

REACTJS

cd /var/www

sudo mkdir Lab3

สร้างโฟลเดอร์ lab3

```
devuser@server:~$ cd /var/www/  
devuser@server:/var/www$ ls  
expressjs-example  html  lab2  lab3  myapp
```

sudo chown -R \$USER:\$USER Lab3

cd Lab3

npx create-react-app my-react-app

สร้างโฟลเดอร์ my-react-app

```
devuser@server:/var/www/lab3$ ls  
my-react-app  ubuntu-next-app
```

cd my-react-app

nano package.json

เข้าไปที่โฟลเดอร์ my-react-app และแก้ไขไฟล์ package.json เพิ่ม PORT=3001 เพื่อกำหนด port

```
devuser@server:/var/www/lab3$ cd my-react-app  
devuser@server:/var/www/lab3/my-react-app$ nano package.json
```

```
"scripts": {  
  "start": "PORT=3001
```

npm start

Compiled successfully!

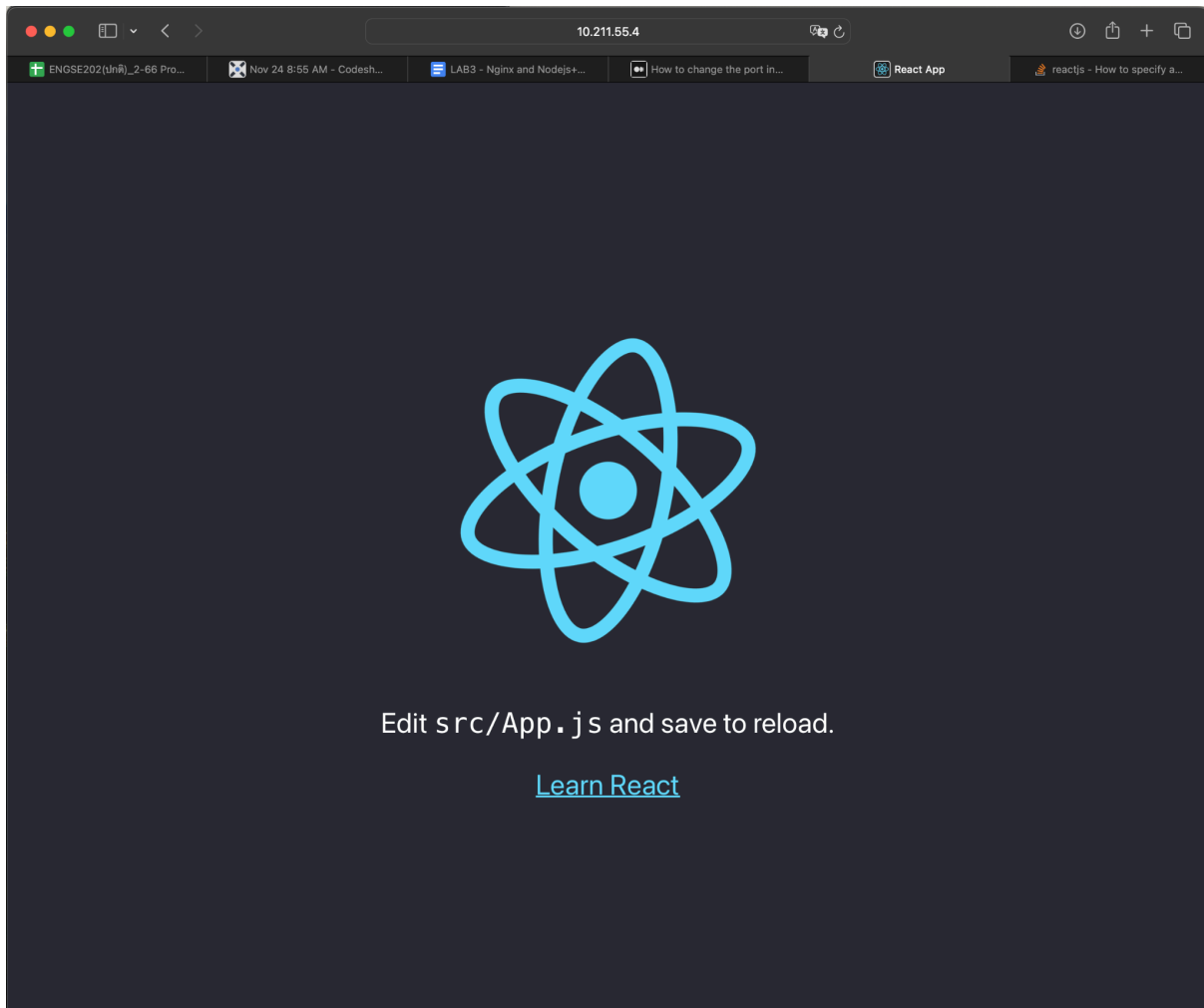
You can now view **my-react-app** in the browser.

