

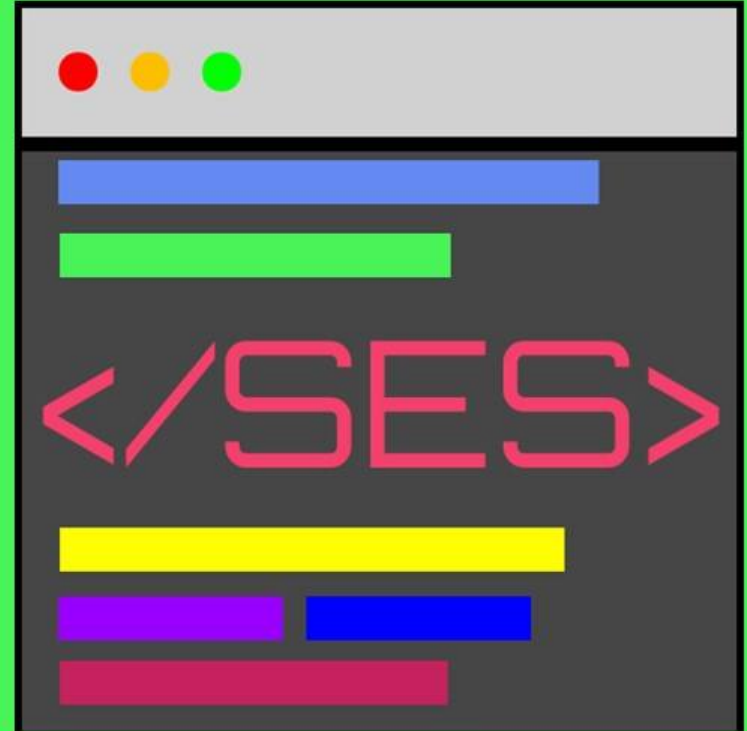


# GIT Ahead

The development tutorial series to help you get an edge in a competitive job market.



Presented by:



And

## DevShare

# DevShare



# //What is DevShare

An initiative to have developers share interesting and relevant topics, with their fellow students and developers

# //Today's Dev's



Kunal Shah  
Sfwr-Eng V  
Software Developer @IBM



Pavithran Pathmarajah  
Sfwr-Eng IV

# **GIT** Ahead

---

A two part workshop series

# // Motivation?

By the end of these two weeks  
you'll have something like this

Checkout: [devshare.space/chat](https://devshare.space/chat)

# //What you will learn

Today:

- GIT Basics
- GitHub Static Web Hosting
- Get a Domain
- Setup a DNS
- Basic UI with Bootstrap

# //What you will learn

Next Time:

- Microsoft Azure Webapps
- Web Sockets using Socket.io
- Node.js Server
- We'll make this chatapp work!
- Flex on literally **EVERYONE**



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“

*The secret to [GIT]ing  
ahead is [GIT]ing started*

**- Mark Twain**

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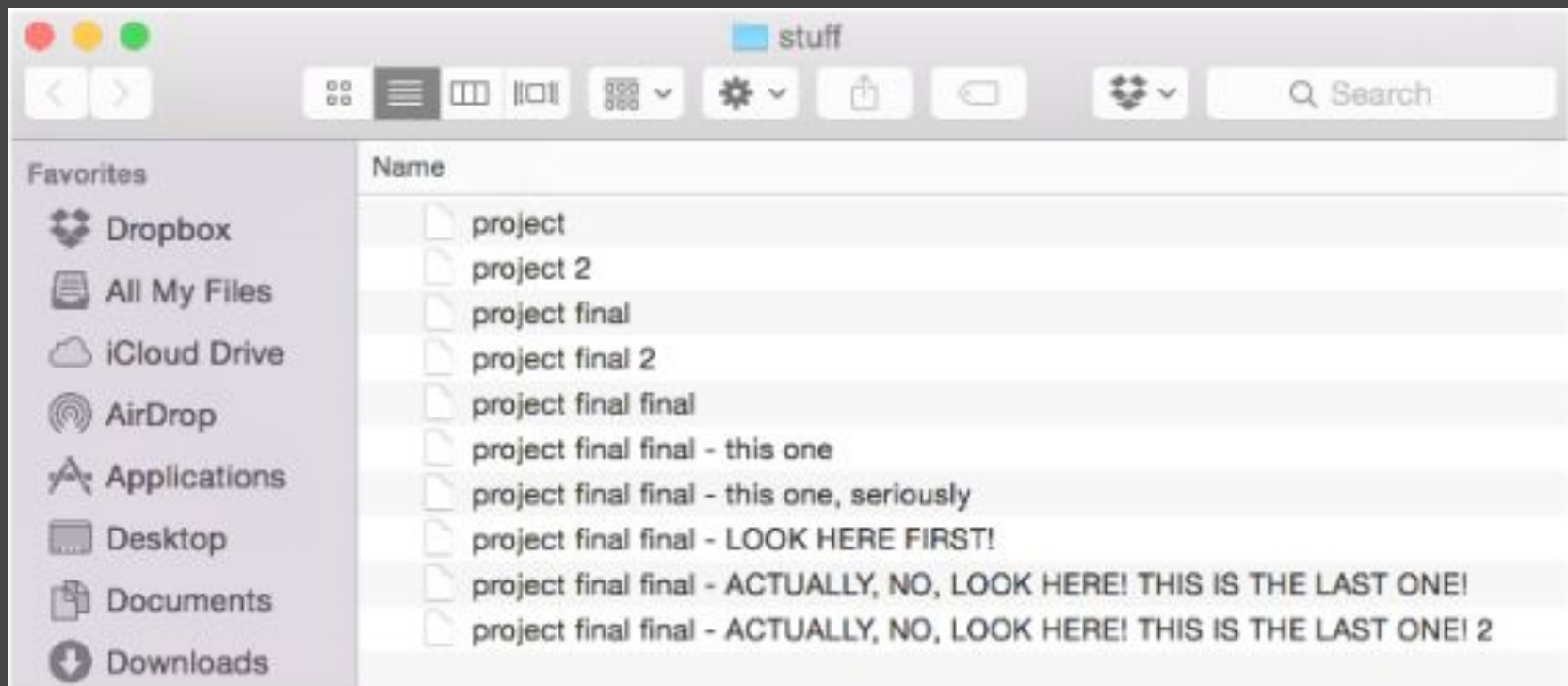
# // Agenda



