

EMPLOYMENT

Backend Engineer, Intern	Arch17	Aug 2018 – Jan 2019
<ul style="list-style-type: none">• Implemented a pop-up notification system to display the latest activity & updates.• Extended, maintained a shopping cart system that enables users to purchases online.• Developed an advanced search engine that helps users explore new furniture.• Enhanced, maintained the business center system that enables users/stores to add & edit their products.• Implemented various custom modules to handle Referrer-Redirection, Media Uploading, and Image editing.• Implemented a blogging system that helps designers explore & Showcase their projects.• Tech stack: PHP, MySQL, CodeIgniter, Git, Linux.		

EDUCATION

Mansoura, Egypt	University of Mansoura	2014 – 2018
<ul style="list-style-type: none">• B.Sc., Faculty of Computer and Information Science, Computer Science department.• Projects: -<ul style="list-style-type: none">○ AI agent to solve Knights Tour Using IDS Algorithm.○ Image Processing: Segmentation Using Otsu Threshold Method.○ Programming Language Design using GOLD Builder System.○ Simple Video Sharing Website using PHP.○ NLP tool: text prediction and spelling correction.		

TECHNICAL EXPERIENCE AND SELECTED PROJECT

- **Stock Market Decision Support System using Deep Learning & Sentiment Analysis.** ([Link](#))
An intelligent decision support system that creates a composite index for each company based on the future prediction of company's stock price from deep learning neural networks, and the result obtained from the sentiment analysis of company's related news. To assist the nonfinancial expert users, this composite index is scored up to three, and higher values indicate more safety decisions.
Tech stack: Python; Keras; PHP; Scikit-learn; Numpy; Pandas; Matplotlib; Textblob.
- **Arabic NLP tool used to perform Text Search, POS tagging, Translation, and diacritization.** ([Link](#))
Tech stack: Python; NLTK; Pyramorph; Tashkeela.
- **Python package to Fetch & Analyze Stock Market data.** ([Link](#))
Download Historical Data, Collect & Analyze News related to a certain stock, provide some visual, preform Empirical Mode Decomposition to extract the trend signal.
Tech stack: Python; Numpy; Pandas; Textblob; Matplotlib.
- **Stock Market Prediction Using Neural Network Models.** ([Link](#))
Predict the daily closing price using Keras models (Backpropagation, Radial Basis Function, and Recurrent)
Tech stack: Python; Numpy; Pandas; Keras.
- **Image Segmentation Using Otsu Threshold Method.** ([Link](#))
Pure Python implementation of Otsu thresholding algorithms that is used to perform automatic image thresholding that separate pixels into two classes, foreground and background.
Tech stack: Python 2, Numpy, Matplotlib, PIL.
- **GUI software to Encrypt\Decrypt file(s) using Advanced Encryption Standard (AES).** ([Link](#))
Tech stack: Python; Pycrypto, Tkinter.
- **Web crawling and scanning tool.** ([Link](#))
INetSC is a tool used to Crawl & Scan (Domain & Server info, robot file, and sitemap) Websites.
Tech Stack: Python, requests, pywhois, Nmap, BeautifulSoup, TLD.

ADDITIONAL EXPERIENCE

- **IbTIECar Innovative Projects:** Shortlisted & Qualified to the Final Round of IBTIECAR2018 competition for the AI and Federated Machine Learning Track. (2019)
- **Problem solving:** Solved 200+ algorithmic & mathematical problems on multiple online judges.
- Public Relations **Volunteer** at ACM Mansoura SC. (2016-2017).
- Participated in **Problem solving competitions** SnackDown (2017) & A2OJ Code battle (2017).
- Trainee at PST {Problem solving program for beginners}. (2017)
- **Summer Internship** at ITI Mansoura {Open Source Development} (Jul 2017 – Sep 2017)
- **Contributed** to Falcon & naftawayh. (Open Source Projects)

Languages and Technologies

- PHP; Python; C++; C#.NET; Ruby.
- CodeIgniter; Django; Keras; Linux; Git.
- HTML; CSS; Javascript; AJAX; JSON; Bootstrap.
- Microsoft SQL Server; Anaconda; XXAMP; phpmyadmin; MySQL Workbench.