

GEOCACHING

HIKE AND SEEK WITH YOUR GPS

Geocaching: Hike and Seek with Your GPS

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Cache On

“Our treasure lies in the beehive of our knowledge.”
—Friedrich Nietzsche

In its simplest form, geocaching is an easy concept to grasp. *Hiders*—geocachers who enjoy setting up caches for others to find—pick collections of items and put them into containers, which they then hide, somewhere, say out in a public park or state forest, after ensuring with the appropriate agencies that this activity will be condoned. Other people, *seekers*, try to find the containers, generally taking items from containers, replacing them with others, and going on their ways. How do people know where they’ve hidden containers, or where to find them? Why, by using their trusty GPS receivers, of course—at least usually.

Simple, no? Well, no, there’s a little more to it than that. The process of finding a cache is generally a series of steps:

1. Go to a geocaching Web site and choose a cache you want to find.
2. Enter the coordinates in your GPS receiver.
3. Print the description and, if you want, any clues that may help in case things are tougher than you expected.
4. Go find the cache and make a note in its log book.
5. Enter your results on the cache Web page.

Similarly, hiding a cache also requires a series of steps:

1. Scout a location removed from other caches and find a good hiding spot there.
2. Get any permission necessary.

3. Pull together an appropriate container and goodies, including a log book, to fill it.
4. Hide the cache in its new home and obtain coordinates as accurate as possible.
5. Post the cache on one of the geocaching Web sites.
6. Follow up on any e-mail comments or questions from people trying to find the cache.
7. Periodically check the condition of the cache and its environment.

As you might suspect, there are potential slipping points all along the way, which Chapters 6 and 7 cover. But you might have noticed mention of geocaching sites and Web pages. Most people involved with the hobby find a GPS receiver vital, but the one virtually indispensable bit of technology for geocaching is actually the Web. The game is played on a number of sites, and you need to know about them.

Caching Playgrounds

Paper and word of mouth are too slow for the pace of geocaching (although they do have a place, as we will discuss later). New cache locations have exploded in number since the onset of the pastime; tens of thousands are now available around the world. To keep up, hidere and seekers communicate on the Web.

Think of the Internet as a meeting ground, or maybe a virtual playground when you aren't out in the woods. Although I describe a number of useful Web sites in later chapters, four sites will take most of your attention:

- Geocaching.com
- Navicache.com
- Buxley's Geocaching Waypoint
- Opencaching.com

These are the major outlets for cache listings and information, and you need to become acquainted with each.

Geocaching.com

This is the successor of the original geocaching site and is still the largest. Figure 2-1 shows the home page.

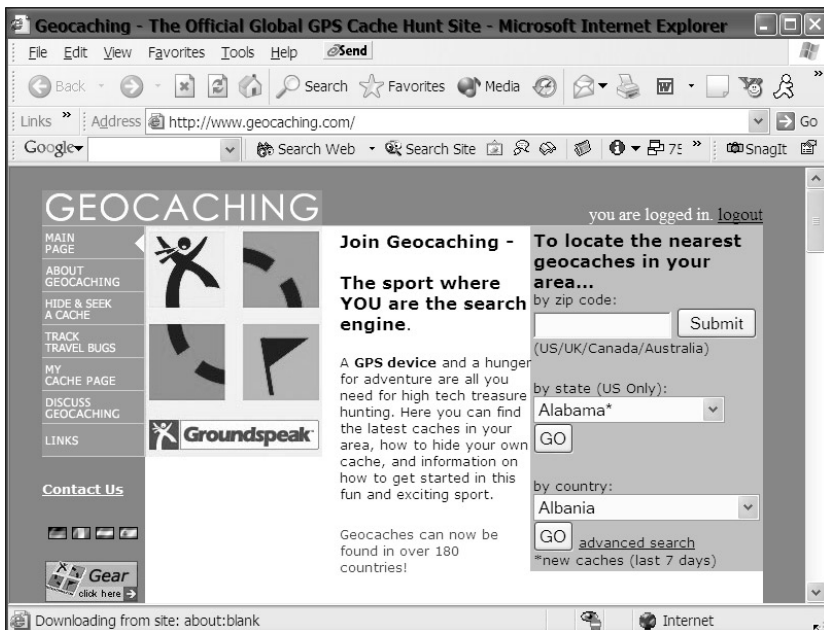


Figure 2-1 Geocaching.com home page

On the left is a menu. You can choose the following:

- **About Geocaching:** This gives a brief and incomplete history of geocaching.
- **Hide & Seek A Cache:** Here is where you click to either submit a cache for others to find, or to choose a cache you want to hunt.
- **Track Travel Bugs:** Travel bugs are objects that people find in one cache and move to another. You can follow their journeys here. (And you can follow the topic in Chapter 8.)
- **My Cache Page:** If you have an account (free at the basic level and worth getting) you can check a listing of caches in your area, see your lists of found caches, and any caches you have created.
- **Discuss Geocaching:** If you have questions or just want to chat, you can go to message boards, again free, and correspond with others active in the sport.
- **Links:** You can find links to useful software and other sites of interest to the geocacher.

Before going through the menu, though, scroll down the home page until you see the heading *Create an Account*. Click on the *Create an account now* link and fill out the fields. This will give you access to most of the forum, including the important ability to log your caching finds and to list the caches you hide. After all, bragging rights go a short distance if you don't keep score.

To get a start on searching, go to the upper-right corner of the home page, enter your zip code, and click the *Submit* button. That will bring you to a page similar to that in Figure 2-2.

