Introduction to

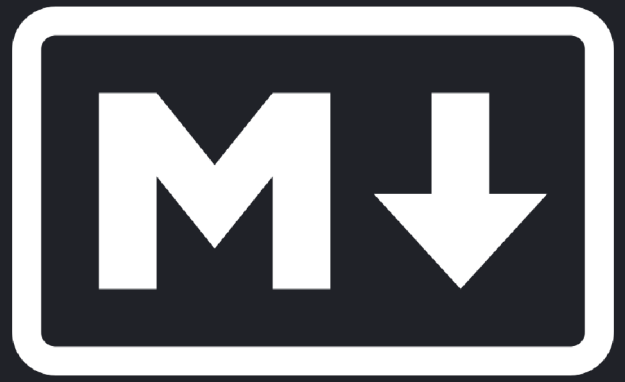
+ MkDocs

Wei Min Cher

09 January 2020

IAP CONFERENCE by 3DC

Contents



Markdown

- Lightweight markup language
- Can be converted to many formats

GitHub Flavored Markdown

Markdown Editor

- GitHub Gist
- Stackedit.io

Headers

```
# This is an <h1> tag
## This is an <h2> tag
###### This is an <h6> tag
```

This is an <h1> tag

This is an <h2> tag

This is an <h6> tag

Emphasis

```
*This will be italic*
```

```
_This will also be italic_
```

```
**This will be bold**
```

```
__This will also be bold__
```

```
_You **can** combine them_
```

Unordered Lists

```
* Item 1
* Item 2
  * Item 2a
  * Item 2b
```

- Item 1
- Item 2
  - Item 2a
  - Item 2b

Ordered Lists

```
1. Item 1
2. Item 2
3. Item 3
   1. Item 3a
   2. Item 3b
```

1. Item 1
2. Item 2
3. Item 3
    1. Item 3a
    2. Item 3b

Links

```
http://github.com
[GitHub](http://github.com)
```

http://github.com
GitHub

Images

```
![SUTD Logo]
(https://www.sutd.edu.sg/assets/sutd/img/logo-
white.png)
```


SINGAPORE UNIVERSITY OF
TECHNOLOGY AND DESIGN

Tables

```
First Header | Second Header
------------ | -------------
Content from cell 1 | Content from cell 2
Content in the first column | Content in the second column
```

First Header	Second Header
Content from cell 1	Content from cell 2
Content in the first column	Content in the second column

Activity 1 (10 mins)

- Make a to-do list with 3 categories
  1. To do
  2. In progress
  3. Done

```
#### To do

1. Pray for good fortune

- Temple
- Bell curve god

##### In progress

1. Catching up on **_SLEEP_**

###### Done

1. School
```

To do

1. Pray for good fortune
    - Temple
    - Bell curve god

In progress

1. Catching up on ***SLEEP***

Done

1. School

Inline code

```
I think you should use an `<addr>` element here instead.
```

I think you should use an `<addr>` element here instead.

Syntax highlighting

```javascript
function fancyAlert(arg) {
  if(arg) {
    $.facebox({div:'#foo'})
  }
}
```

```python
def foo():
    if not bar:
        return True
```

Blockquotes

```
As Kanye West said:

> We're living the future so
> the present is our past.
```

As Kanye West said:

> We're living the future so the present is our past.

Works with HTML.

Typora

http://typora.io/

Inline Math

```
The identity matrix is $\left[
    {\begin{array}{cc}
        1 & 0\\
        0 & 1
    \end{array}}
\right]$.

$$ e = mc^2$$
```

The identity matrix is $\begin{bmatrix} 1 & 0 \\ 0 & 1 \end{bmatrix}$.

