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## EDUCATION

2000-2005	Ph.D., University of Windsor (Windsor, ON, Canada), Engineering Materials
1998-2000	M.Sc., Middle East Technical University, Metallurgical and Materials Engineering
1994-1998	B.Sc., Middle East Technical University, Metallurgical and Materials Engineering

## ACADEMIC POSITIONS

September 2008 -Present	Assistant Professor, Department of Metallurgical and Materials Engineering, Atılım University, Ankara, Turkey
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## RESEARCH INTERESTS

1	Coatings, Corrosion, Tribology, Phase Transformations, Heat Treatment
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## THESES SUPERVISED

1	PhD Thesis, Ebru Saraloğlu Güler, Electrocodeposition of Molybdenum Disulfide Particles in Nickel Matrix, 2013 (Co-supervisor)
2	PhD Thesis, Erdem Kayhan, The Development of a Method to Improve the Limit Drawing Ratio of Blanks Using Preferential Heating, 2015 (Co-supervisor)
3	PhD Thesis, Nizar Ramadan, Process Design Optimization for the Post-Weld Controlled Accelerated Cooling of R350HT Head Hardened Rail Joints, 2018 (Co-supervisor)
4	MSc Thesis, Seren Güneş, Production of API X60 and X70 Grade Steel Plates by Thermomechanical Controlled Rolling, 2018

## PROFESSIONAL SERVICE

1	Reviewer for the following journals: Wear, Surface and Coatings Technology, Diamond and Related Materials, Journal of Materials Science, Thin Solid Films
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## MEMBERSHIPS

1	Turkish Chamber of Metallurgical and Materials Engineers
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## PUBLICATIONS

1	E.S. Guler, E. Konca, I. Karakaya, Investigation of the tribological behaviour of electrocodeposited Ni-MoS <sub>2</sub> composite coatings, <i>International Journal of Surface Science and Engineering</i> , vol. 11, no:5 (2017) 418-432, doi: 10.1504/IJSURFSE.2017.10009220
2	E. Konca, K.Tur, E.Koç, Effects of Alloying Elements (Mo, Ni, and Cu) on the Austemperability of GGG-60 Ductile Cast Iron, <i>Metals</i> , vol. 7 Issue 8 (2017) 320, doi:10.3390/met7080320
3	E.S. Guler, E. Konca, I. Karakaya, Effects of current density, coating thickness, temperature, pH and particle concentration on internal stress during Ni-MoS <sub>2</sub> electrocodeposition, <i>Surface Engineering</i> , vol. 30 Issue 2 (2014), pp. 109-114, doi: 10.1179/1743294413Y.0000000223
4	E.S. Guler, E. Konca, I. Karakaya, Effect of Electrodeposition Parameters on the Current Density of Hydrogen Evolution Reaction in Ni and Ni-MoS <sub>2</sub> Composite Coatings, <i>International Journal of Electrochemical Science</i> , vol. 8, Issue: 4, (2013) pp. 5496-5505
5	E.S. Guler, E. Konca, I. Karakaya, Effect of Electroplating Parameters on Internal Stress in Ni-MoS <sub>2</sub> Composite Plating, in <i>TMS2013 Supplemental Proceedings</i> (ed TMS), John Wiley & Sons, Inc., (2013) pp.191-199
6	A. Kothari, S. Hub, Z. Xia, E. Konca, B.W. Sheldon, Enhanced fracture toughness in carbon-nanotube-reinforced amorphous silicon nitride nanocomposite coatings, <i>ACTA MATERIALIA</i> vol. 60 Issue: 8 (2012) pp. 3333-3339
7	A.K. Kothari, E. Konca, B.W. Sheldon, K. Jian, H. Li, Z. Xia, W. Ni, R. Hurt, Mechanical behavior of anodic alumina coatings reinforced with carbon nanofibers, <i>J. Mater. Sci.</i> (2009) 44:6020–6027, doi 10.1007/s10853-009-3811-2
8	X. Xiao, B.W. Sheldon, E. Konca, L.C. Lev, M.J. Lukitsch, The failure mechanism of chromium as the interlayer to enhance the adhesion of nanocrystalline diamond coatings on cemented carbide, <i>Diam. Relat. Mater.</i> 18 (2009) 1114–1117, doi:10.1016/j.diamond.2009.02.012
9	J.M. Dasch, C.C. Ang, C.A.Wong, R.A.Waldo, D. Chester, Y.T. Cheng, B.R. Powell, A.M.Weiner, E. Konca, The effect of free-machining elements on dry machining of B319 aluminum alloy, <i>J. Mater. Process. Technol.</i> , 209 (2009) 4638–4644, doi:10.1016/j.jmatprotec.2008.11.041
10	E. Konca, Y. -T. Cheng, A. M. Weiner, J. M. Dasch, A. T. Alpas, The Role of Hydrogen Atmosphere on the Tribological Behavior of Non-Hydrogenated DLC Coatings against Aluminum, <i>Tribol. Trans.</i> , 50 (2007) 178-186, doi: 10.1080/10402000701260906
11	E. Konca, Y.-T. Cheng, A.T. Alpas, Sliding wear of non-hydrogenated diamond-like carbon coatings against magnesium, <i>Surf. Coat. Technol.</i> 201 (2006) 4352–4356, doi:10.1016/j.surfcoat.2006.08.084
12	Y. Qi, E. Konca, A.T. Alpas, Atmospheric effects on the adhesion and friction between non-hydrogenated diamond-like carbon (DLC) coating and aluminum – A first principles investigation, <i>Surf. Sci.</i> , 600 (2006) 2955–2965, doi:10.1016/j.susc.2006.05.008
13	E. Konca, Y.-T. Cheng, A.T. Alpas, Dry sliding behaviour of non-hydrogenated DLC coatings against Al, Cu and Ti in ambient air and argon, <i>Diam. Relat. Mater.</i> , 15 (2006) 939 – 943, doi:10.1016/j.diamond.2005.11.030
14	E. Konca, Y.-T. Cheng, A.M. Weiner, J.M. Dasch, A.T. Alpas, Elevated temperature tribological behavior of non-hydrogenated diamond-like carbon coatings against 319 aluminum alloy, <i>Surf. Coat. Technol.</i> , 200 (2006) 3996 – 4005, doi:10.1016/j.surfcoat.2005.02.202
15	Jean M. Dasch, Carolina C. Ang, Curtis A. Wong, Yang T. Cheng, Anita M. Weiner, Leo C. Lev, Erkan Konca, A comparison of five categories of carbon-based tool coatings for dry drilling of aluminum, <i>Surf. Coat. Technol.</i> , 200 (2006) 2970 – 2977, doi:10.1016/j.surfcoat.2005.04.025
16	E. Konca, Y.-T. Cheng, A.M. Weiner, J.M. Dasch and A.T. Alpas, Vacuum tribological behavior of the non-hydrogenated diamond-like carbon coatings against aluminum: Effect of running-in in ambient air, <i>Wear</i> , 259, 1-6 (2005) 795-799, doi:10.1016/j.wear.2005.02.034
17	E. Konca, Y.-T. Cheng, A.M. Weiner, J.M. Dasch and A.T. Alpas, Effect of test atmosphere on the tribological behaviour of the non-hydrogenated diamond-like carbon coatings against 319 aluminum alloy and tungsten carbide, <i>Surf. Coat. Technol.</i> , 200, 5-6 (2005) 1783-1791, doi:10.1016/j.surfcoat.2005.08.053
18	E. Konca, Y.T. Cheng, A. Weiner, J.M. Dasch, A. Erdemir and A.T. Alpas, Transfer of 319 Al alloy to titanium diboride and titanium nitride based (TiAlN, TiCN, TiN) coatings: effects of sliding speed, temperature and environment, <i>Surf. Coat. Technol.</i> , 200, 7 (2005) 2260-2270, doi:10.1016/j.surfcoat.2004.10.008
19	X. Nie, L. Wang, E. Konca, A.T. Alpas, Tribological behaviour of oxide/graphite composite coatings deposited using electrolytic plasma process, <i>Surf. Coat. Technol.</i> , 188–189 (2004) 207– 213, doi:10.1016/j.surfcoat.2004.08.025

