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Publons / Web Of Science ResearcherID: I-6036-2019

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Advising Theses

ÜNLÜSOY Y. S., Modeling and application of artificial muscle actuators, Doctorate, F.Buğra(Student), 2019

ÜNLÜSOY Y. S., Optimization of ride comfort for vehicles equipped with passive and active hydro-pneumatic suspensions, Doctorate, F.SAĞLAM(Student), 2016

ÜNLÜSOY Y. S., Steering dynamics of tracked vehicles, Postgraduate, M.NURİ(Student), 2016

ÜNLÜSOY Y. S., Design and analysis of helical coil spring forms for independent suspensions of automobiles, Postgraduate, G.YAZAR(Student), 2015

ÜNLÜSOY Y. S., Modeling, simulation, and active control of tractor-semitrailer combinations, Postgraduate, S.ALAMDARİ(Student), 2015

ÜNLÜSOY Y. S., Modeling and active steering control of articulated vehicles with multi-axle semi-trailers, Postgraduate, M.UĞUR(Student), 2015

ÜNLÜSOY Y. S., Modeling and optimization of hybrid electric vehicles, Postgraduate, B.Şamil(Student), 2013

ÜNLÜSOY Y. S., Identification of low order vehicle handling models from multibody vehicle dynamics models, Postgraduate, F.SAĞLAM(Student), 2010

ÜNLÜSOY Y. S., Modeling and simulation of high speed railway vehicle dynamics, Postgraduate, T.YÜKSEL(Student), 2010

ÜNLÜSOY Y. S., Impact of damper failure on vehicle handling during critical driving situations, Postgraduate, M.Durukan(Student), 2009

ÜNLÜSOY Y. S., Development of a control strategy for road vehicles with semi-active suspensions using a full vehicle ride model, Postgraduate, Z.ERDOĞAN(Student), 2009

ÜNLÜSOY Y. S., MATHEMATICAL MODELING AND SIMULATION OF TRACKED VEHICLE DYNAMICS, Doctorate, K.ÇALIŞKAN(Student), 2009

ÜNLÜSOY Y. S., OPTIMIZATION OF SUSPENSION PARAMETERS TO IMPROVE IMPACT HARSHNESS OF ROAD VEHICLES, Postgraduate, M.AYDIN(Student), 2009

ÜNLÜSOY Y. S., Identification of handling models for road vehicles, Doctorate, K.Bilge(Student), 2008

ÜNLÜSOY Y. S., Design and simulation of an integrated active yaw control system for road vehicles, Postgraduate, G.TEKİN(Student), 2008

ÜNLÜSOY Y. S., Design and simulation of a traction control system for an integrated active safety system for road vehicles, Postgraduate, G.Oktay(Student), 2008

ÜNLÜSOY Y. S., Identification of inertia tensor of vehicles, Postgraduate, E.KUTLUAY(Student), 2007

ÜNLÜSOY Y. S., Design and simulation of an ABS for an integrated active safety system for road vehicles, Postgraduate, M.Şahin(Student), 2007

ÜNLÜSOY Y. S., Modeling of the dynamics of multi-axle steered vehicles, Postgraduate, K.Bayar(Student), 2006

ÜNLÜSOY Y. S., Mechanical fatigue and life estimation analysis of printed circuit board components, Postgraduate, C.Genç(Student), 2006

ÜNLÜSOY Y. S., Analysis of high frequency behavior of plate and beam structures by statistical energy analysis method, Doctorate, C.Yılmazel(Student), 2004

ÜNLÜSOY Y. S., Experimental determination of transfer functions for a car body-in-white, Postgraduate, S.Şentürk(Student), 2004

ÜNLÜSOY Y. S., Finite element analysis of cornering characteristics of rotating tires, Doctorate, M.AKİF(Student), 2003

ÜNLÜSOY Y. S., Fuzzy logic control of four-wheel steering system, Postgraduate, E.Özatay(Student), 2003

