

## Lect. PhD Ezgi Türkarslan

### Personal Information

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### International Researcher IDs

ScholarID: Fwj-WbwAAAAJ

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Publons / Web Of Science ResearcherID: AAQ-2241-2021

ScopusID: 57223028058

Yoksis Researcher ID: 298900

### Education Information

Doctorate, Ankara University, Fen Bilimleri Enstitüsü, Turkey 2017 - 2023

Postgraduate, Ankara University, Fen Bilimleri Enstitüsü, Turkey 2015 - 2017

Undergraduate, Ankara University, Fen Fakültesi, Matematik Bölümü, Turkey 2009 - 2013

### Dissertations

Postgraduate, Bulanık ölçünün belirlenmesinde karşılaşılan hesaplama çabasını azaltmaya duyarlı yaklaşımlar, Ankara University, Fen Bilimleri Enstitüsü, 2017

### Research Areas

Natural Sciences, Engineering and Technology

### Academic Titles / Tasks

Lecturer, TED University, Faculty Of Arts And Sciences, Mathematics, 2022 - Continues

Research Assistant, TED University, Faculty Of Arts And Sciences, Mathematics, 2019 - 2022

### Courses

Linear Algebra and Differential Equations, Undergraduate, 2023 - 2024, 2022 - 2023

Vector and Complex Calculus, Undergraduate, 2022 - 2023

Multivariable Calculus, Undergraduate, 2022 - 2023

Mathematics for Social Sciences II, Undergraduate, 2022 - 2023

Linear Algebra, Undergraduate, 2022 - 2023

### Published journal articles indexed by SCI, SSCI, and AHCI

- I. **An extended EDAS method with circular intuitionistic fuzzy value features and its application to multi-criteria decision-making process**  
Garg H., ÜNVER M., OLGUN M., Türkarslan E.  
Artificial Intelligence Review, vol.56, pp.3173-3204, 2023 (SCI-Expanded)
- II. **Consistency fuzzy cross entropy based VIKOR approach for multi-criteria decision making**  
Türkarslan E., Ye J., ÜNVER M., OLGUN M.  
Iranian Journal of Fuzzy Systems, vol.20, no.4, pp.39-56, 2023 (SCI-Expanded)
- III. **Measure Identification for the Choquet Integral: A Python Module**  
Türkarslan E., Torra V.  
International Journal of Computational Intelligence Systems, vol.15, no.1, 2022 (SCI-Expanded)
- IV. **Intuitionistic fuzzy-valued neutrosophic multi-sets and numerical applications to classification**  
ÜNVER M., Türkarslan E., Celik N., OLGUN M., Ye J.  
COMPLEX & INTELLIGENT SYSTEMS, vol.8, no.2, pp.1703-1721, 2022 (SCI-Expanded)
- V. **Single and Interval-Valued Hybrid Enthalpy Fuzzy Sets and a TOPSIS Approach for Multicriteria Group Decision Making**  
OLGUN M., Türkarslan E., Ye J., ÜNVER M.  
MATHEMATICAL PROBLEMS IN ENGINEERING, vol.2022, 2022 (SCI-Expanded)
- VI. **Consistency Fuzzy Sets and a Cosine Similarity Measure in Fuzzy Multiset Setting and Application to Medical Diagnosis**  
Türkarslan E., Ye J., ÜNVER M., OLGUN M.  
Mathematical Problems in Engineering, vol.2021, 2021 (SCI-Expanded)
- VII. **A Cosine Similarity Measure Based on the Choquet Integral for Intuitionistic Fuzzy Sets and Its Applications to Pattern Recognition**  
OLGUN M., Türkarslan E., ÜNVER M., Ye J.  
INFORMATICA, vol.32, no.4, pp.849-864, 2021 (SCI-Expanded)