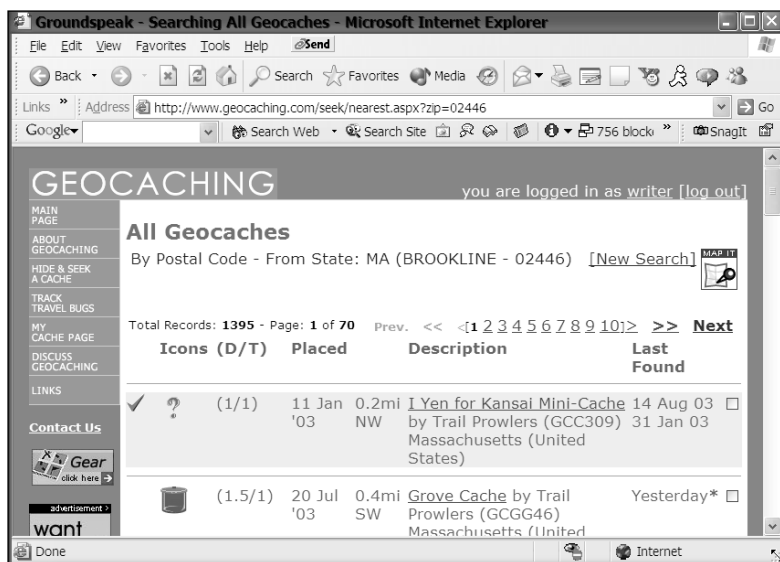


Figure 2-2 Example of a cache search page

The caches appear with such information as the date they first appeared on the site, the user name of the person who placed the cache, and the distance from your zip code. (The distance is calculated from the post office serving that area.) A checkmark shows that you have already completed the cache. An icon indicates the type of cache.

Two important numbers are the difficulty and terrain ratings (the D/T column). Both use a 1-to-5 scale, with 1 being easy and 5 being difficult. Some factors contributing to the difficulty rating include the length of the hike to the cache, the difficulty of finding the cache, or whether there are difficult puzzles to solve before you can find the cache. Terrain includes the amount of slope, the footing, nature of the trail, whether an overnight stay is necessary, and the need for specialized training or equipment in such areas as scuba diving or technical rock climbing. A 1/1 cache is one you could take kids to on a whim, whereas a 5/5 might have you backpacking or searching a cliff face a hundred feet (30-odd meters) in the air.

The home page also has a link to a *Benchmark Hunting* section, an activity in which you search for survey markers that are physical references for location and height. (More on benchmarking in Chapter 8.)

One thing to remember about this site is that it's a business, as opposed to some of the other sites, which seem more like quasi-hobbies run by enthusiasts. Nothing wrong with that, but it does mean that there is more organizational control over what goes onto the site, including what will and won't be allowed for caches, as well as what may be posted in the discussion forums. As with any degree of effectiveness, there is good and bad. On the positive side, the staff is careful about caches that appear in areas they shouldn't (like national parks, where they are not allowed) or that are too close to other caches. The negatives can include a perceived censorship, like people finding that their posts mentioning competing geocaching sites are deleted. Others are concerned that the management is trying to own geocaching.

My own complaint is that the pages are generally too crowded, and sometimes important links—such as benchmarking or signing up for an account—are buried in the text and not called out in the navigation areas.



NOTE Around the time we were making final edits on the book, I heard that Geocaching.com was preparing to make some changes in the look of its site. Unfortunately, prototypes won't be available until this book is actually in print, so you may have to make some mental adjustments.

On the balance, I like the site and the people who run it have my respect. I also think that geocaching is quickly becoming too big for any one group to control, and that is why some competition is good.

Navicache.com

Our second caching stop is **Navicache.com**. As is true with **Geocaching.com** and Buxley's Geocaching Waypoint, there is a navigation menu, though at the top of the screen. And like **Geocaching.com**, the home page also has a search area, as Figure 2-3 shows.

A difference, though, is that you can search by city and state as well as by zip code in the United States, or by latitude and longitude elsewhere in the world (see Chapter 4) to look for caches. The number of caches and the amount of activity is small compared to **Geocaching.com**. The two sites have slightly different criteria for approving caches, so you might find that one allows something that the other doesn't.

One of the menu choices leads to the next virtual stop, Buxley's Geocaching Waypoint.

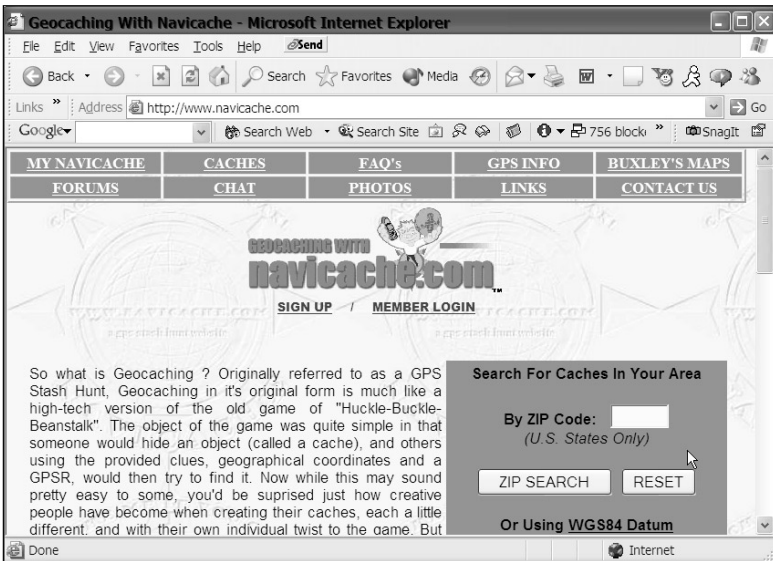


Figure 2-3 Navicache.com home page

Buxley's Geocaching Waypoint

This site, <http://www.brillig.com/geocaching/>, is unusual because it does not host cache Web pages. (See Figure 2-4.)

