useful “crutch” if you don’t remember the search operators mentioned in Parts 1 and 2 and you want to refine your search. Searching within the title, URL, anchor, etc. are all supported. However, if you can recall the earlier-discussed search operators, it’s more efficient to use them from the main Google search box than to turn to Google’s Advanced Search screen.

8. Preferences

The Preferences page is the place to change the number of results displayed on search results pages. Or, if you just want to change the number displayed for a particular search, you can manually add `&num=` followed by any number from 1 to 100 (no spaces) at the end of the URL of any Google search results page. This will limit the results displayed per page to your specified number—for example, the 25 search results displayed for this query: www.google.com/search?q=marketing&num=25.

9. Safesearch Filtering

SafeSearch is Google’s filter; it eliminates offensive material from the search results. You can enable this feature on the Preferences page.

10. Spelling Corrections

Google automatically senses misspellings and offers corrections at the top of the search results. Simply click on Google’s suggested correction to re-execute your search using the correctly spelled word.

11. Cached

Did you get all excited about a Google result just to find it leads to a File Not Found error? Fret no longer. Simply click on the Cached link next to the search result you want, and Google will retrieve the version of the document it downloaded and stored the last time its spider visited the page.

The cached feature is also handy because it will highlight on the page the keywords that you were looking for. Google even specifies in the top right corner of the page when it retrieved that page. Note that sometimes, at the top of the cached page, Google will display “these words only appear in links to this page.” This happens because Google associates the underlined text of the hyperlink with the page that is being linked to.

12. Indented Results

Google displays no more than two results from the same site in a page of search results. When there are two from the same site, these two are grouped together, with the lower-ranked result indented and underneath the first result.

In effect, the indented result gets an artificial boost in its rankings (compared with where it would be placed based on relevance alone). So bear in mind that the indented result may not be as “spot on” as you might otherwise expect.

13. More Results

The More Results link appears under a search result when there are additional documents that match your query. Clicking on this link will conduct another Google search for your query, but the results will be exclusively from the one site.

This is equivalent to adding a *site:* operator to your query. Note that with More Results and the *site:* operator, the limit of two pages per site in a page of search results does not apply.

14. View as HTML

When a search result is a PDF file, Word document, PowerPoint file, or Excel document, you can click on View as HTML to preview it as text extracted from the document.

15. Translate This Page

The Translate This Page link only appears in the search results next to documents that are in a foreign language. Bear in mind that machine translation will give a very inexact English version of the document; it’s not always intelligible, but you can usually get the gist of what’s being said on the page.

16. Date

The date when the document was retrieved and indexed by Google is displayed next to the search result only if that document has been freshly indexed: i.e., within the last day or two.

17. Similar Pages

Follow this link to display documents that Google considers similar to the document in the search result by executing a “related” search on its URL using the *related:* query operator (as covered in part 2).

18. Search Within Results

Got too many search results, but you're sure what you're looking for is buried in there somewhere? Try specifying additional search terms and operators using Search Within Results near the bottom of the Google search results page.

For example, if you were to search on "*market research china*" and wanted to further tease out documents from those results relating to pharmaceutical imports, you could click on Search Within Results on the bottom of the results page and then specify *pharmaceutical imports* in the subsequent search box. Note that this is equivalent to simply appending the words *pharmaceutical imports* at the end of your original search query of "*market research china*"—in short, the more refined query of "*market research china pharmaceutical imports*."

19. Search-Term Definitions

Hop straight from the search results page to glossary definitions of each word in your search query from Dictionary.com by clicking on your hyperlinked search words in the top right.

20. Sponsored Links

Google advertisers bid against each other to be positioned here and are charged every time someone clicks on a link. The click-through rate in part determines which ads display at the top, in addition to the advertiser's maximum bid amount. The intention here is that the most relevant ads, according to Google's users, rise to the top over time.

Teasing Out More, Better Data

Let's now apply some of what we've learned about the Google interface to uncover even more material for our hypothetical research mission.

If you recall, we had found an excerpt of "Food Markets in Review: Frozen Vegetables." Now, by clicking on the Similar Pages link within that search result, we obtain a helpful list of relevant trade associations and press, such as the Food Marketing Institute, Grocery Manufacturers of America, American Frozen Food Institute, National Food Processors Association, and Prepared Foods magazine. That list could prove useful, so we'll make a note of those, but for the moment we'll put the list aside and continue our quest.

Remember that we didn't find the greatest of results with our *market research frozen vegetables* query. But perhaps we were too hasty in abandoning that search. Search results no. 4 and 5 didn't look like what we were after ("Frozen Vegetables in China" and

"Research and Markets—Frozen Food"), but the site where they came from, researchandmarkets.com, looked promising.

So, using Google's More Results function, we further probed that site and found "US Frozen Vegetable 2002—Research and Markets" as the sixth result, which turns out to be a very interesting report covering market size, market segmentation, market shares, distribution, socioeconomic data, and forecasts. Unfortunately, the price tag is \$240, a little steep for our \$5 budget.

We haven't looked through news stories yet, so let's give that a go. When we specify a query of competitor "*birds eye*" and click the News link, we find some articles about Birds Eye, but also a lot of noise—news stories containing the idiomatic expression "bird's eye view." So we'll employ the minus sign (-) operator to eliminate those results, with a query of "*birds eye*" -view. Google returns an article from the Rochester Business Journal titled "Birds Eye, HMO Promote Healthy Eating," an article relevant to our research.

Google News provides only the last 30 days of news stories. So let's use another method to locate additional relevant news stories. The query "*birds eye*" -view site:news.yahoo.com might yield some interesting results from Yahoo News. Not much there, so let's expand our search and try *vegetable consumption site:news.yahoo.com* instead. The first result, "USDA: Price No Reason to Avoid Produce," cites a USDA study with some interesting data for us. Luckily, the story is still available on Yahoo's site.

Some of the Yahoo News stories that I attempt to access take me to a Page Not Found error. Yahoo frequently removes old news stories to make room for new ones. Fret not, however, as another essential feature of Google—Cached pages—saves the day, showing me the page that Google had stored away in its database.

Hopefully, now you feel as if you've gained the knowledge required to get the most out of the Google site.

It's important you don't stop there, however! Coming up next in part 4 we'll cover the plethora of Google services and tools that exist outside of the main Google search site of www.google.com.