Local: http://localhost:3001

On Your Network: http://10.211.55.4:3001

Note that the development build is not optimized.
To create a production build, use `npm run build`.

webpack compiled **successfully**



nextjs

```
cd /var/www/Lab3
```

```
npx create-next-app@latest ubuntu-next-app
```

สร้างโฟลเดอร์ ubuntu-next-app ในโฟลเดอร์ lab3

```
cd ubuntu-next-app
```

```
nano package.json
```

เข้าไปที่โฟลเดอร์ ubuntu-next-app และแก้ไขไฟล์ package.json เพิ่ม -p 3002 เพื่อกำหนด port

```
devuser@server:/var/www/lab3$ cd ubuntu-next-app
devuser@server:/var/www/lab3/ubuntu-next-app$ nano package.json
```

```
"dev": "next dev -p 3002",
"build": "next build",
"start": "next start -p 3002",
```

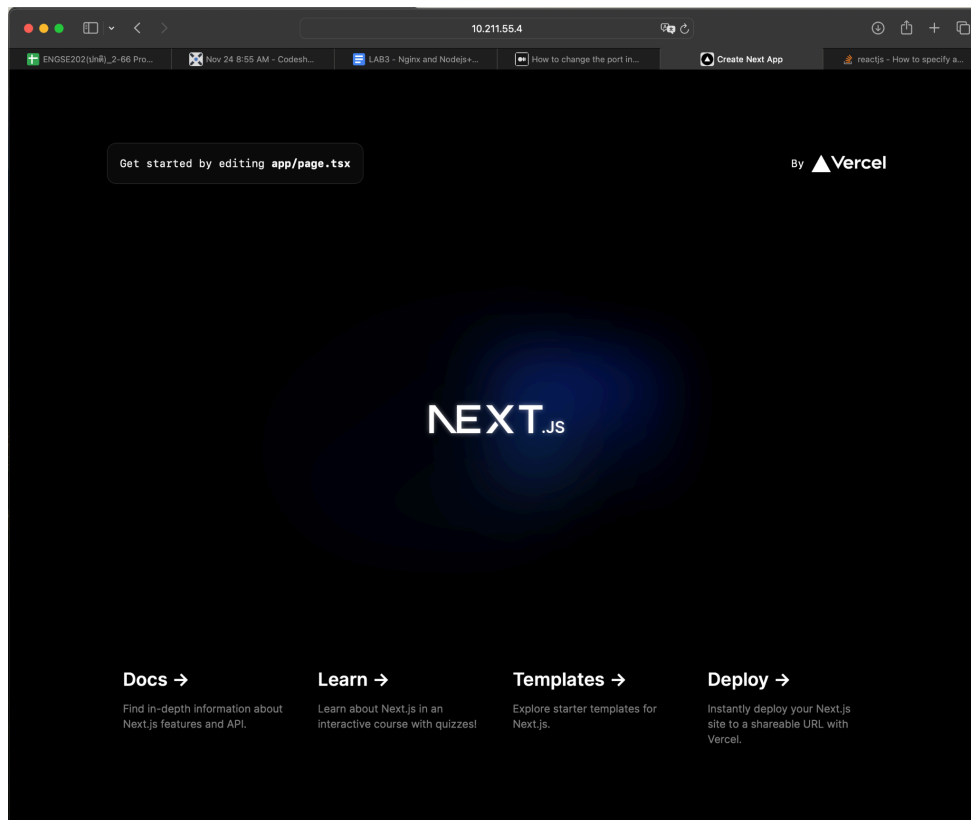
npm start

```
devuser@server:/var/www/lab3/ubuntu-next-app$ npm start

> ubuntu-next-app@0.1.0 start
> next start -p 3002

▲ Next.js 14.0.4
- Local:      http://localhost:3002

✓ Ready in 203ms
```