Part 1.

# Intro

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# //What is git

- Distributed version control
- Coordinates work between multiple developers
- Who made what changes and when
- Revert back at any time
- Local and remote repos

GitHub , BitBucket , GitLab

# //What is git

- Keeps track of code history
- Takes a snapshot of your files
- Take a snapshot by committing your files
- Can go back and see any snapshot

Git Set up



# // How install GIT

## MacOS

- Run the following command on Terminal
- `git --version`


## Windows

- Download and install [Git-Bash](#)
- <https://git-scm.com/downloads>

## Github Desktop App

- Download and install [Github Desktop](#)





 Search or jump to... Pull requests Issues Marketplace Explore

# Welcome to GitHub

You're a few steps away from building better software, @devsharedemo.

✓ Completed  
Set up your account

 Step 2:  
Choose your plan

 Step 3:  
Personalize your experience

## Choose your plan

With tools developers love and the world's largest open source community, there's no wrong choice.

✓  
Free

The basics of GitHub for every developer

\$0  
per month

**Includes:**

- ∞ Unlimited public and private repositories
- ✓ 3 collaborators for private repositories
- ✓ Issues and bug tracking
- ✓ Project management

Are you a [student](#)? Get access to the best developer tools for free with the [GitHub Student Developer Pack](#).

○  
Pro

Pro tools for developers with advanced requirements

\$7  
per month  
[\(view in CAD\)](#)

**Includes:**

- ∞ Unlimited public and private repositories
- ∞ Unlimited collaborators
- ✓ Issues and bug tracking
- ✓ Project management
- ✓ [Advanced tools and insights](#)

☐ **Help me set up an organization next**  
Organizations are separate from personal accounts and are best suited for businesses who need to manage permissions for many employees.  
[Learn more about organizations](#)

Upgrade to Pro for  
free !  
By signing up for  
github student  
developer pack

17

# // Install & Make Github Account

## Github

- Create an account: [github.com](https://github.com)

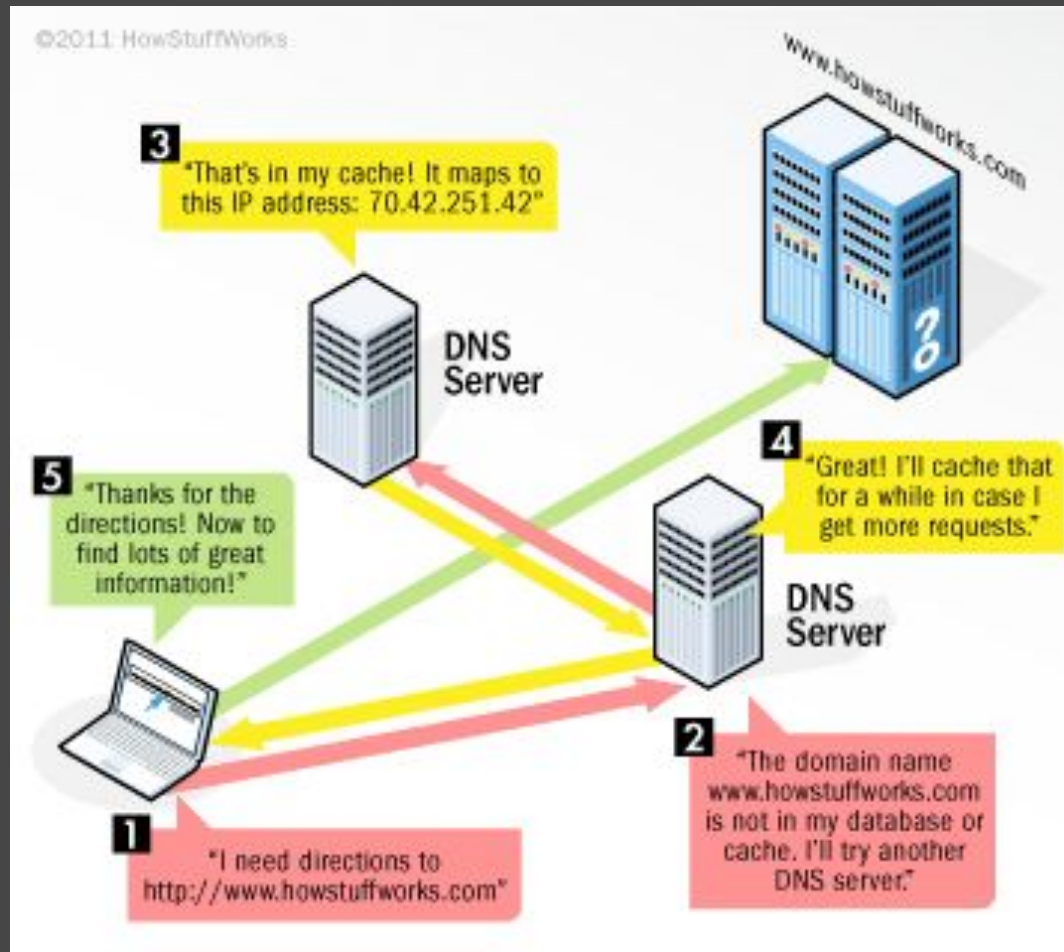
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# //What is a Domain Name



