

TURGAY BATBAT

ASST. PROF.

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Bölümü, 38039 Melikgazi-KAYSERİ

International Researcher IDs

ScholarID: YRIOb-sAAAAJ

ORCID: 0000-0002-0128-2076

Publons / Web Of Science ResearcherID: AAP-5256-2020

ScopusID: 57188928865

Yoksis Researcher ID: 125394



Learning Knowledge

Doctorate
2014 - 2020

Erciyes University, Fen Bilimleri Enstitüsü, -, Turkey

Postgraduate
2011 - 2014

Erciyes University, Fen Bilimleri Enstitüsü, --, Turkey

Undergraduate
2007 - 2011

Erciyes University, Mühendislik Fakültesi, Bilgisayar Mühendisliği, Turkey

Foreign Languages

English, B2 Upper Intermediate

Dissertations

Doctorate, EVALUATION OF TYPES OF ATTENTION WITH EVOKED POTENTIAL SIGNALS OBTAINED BY AUDITORY AND VISUAL STIMULI, Erciyes University, Fen Bilimleri Enstitüsü, --, 2020

Postgraduate, PREDICTION OF PROTEIN STRUCTURE USING ARTIFICIAL BEE COLONY ALGORITHM, Erciyes University, Fen Bilimleri Enstitüsü, 2014

Academic Titles / Tasks

Assistant Professor
2021 - Continues

Erciyes University, Mühendislik Fakültesi, Biyomedikal Mühendisliği

Research Assistant
2013 - 2021

Erciyes University, Mühendislik Fakültesi, Biyomedikal Mühendisliği

Research Assistant

2012 - 2013

Niğde Üniversitesi, Mühendislik Fakültesi, Bilgisayar Mühendisliği

Supported Projects

1. GÜVEN A., BATBAT T., DEMİRCİ E., YETKİN M. F., UĞURGÖL E., YEŞİLBAŞ D., DOLU N., ALTINKAYNAK M., Project Supported by Higher Education Institutions, Günlük internet kullanım süresinin etkilerinin farklı bilişsel görevler sırasında alınan fonksiyonel yakın kızılötesi spektroskopi elektroensefalografi ve olay ilişkili potansiyel sinyalleriyle değerlendirilmesi, 2023 - Continues
2. GÜVEN A., BATBAT T., DEMİRCİ E., Dolu N., İzzetoğlu M., TÜBİTAK Project, Gençlerde, İnternet Oyun Bağımlılığının Beyin Fonksiyonlarına Etkisinin Elektroensefalografi, Olay İlişkili Potansiyeller Ve Fonksiyonel Yakın Kızılötesi Spektroskopi Sinyalleriyle Analizi: Çok Ölçümlü Yaklaşım, 2022 - 2024
3. Işık Ü., GÜVEN A., BATBAT T., TÜBİTAK Project, Transfer Entropi, Momentler Ve Yapay Zekâ Teknikleri İle Duygu Durum Analizi, 2022 - 2023

Jury Memberships

PhD Thesis Monitoring Committee Member, PhD Thesis Monitoring Committee Member, Erciyes Üniversitesi, March, 2023

Post Graduate, Post Graduate, Akdeniz Üniversitesi, January, 2023

Published journal articles indexed by SCI, SSCI, and AHCI

1. **Multimodal analysis of cortical activation in young male adults with internet gaming disorder: A resting state EEG-fNIRS study**
Altinkaynak M., Yeşilbaş D., BATBAT T., GÜVEN A., Uğurgöl E., DEMİRCİ E., İzzetoğlu M., DOLU N.
Journal of Psychiatric Research, vol.177, pp.368-377, 2024 (SCI-Expanded)
2. **Evaluation of Emotions from Brain Signals on 3D VAD Space via Artificial Intelligence Techniques**
Işık Ü., Güven A., Batbat T.
DIAGNOSTICS, vol.13, no.13, pp.1-23, 2023 (SCI-Expanded)
3. **Combining functional near-infrared spectroscopy and EEG measurements for the diagnosis of attention-deficit hyperactivity disorder**
Güven A., Altinkaynak M., Dolu N., İzzetoğlu M., Pektaş F., Özmen S., Demirci E., Batbat T.
Neural Computing and Applications, vol.32, pp.8367-8380, 2020 (SCI-Expanded)
4. **Evaluation of divided attention using different stimulation models in event-related potentials**
Batbat T., Güven A., Dolu N.
Medical and Biological Engineering and Computing, vol.57, no.9, pp.2069-2079, 2019 (SCI-Expanded)
5. **Evaluation of filters over different stimulation models in evoked potentials**
Güven A., Batbat T.
Biocybernetics and Biomedical Engineering, vol.39, pp.339-349, 2019 (SCI-Expanded)
6. **Prediction of Slipper Pressure Distribution and Leakage Behaviour in Axial Piston Pumps Using ANN and MGGP**
ÖZMEN Ö., SİNANOĞLU C., BATBAT T., GÜVEN A.
MATHEMATICAL PROBLEMS IN ENGINEERING, vol.2019, 2019 (SCI-Expanded)
7. **Optimum Assembly Sequence Planning System Using Discrete Artificial Bee Colony Algorithm**
Özmen Ö., Batbat T., Ozen T., Sinanoğlu C., Güven A.