Server name

```
cd /etc/nginx/sites-available
```

```
sudo cp myapp react-app
```

เข้าไปที่โฟลเดอร์ sites-available

Copy ไฟล์ myapp โดยใช้ชื่อไฟล์ว่า react-app

```
devuser@server:/etc/nginx/sites-available$ sudo cp myapp react-app
devuser@server:/etc/nginx/sites-available$ ls
default expressjs-example myapp react-app recat-app
```

```
server_name my-react-app.se-rmutl.net
```

```
proxy_pass http://127.0.0.1:3001
```

```
GNU nano 6.2 react-app
##
# You should look at the following URL's in order to grasp a solid understanding
# of Nginx configuration files in order to fully unleash the power of Nginx.
# https://www.nginx.com/resources/wiki/start/
# https://www.nginx.com/resources/wiki/start/topics/tutorials/config_pitfalls/
# https://wiki.debian.org/Nginx/DirectoryStructure
#
# In most cases, administrators will remove this file from sites-enabled/ and
# leave it as reference inside of sites-available where it will continue to be
# updated by the nginx packaging team.
#
# This file will automatically load configuration files provided by other
# applications, such as Drupal or Wordpress. These applications will be made
# available underneath a path with that package name, such as /drupal8.
#
# Please see /usr/share/doc/nginx-doc/examples/ for more detailed examples.
##

# Default server configuration
#
server {
    listen 80;
    listen [::]:80;
    server_name my-react-app.se-rmutl.net;

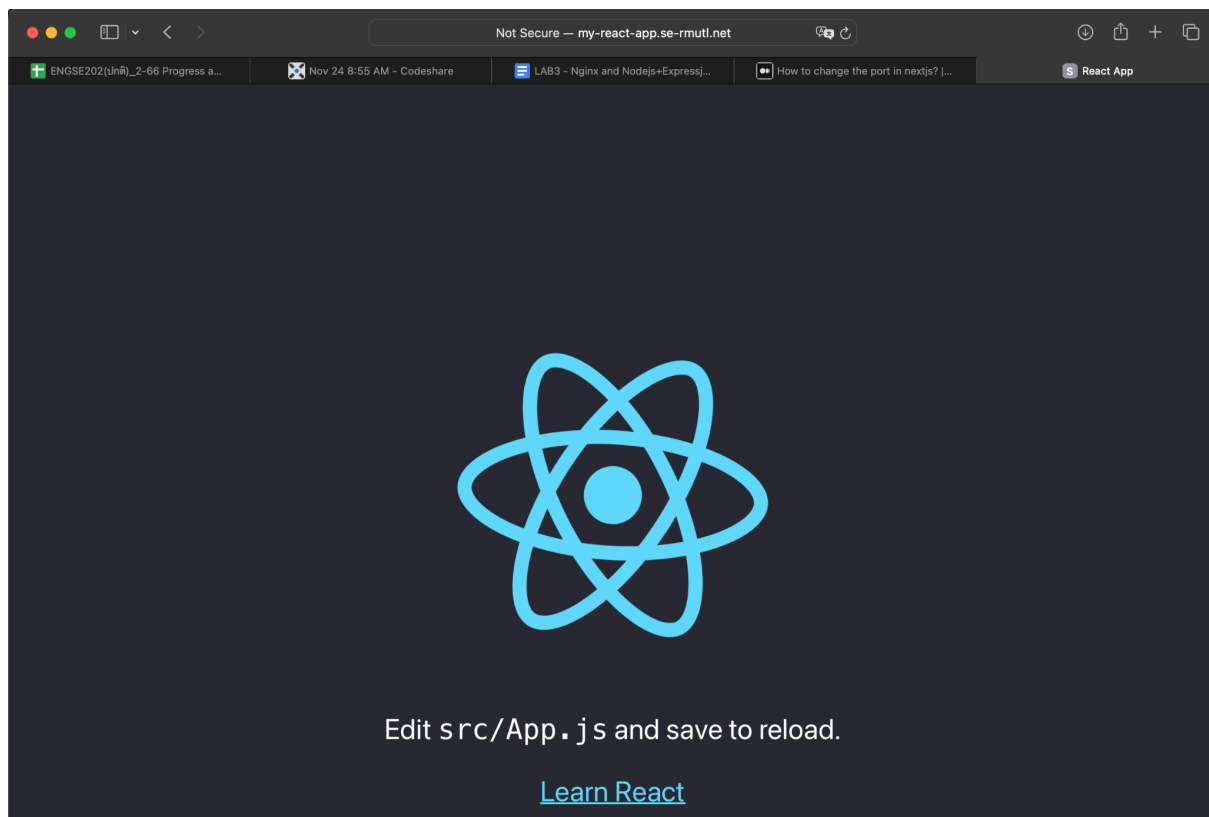
    location / {
        proxy_pass http://127.0.0.1:3001; # !!! - change to your app port
        proxy_http_version 1.1;
        proxy_set_header Upgrade $http_upgrade;
        proxy_set_header Connection 'upgrade';
        proxy_set_header Host $host;
        proxy_cache_bypass $http_upgrade;
    }
}
```