# // Domains

Domain providers:

Domain.com

Namecheap

GoDaddy

Google Domains

# // Domains

Domain providers:

Domain.com

Namecheap

GoDaddy

Google Domains

// Domain.com

1 Free Domain

.com, .org, or .net

and 1 Year of Domain Privacy

Site: [www.domain.com/mlh](http://www.domain.com/mlh)

Promo Code: MLH2019

# // Namecheap

1 Free Domain

.me, with discounts for others

Site: [nc.me](https://nc.me)

Domains Set up





curiouskunal.com



CONGRATS, YOUR DOMAIN IS AVAILABLE!

**curiouskunal.com**

Added To Cart ✕

☒ Add Domain Privacy to each domain for \$8.99 per year. [What's this?](#)

HOW ABOUT ONE OF THESE GREAT DOMAINS:

curiouskunal.net	\$12.99	<a href="#">Add To Cart →</a>
curiouskunal.org	\$14.99	<a href="#">Add To Cart →</a>
curiouskunal.tech ★Featured Domain	\$6.99	<a href="#">Add To Cart →</a>
curiouskunal.space ★Featured Domain	\$2.99	<a href="#">Add To Cart →</a>
curiouskunal.online ★Featured Domain	\$5.99	<a href="#">Add To Cart →</a>
curiouskunal.store ★Featured Domain	\$9.99	<a href="#">Add To Cart →</a>

SHOPPING CART

CURIOUSKUNAL.COM

Domain Purchase	1 Year ▾	\$9.99 ✕
Privacy Protection	1 Year	\$8.99 ✕
<b>Total</b>		<b>\$18.98</b>

[Continue](#)

[← Back to domain add-ons](#)

## BILLING & PAYMENT INFORMATION

[Already have a Domain.com account? Sign In!](#)

### BILLING INFORMATION

Email Address

Phone Number

First Name

Last Name

Street Address

Address 2

Country

UNITED STATES ▼

Postal Code

City

State

Select a state... ▼

### SHOPPING CART

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Domain Purchase	1 Year ▼	\$9.99 ✕
Privacy Protection	1 Year	\$8.99 ✕

Subtotal	\$18.98
Discount	\$18.98
<b>Total</b>	<b>\$0.00</b>

By clicking "Purchase Now" you agree to Domain.com's [Terms of Service](#), [Cancellation Policy](#), [Auto Renewal Policy](#), and acknowledge receipt of our [Privacy Policy](#).

Success! You have saved an additional \$18.98. 🎉

Purchase Now

**Auto Renewal Policy:** Introductory prices apply to the first term. Money-back guarantee applies to hosting and domain privacy. **All plans and products automatically renew unless you cancel.** The renewal will be for the same term length and at the regular rates reflected in your Control Panel. The payment method you provide today, or we have on file, will be used

# CONGRATULATIONS

## YOUR ORDER IS COMPLETE

Thanks for your order! You will receive an email with details on how to activate your product.  
Your account is currently being provisioned. This page will automatically refresh when your account is ready.

[Go To Control Panel](#)

## ORDER DETAILS

Product	Product Price	Term Duration	Total Price
curiouskunal.com	\$9.99/yr	1 Year	\$0.00
Privacy Protection	\$8.99/yr	1 Year	\$0.00
			Subtotal: \$18.98
			Discount: \$18.98
			Tax: \$0.00
			<b>Total: \$0.00</b>

It all starts with a great domain

Search for your next idea





# // Add Alias Records

185.199.108.153

185.199.109.153

185.199.110.153

185.199.111.153

HelpKunal Shah

Forbidden

Summary

Site Builders

Email Management

Standard

G Suite

Office 365

Security

Pointers & Subdomains

DNS & Nameservers

Transfers

Contact Information

+

Add DNS Record

Record	Name	Content	Priority
A	@	66.96.162.138	n/a
A	ftp	66.96.162.138	n/a
A	mx	66.96.140.144	n/a

Add New DNS Record

Use the following tool to add any record type to your DNS table.