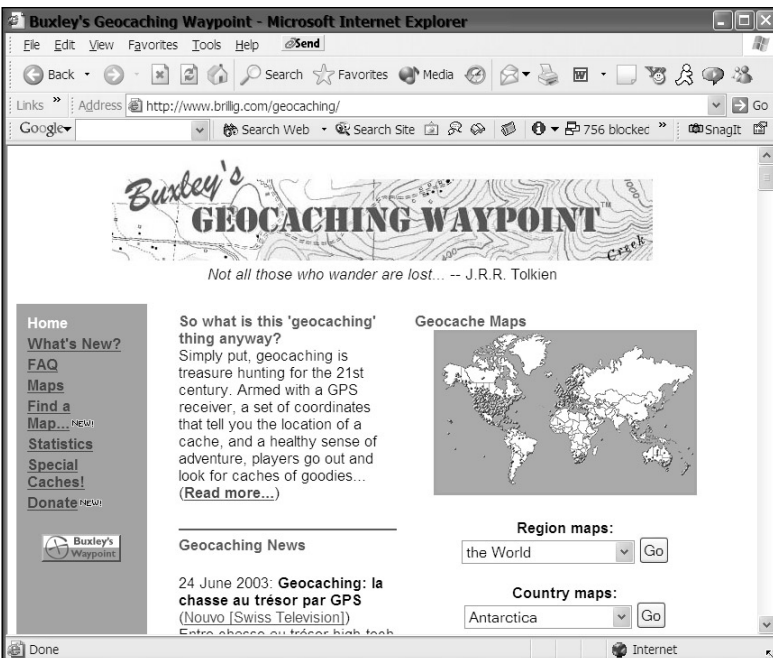


Figure 2-4 Buxley's Geocaching Waypoint home page

Instead, Buxley's is a mapping site. It has searchable maps that show locations of different caches, giving you a more graphic approach to searching. Click on the map and the page switches to a bigger search map, as you can see in Figure 2-5.

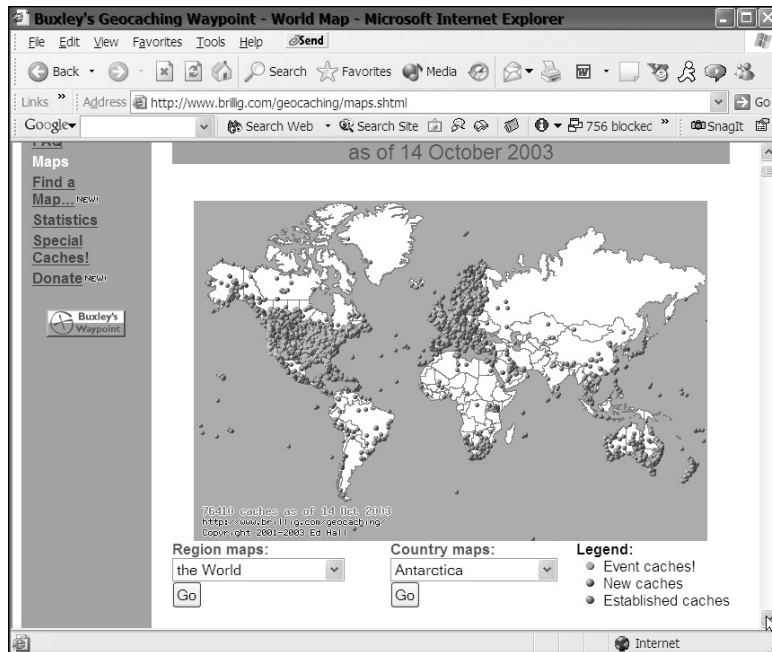


Figure 2-5 Search map on Buxley's Geocaching Waypoint

You can click to select a particular region, like the United States, and have it appear in more detail, as Figure 2-6 shows.

Notice all the bubbles that have appeared on these maps. Each represents a single cache. Blue bubbles are new caches, and green ones are event caches in which people are invited to meet on a particular day and time. The number of bubbles may be gratifying for the person who enjoys the game, but it's visually overwhelming if you are trying to choose a target, so select a smaller area, like the state of Massachusetts, as in Figure 2-7.

You can click again in this case and zoom in for more detailed views, though not all regions have enough cache density to warrant the closer view. When possible, as Figure 2-8 shows, you can pan the map in different directions by clicking the directional arrows corresponding to compass directions on the map's border.