แก้ไขไฟล์ Host ใน Terminal

เพิ่ม 10.211.55.4 my-react-app.se-rmutl.net

```
admin — pico — sudo — 80x24
UW PICO 5.09 File: /etc/hosts Modified
##
# Host Database
#
# localhost is used to configure the loopback interface
# when the system is booting. Do not change this entry.
##
127.0.0.1    localhost engse203.lab1
255.255.255.255 broadcasthost
::1         localhost
10.211.55.4  myapp.se-rmutl.net expressjs-example.se-rmutl.net
10.211.55.4  ubuntu-linux.shared ubuntu-linux #prl_hostonly shared
10.211.55.4  my-react-app.se-rmutl.net
```

^G Get Help **^O** WriteOut **^R** Read File **^Y** Prev Pg **^K** Cut Text **^C** Cur Pos
^X Exit **^J** Justify **^W** Where is **^V** Next Pg **^U** UnCut Text **^T** To Spell



```
cd /etc/nginx/sites-available
sudo cp myapp next-app
เข้าไปที่โฟลเดอร์ sites-available
Copy ไฟล์ myapp โดยใช้ชื่อไฟล์ว่า next-app
```

```
devuser@server:/etc/nginx/sites-available$ sudo cp myapp next-app
devuser@server:/etc/nginx/sites-available$ ls
default expressjs-example myapp next-app react-app recat-app
devuser@server:/etc/nginx/sites-available$
```

```
server_name ubuntu-next-app.se-rmutl.net
proxy_pass http://127.0.0.1:3002
```

```
GNU nano 6.2 next-app
##
# You should look at the following URL's in order to grasp a solid understanding
# of Nginx configuration files in order to fully unleash the power of Nginx.
# https://www.nginx.com/resources/wiki/start/
# https://www.nginx.com/resources/wiki/start/topics/tutorials/config_pitfalls/
# https://wiki.debian.org/Nginx/DirectoryStructure
#
# In most cases, administrators will remove this file from sites-enabled/ and
# leave it as reference inside of sites-available where it will continue to be
# updated by the nginx packaging team.
#
# This file will automatically load configuration files provided by other
# applications, such as Drupal or Wordpress. These applications will be made
# available underneath a path with that package name, such as /drupal8.
#
# Please see /usr/share/doc/nginx-doc/examples/ for more detailed examples.
##

# Default server configuration
#
server {
    listen 80;
    listen [::]:80;
    server_name ubuntu-next-app.se-rmutl.net;

    location / {
        proxy_pass http://127.0.0.1:3002; # !!! - change to your app port
        proxy_http_version 1.1;
        proxy_set_header Upgrade $http_upgrade;
        proxy_set_header Connection 'upgrade';
        proxy_set_header Host $host;
        proxy_cache_bypass $http_upgrade;
    }
}
```

