PROF. DR. SEDDEQ GHRARE

AFFILLATION

Prof. SEDDEQ GHRARE (PhD)
University of Gharyan
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SKILLS & ABILITIES

Platform	: Windows Operating System
Applications	: MATLAB / C++ / Python / Electronic Workbench
Others	: Microsoft Office / Microsoft Visio

EXPERIENCE

- **PROFFESSOR**

April 2023 till Present
Faculty of Engineering, University of Gharyan

- **DEAN**

September 2020 To August 2023
Faculty of Engineering, University of Gharyan

- **ASSOCIATE PROFFESOR**

April 2019 To March 2023
Faculty of Engineering, University of Gharyan

- **DIRECTOR OF INTERNATIONAL COOPERATION OFFICE**

March 2018 To August 2023
University of Gharyan

- **HEAD OF DEPARTMENT**

September 2019 To August 2017
Dept of EEE , Faculty of Engineering ,University of Gharyan

- **VISITING SENIOR LECTURER**

February 2015 To January 2017
Northern University of Malaysia, (UUM)

- **HEAD OF DEPARTMENT**

August 2013 To January 2015
Student Affairs and Registration Office, Faculty of Engineering, University of Gharyan.

- **HEAD OF DEPARTMENT**

May 2012 To July 2013
Dept. of Computer Science, Faculty of Science, University of Gharyan.

- **VISITING SENIOR LECTURER**

January 2011 To February 2012
Technical University of Malaysia (UTeM)

EDUCATION	**PHD - NATIONAL UNIVERSITY OF MALAYSIA. (UKM)** Electrical & Electronic Engineering **M.ENG- NATIONAL UNIVERSITY OF MALAYSIA. (UKM)** Electrical & Electronic Eng. (Communication Engineering) **MSC- UNIVERSITY OF PUTRA MALAYSIA. (UPM)** Electrical & Electronic Eng. (Computer Engineering) **BSC. THE HIGHER INSTITUTE OF ELECTRONICS, LIBYA** Electrical & Electronic Eng. (Computer Engineering)
AWARDS	- International Education Scholarship awarded for Master of Science Degree Program by the Libyan Government. - International Education Scholarship awarded for Master of Engineering Degree Program by the Libyan Government. - International Education Scholarship awarded for PhD Degree Program by the Libyan Government. - Libyan Innovation Prize (LIP2019) for the best B.Sc graduation project
RESEARCH AREA	Data Encryption Digital Image Processing
ACADEMIC COMMITTEES	- Organizing Committee Member of the Regional Postgraduate Engineering Conference (EPC'2009), Putra Jaya, Malaysia, October 20-21, 2009. - Organizing Committee Member of the Workshop on English for Academic Writing, UKM (12-13 January 2010). - Organizing Committee Member of the Libyan International Conference on E-Government (egov2012), Tripoli 14-15 July 2012 - Organizing Committee Member of the First Conference on Technical Education, Zawia 16-17 January 2013 - Technical Program Committee member of the 2015 IEEE International Conference on Signal and Image Processing Applications (ICSIPA), 19-21 October 2015, Kuala Lumpur, Malaysia. http://spsocmalaysia.org/icsipa2015/ - Scientific Committee Member of the 2016 **IEEE** International Conference SETIT'2016 (Science of Electronics, Technologies of Information and Telecommunications),18-20 December 2016, Tunis, Tunisia. http://www.setit.rnu.tn/ - Scientific Committee Member of the 2018 IEEE International Conference SETIT'2018 (Science of Electronics, Technologies of Information and Telecommunications) , 18-20 December 2018, Genoa-Italy/Hammamet-Tunisia. http://www.setit.rnu.tn/ - Technical Program Committee Member, International Conference On Information Technology & Digital Applications 2018, (ICITDA-2018), April 6-7, 2018, Jaipur, India, https://jecrcconference.in/icitda/index.html - Scientific Committee Member of the 2022 IEEE International Conference SETIT'2022 (Science of Electronics, Technologies of Info`rmation and Telecommunications), 19-21 March 2022, Genoa-Italy/Hammamet-Tunisia. http://www.setit.rnu.tn/ - Scientific Committee Member of the First Scientific Conference on Information Technology and Computer Sciences (SCiTCS2022). Faculty of Information Technology, Zawia Umiversity. 21-22 Feb 2022. - Scientific Committee Member of the First International Conference on Artificial Intelligence in Libya (FICAILY2025). July 09, 10 2025. Tripoli, Libya, https://www.gena-ai-libya2025.com/ - Scientific Committee Member of the First International Conference on Electrical and Electronic Engineering (ICEEE2025), 04 October 2025, Gharyan, Libya.
SELECTED PUBLICATIONS	**S.E. Ghrare**, Mohd. Alauddin Mohd. Ali, M.Ismail, K.Jumari, "*Diagnostic Quality Evaluation of Compressed Medical Images for Telemedicine Applications*". The 6th International Conference on Informatics and Systems (INFOS2008). Cairo, Egypt. March 27-29, 2008