You may end up using some of them every day. Indeed, you may wonder how you ever lived without them. ■

Using Google as a Research Tool (Part 4 of 5)

by **Stephan Spencer**
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This series is all about surprises and revelations—at least when it comes to using Google. And here’s another: some of Google’s most valuable properties aren’t even search engines. Rather, they are resources or tools such as online research assistants, Web-based email, browser toolbars and social networks.

These resources can be extremely valuable to marketers and should be considered some of the sharper tools in your research arsenal. Profiled here, in part 4 of this series, are over 40 tools.

I’ve even thrown in several useful third-party sites that are Google-powered but not run by Google.

Stephan’s Picks: Top Recommended Google-Related Services

1. Google Desktop	Program installed on your PC that indexes your documents, emails and visited web pages. Search from your web browser.
2. Google toolbar	Google search integrated into your Internet Explorer or Firefox web browser
3. Google Pack	Free software for your Windows PC, including antivirus, anti-spyware, Google Desktop, and much more, all in one easy download
4. Google Alerts	Automated, free monitoring service of search results in Google and Google News for chosen keywords – a “clipping service” of sorts
5. Google Answers	Get expert Google searchers to do your digging for you, for a fee that you set
6. A9	Search Google and the full text of millions of print books—simultaneously
7. Google Print	Google’s effort to digitize the world’s printed information
8. Google Personalized Search	Orders your search results based on past search queries and the search results that you’ve previously clicked on
9. Jux2	Juxtapose and compare top 10 search results from Google and Yahoo or Ask Jeeves.
10. Google Suggest	Enhancement to the Google search box that suggests search terms to you based on your initial keystrokes
11. Soople	A third party interface to the Google search engine.
12. Google Ultimate Interface	Another third party interface to the Google search engine.
13. Google Sets	Create a set of items from a few specified examples
14. Google Scholar	Search through scholarly literature
15. Google News	Search and browse news sources worldwide, or within your country, by news source, relevance, or date.
16. Google browser buttons	Highlight words on a Web page and click a button in the bookmarks toolbar to conduct a Google search for the highlighted words
17. Google Images	Search for photos, clipart, logos, icons and illustrations
18. Google Groups	Browse, search, create, and post to Usenet newsgroups and to email discussion lists
19. Google Directory	A searchable directory of sites, editorially reviewed and organized by topic
20. Google Search by Country or Language	Search only those Web sites that are in a particular country
21. Google Local	Search geographically, confining the results to a specified location, and get search results back that are pinpointed on a street map or satellite map.
22. Google Uncle Sam	Search US government sites only
23. Google Video	Search thousands of video files, including TV shows and movies
24. Google Tech Support Search	Search for technical support info for Microsoft Windows, Apple Macintosh, Linux or BSD
25. Google’s University Search	Search Web sites of specific universities, such as Stanford or the University of Michigan.
26. Gmail	Free Web-based email with 1,000 megabytes of free email storage
27. Froogle	Comparison-shopping engine

28. Orkut	Google's by-invitation-only social networking site, where you can create a network of friends and then network with your friends' friends
29. Google Catalogs	Search and browse printed mail-order catalogs
30. Blogger	Create a blog for free and host it on Google servers at blogger.com
31. Google Search History	Remembers your past searches and learns over time, giving you improved search results
32. Google Blog Search	Not unlike Feedster or PubSub, allows you to search through an index of RSS feeds
33. Google Personalized Homepage	Customize Google's home page with your city's weather, your favorite team's scores, past search history, bookmarks, news headlines, and RSS feeds.
34. Google Reader	Subscribe to RSS feeds and follow them through this web-based aggregator
35. Google Q&A	Rather than returning search results, Google sometimes will answer your search query with a factual answer. Built into Google's main search engine.
36. Google SMS	Search Google by sending your query as a text message through your cell phone and receive the results back as a text message
37. Google Mobile	Search Google from your web-enabled cell phone or PDA using a pared-down Google web interface designed specifically for mobile devices
38. Google Talk	Instant messaging software for your PC that supports text chat and voice. Plug in a headset into your PC and talk to your buddies for free over the Internet.
39. Google Base	Store all types of information, such as recipes, coupons, classifieds, or event reminders, and make it searchable from the Web
40. Google Web Accelerator	An application for your PC that makes web pages load faster
41. Google Earth	Software for your PC that allows you to view satellite photos of the earth from space and zoom in.
42. Picasa	Organize and share your digital photos with this free software that you install on your PC
43. Google Sponsored Links Search	Search just the sponsored links in Google's Adwords program

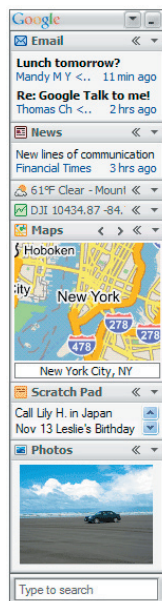
1 Google Desktop

If you are looking for a powerful search application to install on your PC that will search all your Outlook emails, Word documents, Excel spreadsheets, instant messages, previously viewed web pages, and more, then you need go no further than Google's new Desktop search tool.

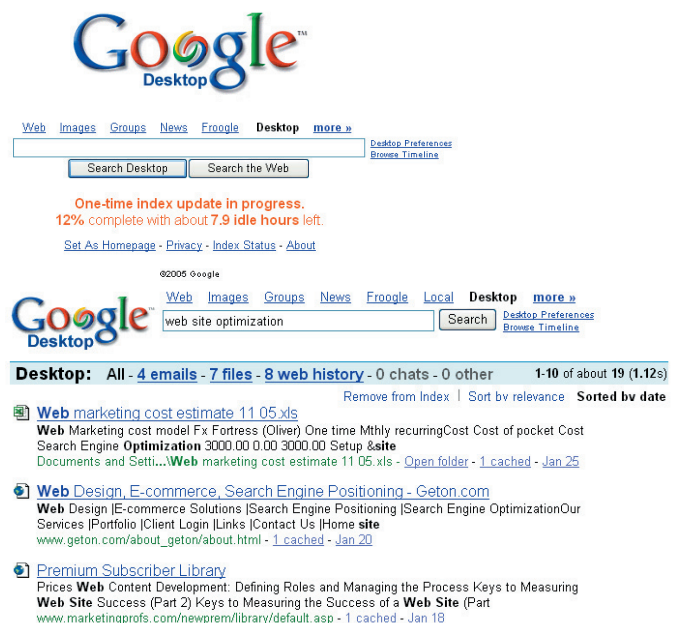
Google Desktop is available to download from <http://desktop.google.com>. It only works on a PC running Windows XP and Windows 2000 Service Pack 3 and above.