Articles Published in Other Journals

1. **Detection of anxiety with non-linear EEG dynamics**
UĞURGÖL E., Batbat T., Yeşilbaş D., ALTINKAYNAK M., Güven A., Demirci E., Dolu N.
Niğde Ömer Halisdemir Üniversitesi Mühendislik Bilimleri Dergisi, vol.13, no.2, pp.558-567, 2024 (Peer-Reviewed Journal)
2. **Protein Structure Prediction with Discrete Artificial Bee Colony Algorithm**
Batbat T., Öztürk C.
INTERNATIONAL JOURNAL OF INFORMATICS TECHNOLOGIES, vol.9, pp.263-274, 2016 (Peer-Reviewed Journal)

Refereed Congress / Symposium Publications in Proceedings

1. **Effect of Internet Gaming Disorder Over Reaction Time Based with Audio-Visual Stimulus"**
Uğurgöl E., Yeşilbaş D., Altinkaynak M., Batbat T., Güven A., Dolu N., Demirci E., İzzetoğlu M.
48th National Physiology Congress,, Sakarya, Turkey, 1 - 04 November 2023, pp.1-3
2. **Frequency Analysis of EEG Response to Visual and Auditory Stimulus**
Uğurgöl E., Yeşilbaş D., Altinkaynak M., Batbat T., Güven A., Dolu N., Demirci E., İzzetoğlu M.
ICAR 10. (International Congress Of Academic Research), Bolu, Turkey, 6 - 07 February 2023, pp.1
3. **Comparing the Reaction Times of Congruent and Incongruent Stimuli in the Stroop Effect",**
Yeşilbaş D., Uğurgöl E., Altinkaynak M., Batbat T., Güven A., Dolu N., Demirci E., İzzetoğlu M.
ICAR 10. (International Congress Of Academic Research), Bolu, Turkey, 6 - 07 February 2023, pp.1
4. **Olay İlişkili Potansiyeller Üzerinden Dikkatin Hu Momentleri Yardımıyla Tespiti**
Batbat T., Güven A., Dolu N.
7thInternational Symposium on Innovative Technologies in Engineering and Science, Şanlıurfa, Turkey, 22 - 24 November 2019, pp.553-562
5. **ANALYSIS OF ELECTROCARDIOGRAM SIGNALS WITH PYTHON**
Yılmaz E., Çamdal A., GÜVEN A., BATBAT T.
II. International Scientific and Vocational Studies Congress, 5 - 07 July 2018
6. **Evaluation of the Effects of Stimulus Types over Attention Based on Hjorth Parameters with Electroencephalography**
BATBAT T., GÜVEN A., DOLU N.
EUROPEAN CONFERENCE ON SCIENCE, ART CULTURE, 19 - 22 April 2018
7. **Exploration of gender differences on attention levels with cancellation tests**
GÜVEN A., BATBAT T., Emekli N. D., Demir M.
2017 Medical Technologies National Conference, TIPTEKNO 2017, Trabzon, Turkey, 12 - 14 October 2017, pp.1-3
8. **Farklı Dikkat Tiplerinin Uyarılmış Potansiyeller İle Sınıflandırılması**
BATBAT T., GÜVEN A., DOLU N., DEMİR M.
TIPTEKNO2016, Antalya, Turkey, 27 - 29 October 2016
9. **Farklı Dikkat Durumlarının Uyarılmış Potansiyeller Üzerine Etkisinin P100 Dalgası ile Analizi**
GÜVEN A., DOLU N., BATBAT T., DEMİR M.
TIPTEKNO'xx15, Muğla, Turkey, 15 - 18 October 2015, pp.197-200
10. **Analysis of the Effect of Auditory and Visual Stimuli on Divided Attention via P300 Wave**
GÜVEN A., DOLU N., BATBAT T., DEMİR M.
41. Ulusal Fizyoloji Kongresi, Çanakkale, Turkey, 9 - 13 September 2015, vol.215, pp.95

Academic and Administrative Experience

2023 - Continues	Bölüm Web Sorumlusu	Erciyes University, Mühendislik Fakültesi, Biyomedikal Mühendisliği
2023 - Continues	Bölüm MÜDEK Komisyon Başkanı	Erciyes University, Mühendislik Fakültesi, Biyomedikal Mühendisliği
2021 - Continues	Anabilim Dalı Akademik Kurul Üyesi	Erciyes University, Mühendislik Fakültesi, Biyomedikal Mühendisliği
2021 - 2023	Bölüm MÜDEK Koordinatör Yardımcısı	Erciyes University, Mühendislik Fakültesi, Biyomedikal Mühendisliği