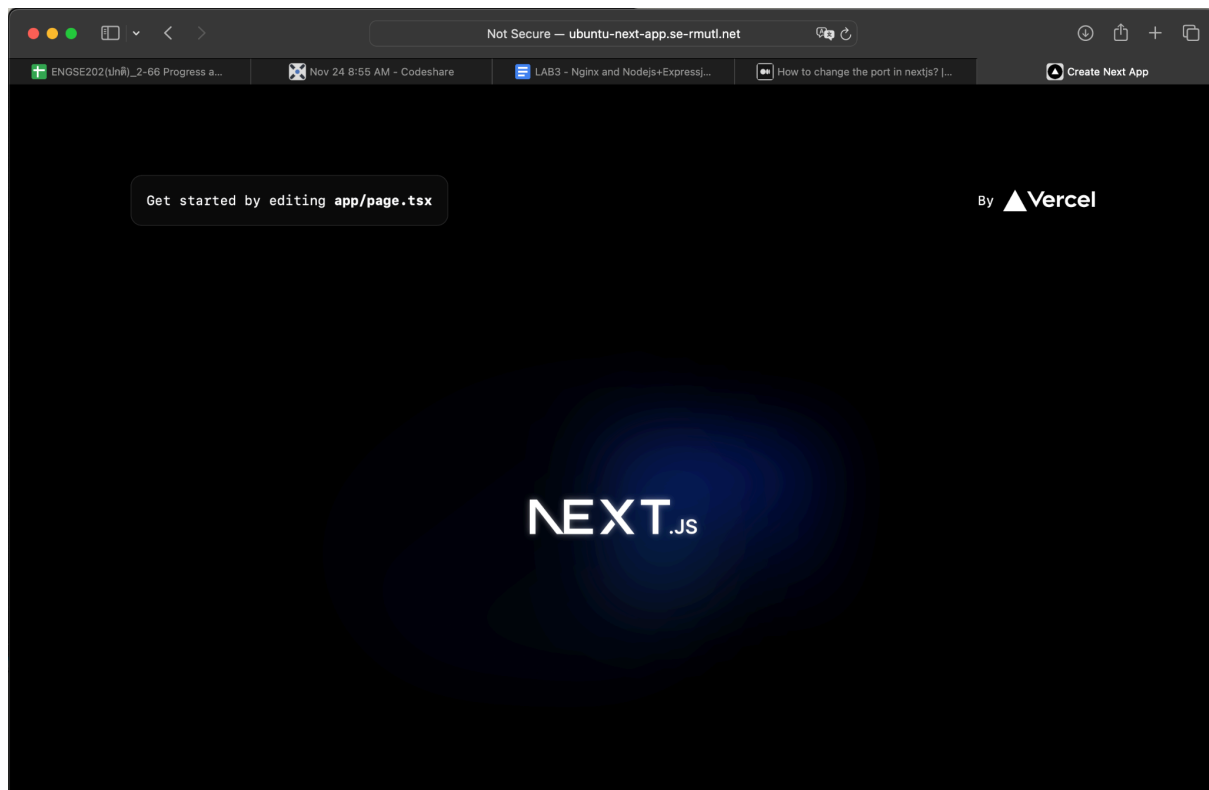
แก้ไขไฟล์ Host ใน Terminal

เพิ่ม 10.211.55.4 ubuntu-next-app.se-rmutl.net

```
admin — pico — sudo — 80x24
UW PICO 5.09 File: /etc/hosts

##
# Host Database
#
# localhost is used to configure the loopback interface
# when the system is booting. Do not change this entry.
##
127.0.0.1    localhost engse203.lab1
255.255.255.255 broadcasthost
::1         localhost
10.211.55.4  myapp.se-rmutl.net expressjs-example.se-rmutl.net
10.211.55.4  my-react-app.se-rmutl.net
10.211.55.4  ubuntu-linux.shared ubuntu-linux #prl_hostonly shared
10.211.55.4  ubuntu-next-app.se-rmutl.net

^G Get Help ^O WriteOut ^R Read File ^Y Prev Pg ^K Cut Text ^C Cur Pos
^X Exit    ^J Justify  ^W Where is ^V Next Pg ^U UnCut Text ^T To Spell
```