It is a simple, painless installation process. After installation, Google Desktop search begins indexing all the files on your hard drive. Quite cleverly, Google integrates Desktop search results along with web search results as you can see from the screenshot.

Google Desktop also comes with the Sidebar, a handy little widget that continuously displays on your desktop personalized information such as news headlines, RSS feeds,



sticky notes, weather, photos, real-time stock quotes, new email messages, maps, and frequently used files and a quick-find feature that lets you launch programs with a few keystrokes. An example Sidebar is depicted on the left.



2. Google Toolbar

With the Google Toolbar, you'll always have Google at hand, built into your Microsoft Internet Explorer or Firefox web browser. It's a simple process to install and is a small download, available from <http://toolbar.google.com>.

If you choose the option of "Install with Advanced Features" (which I recommend), then you'll be able to see the "PageRank" of any page that you visit. As you may recall, a high PageRank means that Google considers that page important. I tend to think of pages with higher PageRank scores as more trustworthy, although that's not always the case.

The toolbar will appear in the top part of your browser window, and it looks something like this:



This tool is well worth installing, as it eliminates the step of going to Google for every search—which, over time, is a real timesaver.

3. Google Pack

Available from <http://pack.google.com>, this handy set of applications for Windows XP includes not just Google Desktop, Google Earth, Picasa, and the Google Toolbar, but also the Ad-Aware antispyware utility and Norton Antivirus and a free 6-month subscription to protection updates.

4. Google Alerts

Google will email you the search results of your chosen keywords in Google and/or Google News when those results change. Be the first to know when your competitors get some press. Think of it as a "clipping service," except this one is free. I have it monitoring my own company name ("netconcepts"), plus a number of key competitors and types of products and services that we offer in the area of Internet marketing.

This tool is invaluable for researchers and is available at <http://www.google.com/alerts>.

5. Google Answers

Ever spin your wheels for many minutes searching for something online that you know must be out there somewhere on the Net? Wouldn't it be nice to just throw your hands up in the air and instead have someone find it for you?

Now you can, with Google Answers. There's a fee involved, of course, but you set that fee and it can be as little as \$2.50. So next time you might prefer to save yourself some frustration and instead whip out your pocketbook. Google has vetted the group of researchers who staff Google Answers.

The process is as follows: go to <http://answers.google.com>, and register on the site if you haven't already done so. Then, post your question, along with the price you're willing to pay; supply your credit card details; and wait to hear back from a researcher. The more you offer to pay, the more likely your question will get answered and the quicker the turnaround.

6. A9

A9, at <http://a9.com>, is a new search engine owned by Amazon.com. It offers Google search results for its Web page matches and, in addition, an optional concurrent search through the full text of Amazon's extensive library of digitized books. Thus, it's a tool for simultaneously mining for information both online and offline.

Turn on the book text search by clicking on the "Open Book Results" tab on the right-hand side of the search results.

A closer look at A9 shows some real innovations in personalization integrated with search. For one, A9 remembers your past searches and displays the latest ones on the home page. In addition, A9 search results that you click on are annotated with how long ago you visited a particular URL (for example, "clicked 3 hours ago").

Furthermore, the A9 toolbar maintains visited-page history. (Note that you must be logged in with your Amazon.com login to access of all A9's personalization features.)

Other features of note: each search result has "Site Info" with quick access to Alexa data (which includes traffic history, sites that were also visited by those who visited the site in question, and other metadata).

This one was a surprise: the toolbar can be used to annotate Web pages as you visit them. Your notes are immediately and automatically saved, and they're available from any other computer simply by logging in to A9 and having the A9 toolbar installed. A9 has made a handy list of its search engine's and toolbar's most compelling features at <http://a9.com/-/company/whatsCool.jsp>.

Consider installing A9's toolbar and using A9 as your default search engine for a while to get a glimpse of A9's potential. And if it personalizes search rankings for users, as I imagine they will, things could get very interesting. I think A9 is one to watch.

7. Google Print

Google Print is a massive initiative from Google to digitize a lot of the world's printed information. To use Google Print, just do an ordinary Google search. When Google finds digitized books with relevant content, those books will be listed in a "Book results" section near the top of the search results page. By clicking on the book title you can view the page of the book that contains your search terms, as well as other information about the book. You can also display up to two pages before and after the page of the book. Try a search for *books about Ecuador trekking* to see Google Print in action.

Books have already been submitted by more than a dozen publishers, including Penguin, Wiley, Hyperion, Pearson, Taylor & Francis, Cambridge, Chicago, Oxford, Princeton, and Scholastic.

For now, only English language books will be indexed with other languages added later.

Google Print marks a monumental shift for Google from being an indexer of the world's knowledge web to a builder of it as well, as noted recently by industry pundit John Battelle.

You can learn more about the Google Print program at <http://print.google.com>.

8. Google Personalized Search

Get personalized search results using Google Personalized Search at <http://www.google.com/psearch>. With it, your search results are ordered based on what you've searched for in the past. You can also browse and search over your past searches, including the web pages, images, and news headlines you've clicked on.

9. Jux2

Discover what's in Yahoo! or Ask Jeeves, but not in Google. Jux2, at <http://www.jux2.com>, is a meta-search engine that displays the top ten results across your two chosen search engines, highlighting the overlap between the two result sets. Jux2 even offers a free toolbar for the Firefox browser. Jux2 was sold on Ebay in 2005 by its original developers for over \$100,000.

10. Google Suggest

Google Suggest, available at <http://google.com/webhp?complete=1>, is a clever enhancement to Google's search box. It very effectively second-guesses what you are searching for before you finish typing in your search phrase and fills in the rest of the search term for you. In other words, just start typing and, with each keystroke, Google starts suggesting search keywords.

