



# Leatile Marata

## Telecommunications and Electronics Engineer

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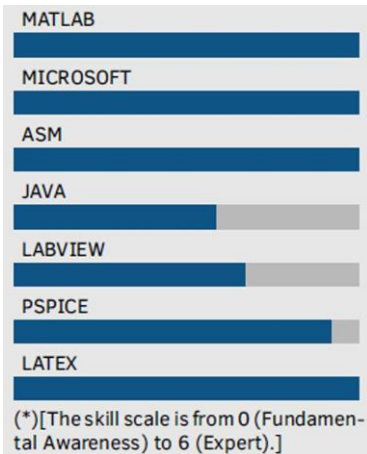
### Mail

[ltmarata@gmail.com](mailto:ltmarata@gmail.com)

### Web

<https://www.linkedin.com/in/leatile-marata>

### Computer Literacy



### Languages

English ★★★★★  
 Spanish ★★★★★  
 French ★☆☆☆☆  
 Chinese ★☆☆☆☆

A sound educational background with a Bachelors of Engineering and M.Eng. Telecommunications Engineering specializing in Bayesian Statistical signal processing combined with more than 4 years worth of experience. Very flexible to do most jobs but love working as a researcher, educator, advisor or in a position that involves ground breaking research in signal processing algorithms for molecular communications. TeraHertz communications, electronics, telecommunications systems engineering, telemedicine, 5G, convex optimization etc. Willing to be proactive and efficient at all times.

### Education

Nov. 14 - March 17 **MEng-Telecommunications Engineering**

[Botswana International University of Science and Technology](#)

A research masters with specialization in Bayesian particle estimation methods for tracking problems.

*Title of the Thesis: "Non-Gaussian noise suppression for autonomous object tracking "*

Aug. 08 - June 13

**BEng (Hons)-Telcommunications and Electronics Engineering**

[Universidad Central de Las Villas](#)

Main subjects: Analog Electronics, Mobile Communications, Microprocessors, Digital Communications, Analog communications, Digital Signal Processing, Radio communications, Networking, Digital Image Processing, An-tenna theory and Electromagnetic field theory.

*Title of the Thesis: "Interchange of WPA-PSK key using QR codes " GPA of 4.01 / 5.00*

### Publications

1. Non-Gaussian noise suppression for Autonomous object tracking, sub-mitted for International Journal of Engineering Science and Technology, Elsevier, *Science Direct*, 2017 (Under review)
2. Assumption free noise suppression for autonomous tractors Tracking, *IEEE RADIO conferece proceedings, Mauritius, 2016* (Accepted)
3. Fading channel coeffiecient estimation using Particle filtering, *BIUST symposium, 2017* (Accepted)
4. Automatic channel Allocation, *BIUST symposium, 2017* (Accepted)
5. Improving Cellular Network Performance through Better Propagation Process for Quality Cellular Service in Botswana, *BIUST symposium, 2017* (Accepted)
6. Erroneous assumptions on signal smoothing: double exponential case, *BIE conf, 2014* (Accepted)

## Experience

- 2017 - Now **Teaching Instructor** [Botswana International University of Science and Technology](#)  
Responsible for teaching undergraduates laboratories and tutorials in the department of Electrical, Computers and Telecommunications. Some of the modules I am responsible for are Wireless and mobile communication, Satellite Communications, Digital Signal Processing, analog communications, digital communications, electromagnetic field theory, Computer networks, internet technology, and digital electronics. I am also responsible for grading and keeping records for students' performance.
- 2014 - 2016 **Teaching Assistant** [Botswana International University of Science and Technology](#)  
Responsible for assisting in teaching undergraduates laboratories and tutorials in the department of Electrical, Computers and Telecommunications. Some of the modules I am responsible for are analog communications, digital communications, electromagnetic field theory, Computer networks, internet technology, and digital electronics. I am also responsible for grading and keeping records for students' performance.
- 2013-2014 **Physics Teacher** [Ministry of Eductaion, Skills and Development](#)  
I was responsible for teaching the Physics syllabus for Botswana General Certificate of Secondary Education as prescribed by the ministry of education. I was responsible for designing appropriate teaching plans, teaching aids, laboratories, making notes as well as grading and keeping records of the student marks. I also took part in the Maths and Science club which was responsible for grooming research orientated students.
- 2013 **Trainee Network Engineer** [Copextel S.A](#)  
I took part in designing local area network plans for customer companies, Installed and maintained VOIP Software packets. I also took part in the design of antennas for radio communications. Also designed a system of Interchange of WPA2-PSK Information for Android Mobile Devices using QR Codes.

## Key Skills and Attributes

### **Unique Communication, Social, Networking and Interpersonal Skills**

Excellent oral and written communication skills developed through employment and academic study. Very confident and outspoken, full of life and energy at most.

### **Team player and Coordinator**

Gained team work experience from academic group work and work experience. Find working in groups to be exciting and captivating.

### **Confidence And willingness to Improve Results**

Display confidence towards any issue, always positive, trying to look for the good side of things and always yearning for improvements.

## Other courses and Training

- Sept.07 - Jun.08 **Preapatory Spanish Language Course** [Universidad de Granma](#)  
Basic spanish lanugage with foundations of Engineering mathemtics, Technical drawings and Physics.
- 2015 **Antenna Measuring System and Radar Measuring System** [BIUST](#)

Introduction to RADAR laboratory system

## Awards

2013

**Overall best academic performing International student for the Faculty  
of Electrical Engineering**

[Universidad Central de Las  
Villas](#)

# Affiliations/Memberships

Graduate Engineer

Engineering Regulatory Board

Provisional Trainer

Botswana Qualifications Authority

## Referees

1. Prof J. M. Chuma

Head Of Department-Electrical, Computers and Telecommunications  
College of Engineering Botswana  
Email: chumaj@biust.ac.bw Tel: +267 7072858

2. Prof A. Yahya

Professor-Electrical, Computers and Telecommunications  
College of Engineering Botswana  
Email: yahyaa@biust.ac.bw Tel: +267 75208674

3. Dr Ibo Ngebani

Senior Lecturer  
Department of Electrical Electronics and  
Telecommunications University of Botswana  
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*Leatile Marata*

*July 20, 2018*