Name

@

Type

A

IP Address

185.199.108.153

TTL (Time To Live)

1/2 Hour

Priority

Add DNS

[Terms of Service](#)

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# Common Git Commands

---

# // Git Commands

// Set Name and Email (need to only do this once)

```
git config --global user.name 'your-name'
```

```
git config --global user.email 'your-email'
```

// Clone Remote Repo

```
git clone <HTTPS Link>
```

# // Git Commands

// add files to staging area

`git add <file>`

// check the status of the staging area

`git status`

// remove file from the staging area (undo git add)

`git reset <file>`

// commit files to the repository

`git commit -m "commit message"`



# // Git Commands

// pull from remote server

git pull

// push your commits to the remote server

git push

# //Warning

Never git add, commit, or push sensitive information to a remote repository.

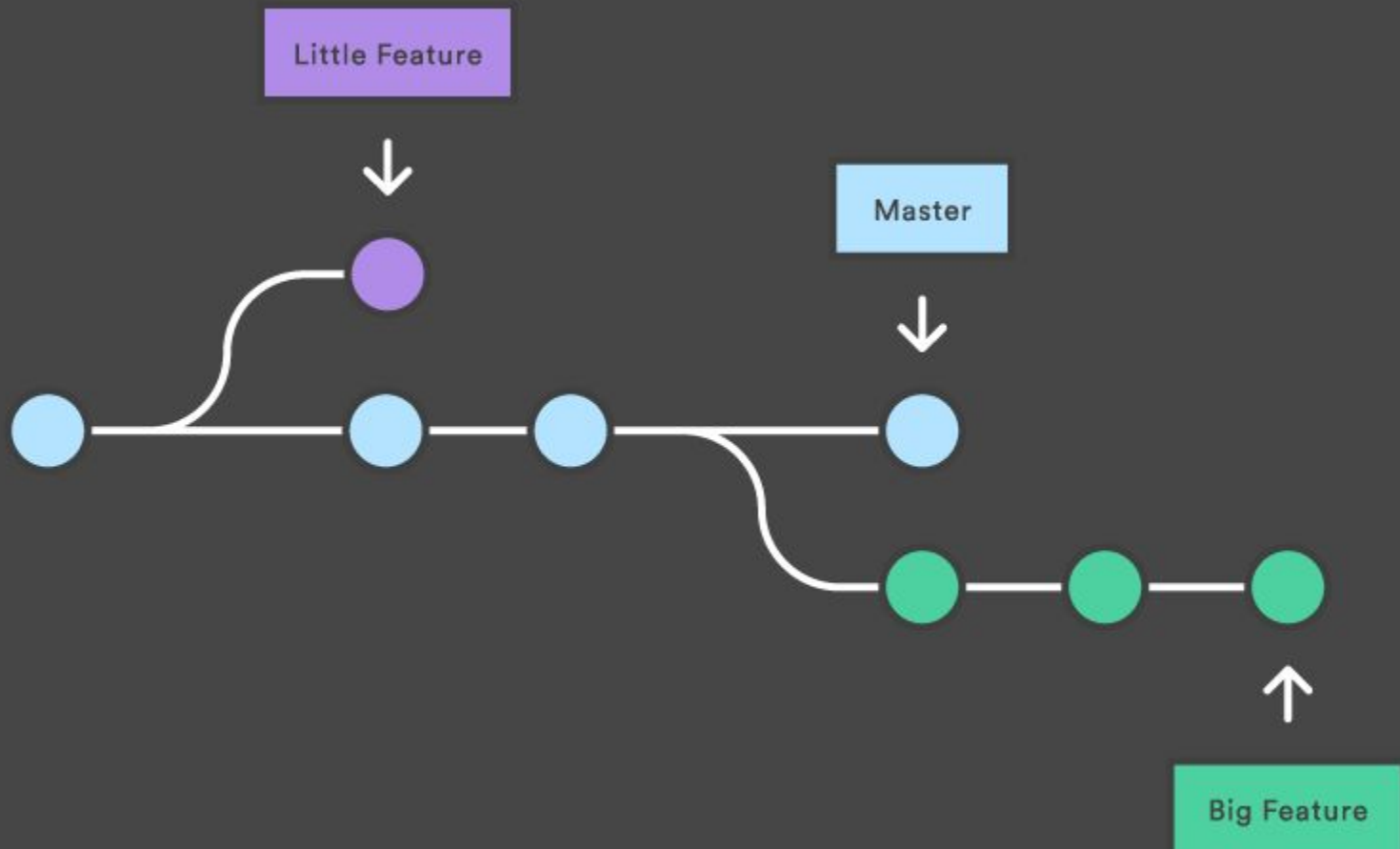
Sensitive information can include, but is not limited to:

- Passwords
- SSH keys
- AWS access keys
- PIN numbers
- API keys
- Credit card numbers
- Cryptocurrency Wallets

# // Git Ignore

- .gitignore file
- Allows you to have files that can't be added to the staging area unless you really want to

# // Branching



# // Branching

// branch

```
git branch <branch name>
```

// change to branch

```
git checkout <branch name>
```

// change to branch

```
git merge <branch name>
```

Part 2.

