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تحصيلات

RWTH-Aachen University, Faculty of Mechanical Engineering, Aachen-Germany

Level: Master's Degree (1988)

Master's Thesis: High Temperature Brazing, development and characterization **Major: Industrial Design** 

• RWTH-Aachen University, Faculty of Mechanical Engineering, Aachen-Germany

Level: PhD Degree (1991)

PhD Thesis: Thermal Spraying of Ni-base alloys for high temperature

applications, development and characterization

**Major: Materials Science** 

مقالات علمي

#### **National Conference Papers:**

1) M. Aliofkhazraei, P. Taheri, A. Sabour Rouhaghdam, Ch. Dehghanian, Tribological investigations of carbon steel and stainless steels treated by plasma electrolytic nitrocarburising technique, 7<sup>th</sup> national conference of Surface Engineering and Heat Treatment, May 2006, Esfahan, Iran.

- 2) M. Aliofkhazraei, P. Taheri, A. Sabour Rouhaghdam, Ch. Dehghanian, Tribological properties of AISI H13 steel treated by Plasma electrolytic boriding(PEB) technique,, 7<sup>th</sup> national conference of Surface Engineering and Heat Treatment, May 2006, Esfahan, Iran.
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- 5) M. Aliofkhazraei, P. Taheri, A. Sabour Rouhaghdam, Ch. Dehghanian, Electrochemical and corrosion properties of AISI H13 steel treated by Plasma electrolytic boriding technique, 7<sup>th</sup> national conference of Surface Engineering and Heat Treatment, May 2006, Esfahan, Iran.
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- 9) M. Aliofkhazraei, P. Taheri, A. Sabour Rouhaghdam, Ch. Dehghanian, Corrosion behavior of plasma electrolytic nitrocarburized 316L austenitic stainless steel, 10<sup>th</sup> annual congress of metallurgical engineering association of Iran, November 2006, Mashhad, Iran.
- 10) M. Aliofkhazraei, P. Taheri, A. Sabour Rouhaghdam, Ch. Dehghanian, Evaluation of electrochemical and corrosion properties of AISI H13 steel treated by Plasma Electrolytic Nitrocarboriding (PEN/C/B), 10<sup>th</sup> annual congress of metallurgical engineering association of Iran, November 2006, Mashhad, Iran.
- 11) H. Hassannejad, T. Shahrabi, A. Shanaghi, A. Sabour Rouhaghdam, M. Aliofkhazraei, Microstructure and electrochemical behavior of green nano cerium oxide conversion coatings applied on AA5083-H321 Aluminum alloy, 1<sup>st</sup> joint conference between 19<sup>th</sup> seminar of casting engineering association of Iran and 11<sup>th</sup> annual congress of metallurgical engineering association of Iran, October 2007, Isfahan, Iran.
- 12) A. Shanaghi, A. Sabour Rouhaghdam, T. Shahrabi, H. Hassannejad, M. Aliofkhazraei, Increasing corrosion resistance of steel in 3.5 wt% NaCl solution by applying TiO<sub>2</sub> nano particle coating with sol-gel method, 1<sup>st</sup> joint conference between 19<sup>th</sup> seminar of