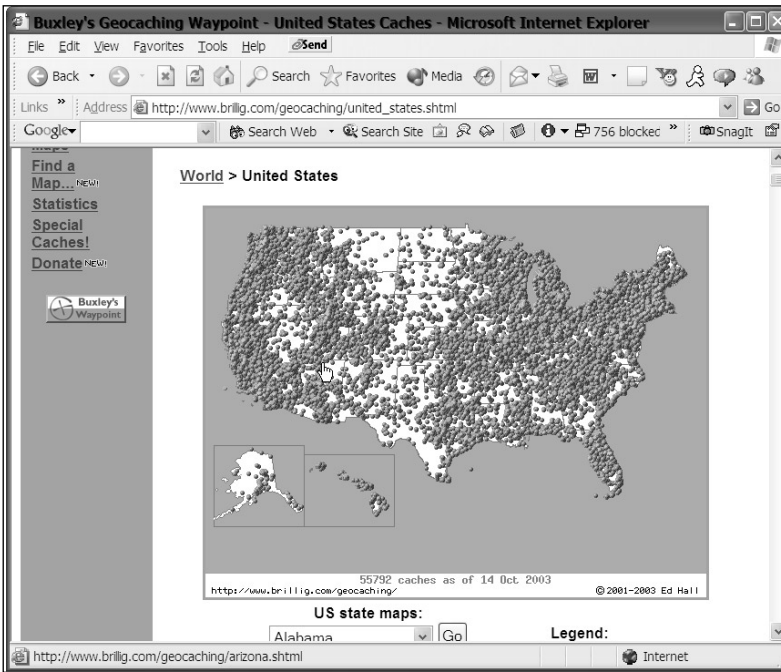


Figure 2-6 United States geocaching map

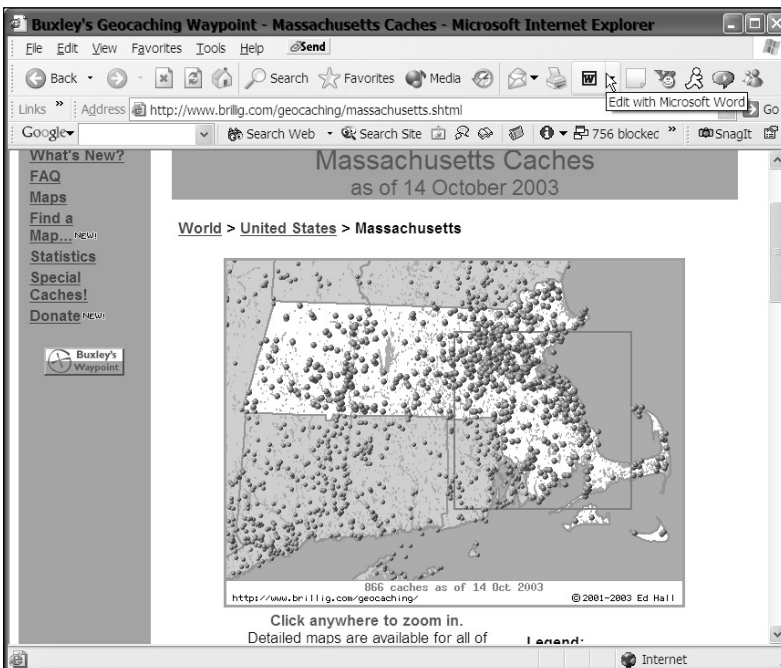


Figure 2-7 Massachusetts geocaching map

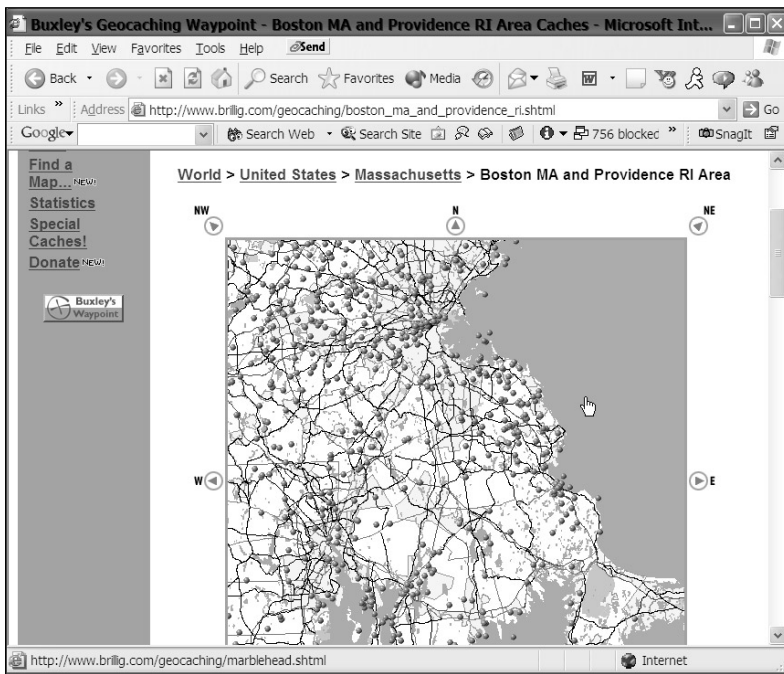


Figure 2-8 Detailed map

In this case, you can click for yet another closer view. Theoretically, Buxley's site regularly updates and adds all new caches from the other sites. Practically, you can't count on when that update will take place. After hiding a cache, I found that it did not appear on the site, at least for a while. Potential for human or computer error aside, it's a good resource, especially if you want to pick a location with a high density of caches for a hunting spree.

Should you want to skip a few of the map clicks, choose a region or country map from the boxes on the home page.

Another interesting spot is the *Statistics* menu choice at the left of the home page. Not only does the site calculate the number of caches you can find in any country, but it provides links to other sites that can tell you who is who when it comes to finding caches.