# Hosting

---

# // Github Pages

1. Create Repo Called:  
`username.github.io`
2. add, commit and push `index.html`
3. Set github pages source
4. configure custom domain

Part 3.

# The Looks

---

Using Web Frameworks to  
make a good looking site FAST



# // TONS of different styles

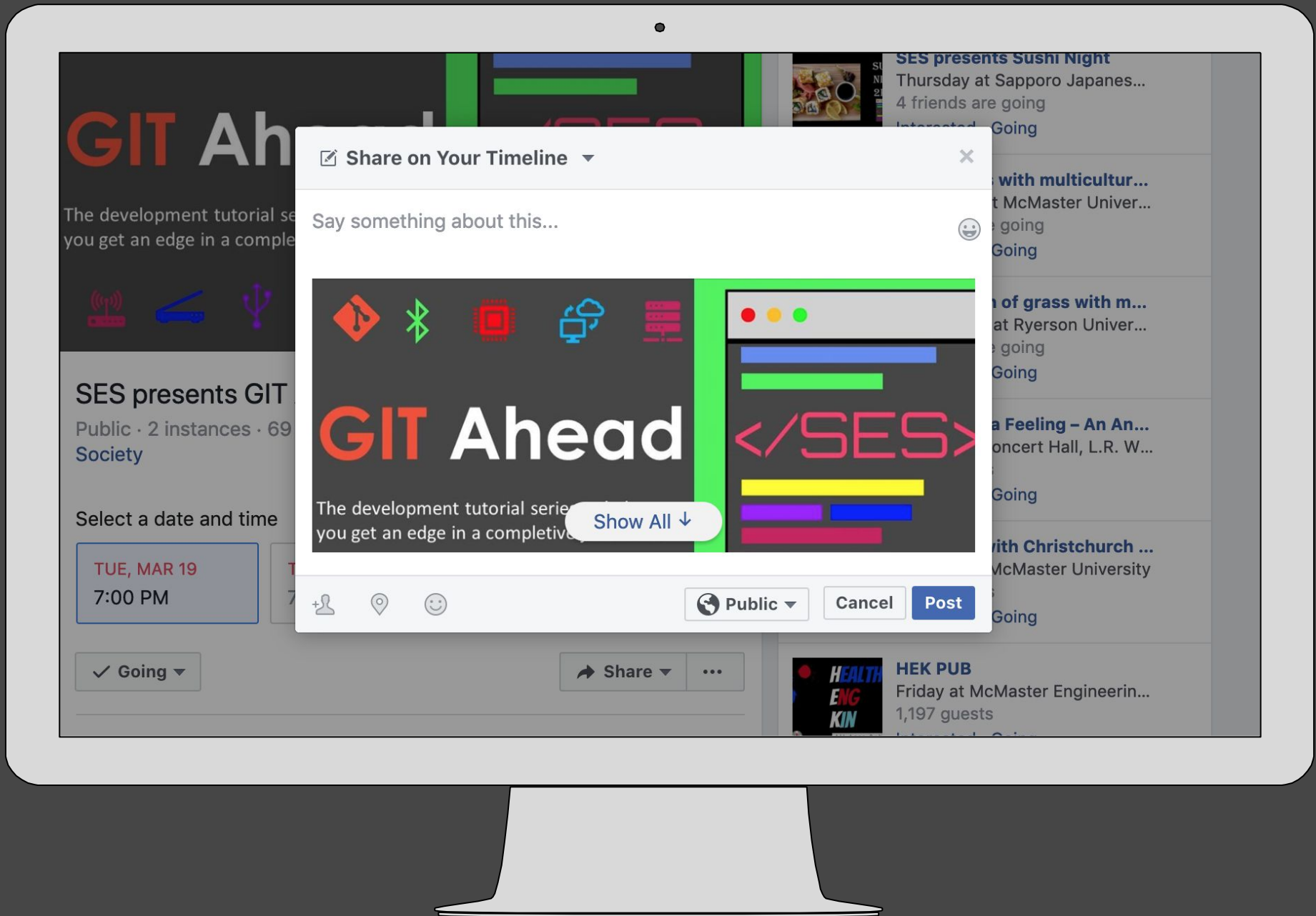
- Plain
    - <https://justinjackson.ca/words.html>
    - <https://www.balenciaga.com>
  - Common/Small Scale
    - <https://wire.com/en/>
    - <http://www.clearmotion.com/>
    - <https://www.paradiso.nl/en/>
  - I'm not actually sure
    - <https://pinupmagazine.org/>
    - <https://3dro.ps/>
-

## // Our Focus common/small scale

- A website that performs a few tasks if any
  - Not “Google.com”
  - Not “Facebook.com”
- Typically a single page, can be more

# // Common Web-Design Components

- Modals
- Cards
- Responsive Design
  - Hamburger Menus
  - Mobile First
- Flat Design
- Typography





## Our Team

### Saad Khan

I have always had an interest in new technology, even as a kid. I wanted to work in a field that let me work with new and emerging technology. Since a lot of industries are moving towards software and automation it just made sense for me to go into Software Engineering



