

PUBLICATIONS

Refereed Journal Papers

1. Y. Snir, D. Moreno, I. Silverman, S. Samuha, Y. Eisen, D. Eliezer, Y. Gelbstein, S. Haroush, "Mechanical Properties of Proton Bombarded SS316L Thin Foils Using the Small Punch Technique", *Journal of Nuclear Materials*, 540 (2020), 152340.
2. Y. Snir, S. Haroush, A. Danon, A. Landau, D. Eliezer, Y. Gelbstein, "Aging condition and trapped hydrogen effects on the mechanical behavior of a precipitation hardened martensitic stainless steel". *Journal of Alloys Compounds*, 805 (2019), pp. 509-516.
3. S. B. Murguia, A. Clauser, H. Dunn, W. Fisher, L. Mello, Y. Snir, M. L. Young, "NiTi shape memory alloy helices through the hydriding-dehydriding method", *Materialia* 5 (2019), 100210.
4. Y. Snir, S. Haroush, A. Danon, A. Landau, Y. Gelbstein, D. Eliezer, "Metallurgical and hydrogen effects on the small punch tested mechanical properties of PH-13-8Mo stainless steel". *Materials*, 11 (2018), 1966
5. S. B. Murguia, A. Clauser, H. Dunn, W. Fisher, Y. Snir, R. E. Brennan, M. L. Young, "Low-pressure and low-temperature hydriding-pulverization-dehydriding method for producing shape memory alloy powders", *Shape Memory and Superelasticity* 4 (2018) pp. 313–326
6. Y. Snir, M. Carl, N.A. Ley, M.L. Young, Effects of hydrogen charging on the phase transformation of martensitic NiTi shape memory alloy wires, *Shape Memory and Superelasticity*. 3 (2017) pp. 443-456.
7. Y. Snir, G. Ben-Hamu, D. Eliezer, E. Abramov "Effect of Compression Deformation on the Microstructure and Corrosion Behavior of Magnesium Alloys", *Journal of Alloys and Compounds*, vol. 528, (2012), pp. 84-90.
8. Y. Snir, M. Pinkas, Y. Gelbstein, A. Landau, "Applying TEP measurements to assess the Aging Stage of Maraging 250 steel", *Quantitative Nondestructive Evaluation*, vol. 27, American Institute of physics 2008.
9. Y. Unigovski, A. Eliezer, E. Abramov, Y. Snir, E.M. Gutman, "Corrosion Fatigue of Die-Cast and Extruded Magnesium Alloys", *Materials Science Engineering A* 360, (2003) pp. 132–139.

Patents

10. M.L. Young, Y. Snir, "Techniques for Producing SMA Materials and Powders" US-Patent, US2020/0961A1, 01/2020.

Refereed research proposals to APS national laboratory

11. Y. Snir, M.L. Young, High energy X-ray diffraction measurements of precipitation hardened steels to analyze in-situ hydrogen Effects on Phase Stability and Removal Kinetics during Charging and Heating & Cooling, GUP-53836, approved 2017.
12. Y. Snir, M. Carl, N.A. Ley, M.L. Young, High energy X-ray diffraction measurements of martensitic NiTi shape memory alloys during in-situ hydrogen charging and heating and cooling, GUP-51351, approved 2016.

PRESENTATIONS AT CONFERENCES:

1. Y. Snir, M. Carl, N. Ley, Y. Gelbstein, A. Landau, D. Eliezer, and M.L. Young, "The Effects of Thermomechanical Treatments on a New Fe-rich Dual-phase Complex Concentrated Alloy (CCA)", oral presentation: 1st International Conference on Technological Innovations in Metals Engineering (TIME), Haifa, Israel, May (2018).
2. M. Issa, S. B. Murguia, Y. Snir, and Marcus L. Young "Processing and characterization of porous high entropy alloy structures via freeze-casting", oral presentation: 147th Annual TMS Meeting, March (2018).
3. S. B. Murguia, Y. Snir, A. Clauser, H. Dunn, W. Grogg, R. E. Brennan, and M. L. Young "Shape memory alloy powders from a low pressure, low temperature hydriding pulverizing-dehydriding process" MS&T2017 Materials Science and Technology Conference David L. Lawrence Convention Center Pittsburgh , PA , USA, 10/2017.
4. Y. Snir, M. Carl, N. Ley, Y. Gelbstein, A. Landau, D. Eliezer, and M.L. Young, "Exploring an Fe-rich eutectic complex concentrated alloy (CCA) with age hardening properties", XXVI international Materials Research Congress (IMRC) 2017, Cancun Mexico, 08/2017.
5. S. B. Murguia, A. Clauser, H. Dunn, W. Grogg, Y. Snir, R. E. Brennan, and M. L. Young "Hydriding- pulverization- dehydriding method of preparing shape memory alloy powders " ICOMAT2017 International Conference On Martensitic Transformations, Chicago, IL, USA, 07/2017.
6. Y. Snir, M. Carl, N.A. Ley, M.L. Young, "Effects of Hydrogen-charging on the Phase Transformation of Martensitic NiTi Shape Memory Alloy Wires", SMST2017, Shape Memory and Superelastic Technologies, May 15-19, (2017) San Diego California.
7. M. Shmulevitsh, Y. Snir, R. Shneck "Self and interaction energy of γ' precipitate in A-286 steel" The 17th Israel Materials Engineering Conference, Bar-Ilan University, Israel, 02/2016.
8. Y. Snir, Y. Gelbstein, A. Landau "A Comparative Assesment Of The Aging Condition

In Precipitation Hardened Steels By Thermo-Electric Power (TEP) Measurements", Proceeding of the 15th Israel Materials Engineering Conference (IMEC 15) 2012, Dead-Sea Israel.