## CONFERENCE PRESENTATIONS

1	İsmail Oğuzhan Ayhan, Erkan Konca ve Kâzım Tur, 2. International Iron & Steel Symposium (IISS'15), 1-3 Nisan 2015, Karabük, Türkiye
2	Erkan Konca, Kazım Tur, Determination of Controlled Cooling Parameters for Head Hardened R350HT Rails After Flash Butt Welding, 3. International Railway Systems Engineering Symposium, (ISERSE'16), 13-15 October 2016, Karabük, Türkiye
3	Nizar Ramadan, Kazım Tur, Erkan Konca, Design and Simulation of an Apparatus for the Post-Weld Controlled Accelerated Cooling of R350HT Head Hardened Rail Joints, 3. International Iron & Steel Symposium, 3-5 April 2017, Karabük, Türkiye
4	E. Konca, K.Tur, E.Koç, Effects of Alloying Elements (Mo, Ni, and Cu) on the Austemperability of GGG-60 Ductile Cast Iron, 3. International Iron & Steel Symposium, 3-5 April 2017, Karabük, Türkiye

## CITATIONS

Sum of times cited without self-citations (ISI Web of Science):	433 (As of September 2018)
H-index (ISI Web of Science):	14 (As of September 2018)

## PROJECTS

1	The Development of a Method to Improve the Limit Drawing Ratio of Blanks Using Preferential Heating
2	Development of the Domestic Production Technology and Production of the Head Hardened (R350HT) Rails Needed by Turkish State Railways

## COURSES GIVEN

1	MATE 201 Fundamentals of Materials Engineering
2	MATE 203 Thermodynamics of Materials I
3	MATE 207 Introduction to Materials Engineering
4	MATE 304 Metallic Materials
5	MATE 313 Phase Transformations and Kinetic Processes in Materials
6	MATE 316 Solidification Processes
7	MATE 318 Materials Characterization
8	MATE 420 Graduation Project
9	MATE 440 Corrosion and Oxidation of Metals