### Jacob Gordon-Zarankin

-VP FINANCE-  
SFWR ENG III



### Marlee Roth

-VP MARKETING-  
SFWR ENG & CO-OP IV



### Alexie McDonald

-VP EXTERNAL-  
SFWR ENG & MNGMT III



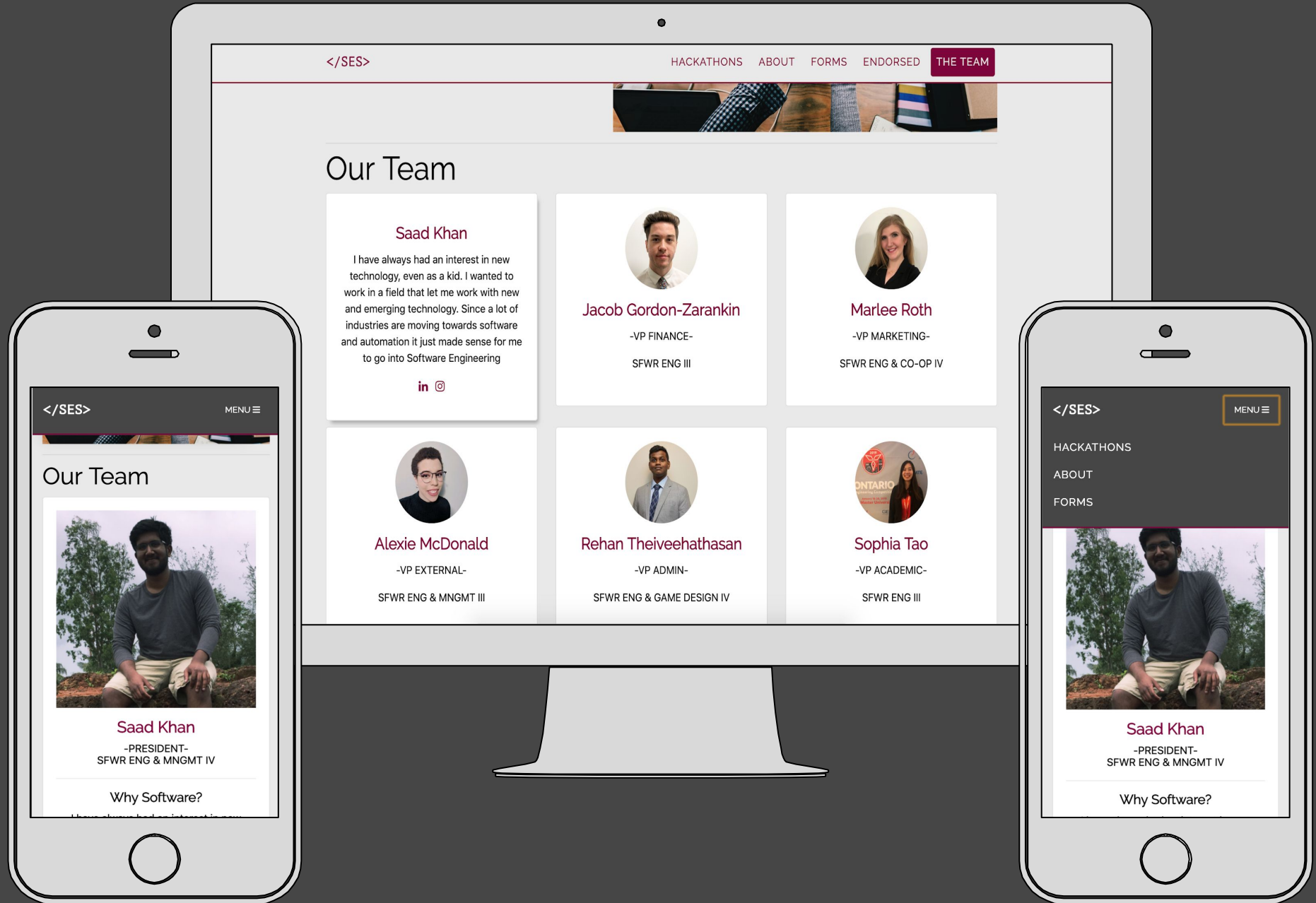
### Rehan Theiveehathasan

-VP ADMIN-  
SFWR ENG & GAME DESIGN IV



### Sophia Tao

-VP ACADEMIC-  
SFWR ENG III



</SES>

HACKATHONS

ABOUT

FORMS

ENDORSED

THE TEAM

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</SES>

MENU

## Our Team



### Saad Khan

-PRESIDENT-  
SFWR ENG & MNGMT IV

Why Software?

</SES>

MENU

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### Saad Khan

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Why Software?