9. S. Avraham, G. Moshe, Y. Snir, M. Shmolevich, E. Khana, I. Edry "The Dissolution Kinetics Of Sn-Co Master- Alloy In Pure Sn", Proceeding of the 15th Israel Materials Engineering Conference (IMEC 15) 2012, Dead-Sea Israel.
10. M. Pinkas, Z. Szaraz, Y. Snir, V. Krasjak, A. Landau, P. Hahner, "Advanced Non-Destructive Microstructural Assessment of ODS Steels", Proceeding of DIANA 1st International Workshop on Dispersion Strengthened Steels for Advanced Nuclear Application 04/2011, Switzerland.
11. Y. Snir, M. Pinkas, Y. Gelbstein, O. Yehezkel and A. Landau, "Quantitative Non-Destructive Evaluation (QNDE) Tools for the assessment of precipitation hardened high strength steels", Proceeding of IAEA-JRC workshop 2010, Ein-Gedi Israel
12. O. Yeheskel, Y. Gelbstein, M. Pinkas, Y. Snir, A. Landau, "Elastic moduli measurements in metallic compounds", JRC-IAEA, workshop 2010, Ein-Gedi, May 2010.
13. Y. Snir, Y. Gelbstein, E. Vinegard, S. Meir, M. Pinkas, A. Landau "Thermo-Electric Power (TEP) measurements for studying ageing kinetics in PH Steels", Proceeding of QNDE Conference July 2009, University of Rhode Island USA.
14. A. Landau, Y. Gelbstein, M. Pinkas, B. Herman, Y. Snir, D. Olson, "Application of Thermo-Electric Power measurement as an NDT Tool to assess microstructure evolution", Proceeding of IMEC 13 2007, The Technion Israel.
15. Y. Snir, A. Landau, Y. Gelbstein, Y. Edry, E. Abramov, D. Eliezer, "Kinetic Study of Precipitation Hardening in High Strength Steels Followed by Thermoelectric Power Measurement", Proceeding of IMEC 13 2007, The Technion Israel.
16. G. Ben-Hamu, Y. Snir, S. Haroush, A. Landau "Characterization of Corrosion Behavior of Mg Alloys Friction Stir Welded", Proceeding of Advanced Materials and Processes in Industry Conference CAMPI 2007, Beer-Sheva Israel.
17. A. Rave, G. Moshe, M. Weiss, Y. Snir, Y. Iphlach, "Oxidation of Tantalum by Inductive Radio-Frequency Plasma", Proceeding of Advanced Materials and Processes in Industry Conference CAMPI 2007, Beer-Sheva Israel.
18. Y. Snir, A. Landau, Y. Gelbstein, E. Abramov, D. Eliezer, "TEP Measurements of Metallurgical Processes in Al Alloys", Israel Materials Engineering Conference IMEC12 2006 ,The Technion Israel.
19. A. Landau, S. Haroush, M. Pinkas, M. Taliander, Y. Snir, S. Eden, "Light and Heavy Reactive Materials Welded by Friction Stir Welding", Mechanical Engineering Conference Ben-Gurion University 2005, Israel.

20. S. Haroush, Y. Snir, M. Pinkas, , S. Eden, A. Turgeman, A. Landau "Friction Stir Welding of Carbon Steel", The Welding and Joining Conference 2005, Tel-Aviv Israel.
21. Y. Snir, S. Haroush, S. Eden, M. Pinkas, A. Landau "Characterization of Friction Stir Welded Mg-Alloys", The Welding and Joining Conference 2005, Tel-Aviv Israel.
22. Y. Snir, D. Eliezer, E. Abramov, "Corrosion Of Wrought Magnesium Alloys", The First Israel Conference of Corrosion Processes & Advanced Materials NACE 2003, Israel. (Exceptional Poster)
23. Y. Snir, D. Eliezer, E. Abramov, "Residual Stresses In Wrought Magnesium Alloys", The 10th Israel Materials Engineering Conference (IMEC 10) 2002, Dead-Sea Israel.
24. A. Eliezer, E. Abramov, E.M. Gutman, A. Ben-Artzy, A. Shtechman, Y. Snir, B. Edelestein, "Corrosion Fatigue Of Extruded Magnesium Alloys", The 10th Israel Materials Engineering Conference (IMEC 10) 2002, Dead-Sea Israel.