Opencaching.com

Both **Geocaching.com** and **Navicache.com** have online forums where people can discuss the activity and other related concerns. However, some people have voiced concern about geocaching effectively being the property of the companies that run those two sites. **Opencaching.com** is an attempt to create a nonproprietary electronic community for cachers. Is it necessary? I don't know, but its appearance is no clear detriment; stop by the site and make your own decision.

Caches

So far, you might have the sense that all caches, at heart, are the same, with only the details changing. That actually isn't true. There are many types of caches and related objects:

- Traditional
- Micros
- Multis
- Offset
- Puzzle
- Secret
- Virtual
- Moving
- Hitchhikers and Travel Bugs
- Benchmarks

Each type offers different challenges, advantages, and disadvantages. Let's take a look at them in a little more detail.

Traditional

These are classic caches, like the first one ever hidden. Someone takes a container, whether the plastic snap-lid type or a metal ammunition can, and puts items into it. (See Figure 2-9.)



Figure 2-9 Some typical cache containers

The containers have the virtue of being largely watertight—an advantage when things stay out in the wild, whether woods or urban—and, if of good quality, not prone to breaking. In these days of paranoia, plastic has gained popularity because carrying a food container doesn't make you look as suspicious as an ammo can might. Items in the container generally include a collection of knick-knacks, toys, or items of potential interest, as well as a log book along with a pen or pencil so people can record their find. You can also find other items of interest:

- Souvenir items
- A camera
- Site-specific information
- Hitchhikers

A souvenir item is a commemorative to remind you of a particular cache. It can be a cachecard, which is a business card bearing the name of the cache and some other information, such as the name of the cache owner, coordinates of the cache, and a photograph of the spot. You can collect them or drop them off at other caches to spread the word about one you've visited. Some people invest in geocoins, like those shown in Figure 2-10.



Figure 2-10 Examples of geocoins

Geocoins are usually metal and embossed with a logo and a name, usually the name of a regional geocaching group or the cache's owners. If you want to make your own out of polymer clay, you can follow the directions of cacher MountainMudbug at <http://www.geocities.com/graphixoutpost/geocoins.html>.

The camera will be the disposable type, with a flash. This allows cache finders to take pictures of themselves or their group. The cache owner will occasionally pick up the camera when it would be running short of film, have it developed, then scan the pictures and post them on a Web page so people can see themselves.

Site-specific information, in the form of printed sheets that people can take, is rarer, but always fun. You can learn about the historical significance of a particular site, and there might be a sheet on an unusual type of tree or bird or animal. Any of this might add to your appreciation and enjoyment if you are inclined to such considerations. If not, feel free to ignore it.

Hitchhikers and their relatives, travel bugs, are items that move from cache to cache. I describe these later in the chapter.

Micros

Not all cache locations offer either enough space or cover from prying eyes to shelter a traditional container. There are also those cache owners who want to make a hunt at least challenging, if not difficult to the point of pain. For such situations, a cache can be a micro, like the ones in Figure 2-11.



Figure 2-11 Micro cache containers

A favorite, and on the larger side of micro, is an empty 35mm film canister. A metal mints container, like those from Altoids, are also popular, although it takes some work to remove the mint odor; otherwise, you run the risk of attracting animals. Micro caches create two other difficulties: finding objects to put in the cache, and having a log book and pencil small enough to fit within.

Things get tougher when you have even smaller caches, because the lower limits of size are restricted only by the ingenuity of people bent on confounding their fellows. A cache in the greater Boston area is actually a coin superglued to a powerful magnet and left in an unlikely place. To get credit for the find, you must e-mail the country and date of the coin to the cache owner. Unfortunately, **Geocaching.com** has stopped approving these sorts of caches, but there is a solution. I've hidden a micro called Classical Cache with a small log for people to sign. However, to get credit, you must answer some questions listed in the container, e-mail the responses to me, and get approval to claim the find. The latter was an idea that I cheerfully stole from a number of other cachers.

Speaking of coins, another cacher hid a little object significantly smaller than a penny. The cache description suggests bringing a magnifying glass and a pair of tweezers to handle the object. No, the person wasn't kidding. You could spend a good long time finding this one, and on its side are the coordinates for another cache, because it is part of a multi-cache.

Multis

I've spoken with a number of cachers whose favorite type of cache is the multi, or multi-cache. In a multi, the published coordinates are for a single cache, usually a micro cache. Inside (or, as described previously, on the side) are the coordinates for another cache, which could house coordinates for yet another. As a variation, seekers may have to find multiple caches, not necessarily in any particular order, to obtain the various parts of the coordinates for the final stage.

After finding the first, you reset the waypoint to the new coordinates and find the next container. This can go on for as many stages as the owner and hunter have patience. They are greatly enjoyable because you are on the chase for a while, and you obtain a feeling of accomplishment at the end. The final stage is often a traditional cache, with lots of goodies for the persistent cacher.

Offset

In some cases, the published coordinates are not even for the actual cache. Instead, you are directed to a spot from which you must follow directions to the cache location. The directions might be a compass bearing or azimuth that you must follow for a certain number of steps (more on this in Chapter 4), or they may direct you to travel along a line created by a series of landmarks.

Sometimes, the offset cache is created for the hider to flex some creative muscle and for the seeker to invoke some patience and determination. At other times, an offset may be the only practical way of providing a usable location.

