

## Dr. Alaeddin Burak İrez

### Personal Information

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### Education Information

Post Doctorate, Ecole Normale Supérieure de Cachan, Laboratory of Mechanics and Technology (LMT), Structures, France 2019 - 2020

Doctorate, Ecole Centrale de Paris, CentraleSupélec, Mechanics of Materials, France 2015 - 2018

Postgraduate, Ecole Nationale Supérieure d'Arts et Métiers (ENSAM), Paris, Mines ParisTech, Master MAGIS, France 2013 - 2014

Undergraduate, Istanbul Technical University, Makina, Makina Mühendisliği, Turkey 2007 - 2012

### Foreign Languages

French, C2 Mastery

### Dissertations

Doctorate, Geri dönüştürülmüş devulkanize edilen kauçuk partiküllerinin eklenmesi ile modifiye edilmiş, epoksi esaslı kompozitlerin tasarımı, geliştirilmesi ve karakterizasyonu: Toklaştırma mekanizmaları için deneysel bir yaklaşım, Ecole Centrale de Paris, CentraleSupélec, 2018

Postgraduate, Cam elyaf ile takviye edilmiş bir termoplastik kompozitin tek eksenli ve iki eksenli yorulma hasarı, Ecole Nationale Supérieure des Mines de Paris, Centre des Matériaux PM Fourt - Evry, 2014

### Research Areas

Wind power, Solid Mechanics, Fracture Mechanics, Finite Element Methods, Biomechanics, Mechanical Testing

### Courses

Special Topics in Materials and Manufacture, Postgraduate, 2021 - 2022

Engineering Materials, Undergraduate, 2020 - 2021, 2021 - 2022

Materials Science, Undergraduate, 2020 - 2021, 2021 - 2022

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

1. **Fracture Toughness Analysis of Epoxy-Recycled Rubber-Based Composite Reinforced with Graphene Nanoplatelets for Structural Applications in Automotive and Aeronautics.**

Irez A. B. , Bayraktar E., Miskioglu I.

Polymers, vol.12, 2020 (Journal Indexed in SCI)

**II. A New Design of Recycled Ethylene Propylene Diene Monomer Rubber Modified Epoxy Based Composites Reinforced with Alumina Fiber: Fracture Behavior and Damage Analyses**

Irez A. B. , Zambelis G., Bayraktar E.

MATERIALS, vol.12, no.17, 2019 (Journal Indexed in SCI)

**III. Flexural fatigue damage analyses of recycled rubber-modified epoxy-based composites reinforced with alumina fibres**

Irez A. B. , Bayraktar E., Miskioglu I.

FATIGUE & FRACTURE OF ENGINEERING MATERIALS & STRUCTURES, vol.42, no.4, pp.959-971, 2019 (Journal Indexed in SCI)

**IV. Recycled and devulcanized rubber modified epoxy-based composites reinforced with nano-magnetic iron oxide, Fe<sub>3</sub>O<sub>4</sub>**

Irez A. B. , Bayraktar E., Miskioglu I.

COMPOSITES PART B-ENGINEERING, vol.148, pp.1-13, 2018 (Journal Indexed in SCI)

## Supported Projects

Irez A. B. , Project Supported by Higher Education Institutions, Geri dönüştürülmüş PP matrisli GnP takviyeli kendi kendini onaran kompozit malzeme geliştirilmesi ve otomotiv sektöründe uygulamaları, 2021 - Continues

## Scientific Refereeing

MATERIALS, SCI Journal, December 2019

MOLECULES, SCI Journal, November 2019

RESOURCES CONSERVATION AND RECYCLING, SCI Journal, September 2019

MECHANICS OF MATERIALS, SCI Journal, April 2019

## Citations

Total Citations (WOS):18

h-index (WOS):2