- casting engineering association of Iran and 11<sup>th</sup> annual congress of metallurgical engineering association of Iran, October 2007, Isfahan, Iran.
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- 4) P. Taheri, M. Aliofkhazraei, Ch. Dehghanian, A. Sabour Rouhaghdam, The effect of experimental parameters on nano-crystal formation and analytical aspects of AISI 1020 and AISI 4140 steel treated by plasma electrolytic nitrocarburising (PEN/C), Corrosion Congress of European Federation of Corrosion (UFC), EuroCorr2006, Maastricht, The Netherlands, 24-28 September 2006.
- 5) P. Taheri, M. Aliofkhazraei, Ch. Dehghanian, A. Sabour Rouhaghdam, Abrasion and corrosion properties of nano-crystalline coating on AISI 316L stainless steel treated by plasma electrolytic nitrocarburising (PEN/C), Corrosion Congress of European Federation of Corrosion (UFC), EuroCorr2006, Maastricht, The Netherlands, 24-28 September 2006.
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- 13) M. Aliofkhazraei, A.S. Rouhaghdam, E. Mohsenian, Pulsed Plasma Electrolytic Boriding of CP-Ti, European congress and exhibition on advanced materials and processes, Euromat 2007, 10-13 September 2007, Nurnberg, Germany.
- 14) M. Aliofkhazraei, A.R. Sabour, S. Shrestha, J.A. Curran, Erosion/Corrosion Characteristics of Keronite<sup>®</sup> Coatings on Aluminium, 21st International Conference On Surface Modification Technologies, SMT 21, 24-26 September 2007, Paris, France.
- 15) M. Aliofkhazraei, C. Morillo, R. Miresmaeili, A. Sabour Rouhaghdam, Carburizing of low melting point metals by pulsed nanocrystalline plasma electrolytic carburizing, The Sixth Asian-European International Conference on Plasma Surface Engineering, 24-29 September 2007, Yasuragi-Ioujima Nagasaki, Japan.
- 16) M. Aliofkhazraei, C. Morillo, R. Miresmaeili, A. Sabour Rouhaghdam, Study of pulsed current effects on wear resistance of pulsed plasma electrolytic carbonitrided 316L austenitic stainless steel, The Sixth Asian-European International Conference on Plasma Surface Engineering, 24-29 September 2007, Yasuragi-Ioujima Nagasaki, Japan.
- 17) M. Aliofkhazraei, Alireza Sabour Rouhaghdam, Neural Networks Prediction of Different Duty Cycles Effects on Corrosion Resistance obtained from Pulsed Nanocrystalline Plasma Electrolytic Carburizing, The 16th conference of International Federation for Heat Treatment and Surface Engineering, IFHTSE 2007, 30 October to 2 November 2007, Brisbane, Australia.
- 18) M. Aliofkhazraei, Alireza Sabour Rouhaghdam, Investigation on Shape of Pulse for Wear Resistance obtained from Pulsed Nanocrystalline Plasma Electrolytic Carbonitriding, The 16th conference of International Federation for Heat Treatment and Surface Engineering, IFHTSE 2007, 30 October to 2 November 2007, Brisbane, Australia.
- 19) M. Aliofkhazraei, Alireza Sabour Rouhaghdam, Study of Bipolar Pulsed Nanocrystalline Plasma Electrolytic Carburizing on Nanostructure of Compound Layer, The 16th conference of International Federation for Heat Treatment and Surface Engineering, IFHTSE 2007, 30 October to 2 November 2007, Brisbane, Australia.
- 20) M. Aliofkhazraei, A. Sabour Rouhaghdam, Neural Networks Prediction of Different Duty Cycles Effects on Corrosion Resistance obtained from Pulsed Nanocrystalline