$$e = mc^2$$

Chemistry

```
$\ce{CH4 + 2 $\left( \ce{O2 + 79/21 N2} \right)$}$
```

$$CH_4 + 2(O_2 + \frac{79}{21}N_2)$$

Introduction to $LaTeX$

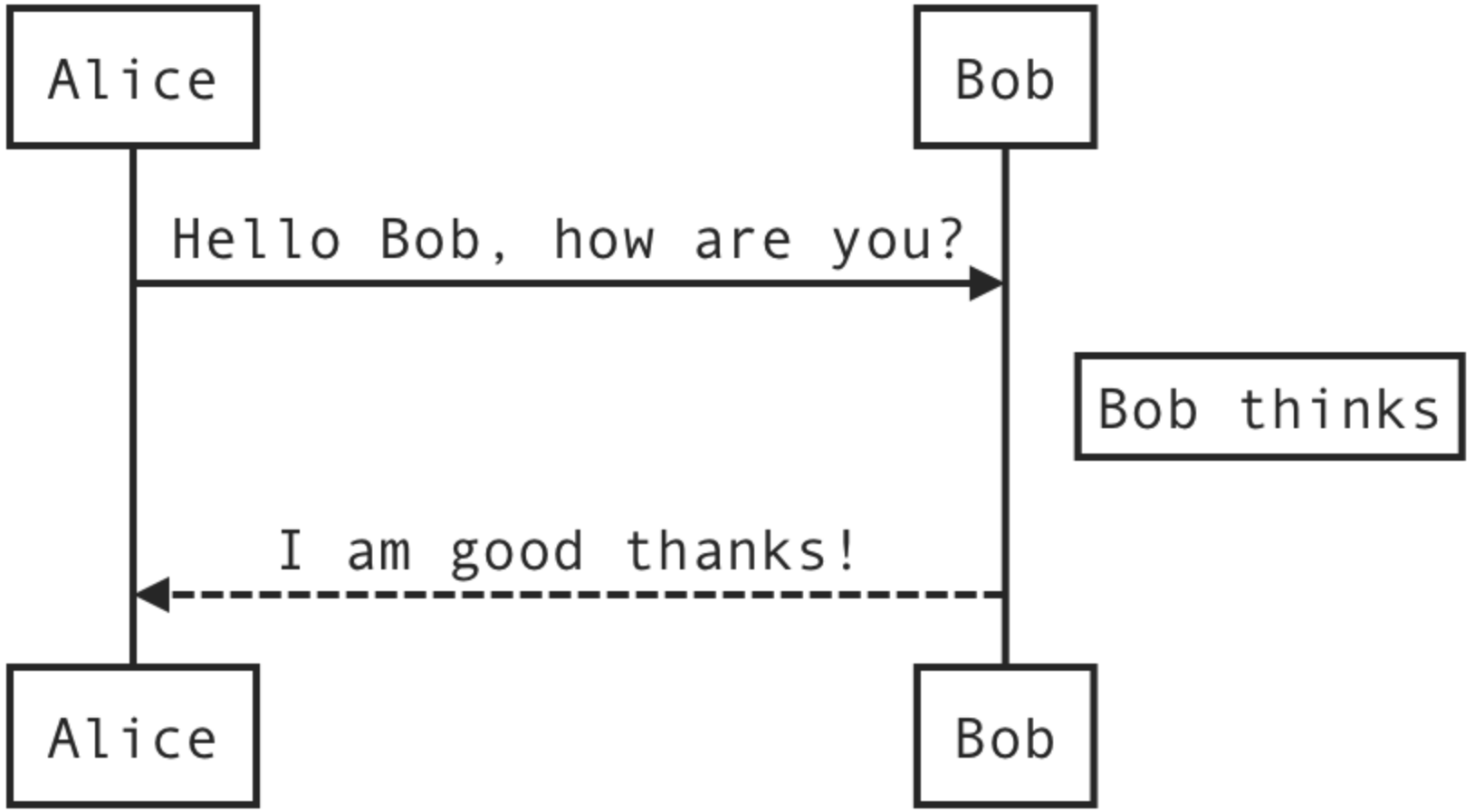
20 January 2020 (Monday)
TT16 (2.201)
7 - 10 pm