For example, a cache in my area is called Miller's Wood. The actual cache location is in a forest, heavy with hemlock and birch trees of a century's age. However, as you will learn in Chapter 3, those trees can play havoc with the reception of a GPS receiver, leaving you unable to follow an electronic course to the loot. The cache owners, a semiretired couple who go by the name GeoChevy50, realized the problem, and so gave some guidelines in terms of descriptions of certain trees. I went directly to **Google.com** on the Internet to look up the appropriate pictures, as my woodsman's skills are what you might expect from a child of suburbia.

Many geocachers might disagree that Miller's Wood is an offset cache, but to my mind, if you can't reliably get there by a GPS receiver and you need additional help to find the location, it's offset.

Puzzle

Multi-caches present an increased element of the challenge over the traditional. Offset caches introduce indirection. Puzzle caches take all this a step further. Instead of offering coordinates to the actual location, the seeker—that is, you—has to solve some puzzles, either intellectual or physical, to reach the cache.

An example is my own Fighting Silver Cache, listed on Geocaching.com, which also shares some of the attributes of an offset cache. In it, the coordinates are only to a parking lot. You bring a compass and follow some clues to shoot two bearings (yes, that is also in Chapter 4) to pinpoint the actual place to search. It's a relatively simple one—mild compared to some that are far more complicated.

For example, another cache in my state is the Raiders of the Lost Geocache. It's worth checking the site on Geocaching.com, even if you aren't close enough to pursue it. The coordinates are real enough, but you must go to an additional Web page for the information you will need, because this is an offset puzzle cache. (See Figure 2-12.)

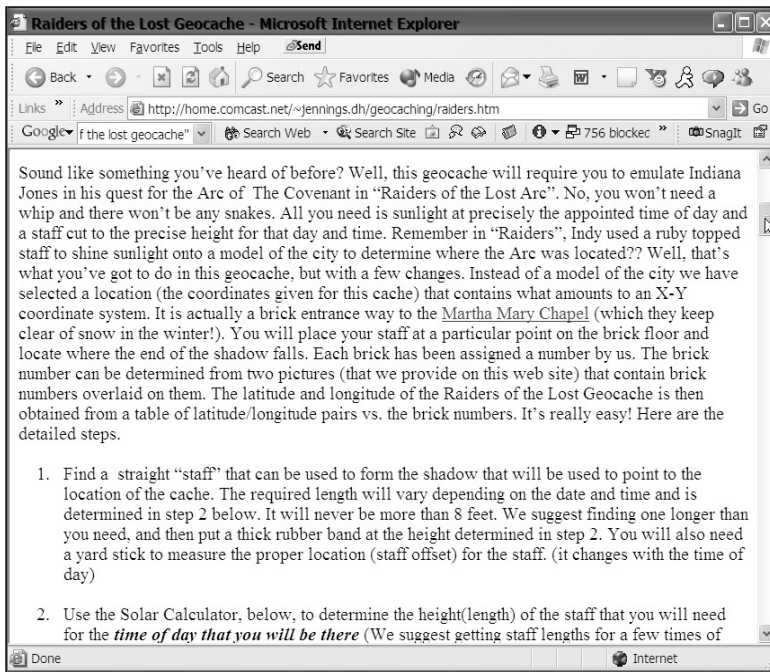


Figure 2-12 Web page for Raiders of the Lost Geocache

You must determine ahead at what day and time you will attempt this, after checking a weather site for a forecast. The weather is important because you need a good shadow produced by the sun. The Raiders site has a program into which you enter the day and time information. In return, you get a measurement. This is the height of the stick you must bring with you.

The coordinates bring you to an overhang with a brick floor. Diagrams on the site, combined with a table, give a long list of potential coordinates. By planting the stick in the proper place and observing the brick on which the top of the shadow falls, you find the corresponding coordinates, which will take you to the real cache location. (See Figure 2-13.)

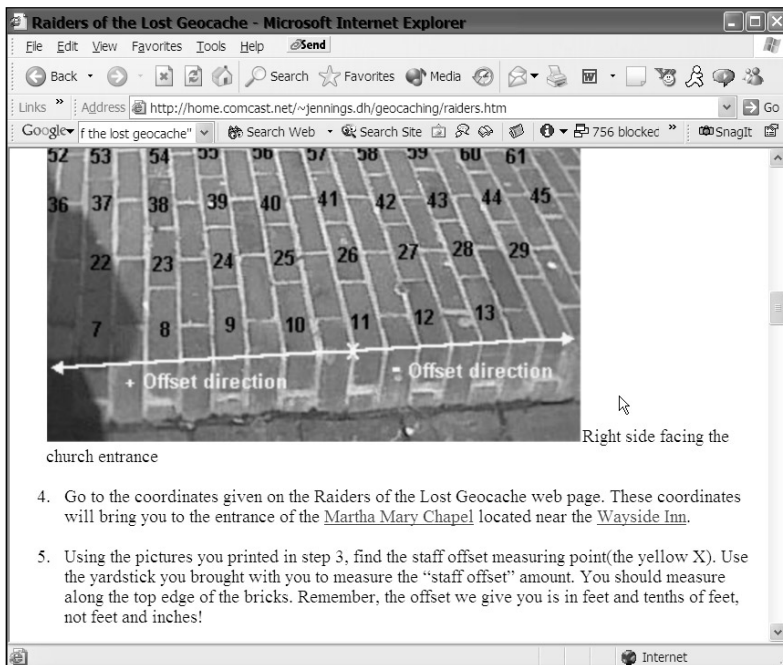


Figure 2-13 Diagram of how the Raiders cache works

Involved? Yes. Ingenious? Absolutely. Have I done it yet? Not at the time of writing, but it's on my short list. The instructions suggest bringing a tape measure and a saw so that if you are running late, you can trim the stick, if necessary, to the correct length. Instead, I'll probably rig a perpendicular flag that I can move to different heights. That should show where the top of the shadow of a stick that particular height would have fallen. However, I'll also bring a saw—just in case.