Courses

Biyostatistics, Undergraduate, 2023 - 2024, 2022 - 2023, 2021 - 2022, 2020 - 2021
Database Management Systems, Undergraduate, 2024 - 2025, 2023 - 2024, 2022 - 2023, 2021 - 2022
Computer Programming-2, Undergraduate, 2023 - 2024, 2022 - 2023
Python Programming, Undergraduate, 2024 - 2025, 2023 - 2024, 2022 - 2023, 2021 - 2022, 2020 - 2021
Bitirme Projesi, Undergraduate, 2024 - 2025, 2023 - 2024, 2022 - 2023
Computer Programming-1, Undergraduate, 2024 - 2025, 2023 - 2024, 2022 - 2023
Machine Learning in Biomedicine, Postgraduate, 2024 - 2025, 2023 - 2024, 2022 - 2023
Biyomedikal Tasarım ve Uygulama, Undergraduate, 2024 - 2025, 2023 - 2024, 2022 - 2023, 2020 - 2021
Veri Bilimi Ve Analitiği, Postgraduate, 2022 - 2023
Visual Programming, Undergraduate, 2022 - 2023, 2021 - 2022, 2020 - 2021
Visual Programming, Undergraduate, 2022 - 2023, 2021 - 2022, 2020 - 2021
Seminer, Doctorate, 2022 - 2023
Lojik Laboratuvarı , Undergraduate, 2022 - 2023, 2021 - 2022
Biostatistics, Undergraduate, 2022 - 2023, 2021 - 2022, 2020 - 2021
Tez Çalışması 2, Postgraduate, 2022 - 2023
Uzmanlık Alan Dersi 2, Postgraduate, 2022 - 2023
Tez Danışmanlığı 1, Postgraduate, 2022 - 2023, 2021 - 2022
Uzmanlık Alan Dersi 1, Postgraduate, 2022 - 2023
Tez Danışmanlığı 2, Postgraduate, 2022 - 2023
Tez Çalışması 1, Postgraduate, 2022 - 2023
Ölçme ve Analiz Laboratuvarı, Undergraduate, 2022 - 2023, 2021 - 2022
Seminer, Postgraduate, 2022 - 2023
Elektronik Laboratuvarı , Undergraduate, 2021 - 2022
Numerical Analysis in Medicine and Biology, Undergraduate, 2021 - 2022
İstatistiksel Veri Analizi, Postgraduate, 2021 - 2022
Database Management Systems, Undergraduate, 2022 - 2023, 2021 - 2022
Python Programlama, Undergraduate, 2022 - 2023, 2021 - 2022, 2020 - 2021
Tıp Ve Biyolojide Nüm. Analiz, Undergraduate, 2021 - 2022
Mathematics for Biology and Medical Sciences, Postgraduate, 2021 - 2022
Biyomedikal Mühendisliğine Giriş, Undergraduate, 2021 - 2022, 2020 - 2021
Ölçme ve Analiz Laboratuvarı, Undergraduate, 2021 - 2022
Biyomedikal Mühendisliğine Giriş, Undergraduate, 2021 - 2022, 2020 - 2021
Probability Theory, Undergraduate, 2020 - 2021
Probability Theory, Undergraduate, 2020 - 2021

Scientific Refereeing

TURKISH JOURNAL OF ELECTRICAL ENGINEERING AND COMPUTER SCIENCES, Journal Indexed in SCI-E, May 2023

APPLIED SOFT COMPUTING JOURNAL, Journal Indexed in SCI-E, August 2022
COGNITIVE NEURODYNAMICS, Journal Indexed in SCI-E, November 2021
COGNITIVE NEURODYNAMICS, Journal Indexed in SCI-E, August 2021
COGNITIVE NEURODYNAMICS, Journal Indexed in SCI-E, May 2021
Journal of Pediatric Neurology, Journal Indexed in ESCI, May 2020
MEDICAL & BIOLOGICAL ENGINEERING & COMPUTING, Journal Indexed in SCI-E, March 2020
APPLIED SOFT COMPUTING, Journal Indexed in SCI-E, January 2020
COGNITIVE NEURODYNAMICS, Journal Indexed in SCI-E, July 2019
JOURNAL OF AMBIENT INTELLIGENCE AND HUMANIZED COMPUTING, Journal Indexed in SCI-E, March 2019
JOURNAL OF AMBIENT INTELLIGENCE AND HUMANIZED COMPUTING, Journal Indexed in SCI-E, February 2019
JOURNAL OF AMBIENT INTELLIGENCE AND HUMANIZED COMPUTING, Journal Indexed in SCI-E, December 2018
COGNITIVE NEURODYNAMICS, Journal Indexed in SCI-E, November 2017

Metrics

Publication: 22
Citation (WoS): 63
Citation (Scopus): 80
H-Index (WoS): 5
H-Index (Scopus): 5

Congress and Symposium Activities

7th International Symposium on Innovative Technologies in Engineering and Science, Working Group, Şanlıurfa, Turkey, 2019
EUROPEAN CONFERENCE ON SCIENCE, ART CULTURE, Working Group, Antalya, Turkey, 2018
TIPTEKNO2016, Working Group, Antalya, Turkey, 2016
Tiptekno'15, Working Group, Muğla, Turkey, 2015

Research Areas

Computer Sciences, bioinformatics, Biocomputing, Artificial Intelligence, Computer Learning and Pattern Recognition, Evolutionary Computing, Neural Networks, Biomedical Engineering, Biosignal Processing, Biosignal Processing, Engineering and Technology