

### **EDUCATIONAL INFORMATION**

Degree	University	Department	Year(s)
Doctoral Degree	Gazi University	Statistics	2010 - 2014
Master's Degree	University of Tabriz		2003 - 2005
<b>Bachelor's Degree</b>	Imam Khomeini International University		1998 - 2003

## **RESEARCH AREAS**

copulas, DEA, Biostatistics, Multivariate Analysis

## **ACADEMIC DUTIES**

Duty	University	Area	Year(s)
Assistant Professor	Altinbas University	Department of Basic Medical Sciences	2024 -
Associate Professor	Islamic Azad University	Mathematics	2021 - 2023
Doctor Faculty Member	Islamic Azad University	Mathematics	2009 - 2021

## **ADMINISTRATIVE DUTIES**

Duty	University	Year(s)
Commission Membership	Islami Azad University	2015 - 2016
Quality Board Membership	Islami Azad University	2014 - 2023
Board Membership	Islami Azad University	2014 - 2023

### ACADEMIC AND PROFESSIONAL MEMBERSHIPS

Organisation		Membership	Year(s)
NON-UNIVE	RSITY EXPERIENCE		
Country	Organisation	Duty	Year(s)

### BOOKS

Descriptive Statistics At a Glance Orhan Akay tehran/iran, 978-600-6053-00-4, 2021 Textbook All

# ARTICLES

Hyperbolic and Trigonometric Generators of Archimedean Copulas: Characteristics and Performance kazemi rad amir masoud,golshani leila,AKAY ORHAN,KOKABINEZHAD MOHSEN Sahand Communications in Mathematical Analysis, 2025 International DOI: 10.22130/scma.2024.2037882.1847



## ARTICLES

Price Bubble and the Effect of Economic Variables on the Exchange Rate in the Iranian Financial Market Using ARIMA and TAR Methods

Zahedi Yaghoob,Rezaei Nader,AKAY ORHAN Financial Economics, 2023 National DOI: 10.30495/fed.2022.1955939.2682

Archimedean Copulas in investigating efficiency of placed powerhouse on dams kazemi rad amir masoud,golshani leila,AKAY ORHAN,KOKABINEZHAD MOHSEN Journal of Iranian Dam and Hydroelectric PowerPlant, 2022 National

Geometric Comments on Music AKAY ORHAN WSEAS TRANSACTIONS on ACOUSTICS and MUSIC, 2021 International DOI: 10.37394/232019.2021.8.3

Archimedean Copulas and Several Methods on Constructing Generators kazemi rad amir masoud,golshani leila,AKAY ORHAN WSEAS TRANSACTIONS on SYSTEMS, 2021 International

Investigating of the Best Location of Solar Plants in Turkey by Different Multiple Decision Methods

AKAY ORHAN, MIRZAPOUR AMIN Politeknik Dergisi, 2020 International

International

Using Copulas to Model Dependence Between Crude Oil Prices of West Texas Intermediate and Brent-Europe AKAY ORHAN Sahand Communications in Mathematical Analysis, 2020

International DOI: 10.22130/SCMA.2020.117584.713

A New Model for the Secondary Goal in DEA KINACI HARUN, AKAY ORHAN Sahand Communications in Mathematical Analysis, 2019

**On Generators in Archimedean Copulas** AKAY ORHAN Sahand Communications in Mathematical Analysis, 2018 International

Investigating 32 fundamental Iranian dams and efficiency of placed powerhouse on them in 1393 AKAY ORHAN, Arjomand Milad Journal of Iranian dam and hydroelectric powerplant, 2016 National

The Dependence Structure Between the Monthly Minimum and Maximum Barometric Data in Iran AKAY ORHAN Gazi University Journal of Science, 2016 International

STOCHASTIC FRONTIER MODELS BY COPULAS AND ANAPPLICATION AKAY ORHAN,BAL HASAN,ÖZTÜRK FİKRİ,ALP İHSAN U.P.B. Sci. Bull, 2016 International



## ARTICLES

Using Data Envelopment Analysis and Stochastic Frontier Analysis Methods to Evaluate Efficiency of Hydroelectricity Centers

KINACI HARUN,AKAY ORHAN,ALP İHSAN Gazi University Journal of Science, 2016 International

Additive generators of copulas Bacıgal Tomas,AKAY ORHAN,Mesiar Radko,BAL HASAN FUZZY SETS AND SYSTEMS, 2015 International

#### A NOTE ON "GENERALIZED BIVARIATE COPULAS AND THEIR PROPERTIES"

AKAY ORHAN, Rahimi Asghar Sahand Communications in Mathematical Analysis, 2015 International

### Generators of copulas and aggregation

Bacıgal Tomas, Mesiar Radko, AKAY ORHAN Information Sciences, 2015 International

#### New families of symmetric/asymmetric copulas

Mesiar Radko, AKAY ORHAN FUZZY SETS AND SYSTEMS, 2014 International

#### A New Measure for Detecting Influential DMUs in DEA

ACARLAR IRMAK,KINACI HARUN,AKAY ORHAN Journal of Optimization, 2014 International

#### An Archimedean copula family with hyperbolic cotangent generator

AKAY ORHAN,Bacıgal Tomas,BAL HASAN International Journal of Uncertainty, Fuzziness and Knowledge-Based Systems, 2014 International