For example, if you type "buy c", Google Suggest lists search terms in what appears to be in order of search popularity, such as *buy cds*, *buy car*, *buy cars*, *buy cd*, *buy computer*, etc. Along with each suggested search term, Google Suggest displays the number of results for that term. A very elegantly built tool that works fast and seamlessly. Google Suggest functionality is also available via a toolbar extension for the Firefox web browser, available for download from <http://toolbar.google.com/firefox/extensions/suggest>



The screenshot shows the Google Suggest BETA interface. At the top is the Google logo with "Suggest BETA" below it. Below the logo are navigation links: Web, Images, Groups^{New!}, News, Froogle, and more ». To the right of these links are links for Advanced Search, Preferences, and Language Tools. The main search area shows "buy cds" entered in the search box. Below the search box is a table of suggestions:

As you type	Results
buy cds	13,700,000 results
buy car	32,600,000 results
buy cars	24,200,000 results
buy cd	29,400,000 results
buy computer	29,500,000 results
buy cds online	5,730,000 results
buy cars online	15,000,000 results
buy computers	24,200,000 results
buy cialis	2,320,000 results
buy cell phones	16,700,000 results

To the right of the table is a link for "learn more".

11. Soople

The clever interface at <http://www.soople.com> provides intuitive access to many of Google's more advanced features. You may prefer it over Google's home page. With Soople, you won't need to remember the query operators to create many of the most useful Google searches.

12. Google Ultimate Interface

Another alternate Google search interface is provided by Fagan Finder, at <http://www.faganfinder.com/google.html>. I quite like this one, too. Whether you opt to use this one over Soople is a personal preference; definitely give both a try.

13. Google Sets

Have Google complete a set for you based on a few examples. For example, supply a few industry leader competitors and see how well Google Sets predicts other competitors to go in the set. Available at <http://labs.google.com/sets>

14. Google Scholar

Google Scholar, available at <http://scholar.google.com>, allows one to search through scholarly literature including articles from peer reviewed academic journals. Google has worked with publishers to gain access to subscription-only content that wouldn't ordinarily be accessible to search spiders. Although the full content of the article may only be available to subscribers of that journal, Google requires that the publishers provide at least abstracts to Google Scholar searchers.

Search results displayed in Google Scholar each have a "cited by" link which, when clicked on, will show you all the citations to that document in the scholarly literature that Google Scholar knows about.

15. Google News

As you may recall, we learned how to search Google News in part 3. I have only a couple of things I would like to add to what I covered there. First, you should get to know the Advanced Search page on Google News at http://news.google.com/advanced_news_search. It's a helpful tool to narrow a search by location, by news source, by date range, and so on.

Second, if you consider yourself a news junkie, you may want to make the Google News home page, at <http://news.google.com>, or the Google News business page, at <http://news.google.com/news/en/us/business.html>, your "start page" that opens up when you start your Web browser. It's a great way to keep up with current events.

16. Google Browser Buttons

Another time-saving device is browser buttons that install into your bookmarks toolbar. They allow you to highlight words on a Web page, and with the click of a button you're taken to a Google search results page for the highlighted words. This works across a range of Web browsers. Download the browser buttons from <http://www.google.com/options/buttons.html>.

17. Google Images

Again, this tool was already discussed in the previous chapter, but I'll just bring your attention to one additional thing: the Advanced Image Search page at http://images.google.com/advanced_image_search, which allows you to refine your search by size, coloration, file type and more.

18. Google Groups

Google Groups, at <http://groups.google.com>, already discussed in part 3, underwent a major upgrade. The biggest enhancement over the original Google Groups is the ability to create, join and search email-based mailing lists, including restricted lists, whereas the original Google Groups was solely for Usenet newsgroups.

In addition, you have the ability to track and mark favorite topics using the "My Groups" feature.

If you want to get the "dirt" and hear what people are saying in Usenet and email discussion forums about your company, a competitor, or an industry, Google Groups is a great resource.

19. Google Directory

Google Directory, at <http://directory.google.com>, is a topically organized directory of Web sites, all of which are reviewed by editors of the Open Directory Project. You can search within a Google directory category. If you want to search within both the Google Directory and Yahoo's directory simultaneously, append *site:directory.google.com | site:www.yahoo.com* after your search keywords on Google.com.

20. Google Search by Country or Language

Google allows you to search solely within those Web sites that are located in a specific country or written in a specific language. Google also offers search sites at each of the major country domains (Google France, Google Germany, Google UK, Google Australia, Google Canada, etc.).

Each Google country site has a radio button to restrict search results to pages within that country, in which case the site must be hosted within that country or have that country's domain extension. A comprehensive list is available at http://www.google.com/language_tools.

21. Google Local

This is a great tool if you need to find local businesses or services in the US, Canada, and some select cities abroad, or if you want to geographically explore a region. It's especially handy when you're hunting out restaurants within spitting distance. Search using location names such as *toronto*, addresses such as *931 e. main st, madison, wi*, type of business such as *pizza*, or a combination of the above such as *hotels near lax*. And you can get driving directions, *lax to 92780* for instance. Even conduct keyword searches that are restricted to the map region displayed on your screen. Google returns phone-book listings with associated Web pages on the left and, on the right, the top results are all pinpointed on the map. Apparently, Google has already put their acquisition of Keyhole to good use, as the map interface allows you to toggle between street maps, satellite images, and hybrid views of both. And you can smoothly pan around and zoom without the slow reloading of pages that you get with other mapping services like MapQuest. A very cool service, it's available at <http://local.google.com>.

22. Google Uncle Sam

Search within US government sites at <http://www.google.com/unclesam>.

23. Google Video

This specialized search engine, at <http://video.google.com>, puts thousands of video files at your fingertips, including TV shows, movies, music videos, documentaries, video blogs, training videos, and much more. Some videos require payment to watch. Submit your own videos for free at <https://upload.video.google.com>

24. Google Tech Support Search

Google has four specialized search engines for finding technical support information for your operating system (Windows, Mac, Linux, BSD):

Microsoft-related Web sites at <http://www.google.com/microsoft.html>

Apple Macintosh-related Web sites at <http://www.google.com/mac.html>

Linux-related Web sites at <http://www.google.com/linux>

BSD Unix-related Web sites at <http://www.google.com/bsd>

25. Google University Search

Search all the Web sites associated with a specific university. Choose from hundreds of them at <http://www.google.com/>

[options/universities.html](http://www.google.com/options/universities.html).

26. Gmail

Gmail, at <http://gmail.google.com>, is Google's Hotmail-killer, Web-based email service, which promises over a gigabyte (that's 1000 megs!) of storage absolutely free.