S.E. Ghrare, Mohd. Alauddin Mohd. Ali, M.Ismail, K.Jumari, "*Diagnostic Quality of Compressed Medical Images: Objective and Subjective Evaluation*". IEEE Transactions of the Second Asia International Conference on Modeling & Simulation (AMS'2008), Kuala Lumpur, Malaysia, May 13-15, 2008 indexed by *SCOPUS*

S.E. Ghrare, Mohd. Alauddin Mohd. Ali, M.Ismail, K.Jumari. (2008). "T*he Effect of Image Data Compression on Diagnostic Information Quality of Compressed MRI for Telemedicine Applications*", The 4th International Computer Engineering Conference (ICENCO'2008), Cairo, Egypt, December 29-30, 2008

S.E. Ghrare, Fituri H. Belgassem, Abdulbasit Nigrat (2009) "*Algorithms for the Fast Computation of PWL and PHL Transforms*", World Congress on Science, Engineering and Technology (WCSET 2009), February 25-27, 2009, Penang, Malaysia

S.E. Ghrare, Mohd. Alauddin Mohd. Ali, K. Jumari and M. Ismail, "*Development of an Efficient Near Lossless Coding Algorithm for Medical Images*", Regional Postgraduate Engineering Conference (EPC'2009), Putra Jaya, Malaysia, October 20-21, 2009.

S.E.Ghrare, S.M Shreef, "*Quality Evaluation of Compressed MRI Medical Images for Telemedicine Applications*" ,: International Conference on Communications Engineering and Technology ICCET 2012 , Penang, Malaysia, December 6-7, 2012.

S.E.Ghrare, T.A. Haddud, "*Effect of Data Compression on Diagnostic Accuracy in Compressed Computed Tomography Images* ", The 1st International Conference on Electrical and Computer Engineering (ICECE 2013) March 26-28, 2013, Benghazi, Libya.

S.E. Ghrare, Mohd. Alauddin Mohd. Ali, M. Ismail, K. Jumari, "*The Effect of Image Data Compression on the Clinical Information Quality of Compressed CT Images for Teleradiology Applications*", European Journal of Scientific Research, Vol.23 No.1, pp.6-12. Indexed by *SCOPUS*

S.E. Ghrare, Abdullatif S. Khrwat, T.A. Haddud, " *A Hybrid Approach for Lossless Medical Image Compression*", International Research Conference on Information Technology and Computer Science (IRCITCS 2013), September 28-30, 2013, Kuala Lumpur, Malaysia.

S.E. Ghrare, Ahmed R. Khobaiz, "*Behavior of LSSVM and SVM Channel Equalizers in Presence ofNon-Gaussian Noise*", The 2014 IEEE International Conference on Computer, Communication, and Control Technology (I4CT),2nd - 4th September, 2014, Langkawi,Malaysia. Indexed by *SCOPUS*

S.E. Ghrare, Ahmed R. Khobaiz "*Digital Image Compression using Block Truncation Coding and Walsh Hadamard Transform Hybrid Technique"* , The 2014 IEEE International Conference on Computer, Communication, and Control Technology (I4CT),2nd - 4th September, 2014, Langkawi,Malaysia. Indexed by *SCOPUS*

S.E. Ghrare, Mohd. Alauddin Mohd. Ali, M. Ismail, K. Jumari, "*The Effect of Image Data Compression on the Clinical Information Quality of Compressed CT Images for Teleradiology Applications*", European Journal of Scientific Research, Vol.23 No.1, pp.6-12. Indexed by *SCOPUS*

S.E. Ghrare, Mohd. Alauddin Mohd. Ali, M.Ismail, K. Jumari, "*An Efficient Low Complexity Lossless Coding Algorithm for Medical Images*". American Journal of Applied Sciences 6 (8): 1502-1508. Indexed by *SCOPUS*

S.E. Ghrare, Khaled Algharari, Maisem Bouras, "*An Efficient Data Security System Based on LSB Steganography and Symmetric Key Cryptography*", International Journal of Contemporary Computer Research (IJCCR), Vol.2 Issue.1. March 2018

Seddeq E. Ghrare, Haneen A. Barghi, Noura R. Madi "*New Text Encryption Method Based on Hidden Encrypted Symmetric Key (HESK)",*The IEEE International Conference on Advanced Computer Information Technologies ACIT 2018**,** Ceske Budejovice, Czech Republic , June 1-3, 2018. Indexed by *SCOPUS*

Seddeq E. Ghrare, Esam Alosta, "*Lossy-Lossless Hybrid Compression Technique for Medical Images Using DWT and GSM",* Gharyan Journal of Technology, High Institute of Science & Technology Gharian Issue (4), December 2018.

