

Curriculum Vitae

Name: Ahmad Zghoul

Marital Status: Married, four children

Address in Jordan: Department of Mathematics
Faculty of Science
Jordan University
(+962)775612477

e-mail: a.zghoul@ju.edu.jo, aazghoul@gmail.com

Academic Qualifications

Ph. D, Statistics	Colorado State Univ., USA	1988
M. Sc., Statistics	Colorado State Univ., USA	1986
B. Sc., Mathematics	Yarmouk Univ., JORDAN	1981

Teaching Experience

<u>Institution</u>	<u>Position</u>	<u>Period</u>
The University of Jordan	Professor	2/2012-2015
California State University (Northridge)	Lecturer	8/2015-8/2017
The University of Jordan	Professor	2/2012-2015
The University of Jordan	Associate Professor	9/2008-2/2012
The University of Qatar (Sabbatical, unpaid leave)	Associate Professor	11/2003-9/2008
Mu'tah University	Associate Professor	9/2001-11/2003
The University of Qatar (Sabbatical, unpaid leave)	Associate Prof.	9/1997-9/2001
Mu'tah University	Associate Professor	11/1996-9/1997
Mu'tah University	Assistant Professor	6/1988-11/1996
Mu'tah University	Full Time Lecturer	1/1988-6/1988
Royal Military Academe	Math. Instructor	4/1981-1/1983

Administrative Experience

<u>Institution</u>	<u>Position</u>	<u>Period</u>
The University of Jordan	Vice Dean	1/2020-
The University of Jordan	Dean Assistant	1//2012-9/2012
Mu'tah University	Vice Dean of the College of Arts and Sciences/Ma'an	2/1997-9/1997
Mu'tah University	Coordinator of Math. Section in the Military Wing	8/1993-1/1996; 7/2002 – 9/2003
Mu'tah University	Chairman of Math. and Stat. Dept.	7/1990-8/1992; 5/1993-9/1993
Mu'tah University	Math. Section Coordinator	1/1989-1/90

Taught Courses

Statistics Courses

- Biostatistics (undergraduate and graduate levels)
- Business Statistics
- Introductory Statistics (Science and Engineering students)
- Introduction to Probability
- Mathematical Statistics (undergraduate and graduate levels)
- Statistical Methods
- Applied Regression
- Experimental Design
- Nonparametric Statistics
- Reliability and Quality Control
- Categorical Data Analysis
- Time Series Analysis
- Stochastic Processes (undergraduate and graduate levels)
- Probability Theory (graduate level).

Actuarial Courses

- Actuarial Mathematics
- Actuarial Modeling
- Pension
- Financial Mathematics

Math. Courses

- Calculus
- Linear Algebra
- Discrete Math.
- Differential Equations

Supervision

- Currently there are five Ph.D students and one Master's student under my supervision.
- I have Supervised six master's degree students and co-supervised two other students.
- Several graduation projects for undergraduate statistics students in the Department of Mathematics, Physics, and Statistics of the University of Qatar.

Research Areas

- *Statistical Inference*
- *Goodness-of-Fit Tests*
- *Distribution Theory*
- *Quadratic Forms*
- *Order Statistics and Records*
- *Distribution Theory*

Research Papers

- Progressive Type-II Censoring Power Function Distribution Under Binomial Removals. *Nonlinear Dynamics and Systems Theory*, 21 (5), pp. 510–524, 2021.
- Analysis of system outage probability in underlay cognitive two-way amplify-and-forward relay networks. *Computer Communications*. Vol. 160, pp. 253-262, 2020.
- Efficient Plug-In Estimators Of The Topp-Leone Distribution Shape Parameter. *Pakistan Journal of Statistics*, Vol. 36, 4, pp. 305-320, 2020.
- The Arabic Language Status in the Jordanian Social Networking and Mobile Phone Communications. 7th Int'l Conference on Information Technology. pp. 449-456., 2015.
- Effect of Topic on The Arabic Language Used on Social Networks and Mobile Phone Communications. IEEE Jordan Conference on Applied Electrical Engineering and Computing Technologies (AEECT), pp. 1-6, 2015.
- Pitman closeness of k th records based on two-sequence case. *Communications in Statistics-Theory and Methods*. 43(23):5091-5104, 2014
- A Robust Confidence Interval for The Population Standard Deviation. *Journal of Applied Statistical Science*, Vol 18, no. 2, 2011.
- Record Values From A Family Of J-Shaped Distributions. *STATISTICA*, anno LXXI, n. 3, 2011.
- Normality Test Based on a Truncated Mean Characterization. *Communications in Statistics - Simulation and Computation*, 39: 9, 1818-1843, 2010.