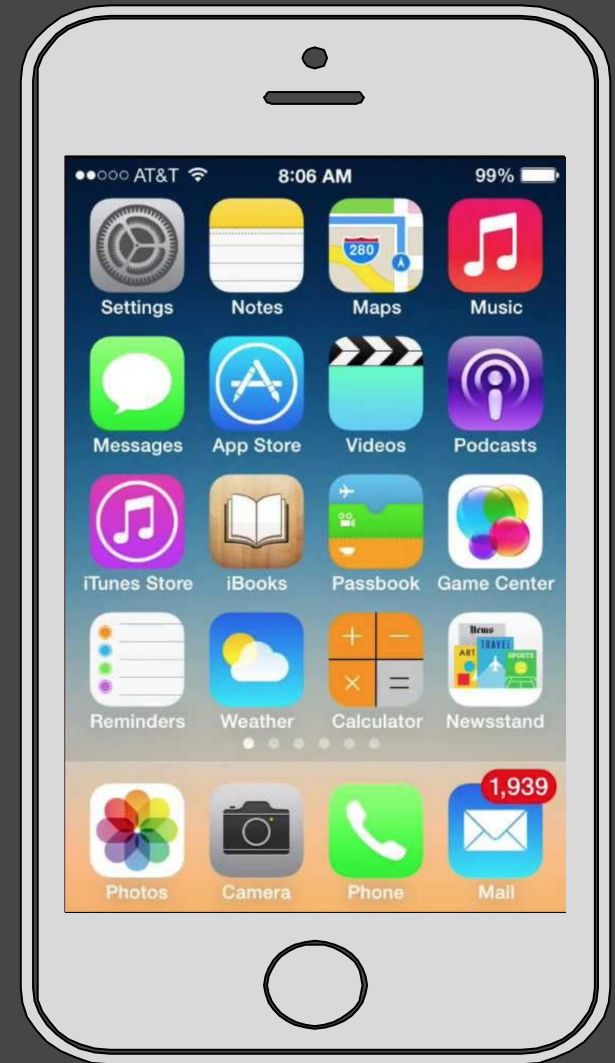


Skeuomorphic

VS

Flat

DESIGN



Google Fonts

Lukasz Dziedzic (10 styles)

A shining crescent  
far beneath the  
flying vessel.

Baloo Chettan  
Ek Type (1 style)

Julietta Ulanovsky, Sol Matas, Juan Pablo del Peral,  
Jacques Le Bailly (18 styles)

It was going to  
be a lonely trip  
back.

Roboto Condensed  
Christian Robertson (6 styles)

**Mist enveloped  
the ship three  
hours out from  
port.**

Source Sans Pro  
Paul D. Hunt (12 styles)

Silver mist suffused  
the deck of the ship.

**The face of the  
moon was in**

Lilita One  
Juan Montoreano (1 style)

Font Awesome is one of the top open source projects on GitHub. [Star](#) 59,176

Order Up! Hot and Fresh Food Category Pack!

Medical Icons Vol. 3!

More Top Icon Requests and Fixes!

Hundreds of Brand Icons for Occasions!

Professionally Designed + Pixel-Perfect

Each and every symbol is designed from scratch against guidelines and standards for



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HTML & CSS



# //HTML vs CSS

## Hypertext Markup Language (HTML)

- A markup language to tell the browser what it's looking at, whether it be text, pictures sound a video

## Cascading Style Sheet

- A literal sheet of statements
- That provides the browser with instructions on how to style HTML

## nt Interface Layer

ns

?

ere a large group of people engage in collaborative programming. The event usually takes place over the course of the weekend lasting 24 - 36 hours. Typically hosted by a university with many industry sponsors and prizes, encourage students to develop innovative solutions for real problems.

### icipate?

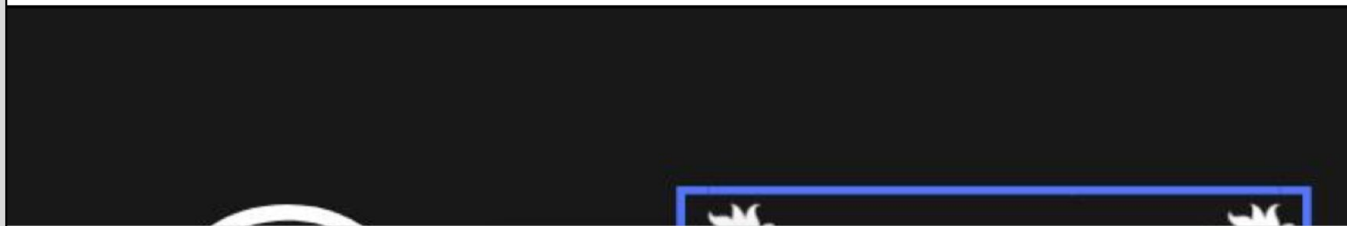
VAG (Stuff We All Get) and an excuse to travel! If this is not enough of a reason, hackathons are amazing experiences to apply what you've learned, pick up new skills and NETWORK! These competitions are free and we offer travel stipends, so there is no real reason not to participate.

[Join on MLH](#)

## THE SES

Engineering Society is a committee that works to make your experience and the software engineering program at McMaster the best it can be! We regularly plan events that allow you to network with your fellow students and, professors, to gain a better understanding of the field. If you are looking to get involved or meet other people in your faculty then we are here for you!

If you have any comments, concerns or requests let us know! We can help put together a workshop, talk to the software engineering professors and make sure your voice is heard. So reach out to us and get involved!