Seddeq E. Ghrare, Mohd. Alauddin M. Ali ,Abdullatif S. Khrwat, "*Development of Near Lossless Coding Algorithm for Medical Images using Grayscale and Binary Matrices*", Aljabal Journal for Applied Science and Humanities. Issue No. (2), December 2018.

Seddeq E. Ghrare,, Hajer A. Emhemed, Abduladim .M. Alamari, "*Digital Image Watermarking Method Based on ROI Using DCT and DWT Hybrid Technique*", The Second International Conference of Applied Sciences and Technology (ICAST2019), Sabha University, 16,17 October 2019. Journal of Pure & Applied Sciences www.Suj.sebhau.edu.ly ISSN 2521-9200

Seddeq E. Ghrare,, Abdullatif S. Khrwat, Mohamed H. Omar, "*Channel Estimation for Massive MIMO Systems in Time Varying Rayleigh Fading Channel*", University of Gharyan Journal, Vol. 21, June 2021.

Seddeq E. Ghrare,, Haneen A. Barghi, Noura R. Madi " Development of Arabic Language Encryption Algorithm using Dynamic Encrypted Symmetric Key (DESK)*",* Albahit Journal of Applied Sciences ISSN 2708-244X, e-ISSN 2708-8936, Vol. 3, Issue 1, 2022, 16-23.

Seddeq E. Ghrare, Hajer A. Emhemed, Abduladim .M. Alamari "*Digital Image Watermarking Method Based on LSB and DWT Hybrid Technique*", The 2022 IEEE International Conference on Sciences and Techniques of Automatic Control and Computer Engineering,(MI-STA2022), Sabratha University, 23,25 May 2022. *SCOPUS*

Seddeq E. Ghrare, "*Implementation and Performance Evaluation of Face Recognition System using LBPH and PCA Algorithms*", Al-Jefara University Journal of Applied and Humanity Science, Issue 2, pp. 218-227, December 2022.

Seddeq E. Ghrare,, Haneen A. Barghi, " *Design and Implementation of Encryption and Decryption Technique Based on Hidden Encrypted Symmetric Key with Logical Shift and XOR Operation* ", The 2023 IEEE International Conference on Sciences and Techniques of Automatic Control and Computer Engineering,(MI-STA2023), University of Benghazi, 23CI,25 May 2023. Indexed by *SCOPUS*

Seddeq E. Ghrare, Maisem A Abouras, Ibrahim A. Akermi, "*Development of Hybrid Data Security System using LSB Steganography and AES Cryptography* ", African Journal of Advanced Pure and Applied Sciences (AJAPAS), Vol. 3, Issue 2, April-June 2024.

Seddeq. E. Ghrare , Haneen A. Albarghi, "*Development of Hybrid Segmentation Technique for Liver Tumor Detection and Extraction Neutrosophic Sets and Gaussian Mixture Model*", The First International Conference on AI: Current Research, Industry Trends, and Innovations, (FICAILY2025) , 9-11 July 2025, *Springer Nature Book Chapter (Studies in Computational Intelligence (SCI*,) indexed by *SCOPUS*.

Seddeq. E. Ghrare , Haneen A. Albarghi, "*Liver Tumor Detection and Classification using Hybrid Segmentation Techniques and TL-CNN*", The 3rd Libyan International Conference on Information and Communications Technologies (ILCICT2025), 9-11 September 2025, *Springer Nature Book Chapter (Communications in Computer and Information Science (CCIS*,) indexed by *SCOPUS*. (*SUBMITTED*)

TOUGHT COURSES	Subject	Course Level	Institution
	EE232 Digital Systems	BSc	University of Ghayan
	EE311 Electronics Laboratory	BSc	University of Ghayan
	EE331 Digital Systems Laboratory	BSc	University of Ghayan
	EE333 Microprocessors	BSc	University of Ghayan
	EE334 Computer Programming C++	BSc	University of Ghayan
	EE416 Data Communication	BSc	University of Ghayan
	EE477 Digital Circuits Design	BSc	University of Ghayan
	EE535 Computer Networks	BSc	University of Ghayan
	EE574 Computer Architecture	BSc	University of Ghayan
	EE585 Digital Image Processing	BSc	University of Ghayan
	EE599 Graduation Project	BSc	University of Ghayan
	EE604 Data Communication	MSc	University of Ghayan
	EE606 Digital Image Processing	MSc	University of Ghayan
	EE607 Information Theory and Coding	MSc	University of Ghayan
	BBJIB 2033 Information & Communication Technology	MSc	University Utara Malaysia (**UUM**)
	MENC 5213 Computer Architecture	MSc	Technical University of Malaysia (**UTeM**)

REFERENCES   AVAILABLE UPON REQUEST