27. Froogle

Already discussed in part 3.

28. Orkut

Orkut, at <http://www.orkut.com>, is Google's social networking site. It's like an exclusive club—you can't even get in without being invited. But once you are invited, you could be just a couple of degrees of separation away from hobnobbing with movers and shakers!

29. Google Catalogs

Search and browse through print catalogs (like the kinds you get in your mailbox). This would be relevant as a research tool mostly just for those in the catalog industry. For example, a market researcher at Lands' End could search for new products appearing exclusively in print catalogs of competitor apparel catalogers. This is the only source I know of for searching through the digitized copy of print catalogs. Available at <http://catalogs.google.com>.

30. Blogger

Web logs, or blogs for short, are the hot trend on the Internet, and the guys at Google weren't about to be left out. So Google Inc. acquired Pyra Labs, makers of Blogger.com, a site offering free blog hosting, templates and remote blogging software.

For those not familiar with blogs, everyone from high school kids to celebrities, journalists, and business people are doing it. They rant, rave, ponder, opine, and more—in usually thought-provoking, always opinionated, online journals/diaries. Available at <http://www.blogger.com>.

31. Google Search History

Wouldn't it be cool if your search engine got smarter the more you used it? That is what Google Search History hopes to achieve. By analyzing your past searches, it hopes to give more targeted and relevant results to you in the future. You can use this on multiple PCs. All you have to do is just be logged into your Google account on your computer and it will track your past searches, show you

what your searches were so you can conduct them again, and also show you what you clicked on in the past. Sign up at <http://www.google.com/searchhistory>

32. Google Blog Search

After giving small upstarts like Technorati, Feedster and PubSub lots of time to build RSS specific search engines, Google finally decided to enter the fray with their own offering: Google Blog Search. Available at <http://blogsearch.google.com>, it's actually misnamed, since it is a search engine of RSS feeds rather than blogs. More specifically, blogs without RSS feeds won't make it into Google Blog Search, but sites that aren't blogs but have RSS feeds are included. It's not known exactly how Google Blog Search discovers all the RSS feeds it has indexed in Google Blog Search; but at this time you cannot submit your RSS feed to be included. With the advanced search functionality in Google Blog Search, you can search by author, by date range, and by blog.

33. Google Personalized Homepage

Customize Google's home page with your city's weather, your favorite team's scores, latest messages from your Gmail inbox, past search history, saved bookmarks, late-breaking headlines across numerous news sources and RSS feeds, and more. Available at <http://www.google.com/ig>

34. Google Reader

Google has also been slow to enter the web-based RSS aggregator arena, but they have finally come out with Google Reader, available at <http://reader.google.com>, to compete with services such as My Yahoo, MyMSN and Bloglines. This tool is still a bit clunky but there are some very elegant attributes to it. It's well worth checking out, particularly if you prefer subscribing to RSS

feeds through a website, rather than an installed application on your PC.

35. Google Q&A

This isn't actually a separate service; it's built right into the Google search interface. Sometimes when you submit a query to Google, instead of returning the standard sort of search results, Google may provide you with a direct answer to your question, but also citing (and linking to) the source that it obtained the answer from. For example, either the query when was Einstein born? or an equivalent query of Einstein birthday will return the date of his birth rather than a set of search results. Here are some more example queries that return Google Q&A results: *population of USA*, *President of France*, *what is the birthplace of Bono?*, *when was Star Wars released?*, *who is the Prime Minister of England?*, *moon size*, *who shot Abraham Lincoln?*, *Pamela Anderson's measurements*, and *height of Kilimanjaro*.

36. Google SMS

On the go with just a SMS-capable cell phone in your pocket? No problem! Just conduct your search from your cell phone by sending Google your query as a SMS text message to the US shortcode 46645 (GOOGL on most phones). You'll then receive one or more text messages back with your results, usually within a minute. Results may be labeled as "1/3", "2/3", and so on. To get Google SMS help info sent directly to your phone, send the word 'help' as a text message to 46645. Or learn more at <http://sms.google.com>

37. Google Mobile

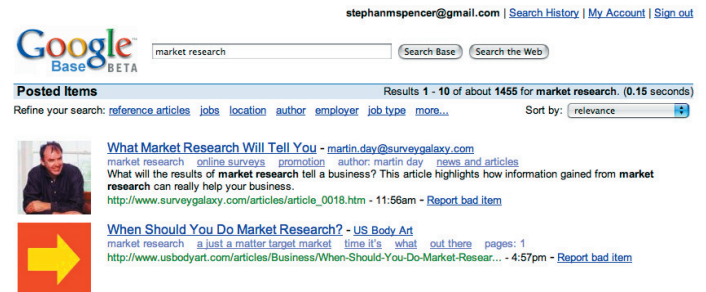
If you have a web-connected cell phone or PDA, you can search Google using a pared-down interface designed specifically for mobile devices. Just enter in www.google.com (or www.google.com/xhtml if you get an error) and you're on your way! Learn more at <http://www.google.com/mobile/>

38. Google Talk

Many of us have used instant messaging software such as ICQ, AOL Instant Messenger, MSN Messenger or Yahoo Messenger. Now Google has come out with its own messenger client, dubbed Google Talk. It supports not just text message chat, but also voice over the Internet (like Skype and Apple's iChat). In other words, you can converse for free with any other Google Talk user by using a headset or microphone. Download Google Talk from <http://talk.google.com>

39. Google Base

Google Base is a repository for all types of information - anything you can think of that you would like Google to host for you and



make searchable. It could be recipes, coupons, reviews, to do's, events, classified ads, inventories, and much more. Perhaps this is Google's rendition of craigslist.com? Sign up requires a Google account. Access the service at <http://base.google.com>

40. Google Web Accelerator

Ever feel like web pages just seem to crawl, even though you have a high speed Internet connection? Well Google has the answer for you: a software application called Google Web Accelerator that you install on your PC that makes web pages load faster. It relies on Google's network of proxy servers which download and cache frequently requested web pages so that they are instantly available. Google Web Accelerator also helps with web browsing by pre-fetching certain pages on to your computer in advance, by compressing the data before sending it to you, and by downloading only the updated part of a page if a web page has changed since you last viewed it. A free download from <http://webaccelerator.google.com>

41. Google Earth

This software that installs on your PC allows you to see satellite views of anywhere on the Earth from space, along with street maps (available for all of the US and many other cities abroad) overlaid with optional views. Point and click, and satellite images and local facts zoom into view. You can tilt and rotate the view to check out the terrain and buildings. Obtain driving directions and "fly" along your route. You can zoom in from space right into your neighborhood. A very cool piece of software which came from Google's acquisition of Keyhole Corporation. Available for download at <http://earth.google.com>

42. Picasa

Another one of Google's acquisitions, Picasa was a digital photo management company. Google offers the full-featured Picasa

digital photo management software as a free download, at <http://picasa.google.com>. The software allows you to easily organize and share your digital photographs, write captions for your pics, order prints, apply color corrections and other photo effects, and even make gift CDs for friends and family.