Install pm2

```
devuser@server:~$ sudo npm install pm2 -g
npm WARN deprecated uuid@3.4.0: Please upgrade to version 7 or higher. Older versions may use Math.random() in certain circumstances, which is known to be problematic. See https://v8.dev/blog/math-random for details.

added 157 packages in 6s

13 packages are looking for funding
  run `npm fund` for details
```

เข้าไปที่โฟลเดอร์ my-react-app และ ubuntu-next-app

แล้วใช้คำสั่ง

pm2 start - -name my-react-app npm - - start

และ

pm2 start - -name ubuntu-next-app npm - - start

เพื่อให้ pm2 เปิดการทำงานของ my-react-app และ ubuntu-next-app ได้พร้อมกัน

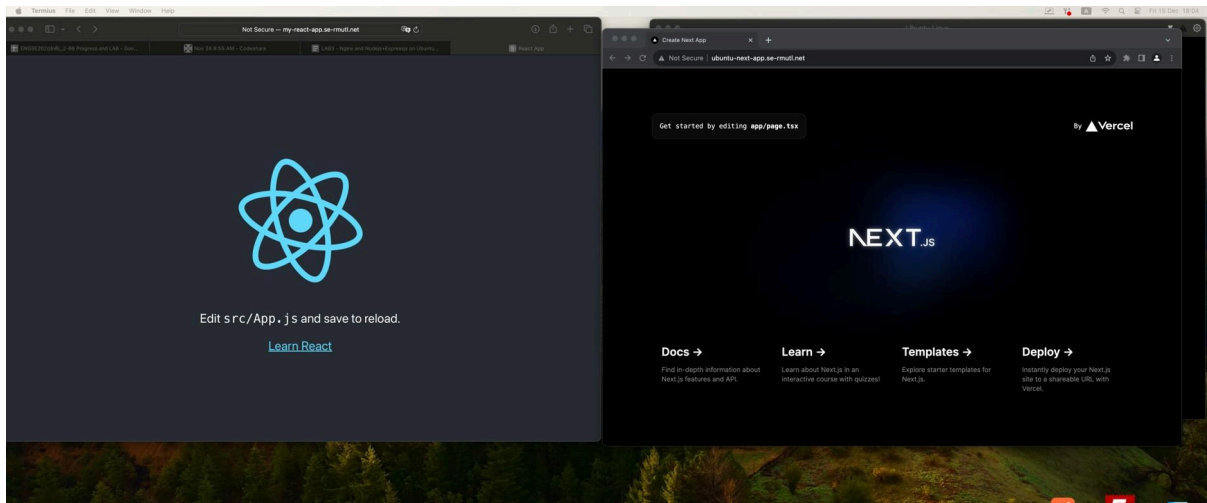
```
10.211.55.4 devuser@server:/var/www/lab3/my-react-app$ pm2 start --name my-react-app npm -- start
10.211.55.4 [PM2] Starting /usr/bin/npm in fork_mode (1 instance)
10.211.55.4 [PM2] Done.
10.211.55.4
10.211.55.4
```

id	name	namespace	version	mode	pid	uptime	ง	status	cpu	mem	user	watching
0	my-react-app	default	N/A	fork	2005	0s	0	online	0%	28.2mb	devuser	disabled

```
devuser@server:/var/www/lab3/my-react-app$ cd ..
devuser@server:/var/www/lab3$ ls
my-react-app  ubuntu-next-app
devuser@server:/var/www/lab3$ cd ubuntu-next-app
-bash: cd: ubuntu-next-app: No such file or directory
devuser@server:/var/www/lab3$ cd ubuntu-next-app
devuser@server:/var/www/lab3/ubuntu-next-app$ pm2 start --name ubuntu-next-app npm -- start
[PM2] Starting /usr/bin/npm in fork_mode (1 instance)
[PM2] Done.
```

id	name	namespace	version	mode	pid	uptime	ง	status	cpu	mem	user	watching
0	my-react-app	default	N/A	fork	2425	116s	9	online	0%	58.2mb	devuser	disabled
1	ubuntu-next-app	default	N/A	fork	2525	0s	0	online	0%	3.4mb	devuser	disabled

```
devuser@server:/var/www/lab3/ubuntu-next-app$
```



66543210033-7 สรพัต สภาพ