Diagrams

UML Sequence

`js-sequence`

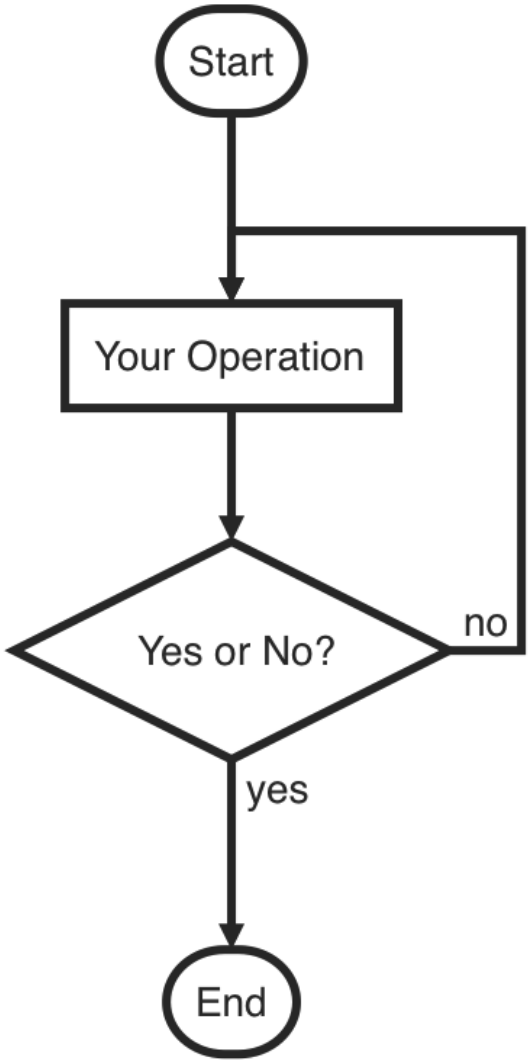
````
```sequence
Alice->Bob: Hello Bob, how are you?
Note right of Bob: Bob thinks
Bob-->Alice: I am good thanks!

```
````