43. Google Sponsored Links Search

By going to <http://www.google.com/sponsoredlinks> you can do a search just within the “Sponsored Links” that advertisers purchase from Google through the Google’s AdWords program.

Google Tools Applied to Our Food Industry Example

It’s time to resurrect our hypothetical research task from part 3, where we aimed to find market research relating to the frozen food industry, specifically frozen vegetables.

How might the above-mentioned tools help us gain the information we seek? Consider these steps:

1. Let’s start with Amazon’s A9. A competitor search for “*birds eye*” -view vegetables “*green giant*” returns an intriguing #2 result in the book results—a book called *Food Fight: The Inside Story of the Food Industry, America’s Obesity Crisis, and What We Can Do About It*.
2. With Google Personalized Search enabled, I search for *birds eye* -view; several interesting news releases rise to the top—nothing particularly recent, though.
3. With Google Groups, I search for *organic frozen vegetables* and the third search result yields an interesting debate among consumers on the pros and cons of frozen vegetables.
4. A search on Google Uncle Sam for *frozen vegetables* turns up the USDA’s quality standards for frozen vegetables as the second result—another useful piece of data.
5. Out of curiosity, I check Google Catalogs for *frozen vegetables u.s.* and discover a market research report for sale called “The U.S. Market for Frozen Quick Meal Solutions.” Unfortunately, although the report appears to have the sort of data I’m looking for, it’s a couple years older than I would like and a bit too expensive.
6. Now on to the Google Directory, where I try a search for *organic frozen vegetables* and find in the search results a relevant category of “Business > Food and Related Products > Produce > Organic.” I click on the category link and discover the no. 1 ranked site in that category is the Organic Consumers Association, an organization I was not aware of—and a likely source for market research on consumer perceptions about organic versus non-organic produce.

7. And to finish off my whirlwind tour of Google tools and resources for this market research quest, I head over to Google Answers and post our hypothetical research task from part three. Then I wait. After 24 hours, I have yet to receive a single answer or comment to my \$5 question. Hopefully, I will have something more substantial to report back for our final installment. Read on to part 5 to hear my verdict on the viability of delegating market research to Google Answers’ researchers.

10 Steps to a More Efficient Desktop

Organization consultants usually start at their client’s desk. I advise, however, to start with your PC’s desktop. Arrange your virtual office environment for maximum productivity in online researching, as follows:

1. Install the Google Pack and Google Web Accelerator. If not on the latest version of Windows, at least install the Google Toolbar (with advanced features).
2. Sign up for Google Reader and select some of your favorite blogs and news sites to subscribe to their RSS feeds. Be sure to include the feeds of ResearchBuzz.com, TheShiftedLibrarian.com, Google Blogscoped (<http://blog.outter-court.com>), the Official Google Blog (<http://googleblog.blogspot.com>), StephanSpencer.com, and MarketingProfs.com!
3. Load up your key competitors names, your company and brand names, etc. into Google Web Alerts and News Alerts.
4. Set your browser start page to something more useful like the Google Personalized Homepage, Google Reader, Google News, A9, etc...
5. Buy a reference book on Google for your bookshelf, such as *Google: The Missing Manual*, or *How To Do Everything With Google*. And if you’re a techie, you’ll appreciate the excellent book *Google Hacks*, now in its second edition.
6. Register on Google Answers and post your first question, to start getting the hang of it.
7. Enable Google Search History to start getting personalized search results.
8. Create a cheat sheet of the query operators you most want to start using, print it and keep it near your PC.
9. For those of you on the Firefox Web browser, configure the browser’s search box to include in the dropdown list the various Google sites, such as Google Local, Google Personalized, Google Groups, Google Directory, etc.
10. Take the free Google tutorial at GoogleGuide.com.

Using Google as a Research Tool (Part 5 of 5)

by Stephan Spencer
2006

Seek and ye shall find. But not always. According to an IDC (International Data Corporation) report, knowledge workers spend 15-30% of their day searching for information. What's worse, more than half of their online searches fail.

That doesn't bode well for us, does it? Hopefully, this series has gone a long way to help you make the invisibly rich Internet more visible. We close this series by tapping into the wisdom and experience of two renowned Google experts—Nancy Blachman and Tara Calishain—who share some of their favorite tips, tools, insights, and search strategies for researching with Google.

Nancy Blachman is coauthor of *How To Do Everything With Google* (McGraw Hill 2003) and publishes the *Google Guide* e-book and Web site (www.googleguide.com). Tara Calishain is author of the *Web Search Garage* (Prentice Hall 2004), coauthor of *Google Hacks*, 2nd ed. (O'Reilly 2004), and publishes the ResearchBuzz Web site (www.researchbuzz.com).

You will learn a lot from these two experts. But perhaps the biggest revelation will be what an amazing research tool Google Answers is. First, we'll talk about where Google Answers fits into the marketer's toolkit.

"Google Answers": Your New Secret Weapon

I introduced you to Google Answers (<http://answers.google.com>) in part 4. You may recall that, I had not received any immediate responses to my request for market research data for the frozen vegetables market.

However, nearly a week later, I received a bounty of market research information. It was after I appended a clarification to my question, that I suddenly attracted some attention.

In that clarification, I asked whether the \$5 fee I had set was too low. Indeed it was for such a research-intensive question, according to the Google Answers researcher codenamed "perfectanswers." Nonetheless, perfectanswers proceeded to address the questions posed, and did it as a comment rather than an answer, which means this person did not receive any compensation for his/her work on my task. (View the extensive response from perfectanswers at <http://answers.google.com/answers/threadview?id=389841>.)