NOTE In British Columbia, Canada, a group called Team KFWB indulges in the most extravagant of cache hunts, with first-finder packages of loot that run into the thousands of dollars in value. Oh, but to find the cache, you need ingenuity, persistence, effort spread over days, access to four-wheel-drive vehicles, and the ability to follow specific instructions to assemble the coordinates of the cache location. Don't plan on getting rich, though. I spoke with someone who had worked as part of a group solving a couple of these, and between the number of searchers and the time needed, the monetary reward on an hourly basis would make entry-level burger-flipping look good.

Some puzzle caches require a strong bent for riddles and intellectual twists. For those, some preliminary research on the Internet, or in a library, can do wonders.

Secret

For some caches, research is unlikely to help at all. These are secret caches, whose coordinates do not appear on a page at one of the major caching sites. In some cases, there is a page, but only with general information and instructions.

There is a cacher in Rhode Island who keeps a Web page devoted to his activities. On it is a link to a “bonus” cache in the state. You cannot find the coordinates, or even the cache’s existence, any other way. How did I find out about it? By reading a New England geocaching forum and running across a mention of the site, with a link. Word of mouth pays off, and makes it hard for a secret to remain *too* secret. I’d include a link for the page, but then it wouldn’t be secret.

Virtual

Sometimes a cache can be out for everyone to see, but only those playing the game can claim credit of discovery. That is because not all caches are physical. In some places, like the U.S. National Parks, you are not allowed to leave items, even caches. In other spots, like many cities, too many people might wander by and see someone retrieve a cache, only to return to the site and steal the container, leaving everyone else out of luck. (Yes, people have plundered caches.)

In such settings, a virtual cache may be in order. With this type, you don’t open a container, trade items, and sign a log. Instead, you collect proof that you can send to the cache owner. It might be information contained on a placard attached to a building’s exterior wall, or it could be a digital photo you e-mail to the cache owner.

An example is the Masonic Home Virtual Cache in Wisconsin. If seeking this cache, you follow the directions and find a historic marker, then answer a question by using the information on it. The answer to the question goes to the cache owner. Without sending the verification, your credit for the find goes the way of the dodo bird. I did a similar thing with my Classical Cache in Boston, which is a two-stage cache requiring the seeker to bring a knowledge of musical notation, gather information, and send the results back to me. (Told you that I stole this idea.) And, yes, I have deleted claims of a find when I had no e-mail with the correct answers. What can I say? I just work here.

Some virtual caches are placed within view of a Web cam, which periodically takes pictures of the spot. To get credit, you e-mail a copy of the Web page showing you on the spot, usually performing some instruction like holding your GPS receiver up in front of you, so it is obvious that this is not some innocent bystander.

Such virtuals usually require collaboration from someone sitting at a desk. This person monitors the Web cam until an image appears showing you. At that point, the person, in communication with you via a cell phone, saves the Web page for later e-mail delivery to the cache owner. It is theoretically possible to fake this type of image, inserting a picture of yourself in scale into a shot

of the empty background, but the amount of work required is far greater than the effort needed to actually get the legitimate image.

For those with a taste for the ultimate in high tech, a number of cell phone service providers, such as Verizon and Sprint PCS, offer wireless Internet service. You can slip an access card into a slot on your laptop, then capture the Web cam image yourself, immediately e-mailing it after for near-instant credit.

Moving

Some caches are virtual; others are physical but move. Someone finding a moving cache generally takes it to a new location. That may be a new spot or one of several in which it is allowed to reside; the rules are at the whim of the cache owner. One moving cache, *Keep it Moving*, can appear in new places by itself, or be located within other caches, just to keep people on their toes.

The trick in hiding this type of cache is to ensure clear instructions, so that people finding and moving the cache provide the updated location in the place that future seekers will look. Those who find it should follow the directions so other people can enjoy it, too, without taking fruitless trips to find an unexpectedly moved cache.



NOTE Geocaching.com has stopped approving new moving caches, unfortunately, but for good reason. It's tough enough to check that a cache is properly placed once, but as it begins moving, someone might leave it in some inappropriate spot. However, there are still moving caches that were grandfathered in, so get moving and find them.

Hitchhikers and Travel Bugs

Related to the moving cache is the hitchhiker. Instead of the cache moving from place to place, an item moves from one cache to another. In some cases it is just a matter of fun, like The Great Texas-Wisconsin Hitchhiker Races, in which two characters, Butch and Sundance, were racing across multiple states to reach each other's origin. Figure 2-14 shows the page for the first race which, so far as I can tell, is still going on.

Another example of a hitchhiker is the Thoreau Hitchhiker. It's a set of papers that include instructions and coordinates for the actual cache. Part of a finder's responsibility is to remove it from one cache and return it to another in eastern Massachusetts.

A specialized type of hitchhiker is the travel bug. It's actually a pair of metal tags (you buy them at Geocaching.com—hey, they have to make a living somehow) that come with a serial number. You attach one of the tags to some item that can go from one cache to another. In Figure 2-15, you can see two examples: Gwaihir the Windlord, a toy eagle, and Grandpa Bug, a small wrench.