ÜNLÜSOY Y. S., Dynamic simulation and performance optimization of a car with continuously variable transmission, Postgraduate, S.Güvey(Student), 2003

ÜNLÜSOY Y. S., Computer simulation of dynamic behavior of pneumatic tires, Doctorate, E.TÖNÜK(Student), 1998

ÜNLÜSOY Y. S., ÇALIŞKAN M., An integrated FEM/BEM approach to the prediction of interior noise levels of vehicle body structures, Doctorate, Ş.Kopuz(Student), 1995

Published journal articles indexed by SCI, SSCI, and AHCI

- I. **Steering optimization for multiaxle vehicles with multiaxle steering**
Yazıcı C. B., KUTLUAY E., ÜNLÜSOY Y. S.
Journal of Mechanical Science and Technology, vol.35, no.8, pp.3303-3311, 2021 (SCI-Expanded)
- II. **A new contact & slip model for tracked vehicle transient dynamics on hard ground**
Ozdemir M. N., Kilic V., ÜNLÜSOY Y. S.
JOURNAL OF TERRAMECHANICS, vol.73, pp.3-23, 2017 (SCI-Expanded)
- III. **Adaptive ride comfort and attitude control of vehicles equipped with active hydro-pneumatic suspension**
Saglam F., ÜNLÜSOY Y. S.
INTERNATIONAL JOURNAL OF VEHICLE DESIGN, vol.71, pp.31-51, 2016 (SCI-Expanded)
- IV. **Optimization of suspension parameters to improve impact harshness of road vehicles**
Aydin M., ÜNLÜSOY Y. S.
INTERNATIONAL JOURNAL OF ADVANCED MANUFACTURING TECHNOLOGY, vol.60, pp.743-754, 2012 (SCI-Expanded)
- V. **Design and simulation of an integrated active yaw control system for road vehicles**
Tekin G., ÜNLÜSOY Y. S.
INTERNATIONAL JOURNAL OF VEHICLE DESIGN, vol.52, pp.5-19, 2010 (SCI-Expanded)
- VI. **Design and simulation of an ABS for an integrated active safety system for road vehicles**
Sahin M., ÜNLÜSOY Y. S.
INTERNATIONAL JOURNAL OF VEHICLE DESIGN, vol.52, pp.64-81, 2010 (SCI-Expanded)
- VII. **Optimization of Speed Control Hump Profiles**
BAŞLAMİŞLİ S. Ç., ÜNLÜSOY Y. S.
JOURNAL OF TRANSPORTATION ENGINEERING, vol.135, no.5, pp.260-269, 2009 (SCI-Expanded)
- VIII. **A fuzzy logic controlled Anti-lock Braking System (ABS) for improved braking performance and directional stability**
YAZICIOĞLU Y., ÜNLÜSOY Y. S.
INTERNATIONAL JOURNAL OF VEHICLE DESIGN, vol.48, pp.299-315, 2008 (SCI-Expanded)
- IX. **Identification of linear handling models for road vehicles**
ARIKAN K. B., ÜNLÜSOY Y. S., Korkmaz I., Celebi A. O.
VEHICLE SYSTEM DYNAMICS, vol.46, no.7, pp.621-645, 2008 (SCI-Expanded)
- X. **Steering strategies for multi-axle vehicles**
Bayar K., ÜNLÜSOY Y. S.
INTERNATIONAL JOURNAL OF HEAVY VEHICLE SYSTEMS, vol.15, pp.208-236, 2008 (SCI-Expanded)
- XI. **Prediction of automobile tire cornering force characteristics by finite element modeling and analysis**
Tonuk E., Unlusoy Y. S.
COMPUTERS & STRUCTURES, vol.79, no.13, pp.1219-1232, 2001 (SCI-Expanded)

