

Prof. Emin Faruk KEÇECİ

Personal Information

Email: faruk.kececi@agu.edu.tr

Web: <https://avesis.agu.edu.tr/faruk.kececi>

Education Information

Doctorate, University Of Virginia, Elektrik Mühendisliği, United States Of America 1999 - 2003

Post Graduate, Duke University, Makina Mühendisliği, United States Of America 1997 - 1999

Under Graduate, İstanbul Teknik Üniversitesi, Makina Fakültesi, Makina Mühendisliği, Turkey 1992 - 1996

Foreign Languages

English, C1 Advanced

Research Areas

Mechanical Engineering, Machine Theory and Dynamics, Robotics, Engineering and Technology

Academic Titles / Tasks

Associate Professor, Abdullah Gül Üniversitesi, Mühendislik Fakültesi, Makina Mühendisliği, 2016 - Continues

Associate Professor, İstanbul Teknik Üniversitesi, Makina Fakültesi, Makina Mühendisliği, 2011 - 2016

Assistant Professor, İstanbul Teknik Üniversitesi, Makina Fakültesi, Makina Mühendisliği, 2010 - 2011

Assistant Professor, İzmir Yüksek Teknoloji Enstitüsü, Mühendislik Fakültesi, Makina Mühendisliği, 2003 - 2009

Professional Experience

Advising Theses

KEÇECİ E. F. , 3D Image Recognition in MRI Imaging Data Sets, Doctorate, S.M.(Student), Continues

KEÇECİ E. F. , Residential Recycling Sorting Machine, Post Graduate, K.M.(Student), 2016

KEÇECİ E. F. , Rough Terrain Robot with a High Jumping Ability, Post Graduate, A.E.(Student), 2016

KEÇECİ E. F. , Design and Prototyping of an Autonomous Cleaning Robot, Post Graduate, G.A.(Student), 2012

KEÇECİ E. F. , Advanced Control Applications for Rescue Robotics with Off the Shelf Electronics, Post Graduate, B.V. (Student), 2012

KEÇECİ E. F. , Finite Element Analysis of a Electrically Driven Vehicle, Post Graduate, E.E.(Student), 2012

KEÇECİ E. F. , Design and Manufacturing of a Fireproof Fire Rescue Robot, Post Graduate, T.O.(Student), 2008

KEÇECİ E. F. , Wearable Exoskeleton Robot Design and Prototyping, Post Graduate, G.V.(Student), 2007

KEÇECİ E. F. , Mechatronic Design of a Completely Mechanical Quick-changeable Joint for Multi Purpose Explosive Ordnance Disposal Robots, Post Graduate, K.M.(Student), 2006

KEÇECİ E. F. , Design and Prototyping of a Mechatronic System as a Drag Reduction Device for Busses, Post Graduate, K.G.(Student), 2006

KEÇECİ E. F. , Design of a Rescue Robot for Search and Mapping Operation, Post Graduate, A.D.(Student), 2006

KEÇECİ E. F. , Autonomous Solid Waste Separation System Design, Post Graduate, P.O.(Student), 2006

KEÇECİ E. F. , Mechatronic Design of an Explosive Ordnance Disposal Robot, Post Graduate, T.O.(Student), 2005

Articles Published in Journals That Entered SCI, SSCI and AHCI Indexes

- **Design and prototype of mobile robots for rescue operations**
Kececi E. F.
ROBOTICA, vol.27, pp.729-737, 2009 (Journal Indexed in SCI)
- **Completely mechanical quick changeable joints for multipurpose explosive ordnance disposal robots**
Kececi E. F.
ROBOTICA, vol.27, pp.555-565, 2009 (Journal Indexed in SCI)
- **FIREPROOFING THE Firefighting Robot**
Kececi F.
PHOTONICS SPECTRA, vol.43, pp.43-50, 2009 (Journal Indexed in SCI)
- **Adaptive actuator failure compensation for redundant manipulators**
Kececi E. F. , Tang X., Tao G.
ROBOTICA, vol.27, pp.19-28, 2009 (Journal Indexed in SCI)
- **Adaptive vehicle skid control**
Kececi E. F. , TAO G.
Mechatronics, vol.16, pp.291-301, 2006 (Journal Indexed in SCI)
- **An intelligent robotic walker: Mechanical design and control system**
Kececi E. F. , TAO G.
ASME International Mechanical Engineering Congress and Exposition, Proceedings, pp.795-802, 2002 (Journal Indexed in SCI Expanded)

Book & Book Chapters

- **Mechatronic Components: Roadmap to Design**
KEÇECİ E. F.
Elsevier Science, Oxford/Amsterdam , Ny, 2018
- **in: Mechatronics and Robotics Engineering for Advanced and Intelligent Manufacturing**
KEÇECİ E. F.
Wired Autonomous Vacuum Cleaner, Zhang D., Wei B., Editor, Springer, Bern, pp.167-175, 2017
- **Mobile Robots for Dynamic Environments**
KEÇECİ E. F. , Ceccarelli M.
Asme, New York, 2015
- **Design and prototypes of mobile robots**
KEÇECİ E. F. , Ceccarelli M.
Asme, New York, 2015
- **in: Design and Prototypes of Mobile Robots**
KEÇECİ E. F.
Design issues for mechanical structures, Kececi E.F., Ceccarelli M., Editor, Asme, Abd, pp.79-97, 2015
- **in: Service Robots and Robotics: Design and Application**
KEÇECİ E. F.
Safer and Faster Humanitarian Demining with Robots , Abelbeck H., Gallagher E., Editor, Igi Global, Hershey, pp.176-190, 2012
- **PIC Mikrokontrolörlerle Robotik ve Otomasyon Uygulamaları ve Gömülü Elektronik Devre Tasarımı**
KEÇECİ E. F.
Tmmob Elektrik Mühendisleri Odası Yayınları, Ankara, 2008

Refereed Congress / Symposium Publications in Proceedings

- **Finding Glenoid Surface on Scapula in 3D Medical Images for Shoulder Joint Implant Operation Planning-3D OCR**
Sadeghi M. M. , Kececi E. F. , Bilsel K., Aralasmak A.