Alice
Bob
Hello Bob, how are you?
Bob thinks
I am good thanks!
Alice
Bob

Flowchart

`flowchart.js`

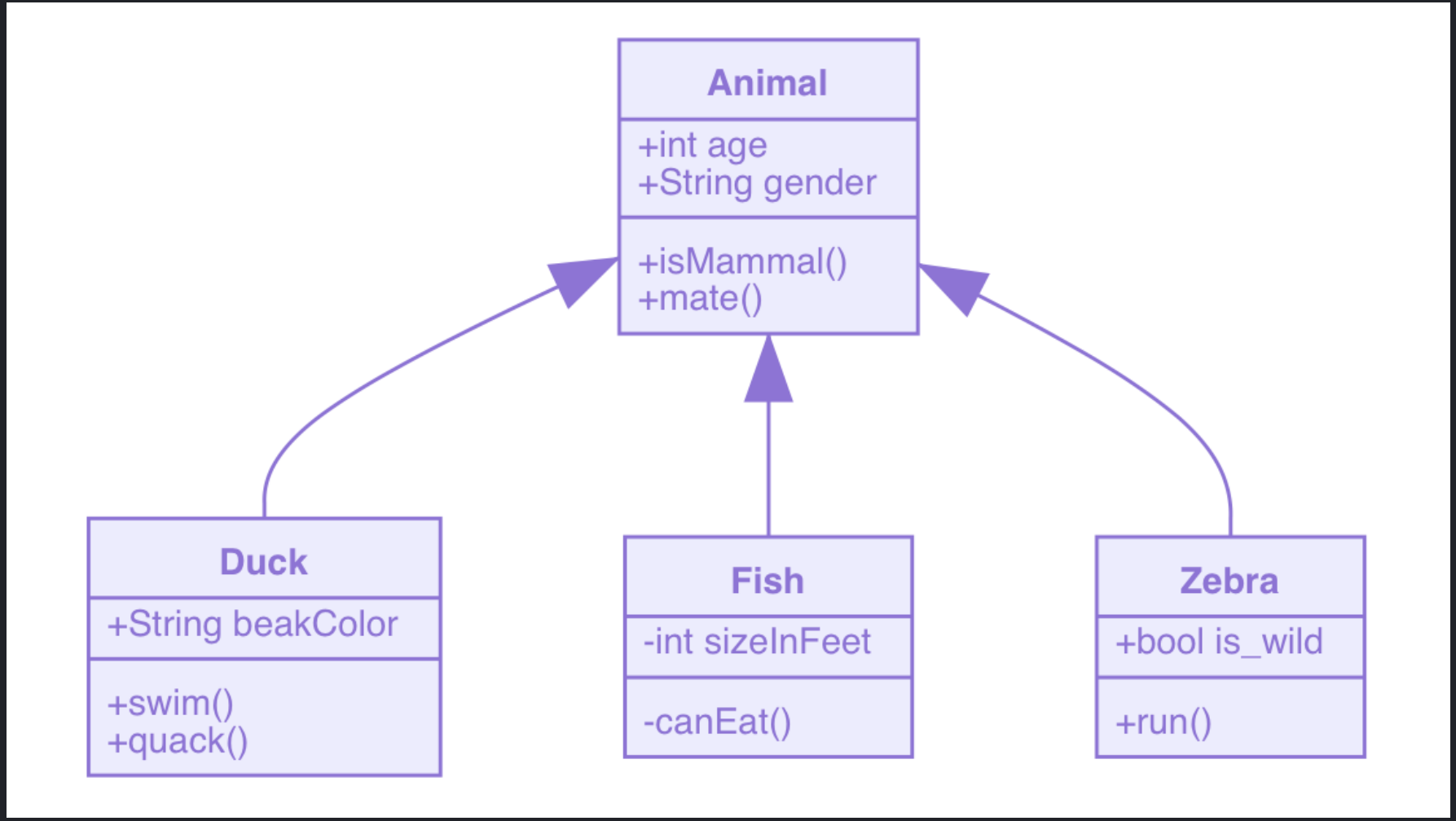
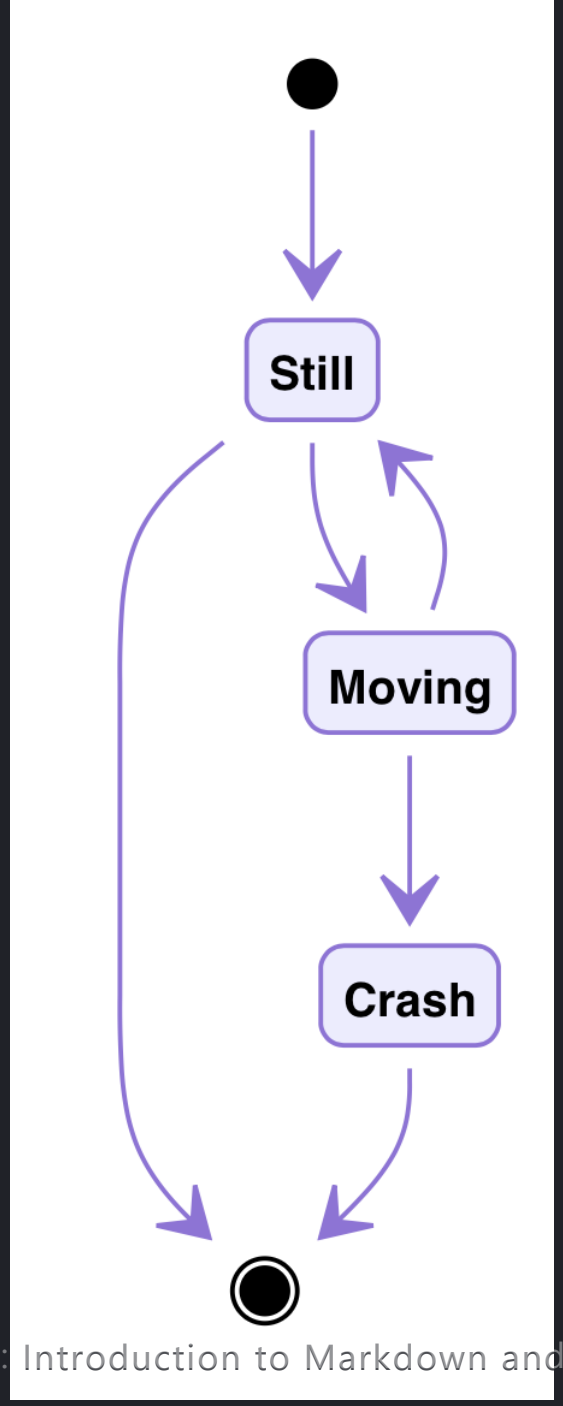
````
```flow
st=>start: Start
op=>operation: Your Operation
cond=>condition: Yes or No?
e=>end