- XII. **Integrated FEM/BEM approach to the dynamic and acoustic analysis of plate structures**
Kopuz S., Unlusoy Y., Caliskan M.
ENGINEERING ANALYSIS WITH BOUNDARY ELEMENTS, vol.17, no.4, pp.269-277, 1996 (SCI-Expanded)
- XIII. **NONLINEAR DYNAMIC-MODEL AND ITS SOLUTION FOR A HIGH-SPEED CAM MECHANISM WITH COULOMB-FRICTION**
UNLUSOY Y., TUMER S.
JOURNAL OF SOUND AND VIBRATION, vol.169, no.3, pp.395-407, 1994 (SCI-Expanded)
- XIV. **ANALYTICAL DYNAMIC-RESPONSE OF ELASTIC CAM-FOLLOWER SYSTEMS WITH DISTRIBUTED-PARAMETER RETURN SPRING**
UNLUSOY Y., TUMER S.
JOURNAL OF MECHANICAL DESIGN, vol.115, no.3, pp.612-620, 1993 (SCI-Expanded)
- XV. **NONDIMENSIONAL ANALYSIS OF JUMP PHENOMENON IN FORCE-CLOSED CAM MECHANISMS**
TUMER S., UNLUSOY Y.
MECHANISM AND MACHINE THEORY, vol.26, no.4, pp.421-432, 1991 (SCI-Expanded)

Articles Published in Other Journals

- I. **State Dependent Riccati Equation Control of an Active Hydro Pneumatic Suspension System**
SAĞLAM F., ÜNLÜSOY Y. S.
Journal of Automation and Control Research, vol.1, pp.1-10, 2014 (Peer-Reviewed Journal)
- II. **Product Based Material Testing for Hyperelastic Suspension Jounce Bumper Design with FEA**
ÇALIŞKAN K., KONUKSEVEN E. İ., ÜNLÜSOY Y. S.
KEY ENGINEERING MATERIALS, vol.450, pp.119-123, 2011 (Scopus)

Refereed Congress / Symposium Publications in Proceedings

- I. **Development of a Blade Lifting Control Assist System for a Motor Grader**
Öztürk E. C. Ö., Akpınarlı U., Varol İ., ÜNLÜSOY Y. S., SCHMİDT K. V.
40th International Symposium on Automation and Robotics in Construction, ISARC 2023, Chennai, India, 5 - 07 July 2023, pp.156-163
- II. **Birbirine Bağlı Hidro Pnömatik Süspansiyon Sistemlerinin Araç Performansına Etkisi**
SAĞLAM F., ÜNLÜSOY Y. S.
UMTS 2015 / TrISToMM Uluslararası Katılımlı 17. Makina Teorisi Sempozyumu, İzmir, Turkey, 14 - 17 June 2015
- III. **Analysis and Design of Passive and Active Interconnected Hydro Pneumatic Suspension Systems in Roll Plane**
SAĞLAM F., ÜNLÜSOY Y. S.
ICENS 2015 International Conference on Engineering and Natural Sciences, 15 - 19 May 2015
- IV. **Modeling and Simulation of High Speed Railway Vehicle Dynamics**
TUĞÇE Y., ÜNLÜSOY Y. S.
International Congress on Advanced Railway Engineering, 2 - 04 March 2015
- V. **Product Based Material Testing for Hyperelastic Suspension Jounce Bumper Design with FEA**
Caliskan K., KONUKSEVEN E. İ., ÜNLÜSOY Y. S.
3rd International Conference on Advanced Design and Manufacture, Nottingham, United Kingdom, 8 - 10 September 2010, vol.450, pp.119-120
- VI. **BOUNDARY-ELEMENT METHOD IN THE DEVELOPMENT OF VEHICLE BODY STRUCTURES FOR BETTER INTERIOR ACOUSTICS**
KOPUZ S., UNLUSOY Y., CALISKAN M.
8th International Conference on Boundary Element Technology (BETECH 93), VILAMOURA, Portugal, 9 - 11 November 1993, pp.57-66

Metrics

Publication: 26

Citation (WoS): 188

Citation (Scopus): 236

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Non Academic Experience

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