9th International Conference on Machine Vision (ICMV), Nice, France, 18 - 20 November 2016, vol.10341

- **Hybrid Power System for Mobile Robotics**

Sadeghi M. M. , Kececi E. F.

International Conference on System Reliability and Science (ICSRS), Paris, France, 15 - 18 November 2016, pp.64-67

- **Design and implementation of self-balancing camera platform for a mobile robot**

Bukey M. V. , Kececi E. F. , ARİSOYA.

20th CISM-IFTOMM Symposium on Theory and Practice of Robots and Manipulators, ROMANSY 2014, Moscow, Russia, 23 - 26 June 2014, vol.22, pp.555-562

Supported Projects

KEÇECİ E. F. , Industrial Thesis Project, Design and Prototyping of a Wired Vacuum Cleaning Robot, 2013 - 2015

KEÇECİ E. F. , TUBITAK Project, Development of Smart Autonomous Human Carrying Vehicles, 2012 - 2015

KEÇECİ E. F. , TUBITAK Project, Adaptive Skid Control of an Omnidirectional Robot, 2010 - 2012

KEÇECİ E. F. , TUBITAK Project, Development of a Drive System with a Cycle Skip for an Internal Combustion Engine, 2009 - 2011

KEÇECİ E. F. , Project Supported by Other Official Institutions, Design and Manufacturing of Wearable Exoskeleton Robot, 2006 - 2008

KEÇECİ E. F. , Project Supported by Other Official Institutions, Design and Prototyping of a Fireproof Fire Fighting Robot, 2005 - 2007

KEÇECİ E. F. , CB Strateji ve Bütçe Başkanlığı (Kalkınma Bakanlığı) Projesi, Mechatronic Design of a Completely Mechanical Quick-changeable Joint for Multipurpose Explosive Ordnance Disposal Robots, 2003 - 2005

KEÇECİ E. F. , TUBITAK Project, Explosive Ordnance Disposal Robot Design and Prototype Manufacturing, 2002 - 2004

Activities in Scientific Journals

Robotica Journal, Committee Member, 2011 - 2015

Invited Congress and Symposium Activities

An Open Software Open Hardware Hexapod Robot Platform for Robotic Education, Attendee, Turkey, 2016

Wired Autonomous Vacuum Cleaner, Attendee, Nice, France, 2016

Electronic Hardware and Control of a Wearable Exoskeleton Robot, Attendee, İstanbul, Turkey, 2016

Mechanical Design of a Wearable Exoskeleton Robot, Attendee, İstanbul, Turkey, 2016

Finding Glenoid Surface on Scapula in 3D Medical Images for Shoulder Joint Implant Operation Planning, Attendee, Nice, France, 2016

Electronics of a Holonomic Rescue Robot with a Screw Drive Mechanism for Soft Terrain Mobility, Attendee, Konya, Turkey, 2016

Hybrid Power System for Mobile Robotics, Attendee, Paris, France, 2016

Identification of design parameters of a Portable Robot for Urban EOD Operations, Attendee, Ankara, Turkey, 2014

Layering: An Additive Manufacturing Method for Functional Parts, Attendee, İzmir, Turkey, 2014

Design and Implementation of a Self-Balancing Camera Platform, Attendee, Moskva, Russia, 2014

Initial Experience Designing and Manufacturing Custom Radiosurgery Phantom Components Using Rapid Prototyping Technology, Attendee, Stockholm, Sweden, 2014

Self Balancing Camera Platform Design and Application for a Mobile Robot, Attendee, Malatya, Turkey, 2013

Cloud Manufacturing in Healthcare: A Gamma Knife Center Experience, Attendee, Wisconsin, United States Of America, 2013

Rescue Robots: Supporting Adaptive Navigation, Attendee, İstanbul, Turkey, 2012

Dynamics and Controller Design of a Screw Wheel Drive Holonomic Rescue Robot, Attendee, Texas, United States Of

America, 2012

Advanced All-Terrain Autonomous Systems, Attendee, İzmir, Turkey, 2010

Portable Robot Usage in the Soldier Modernization Program, Attendee, Ankara, Turkey, 2010

A Diagnostic and Calibration card for Robotic Applications, Attendee, İstanbul, Turkey, 2008

Task Space Control of an Explosive Ordnance Disposal Robot, Attendee, Turkey, 2005

Actuator Failure Compensation for Cooperating Multiple Manipulator Systems, Attendee, Washington, United States Of America, 2003

Actuator Failure Compensation for Concurrently Actuated Manipulators, Attendee, Washington, United States Of America, 2003

An Intelligent Robotic Walker: Mechanical Design and Control System, Attendee, New York, United States Of America, 2002

Adaptive Actuator Failure Compensation for a Platform Manipulator, Attendee, İstanbul, Turkey, 2002

Citations

Total Citations (WOS):21

h-index (WOS):2

Awards

KEÇECİ E. F. , one of the 8 faculty members out of 1237, Innovation Fair 2013, January 2013

KEÇECİ E. F. , Scholarship for visiting scholar study at University of Virginia, YÖK, January 2013

KEÇECİ E. F. , 2005-2010 yılları arasındaki 6000 projenin içerisinde en iyi 150 tanesinden biri, TÜBİTAK, January 2011