- Plasma Electrolytic Carburizing, First Iran India joint conference on Nanotechnology, IIJCN2008, 27-29 April 2008, Tehran, Iran.
- 21) M. Aliofkhazraei, A. Sabour Rouhaghdam, Investigation on Shape of Pulse for Wear Resistance obtained from Pulsed Nanocrystalline Plasma Electrolytic Carbonitriding, First Iran India joint conference on Nanotechnology, IIJCN2008, 27-29 April 2008, Tehran, Iran.
- 22) M. Aliofkhazraei, A. Sabour Rouhaghdam, Study of Bipolar Pulsed Nanocrystalline Plasma Electrolytic Carburizing on Nanostructure of Compound Layer, First Iran India joint conference on Nanotechnology, IIJCN2008, 27-29 April 2008, Tehran, Iran.
- 23) M. Aliofkhazraei, H. Hassannejad, A. Shanaghi, T. Shahrabi, A.R. Sabour, Nanostructural and Electrochemical characteristics of cerium oxide thin films applied by dip immersion and sol-gel methods on AA5083-H321 Aluminum Alloy, ThinFilms2008, 13-16 July 2008, Singapore.
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- 25) M. Aliofkhazraei, S.H.H. Mofidi, A. Sabour Rouhaghdam, E. Ghobadi, E. Mohsenian, Improvement of surface characteristics by electroplating hard chromium coating post treated by nanocrystalline plasma electrolytic carbonitriding, Eleventh International Conference on Plasma Surface Engineering, PSE 2008, 15-19 September 2008, Germany.
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- 29) M. Aliofkhazraei, A.R. Sabour, S. Shrestha, J.A. Curran, Abrasive Wear of Materials Treated with Plasma Electrolytic Oxidation and Plasma Electrolytic Carburizing Processes, 22<sup>nd</sup> International Conference on Surface Modification Technologies, SMT 22, 22-24 September 2008, Sweden
- 30) M. Aliofkhazraei, A. Sabour Rouhaghdam, Pt-Co Electrodeposition on Carbon Nanotubes as Electrocatalysts, 60th annual meeting of the international society of electrochemistry, ISE 2009, 16-21 August 2009, Beijing, China.

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- 33) M. Aliofkhazraei, A. Sabour Rouhaghdam, Abrasive Wear Behavior of Sialon Nanocomposite Coatings Fabricated by Plasma Electrolytic Oxidation, 7th international conference on Asian-European conference on plasma surface engineering, AEPSE 2009, 20-25 September 2009, Busan, South Korea.
- 34) M. Aliofkhazraei, A. Sabour Rouhaghdam, Fabrication of TiC/WC Ultra Hard Nanocomposite layers by Plasma Electrolysis and study of its characteristics, 7th international conference on Asian-European conference on plasma surface engineering, AEPSE 2009, 20-25 September 2009, Busan, South Korea.
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- 36) M. Aliofkhazraei, A. Sabour Rouhaghdam, Characterization of Cu based nanocomposite by TiO<sub>2</sub> nanorods formed by duplex electroplating and plasma electrolytic saturation, 2nd international conference on microelectronics and plasma technology, ICMAP 2009, 20-25 September 2009, Busan, South Korea.
- 37) M. Aliofkhazraei, A. Sabour Rouhaghdam, Interaction study of carbon nanotubes and quantum dots in a novel nanocomposite formed in organic electrolyte, 2nd international conference on microelectronics and plasma technology, ICMAP 2009, 20-25 September 2009, Busan, South Korea.
- 38) M. Aliofkhazraei, A. Sabour Rouhaghdam, Application of plasma electrolysis for fabrication of nanostructures and cleaning on metallic wires, 2nd international conference on microelectronics and plasma technology, ICMAP 2009, 20-25 September 2009, Busan, South Korea.
- 39) M. Aliofkhazraei, A. Sabour Rouhaghdam, E. Ghobadi, Characterization of Sialon-based Nanocomposite Coatings Prepared via Micro Arc Oxidation, 4th NANOSMAT 2009, 19-22 October 2009, Rome, Italy.
- 40) M. Aliofkhazraei, A. Sabour Rouhaghdam, E. Ghobadi, Ti-WC Nanocrystalline coating formed by SMAT process on 316L stainless steel, 4th NANOSMAT 2009, 19-22 October 2009, Rome, Italy
- 41) M. Aliofkhazraei, A. Sabour Rouhaghdam, Synthesis and Properties of a Novel Ultrahard Nanodiamond/Titanium Carbide Nanocomposite Coating, The 4th International Conference on New Diamond and Nano Carbons, 16-20 May 2010, Suzhou, China.
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- 46) M. Aliofkhazraei, A. Sabour Rouhaghdam, Photocatalytic characteristics of the Si<sub>3</sub>N<sub>4</sub>/Titania based PEO-synthesized nanocomposite layer, International Conference on Electronic Materials presented by International Union of Materials Research Societies, IUMRS-ICEM 2010, 22-27 August 2010, Seoul, South Korea.
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