### SIMULATION STUDY ON COPULAS

ŞAHİN TEKİN SİNEM TUĞBA,AKAY ORHAN,ÖRKCÜ HACI HASAN Sahand Communications in Mathematical Analysis, 2014 International

MODELING OF DEPENDENCE STRUCTURES INMETEOROLOGICAL DATA VIA ARCHIMEDEAN COPULAS AKAY ORHAN,BAL HASAN,ÇELEBİOĞLU SALİH U.P.B. Sci. Bull., 2013 International

Archimedean Copulas Family via Hyperbolic Generator BAL HASAN,AKAY ORHAN Gazi Üniversitesi Fen Bilimleri Dergisi Part: C Tasarım ve Teknoloji, 2013 International

An Application of Archimedean Copulas for Meteorological Data AKAY ORHAN, ÜNSAL MEHMET GÜRAY Gazi University Journal of Science, 2012 International

PROCEEDINGS





### PROCEEDINGS

SEVERAL METHODS IN CONSTRUCTING GENERATORS OF ARCHIMEDEAN COPULAS

kazemi rad amir masoud,golshani leila,AKAY ORHAN the 6th Seminar on Copula Theory and its Applications, 2021 National

Using copulas to model dependence between crudeoil prices AKAY ORHAN International Conference of Mathematical Sciences (ICMS 2019), 2019 International

**Copulas in stochastic frontier models by an application** AKAY ORHAN Copulas and their Applications, 2017 International

On selection of copulas AKAY ORHAN VII Int. Joint Con. of Georgian Math. Union& Georgian Mechanical Union, 2016 International

Using copulas in the stochastic frontier analysis and an application on efficiency of Iranian hydroelectricity centers AKAY ORHAN,Arjomand Milad 8. NATIONAL CONFERANCE OF DEA, 2016 National

Hyperbolic Archimedean copulas by wavelets AKAY ORHAN The Euler International Mathematical Institute, 2015 International

Copulas And Their Extensions AKAY ORHAN 5th International Scientific Conference of Iranian Academics in Turkey, 2015 International

A NEW ARCHIMEDEAN COPULAS FAMILY WITH TRIGONOMETRIC GENERATOR

AKAY ORHAN The second science news conference, 2014 National

A NEW APPROACH FOR THE SECONDARY GOAL IN DEA

KINACI HARUN,AKAY ORHAN,ACARLAR IRMAK 11 INTERNATIONAL CONFERANCE ON DEA, 2013 International

## **PROJECTS**

GEOMETRIC REPRESENTATION OF MUSIC (Executive) Scientific research project supported by Higher Education Institutions, 25.10.2010 - 25.07.2011 National Completed

MULTIVARIATE COPULAS (Executive)

Scientific research project supported by Higher Education Institutions, 22.04.2012 - 22.09.2012 National Completed

New Archimedean copulas family with trigonometric and hyperbolic generators (Executive) Scientific research project supported by Higher Education Institutions, 09.10.2012 - 09.03.2013 National Completed





### **PROJECTS**

A new method in model selection via goodness of fit test (Executive) Scientific research project supported by Higher Education Institutions, 08.03.2015 - 08.09.2015 National Completed

## THESIS SUPERVISION

Using Copulas with trigonometric and hyperbolic generator in Stochastic Frontier Analysis with an applied example amirmasoud kazemi rad 2023 Doctorate

Test of reciprocal transfer bubble financial markets (Stock Exchange, Exchange and Gold) yaghoob zahedi 2022 Doctorate

**Investigation the impact of cash holding on-trade credit by emphasizing the role of competition in the market** mohammadreza mahdavi manesh 2021 Master's Degree

The relationship between debt financing with thegrowth and survival of listed companies inTehran Stock Exchange HADI YAZDANI 2019 Master's Degree

Relationship between values of the national culture and sensitivity of investors on prices in the Tehran Stock Exchange mahsa mohebkhah 2019 Master's Degree

### **COURSES**

Course Type	Course Code	Course Name
Bachelor's Degree	MED112	INTRODUCTION TO RESEARCH METHODOLOGY
Bachelor's Degree	DEN304	ADVANCED RESEARCH METHODOLOGY II
Bachelor's Degree	MED162	BIOSTATISTICS
Bachelor's Degree	MED100	MOLECULAR AND CELLULAR MEDICAL SCIENCES
Bachelor's Degree	MED100-C1	MOLECULAR AND CELLULAR MEDICAL SCIENCES COMMITTEE I
Bachelor's Degree	MED100-C2	MOLECULAR AND CELLULAR MEDICAL SCIENCES COMMITTEE II
Bachelor's Degree	MED100-C3	MOLECULAR AND CELLULAR MEDICAL SCIENCES COMMITTEE III
Bachelor's Degree	MED100-C4	MOLECULAR AND CELLULAR MEDICAL SCIENCES COMMITTEE IV
Bachelor's Degree	MED300	INTRODUCTION TO CLINICAL SCIENCES (BODY SYSTEM DISEASES)
Bachelor's Degree	MED300-C7	NEUROLOGICAL SCIENCES, PSYCHIATRY AND MUSCULOSKELETAL SYSTEM COMMITTEE - VII

## PERSONAL INFORMATION

#### **CONTACT INFORMATION**

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