Google Answers researchers are compensated by the person posing the question with a modest amount of cash, usually in just

single or double digits. But sometimes a question will carry a compensation tag of \$100 or \$200.

If the response does not meet your standards, you can seek recourse with Google. With such a system in place, Google Answers researchers know better than to submit an answer that is incomplete or unverifiable. If the researcher isn't confident that her response will pass muster, she will post the response as a comment rather than an answer.

If the answer to your question passes muster but you'd like another response, just repost your question. You will of course have to pay again. You can't control who answers your questions; whoever is interested in answering, does so.

Some of us here at MarketingProfs wonder how Google Answers compares with our own Know-How Exchange. And here's the answer: Google Answers is manned by professional researchers, whereas the Know-How Exchange is manned by professional marketers.

So if you are looking for a subjective opinion from an expert marketer, turn to the Know-How Exchange rather than Google Answers. If you are looking for other information, Google Answers is probably the place to turn.

Google Answers researchers probably won't know the answers to questions offhand, but they will know how to find information that may contain the answers you need. Know-How Exchange experts may know an answer to your marketing question (or at least have an opinion about it), but they are unlikely to be experts at finding information they don't know.

Q&A About "Answers"

Let's hear from Nancy about her experiences with Google Answers.

Stephan: *Do you recommend that marketers or market researchers use Google Answers, and if so, under what circumstances?*

Nancy: Yes, it's a wonderful service that doesn't get the attention or traffic it deserves. If you are doing research for a client, make sure that the client doesn't object to questions and answers being accessible through Google.

Stephan: *Have you used Google Answers before? If so, please rate and describe your experience.*

Nancy: Yes, I was reluctant to use Google Answers at first. I thought that I could find the information I wanted if I searched a bit longer. Now that I've used the service, I'm a big fan of it. Not only does it save me time, the answers are packed with useful information and links. It's a wonderful service for getting information or opinions. I used it to get suggestions for how I could improve Google Guide.

Stephan: *Any tips to share on how to get the most out of Google Answers?*

Nancy: If you want to get a variety of answers, consider asking the same question more than once. A different researcher will answer it each time, so you may get a variety of answers. I did just that to get suggestions for how I could improve Google Guide. I posted my question four times and got three stupendous answers.

If you don't get an answer within a day or so, consider adjusting the amount that you're willing to spend. When you make such a change, your question gets treated as a newly posted question. The more you are willing to spend, the more likely a researcher will answer your question.

Choosing the Right Tool for the Job

Now let's look at the wider landscape of Google-related tools and services with Nancy and Tara.

Stephan: *For what sort of research tasks is a major search engine not well suited?*

Nancy: The UC Berkeley Library has a wonderful chart for suggesting when to use a search engine, subject directory, specialized database, or an expert. It's part of their "Finding Information on the Internet" tutorial, which can be found at www.lib.berkeley.edu/TeachingLib/Guides/Internet/Strategies.html.

Tara: Stuff like these interview questions! Mostly questions where you want to ask an expert several things, where you want to "pick someone's brain." Thankfully, the Internet can help you FIND the experts. If you have a situation where you need to explore only known and credible information, then you might want to use a paid search engine like LexNex or the friendly experts at your local library. You might be able to find what you need via a general search engine, but you'd have to use a subscription service to actually get to it.

Stephan: *For what sort of research tasks is Google not well suited, but another major search engine is? Which search engine(s) do you turn to in such occasions?*

Nancy: Good question. I just came across this page www.bcps.org/offices/lis/models/tips/searching.html that lists when to use which search engine. You can also find charts listing features of the most popular search engines: e.g., www.infopeople.org/search/chart.html.

Tara: Searchable Subject Indexes (Yahoo, DMOZ) are best for finding general topics—famous people, or topics you can't narrow down much. Search for *George Washington* in Yahoo and in Google and note the extreme differences in the kind of results you get.

Stephan: *What are your favorite Google query operators, and why?*

Nancy:

- *define:* Shows definitions from pages on the Web. For example, *define:blog* will show definitions for "Blog" (weB LOG).
 - *filetype:* Restrict the results to pages whose names end with the specified suffix. For example, *interviewing salary negotiation filetype:pdf* restricts results to pdf documents with tips on job interviewing and salary negotiation.
 - *allintitle:* Restrict results to those containing all the query terms you specify in the title. For example, find a link to the wonderful widely circulated well-written fantasy "commencement speech" purportedly given by Kurt Vonnegut at MIT. The imaginary speech began "Wear sunscreen" with the query *allintitle: wear sunscreen*.
 - *site:* Restrict your search results to the site or domain you specify. For example, find every page on a site that's included in Google's index. *site:www.googleguide.com*
 - *location:* Restrict your query on Google news to only articles from the location specified. For example, find news about John Kerry in one of the contested states *location:OH "John Kerry"*
- Tara:**
- *site:* Helps me narrow down search a lot.
 - *intitle:* You know a page is focused on a topic when the topic word is in the title.

Stephan: *Besides www.google.com, what are your favorite Google-owned Web sites, and why?*

Nancy:

- **Google Answers** (<http://answers.google.com>). I'm grateful to Google Answers researchers for their feedback and suggestions for improving Google Guide. Google Answers is a wonderful resource. I wish such a resource were available for hiring people to work in my house or on technical projects. I love that I can higher an expert without even knowing whom I'm hiring.
- **Google Sets** (<http://labs.google.com/sets>). Automatically create a set of items from a few examples. Enter a few items from a set of things. Google Sets will try to predict other items in the set. For example, if you enter *Golden Gate Bridge*, *Palace of Fine Arts*, and *Coit Tower*, Google Sets suggests other places worth visiting in San Francisco. I've used Google sets to find potential coauthors and to get suggestions for things to eat for breakfast. I like the idea of creating a query by example.

Tara: I like Google News (news.google.com); I use it a lot. It's got a great list of sources and now you can search by a date range.