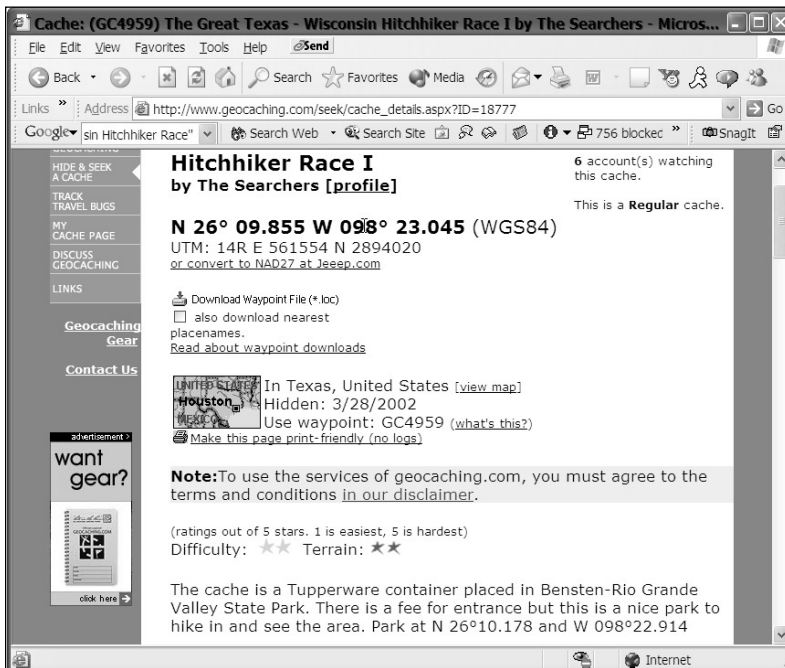


Figure 2-14 Two cache hitchhikers



Figure 2-15 Examples of travel bugs

When you create a travel bug, you keep one of the tags as a record and send the other out into the wild by placing it into a cache. You can also drape the travel bug like a military dog tag identification around the hitchhiker. When finders record the new temporary resting spots on **Geocaching.com** (this doesn't work with **Navicache.com**), the page updates with the number of traveled miles.

As owner of the travel bug, you give its stated mission, which might be something such as visiting a certain number of countries or reaching a particular region that is sunny and warm. One, **WitchBlade TB3**, named for either the comic book or television show, had the mission to roam the world for a year, traveling to caches "far and wide searching out and destroying evil wherever it

is found.” We are thankful that the world of geocaching is safer for its existence, even if its namesake television program didn’t last beyond a second season.

Benchmarks

Unlike hitchhikers, benchmarks aren’t supposed to go anywhere. In fact, they were placed long before geocaching started. These are physical reference marks left by major government survey efforts, and that are now tracked, more or less, by the U.S. National Geodetic Survey (NGS). Typically, these are metal disks set into the ground in plain sight, although most people ignore them.

Although the NGS keeps a database of information on the benchmarks, much of it can be out of date, and the coordinates are often only approximate. So, finding one might be as hard as finding a deliberately hidden cache. What you don’t do is take or move one; doing so is a federal crime.

Other organizations, including the U.S. Army Corps of Engineers and the U.S. Bureau of Land Management, place benchmarks. Unfortunately, **Geocaching.com** doesn’t have databases of these (they have only on the NGS variety), and is not set up to handle information on these others. So, if you find a benchmark that doesn’t appear on the site, you can’t do much with it, other than keep your own tally.

Caching Logistics

You can participate in geocaching just about anywhere you find yourself, because caches exist in nearly 190 countries at the time of writing. But as the Buxley’s Geocaching Waypoint world map shows, there are areas of concentration.

You will be busy in the United States, Europe, many parts of Canada, South Africa, and Australia. But there are other regions with some caching presence, like Japan and Malaysia, or parts of Mexico or Brazil. Be aware that cache pages can appear in different languages; I’ve seen Portuguese and Dutch, but have yet to unearth a subject-appropriate phrase book to decode them. (How do you say Tupperware in German? *Tupperdose*: see the Champagner cache on **Geocaching.com**.)

Hiding a cache is probably best done during daylight hours so you can easily survey the area for potential issues and problems (see Chapter 7). Finding caches, however, can be a 24-hour-a-day activity. Some seekers head off into the woods with headlamps, flashlights, and more determination than I can generally muster. I’ll restrict my nocturnal wanderings to a regular hike in the woods. However, if you do want to give it a shot, Chapter 5 includes some tips on navigating in the physical dark, at least. When it comes to mental dimness, you’ll just have to struggle with it yourself, like me.

You can also geocache at almost any time of the year, although you may have to make adjustments to your clothing or travel technique, and certainly give some consideration to leaving an obvious trail to a cache. Some caches may be inaccessible in the winter because of ice or snow. Some may actually be inactive in the summer because of a preponderance of crowds in a given area.

Above everything else, geocaching is a secret activity. You are supposed to hide and find caches without those uninvolved in the activity being alerted to what is happening all around them. This secrecy arises in part from an environmental ethic. One of the early concerns about geocaching is that it would lead to environmental damage, with caches being placed in sensitive areas and searchers beating thousands of unnecessary trails into existing ecosystems. The good news from the land management front is that cachers are being unusually responsible and responsive, working with officials and even carrying out trash left by casual visitors. There's a saying that you'll run into more than once in this book: cache in, trash out.

Before you can trash out, or cache in, or even get close to a cache, you must know the basics of GPS systems, navigation, and hiking. That's what the next few chapters are for.