

# Brainhack Computing : Hands on in Python



## Overview

**SPIT presents to you,**

**IEEE Sponsored 3-days workshop on “Brainhack Computing: Hands on in Python”**

Major organizations such as Google and Microsoft are using R and Python as a programming language and a statistical tool. With its contribution in Data Analytics, it has gained a booming popularity.

We at SPIT- stand by the aim to train and prepare the students to their best of abilities. We are organizing a three-day hands on workshop on Python programming, where you'll learn:

- Understanding basics of programming in Python, its packages, and tools.
- Read and write medical imaging data in standard formats.
- Manipulate and visualize medical imaging data using Python Packages/tools.
- Apply machine vision approach to neuroimaging data.

This course is designed as an introductory course in medical image processing and analysis for engineers and quantitative scientists, including students and faculty. This course will also have several hands-on segments that will allow the students to get a first-hand feel of the opportunities and challenges in medical image analysis. Course participants will learn these topics through lectures and hands-on experiments. Also, case studies and assignments will be shared to stimulate research motivation of participants.

Dates : 11<sup>th</sup> to 13<sup>th</sup> July, 2018

Venue :Room 503, Sardar Patel Institute of Technology, Munshi Nagar, Andheri (W)

<b>Modules:</b>	<p>A: 11<sup>th</sup> July, 2018 – Neuroimage Basics with focus on DICOM and NifTI format</p> <p>B: 12<sup>th</sup> July, 2018 – Neuroimage Processing techniques with focus on fMRI</p> <p>C: 13<sup>th</sup> July, 2018 – Case study with Machine Vision approach.</p> <p><b><u>Number of participants for the course will be limited to 25.</u></b></p>
<b>You should attend if you are:</b>	<ul style="list-style-type: none"> <li>• Engineers, faculty, researchers, scientists, physicians, and clinicians at universities,colleges, hospitals, government organizations, and R&amp;D laboratories.</li> <li>• Students at all levels (B.Tech./ M.Sc./ M.Tech./ Ph.D.) from reputed academic institutions interested in computer vision or medical image analysis.</li> </ul>
<b>Course Registration Fees:</b>	<p>The participation fees (inclusive of 18% GST) for taking the course are as follows:</p> <ul style="list-style-type: none"> <li>• Fees (non IEEE members) : ₹ 1500</li> <li>• Fees (IEEE members) : ₹ 1200</li> <li>• The above fee includes all instructional materials, computer use for tutorials and assignments,laboratory equipment usage charges, 24-hour free internet facility, and food (high tea, lunch and breakfast)</li> </ul>

## SPEAKERS



Prof. Jani has completed PhD (Electrical Engineering) from University of Technology, Sydney, Australia, M.Eng.Sc (Digital Communication) from University of New South Wales, Sydney, Australia and B.E. (Electronics and Communication) Gujarat University, Ahmadabad, India. Her area of interest is Wireless Communication, Network Security, Algorithms (Compression, Bioinformatics), Satellite Communication and Cognitive Radio. Prof. Jani numerous inventions, Patents and publications in her name.



Prof. Lynette has completed M.E. (Telecommunication) and B.E. (Electronics and telecommunication). Her area of interest is Digital Signal Processing and Signal and System.



Prof. Aayesha has completed Master of Engineering (Electronics and Telecommunication Engineering), S.P.I.T, Andheri and Bachelor of Engineering (Electronics and Telecommunication Engineering), M.H. Saboo Siddik COE, Byculla. She did a one year internship at Society for Applied Microwave Electronics Engineering & Research (R&D of DIT, Govt of India). Her area of Interest is Image Processing and Signal Processing.

### **Registration :**

Please fill online registration on <https://goo.gl/forms/zC57jo859Rk9r2AE2>

### **Contact persons for registration:**

Prof. Aayesha Hakim (EXTC Dept. Room No. 506)  
aayesha.hakim@spit.ac.in  
8850939766

Prof. Sneha Weakey (EXTC Dept. Room No. 507-B)  
sneha\_15weakey@spit.ac.in  
9766246393

### **Course fees Payment Mode:**

Registration charges of Rs. 1500/-- in the form of Cash should reach to us on or before 06<sup>th</sup> July, 2018. Charges will not be returned if candidate is selected and does not attend the course.

## REGISTRATION FORM

Name: \_\_\_\_\_

Designation: \_\_\_\_\_

Qualification: \_\_\_\_\_

Experience: \_\_\_\_\_

Institution: \_\_\_\_\_

Email: \_\_\_\_\_

Tel: (O) \_\_\_\_\_ (Extn.) (M) \_\_\_\_\_

Payment by Cash to reserve the slot on or before 06<sup>th</sup> July, 2018 to one of the contact persons at S.P.I.T.

Signature of the participant :

**Program Coordinator**

Dr Preetida Jani, Professor, EXTC  
Prof Lynette Pereira, EXTC

**Course Co coordinators**

Aayesha Hakim (Assistant Professor, EXTC)  
Sneha Weakey (Assistant Professor, EXTC)

**Deputy HOD (EXTC)**

Prof. D.D. Ambawade

**R &D Dean**

Dr. Y.S. Rao

**Principal**

Dr. Prachi Gharpure