CRUD & REST
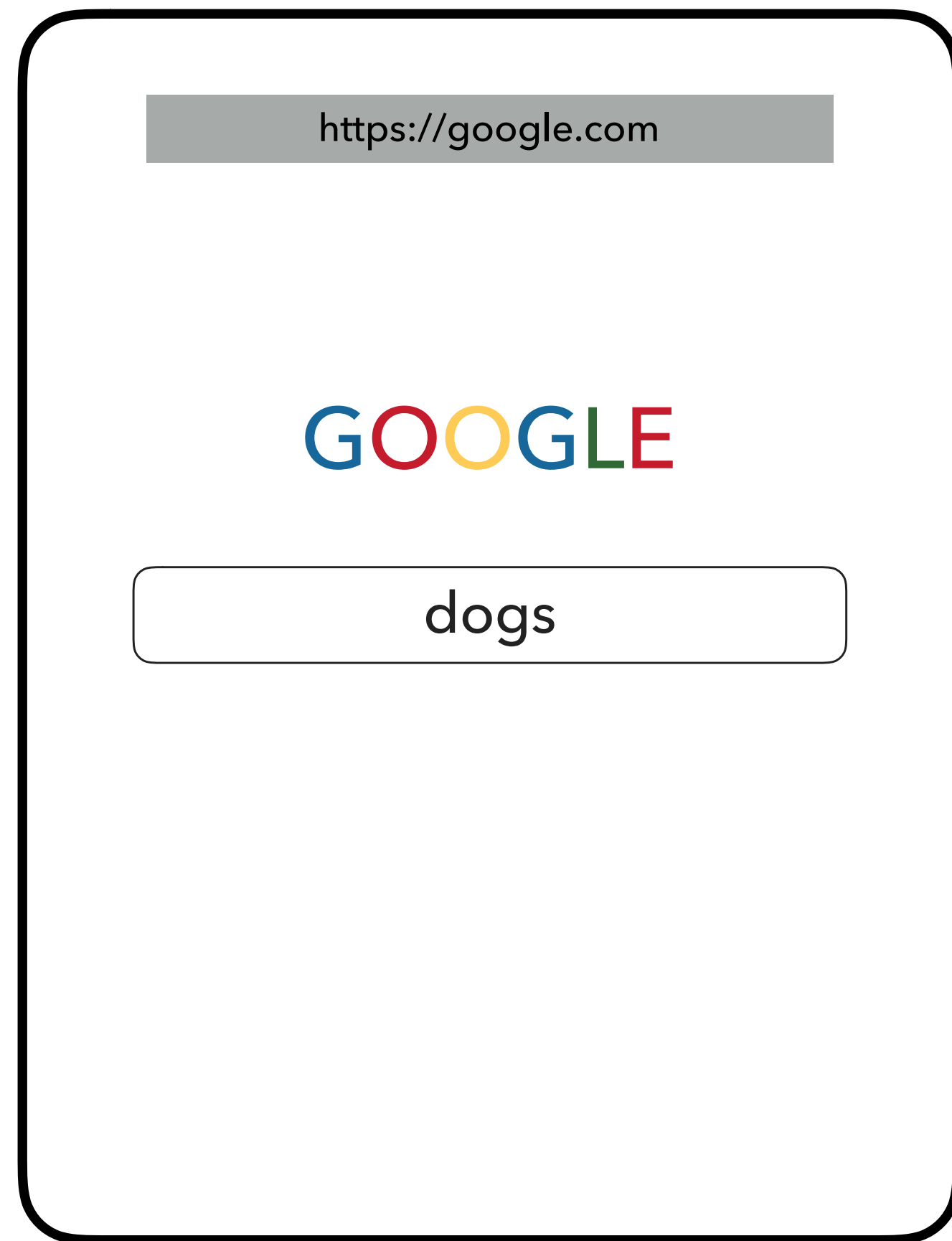
What is the difference between "the Internet" and "the Web"?

What is the difference between a web site and a web app?

HTTP Request

https://google.com

GOOGLE

dogs

```
GET /search?q=dogs HTTP/1.1
Host: google.com
User-Agent: Mozilla 5.0/…
Accept: text/html, */*
Cookie: ...
...
...
```

Server

HTTP Response

```
HTTP/1.1 200 OK
Content-Type: text/html
...

<!DOCTYPE html><html><head>...
```

HTTP

https://developer.mozilla.org/en-US/docs/Web/HTTP/Overview

Create

Read

Update

Destroy

REST

Create ———————— new
create

Read ———————— index
show

Update ———————— edit
update

Destroy ———————— delete

REST

Create ———————— new   GET /things/new
                   create   POST /things

Read ———————— index   GET /things
             show   GET /things/:id

Update ———————— edit   GET /things/:id/edit
                  update   PUT /things/:id

Destroy ———————— delete   DELETE /things/:id

RESTful Routes

HTTP Verb	Path	Controller#Action	Used for
GET	/photos	photos#index	display a list of all photos
GET	/photos/new	photos#new	return an HTML form for creating a new photo
POST	/photos	photos#create	create a new photo
GET	/photos/:id	photos#show	display a specific photo
GET	/photos/:id/edit	photos#edit	return an HTML form for editing a photo
PATCH/PUT	/photos/:id	photos#update	update a specific photo
DELETE	/photos/:id	photos#destroy	delete a specific photo

http://guides.rubyonrails.org/routing.html

Nested Routes

HTTP Verb	Path	Controller#Action	Used for
GET	/magazines/:magazine_id/ads	ads#index	list of all ads
GET	/magazines/:magazine_id/ads/new	ads#new	form to create a new ad
POST	/magazines/:magazine_id/ads	ads#create	create a new ad
GET	/magazines/:magazine_id/ads/:id	ads#show	show a specific ad
GET	/magazines/:magazine_id/ads/:id/edit	ads#edit	form to edit an ad
PATCH/PUT	/magazines/:magazine_id/ads/:id	ads#update	update specific ad
DELETE	/magazines/:magazine_id/ads/:id	ads#destroy	delete specific ad

http://guides.rubyonrails.org/routing.html

HTTP Methods

https://developer.mozilla.org/en-US/docs/Web/HTTP/Methods

```
<form method="POST" action="/things/<%= @thing.id %>">
  <input type="hidden" name="_method" value="PUT" />
```

```html
<form method="POST" action="/things/<%= @thing.id %>">
  <input type="hidden" name="_method" value="DELETE" />
  <input type="submit" class="delete" value="delete" />
</form>
```

```css
.delete {
  background: none;
  border: none;
  display: inline;
  font-size: 100%;
  text-decoration: underline;
  margin: 0;
  padding: 0;
}

.delete:hover {
  cursor: pointer;
}
```