# HACKATHONS

— </SES> —

## What is it?

It is an event where a large group of people engage in collaborative programming. The event usually takes place over the course of the weekend lasting 24 - 36 hours. Typically hosted by a university with many industry sponsors and prizes, encouraging students to develop innovative solutions for real problems.

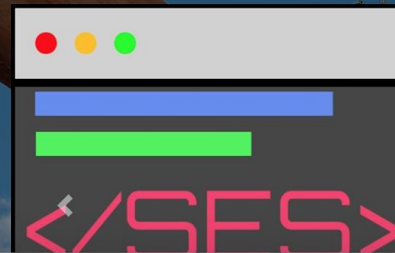
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Free FOOD, SWAG (Stuff We All Get) and an excuse to travel! If this is not enough of a reason, hackathons are amazing experiences to apply what you've learned, pick up new skills and NETWORK! These competitions are free and we offer travel reimbursements so there is no real reason not to participate.

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HTML - THE BARE MINIMUM



# // HTML - THE BARE MINIMUM

- Tags: Used by the browser to identify what type of thing it's looking at and identifies the start and ending of it
- Basic Tags:
  - <head>
  - <title>
  - <body>
  - <h1> - <h6>, <p>, <a>, <br>, <hr>
  - <div>
- Recommendation: [w3schools](https://www.w3schools.com/html/)





CSS - THE BARE MINIMUM



# // CSS – THE BARE MINIMUM

- Selector: Tells the browser what HTML these properties effect
- Property: Predefined actions that CSS can modify
- Value: The value to set that property to

EX: `h1 { color:red; }`

- Recommendation: [w3schools](https://www.w3schools.com/css/)



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“

*Don't reinvent the wheel,  
just realign it.*

**- Anthony J. D'Angelo**

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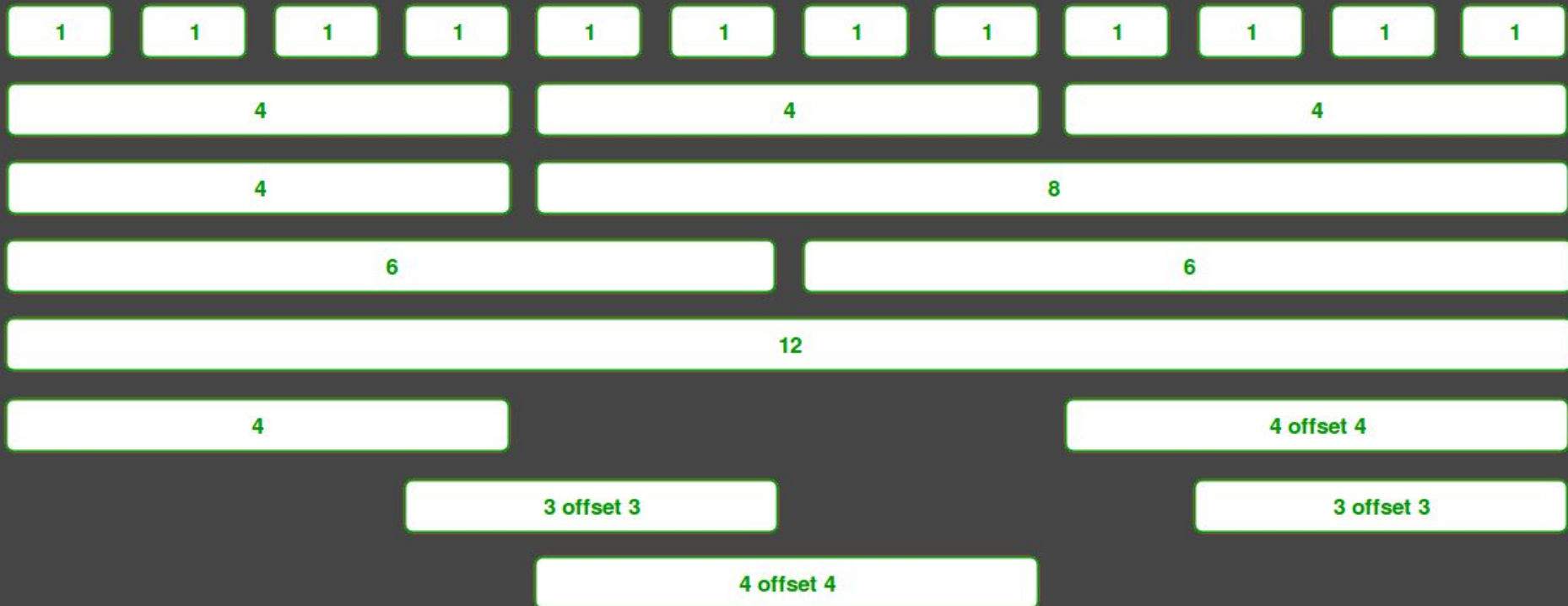
# // Frameworks

- Bootstrap
- Pure.css
- UIKit
- Foundation
- Materialize

# Bootstrap



# //Grid System



# // Bootstrap

To get started:

<https://getbootstrap.com/>

To go quickly: Templates

<https://startbootstrap.com>

<https://themewagon.com>

# //Until Next Time

- Look into HTML/CSS/Bootstrap
- Make your chat app look amazing!
  
- Then next time we'll make it all work and start doing some javascript