st->op->cond
cond(yes)->e
cond(no)->op
```
````

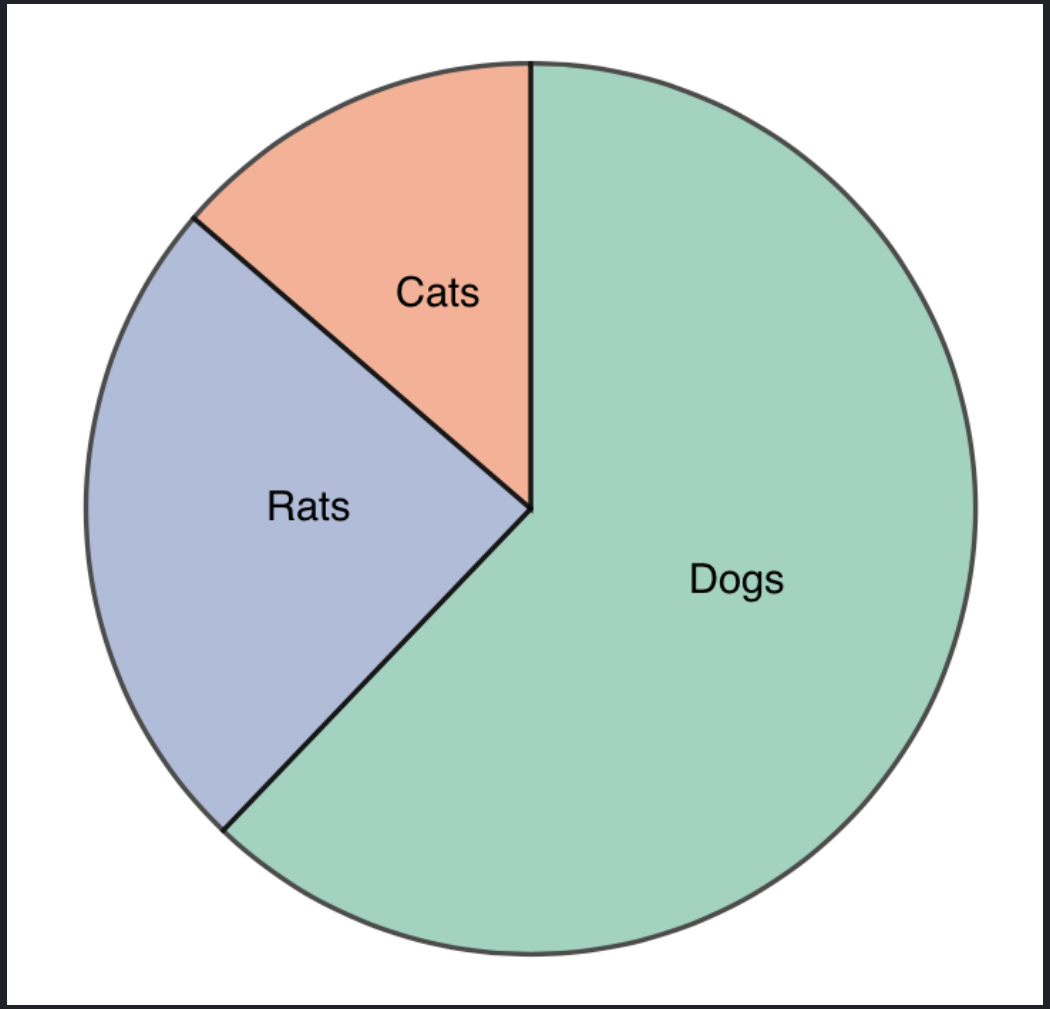

Start
Your Operation
Yes or No?
no
yes
End

Mermaid

`mermaid-js`

Class Diagram

````
```mermaid
classDiagram
      Animal <|-- Duck
      Animal <|-- Fish
      Animal <|-- Zebra
      Animal : +int age
      Animal : +String gender
      Animal: +isMammal()
      Animal: +mate()
````
````

```
class Duck{
    +String beakColor
    +swim()
    +quack()
}
class Fish{
    -int sizeInFeet
    -canEat()
}
class Zebra{
    +bool is_wild
    +run()
}
```