## Articles Published in Other Journals

- I. **An extension of CODAS method for multi-criteria group decision making with complex intuitionistic fuzzy information via Dombi sine weighted arithmetic aggregation operators**  
Garg H., OLGUN M., ÜNVER M., Türkarslan E.  
Granular Computing, vol.8, no.6, pp.1467-1480, 2023 (Scopus)
- II. **MAGDM Model Using the Aczel-Alsina Aggregation Operators of Neutrosophic Entropy Elements in the Case of Neutrosophic Multi-Valued Sets**  
Li W., Ye J., Türkarslan E.  
Neutrosophic Sets and Systems, vol.57, 2023 (Scopus)
- III. **A Choquet Integral Based Cosine Similarity Measure for Interval-Valued Intuitionistic Fuzzy Sets and an Application to Pattern Recognition**  
Garg H., OLGUN M., Türkarslan E., ÜNVER M.  
Lobachevskii Journal of Mathematics, vol.43, no.9, pp.2444-2452, 2022 (ESCI)
- IV. **Algebraic and Einstein weighted operators of neutrosophic enthalpy values for multi-criteria decision making in neutrosophic multi-valued set settings**  
Ye J., Türkarslan E., ÜNVER M., OLGUN M.  
GRANULAR COMPUTING, vol.7, no.3, pp.479-487, 2022 (ESCI)
- V. **Cosine and Cotangent Similarity Measures Based on Choquet Integral for Spherical Fuzzy Sets and Applications to Pattern Recognition**  
ÜNVER M., OLGUN M., TÜRKARSLAN E.  
Journal of Computational and Cognitive Engineering, vol.1, no.1, pp.21-31, 2022 (Peer-Reviewed Journal)
- VI. **q-Rung Orthopair Fuzzy Topological Spaces**  
Türkarslan E., ÜNVER M., OLGUN M.

LOBACHEVSKII JOURNAL OF MATHEMATICS, vol.42, no.2, pp.470-478, 2021 (ESCI)

VII. **2-Additive Choquet Similarity Measures For Multi-Period Medical Diagnosis in Single-Valued Neutrosophic Set Setting**

OLGUN M., Türkarslan E., ÜNVER M., Ye J.

Neutrosophic Sets and Systems, vol.45, pp.8-25, 2021 (Scopus)

VIII. **Cryptography in Terms of Triangular Neutrosophic Numbers with Real Life Applications**

Hamza A., Jafar M. N., Habib A., Farooq S., TÜRKARSLAN E.

INTERNATIONAL JOURNAL OF MEDICAL ARTS, vol.11, no.1, pp.39-52, 2020 (Peer-Reviewed Journal)

IX. **Nonagonal Neutrosophic Linear Non-Linear Numbers, Alpha Cuts and Their Applications using TOPSIS**

Jafar M. N., Türkarslan E., Hamza A., Farooq S.

International Journal of Neutrosophic Science, vol.10, no.1, pp.45-64, 2020 (Scopus)

## Books & Book Chapters

I. **q-Rung Orthopair Fuzzy Points and Applications to q-Rung Orthopair Fuzzy Topological Spaces and Pattern Recognition**

Türkarslan E., Ünver M., Olgun M., Yardımcı Ş.

in: Advances in Topology and Their Interdisciplinary Applications , Santanu Acharje, Editor, Springer Nature, Singapore, pp.245-259, 2023

II. **Some trigonometric similarity measures based on Choquet integral for Pythagorean fuzzy sets and its applications to pattern recognition**

Türkarslan E., Olgun M., Ünver M., Yardımcı Ş.

in: Pythagorean Fuzzy Sets: Theory and Applications, Harish Garg, Editor, Springer Nature, Singapore, pp.83-106, 2021

III. **2-Additive Choquet cosine similarity measures for simplified neutrosophic sets and applications to medical diagnosis**

Türkarslan E., Olgun M., Ünver M., Yardımcı Ş.

in: Decision-Making with Neutrosophic Set: Theory and Applications in Knowledge Management, Harish Garg, Editor, NOVA Science Publishers Inc. , New York, pp.259-281, 2021

## Refereed Congress / Symposium Publications in Proceedings

I. **A Vector Valued Similarity Measure Based on the Choquet Integral for Intuitionistic Fuzzy Sets and Its Application to Pattern Recognition**

Türkarslan E., Ünver M., Olgun M.

International Conference on Intelligent and Fuzzy Systems, INFUS 2021, İstanbul, Turkey, 24 - 26 August 2021, vol.308, pp.84-92

## Supported Projects

Olgun M., Türkarslan E., Ünver M., Yardımcı Ş., TUBITAK Project, Bulanık Kümeler İçin Bulanık İntegral Tabanlı Benzerlik Ölçüleri ve Örüntü tınma Üzerine Uygulamaları, 2021 - 2022

## Scholarships

2214-A Yurt Dışı Doktora Sırası Araştırma Burs Programı, TUBITAK, 2022 - 2022

2211-A Genel Yurt İçi Doktora Burs Programı, TUBITAK, 2018 - 2022

## **Awards**

Türkarlan E., TED Üniversitesi Yayın Ödülü , Ted Üniversitesi, October 2022

Türkarlan E., TED Üniversitesi Yayın Ödülü , Ted Üniversitesi, July 2022

Türkarlan E., TED Üniversitesi Yayın Ödülü , Ted Üniversitesi, February 2022

Türkarlan E., TED Üniversitesi Yayın Ödülü , Ted Üniversitesi, July 2021