- A Goodness of Fit Test for Normality Based on the Empirical Moment Generating Function. *Communications in Statistics - Simulation and Computation*, 39: 6, 1292 — 1304, 2010.
- Recurrence Relations and Bounds for Moments of Order Statistics From A Family of J-Shaped Distributions. *Metron: the international Journal of Statistics*. vol. LXVIII, n. 2, pp. 127-136, 2010.
- Sudden Change in Rainfall Characteristics in Amman, Jordan during the mid50's. *American Journal of Environmental Sciences*. 2(3), 84-93, 2006. (jointly with M. Smadi).
- A moment-type estimator for the Cauchy scale parameter. *Far East J. Theo. Stat.*, 12(2), 167-178, 2004.
- Estimating the Cauchy location and scale parameters using empirical characteristic function. *Adv. Appl. Stat.* , no. 2,, 3 , 173 - 181 ,(2003).
- Approximation of the distribution of indefinite quadratic forms using orthogonal polynomials. *Qatar Univ. Sci. J.* , 15-25, (18), 2001.
- On the distribution of Non-Central Indefinite Quadratic forms. *Dirasat. Sciences Series*. Vol. 26, No. 1, 88-93, 1999.
- An Exponential distribution with a jump. *Egyptian Journal of Statistics*, 82-94, 1998.
- On the distribution of Difference of Quadratic forms and ratio of differences of quadratic forms in normal random variables. *Mu'tah Lilbohouth Wal-Dirasat. Natural and applied Sciences Series* .1997
- Estimation via record values. *Journal of Information and Optimization Sciences*. Vol. 17 (1996), No. 3, pp. 541-548.
- On the Distribution of Continuous Quadratic Forms. *Journal of the College of Education , Al-Mustansiriyah University* , No. 5, pp. 9-18, 1995.
- Records associated with Poisson processes . *Mu'tah Lilbohooth wal-Dirasat. Natural and Applied Science Series*. Vol. 9, No. 1, pp 191-211, 1994.
- On the distribution of sum of squares and test criteria in Two way Models with correlated errors. *Abhath Al-Yarmouk. Pure Science and Engineering Series*. Vol. 3, No. 1, pp.9-31, 1994.

- Series expansion for the distribution of general quadratic forms in normal random variables. *Pakistan Journal of Statistics*. Vol. 7(1)A, pp. 41-45, 1991.
- Distribution of indefinite quadratic forms in Gaussian processes. *The Proceedings of the first Islamic Countries Conference on Statistical Sciences*, 1988, 319-352.

A published book

- An introduction to Probability and its Applications (in Arabic). Dar-Alforqan. (1998, 2003).

Conferences and Academic Activities

- The Ninth Islamic Countries Conference on Statistical Sciences. Kuala Lumpur, Malaysia, 2007.
- The 35th Statistical Society of Canada Meeting, St. Johns, Canada, 2007.
- The 21st European Statisticians Meeting. Aarhus, Denmark, 1995.
- The Third Islamic Countries Conference on Statistical Sciences. Rabatt, Morocco, 1992.
- The First Islamic Countries Conference on Statistical Sciences. Lahore, Pakistan, 1988.
- The Third Jordanian Mathematics Conference. Jordan 1996.
- The Second Jordanian Mathematics Conference. Jordan 1994.
- The First Jordanian Mathematics Conference. Jordan 1991.
- Workshop in using Mathematica in Teaching Calculus. Mu'tah Univ., 1996.
- Workshop in Math. and Stat. Mu'tah Univ., 1993.

Articles Presented in Conferences

- A goodness-of-fit Test for Normality Based On The Empirical Moment Generating Function. The Ninth ICCSS. Kuala Lumpur, Malaysia, 2007.
- Order Statistics and Records from a family of J-shaped distributions. The 35th Statistical Society Meeting, St. Johns, Canada, 2007.
- Estimation via record values. The 21st European Statisticians Meeting. Aarhus, Denmark, 1995.
- On the distribution of Difference of Quadratic forms and ratio of differences of quadratic forms in normal random variables. The Second Jordanian Mathematics Conference. Jordan 1994.
- Records associated with Poisson processes. The Third Islamic Countries Conference on Statistical Sciences. Rabatt, Morocco, 1992.
- On the distribution of sum of squares and test criteria in Two way Models with correlated errors. The First Jordanian Mathematics Conference. Jordan 1991.
- Distribution of indefinite quadratic forms in Gaussian processes. The First Islamic Countries Conference on Statistical Sciences. Lahore, Pakistan, 1988.

University Committees Membership

- Several faculty and department Committees
- Committee of *designing a questionnaire for the teaching process* at Mu'tah Univ.
- Committee of the Univ. *Cultural Season*.
- *Housing* Committee.
- Committee of *analyzing The teaching process questionnaire*.
- Committee of the *academic Supervision of Mu'tah Model School*.
- *Editorial Board of Mu'tah Journal Lil-Bohooth Wal-Dirasat. Natural and Applied Science Series*.
- Member of *Student Disciplinary Council*.
- Committee to *Study the Academic Status* at Mu'tah University.
- Preparation Committee for a *Workshop in Math. and Stat*.
- Preparation Committee for *the first and the second meetings of math. departments chairmen in Gulf States Universities*.

Outside University Committees and Memberships

- Member of a National Team to develop Jordan Universities Teaching plans in Mathematics and Statistics.
- Member of the executive board of the Islamic Society of Statistical Sciences, 88-90.
- Member of a Committee to revise the Constitution of the Islamic Society of Statistical sciences, 1992.
- Preparation Committee for the *1st and the 2nd Jordanian Mathematics Conferences*.

Rewards

- Four Years Scholarship from Jordanian Armed Forces to study BSc. in Mathematics at Yarmouk University (1977-1981).
- A scholarship from Mu'tah University to pursue graduate studies towards Masters and Ph. D degrees in Statistics (1983-1988).
- Academic Reward of Excellence. Yarmouk University 1981.