Animal
+int age
+String gender
+isMammal()
+mate()
Duck
+String beakColor
+swim()
+quack()
Fish
-int sizeInFeet
-canEat()
Zebra
+bool is_wild
+run()

State Diagram

````
```mermaid
stateDiagram
    [*] --> Still
    Still --> [*]

    Still --> Moving
    Moving --> Still
    Moving --> Crash
    Crash --> [*]
```
````


Still
Moving
Crash

Pie Chart

````
```mermaid
pie
    title Pie Chart
    "Dogs" : 386
    "Cats" : 85
    "Rats" : 150
```
````


Cats
Rats
Dogs

Pandoc

Swiss-army knife to convert content

Conversion between

- PDF
- Markup formats
- HTML formats
- Ebooks
- XML formats
- TeX formats
- Word processor formats
- Interactive notebook formats

...

Demo

Converting Markdown to PDF

MkDocs

Project documentation with Markdown.

Installing MkDocs

```
pip install mkdocs
```

Material theme for MkDocs

```
pip install mkdocs-material
```

Create a new site

- `cd` to the appropriate folder

```
mkdocs new my-project
cd my-project
```

Editing `mkdocs.yml`

```yaml
site_name: Test
nav:
  - Home: index.md
  - About: about.md
theme:
  name: "material"
```

Serving the site

```
mkdocs serve site
```

- Site up at localhost:8000

Activity 2 (15 min)

- Play around with the Material themed site
- Refer to Getting Started for more customization

Building the site

```
mkdocs build site
```

- By default, files at `/site`

GitHub Pages

Free web hosting for GitHub users

Personal Sites

- at *username*.github.io
- Repository should be '*username*.github.io'
- Source: `master` branch
  - Contents of `\site` to be placed here

Project Sites

- at *username*.github.io/*project*
- Repository can have any name
- Source: `master` branch `/docs` folder
  - Contents of `\site` to be placed inside `/docs`

Activity 3 (5 mins)

Host the website on GitHub.

Powered by

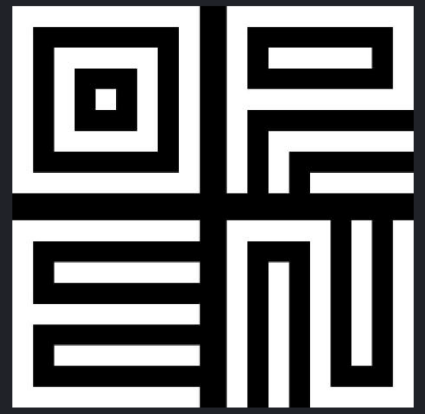
Markdown Presentation Ecosystem

This entire slide deck was done entirely in Markdown.

Source Code

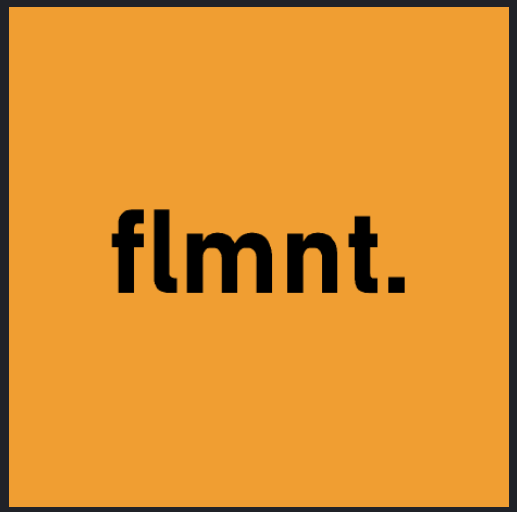
OpenSUTD / IAP2020-MkDocs

OpenSUTD



An open organisation owned
by the SUTD community.

Signing off,



@flamanta