Stephan: *What are your favorite third-party applications that are based on Google?*

Nancy:

- Google Alert (www.googlealert.com)
- GAPS (www.staggenation.com/cgi-bin/gaps.cgi)
- Google Ultimate Interface (www.faganfinder.com/google.html)
- Fagan Finder's Translation Wizard (www.faganfinder.com/translate/)
- FreshGoo.com (www.freshgoo.com)
- Fagan Finder's Search Tool
- Google Blaster (www.googleblaster.com)
- Soople (www.soople.com)
- Search result evaluation checklist (www.lib.berkeley.edu/TeachingLib/Guides/Internet/EvalForm.pdf)

A Market Research Scavenger Hunt

I enlisted our guru Nancy to formulate search queries on a hunt for market research information for two industries—bed & breakfasts and online car buying. The exercise was merely to gain an insight into her search term strategies.

Stephan: *What Google search query would you use if you were looking for a list of the most popular guidebooks of B&Bs in the United States?*

Nancy: "bed * breakfasts" OR "b&b" "U.S." OR "United States" OR USA

Stephan: *What search query would you use if you were looking for the number of bed and breakfasts in the United States?*

Nancy: This is the search suggested by a Google Answers researcher: "bed * breakfasts in u.s."

Stephan: *What search query would you use if you were looking for the amount of money that bed and breakfasts in the United States spend per year on marketing?*

Nancy: Again, I defer to the search strategy suggested by Google Answers, which is "bed * breakfasts in u.s."

Stephan: *What search query would you use if you were looking for the number of new cars purchased annually over the Internet in the United States?*

Nancy: new cars purchased Internet in the "United States" OR "US" OR USA

Stephan: *What search query would you use if you were looking for a list of the top few biggest sellers of new cars over the Internet by sales volume?*

Nancy: sales cars purchased over the internet
revenue cars purchased over the internet

Stephan: *What would your search query be if you were looking for a fairly comprehensive market research report for a business plan of a virtual dealership of new cars that supports online purchase? (paid reports are fine; it doesn't have to be free.)*

Nancy: market research cars purchased over the internet

The Path to Google Greatness

Stephan: *How does one assess the quality or credibility of the information produced by the search and various sources? Any practical tips beyond the obvious "buyer beware" type of advice?*

Nancy: Google's Web-page ranking system, PageRank, tends to give priority to better respected and trusted information. Well-respected sites link to other well-respected sites. This linking boosts the PageRank of high-quality sites. Consequently, more accurate pages are typically listed before sites that include unreliable and erroneous material. Nevertheless, evaluate carefully whatever you find on the Web since anyone can

- Create pages
- Exchange ideas
- Copy, falsify or omit information intentionally or accidentally

Many people publish pages to get you to buy something or accept a point of view. Google makes no effort to discover or eliminate unreliable and erroneous material. It's up to you to cultivate the habit of healthy skepticism. When evaluating the credibility of a page, consider the following AAOCC (Authority, Accuracy, Objectivity, Currency, Coverage) criteria and questions, which are adapted from www.lib.berkeley.edu/ENGI/eval_criteria.html.

Authority

- Who are the authors? Are they qualified? Are they credible?
- With whom are they affiliated? Do their affiliations affect their credibility?
- Who is the publisher? What is the publisher's reputation?

Accuracy

- Is the information accurate? Is it reliable and error-free?
- Are the interpretations and implications reasonable?
- Is there evidence to support conclusions? Is the evidence verifiable?
- Do the authors properly list their sources, references or citations with dates, page numbers or Web addresses, etc.?

Objectivity

- What is the purpose? What do the authors want to accomplish?
- Does this purpose affect the presentation?
- Is there an implicit or explicit bias?
- Is the information fact, opinion, spoof, or satirical?

Currency

- Is the information current? Is it still valid?
- When was the site last updated?
- Is the site well maintained? Are there any broken links?

Coverage

- Is the information relevant to your topic and assignment?
- What is the intended audience?
- Is the material presented at an appropriate level?
- Is the information complete? Is it unique?

Search for *evaluate web pages* or *hints evaluate credibility web pages* to find resources on how to evaluate the veracity of pages you view.

For a printable form with most of the questions that you will probably want to ask, visit www.lib.berkeley.edu/TeachingLib/Guides/Internet/EvalForm.pdf. For more information on evaluating what you find, visit www.lib.berkeley.edu/TeachingLib/Guides/Internet/Evaluate.html

Tara: I give sites more credibility when they have their own domain (versus being set up on a free site like Geocities). I give more credibility when a site is updated regularly—and by regularly I don't mean once a year or so. I like having some kind of "about this page" set up on the site. I like when content updates are dated. I like when sites fully source some of their claims. Of course there are exceptions to rules, there's great content set up on free Web sites, but these are my rules of thumb. And it also helps to have a really good BS detector. :->

Stephan: *What one piece of advice about using Google as a research tool should the reader retain, if they remember nothing else?*

Nancy: You can find quite a bit of information using Google. However, not all information on the Web is available through Google. If you don't find what you want by using Google, try another search tool and/or ask Google Answers for help. ■

Stephan Spencer is founder and president of the search engine specialist Web agency Netconcepts (www.netconcepts.com).

About the Author



Stephan M. Spencer, M.Sc., is the founder and president of Netconcepts, a full-service interactive agency with specialization in search engine optimization, Web redesign, ecommerce, email marketing, and Web site auditing. Clients include Verizon, REI, AOL, Gorton's, Cabela's, InfoSpace, The Sharper Image, Wella, Northern Tool, Sara Lee Direct, Midwest Airlines, Guild.com, and MP3.com.

For over ten years, Mr. Spencer has been implementing tools and techniques to create dynamic, personalized, community-building web sites. He is a frequent speaker at Internet conferences around the globe, and has made presentations at events in Berlin, London, Toronto, Santiago, Auckland, New York, Chicago, San Francisco, Los Angeles, and numerous other venues for organizations such as the DMA, the AMA, JupiterMedia, Internet World, and IIR. For several years in the mid 90's, he taught Internet mini-courses at the University of Wisconsin-Madison. In 1998, Mr. Spencer was featured on the cover of In Business magazine.

Mr. Spencer is a Senior Contributor to MarketingProfs.com. He has contributed to DM News, Catalog Age, Multichannel Merchant, Practical Ecommerce, Unlimited, NZ Marketing, NZ Management, Building Online Business, and others. He is co-author of the analyst report "The State of Search Engine Marketing 1.0: New Strategies for Successful Cataloging" published by Catalog Age.

Mr. Spencer can be contacted at (608) 285-6600, via the Web at www.netconcepts.com, or via email at sspencer@netconcepts.com.