## REFERENCES


Abrutin, A., Drabkin, I., & Osvenski, V. (2004). Corrections Used when Measuring Materials Thermoelectric Properties by Harman Method. *Proc. 2nd Eur. Cof. on Thermoelectrics, Krakow*.

Anselmi-Tamburini U. (2019). Spark Plasma Sintering. *Encyclopedia of Materials: Technical Ceramics and Glasses*, 1-17.

Barma, M., M.Riaz, R.Saidur, & B.D.Long. (2015). Estimation of Thermoelectric Power Generation by Recovering Waste Heat from Biomass Fired Thermal Oil Heater. *Energy Conversion and Management, vol.98*, 303-313.

Bensebaa, F. (2013). Chapter 5 - Clean Energy. In F. Bensebaa, *Interface Science and Technology* (pp. 279-383). Elsevier.

Boukai A. I., B. Y.-K.-K. (2011). Silicon Nanowires as Efficient Thermoelectric Materials. *Materials for Sustainable Energy: A collection of Peer-Reviewed Research and Review Article from Nature Publishing Group*, 116-119.

Campbell, M. R., Hogarth, C. A., & Hagger, C. A. (1965). A Correction to the Theory of Harman's Method of Determining the Thermoelectric Figure of Merit. *International Journal of Electronics, vol.19, Issue 6*, 571-575.

Campoy-Quiles M. (2018). Will Organic Thermoelectric Get Hot? *Phil. Trans. R. Soc. A 377*, 0325.

Chen, S. &. (2013). Recent progress of half-Heusler for moderate temperature thermoelectric applications. *Materials Today*, *16*, 387-395.

Fleurial, J. P., Borshchevsky, A., Caillat, T., & Ewell, R. (1997). New Material and Device for Thermoelectric Application. *Proceedings of the 32nd Intersociety Energy Conversion Engineering Conference* (pp. 1080-1085). New York: American Institute of Chemical Engineers.

Gao, C., & Chen, G. (2016). Conducting Polymer/Carbon Particle Thermoelectric Composites: Emerging Green Energy Materials. *Composite Science and Technology, vol.124*, 52-70.

Gayner C., K. K. (2016). Recent Advances in Thermoelectric Materials. *Prog Mater Sci 83*, 330-382.

Goldsmid, H. J. (2009). Introduction to Thermoelectricity. *Materials Science Volume 121*.

Goldsmith H. J. (2016). The Improvement of a Specific Material-Bismuth Telluride. *Introduction to Thermoelectricity. Berlin: Springer*, 85-107.

Gromov, G., Kondratiev, D., Rogov, A., & Yershova, L. (2001). Z-Meter: Easy-to-use Application and Theory. *Proceedings Sixth European Workshop on Thermoelectricity of the European Thermoelectric Society*, (pp. 1-8). Freiburg im Breisgau.

Hadjistassou, C., Kyriakides, E., & Georgiou, J. (2013). Designing High-Efficiency Segmented Thermoelectric Generators. *Elsevier (Energy Conversion and Management), 6*, 165-172 (11).

Harman, T., Taylor, P. J., Spears, D. L., & Walsh, M. P. (2000). Thermoelectric quantum dots superlattices with high ZT. *J.Electron.Mater.29*, 1-2.

Hasan M. N., W. H. (2020). Inorganic Thermoelectric Materials: A Review. *International Energy Research*, 1-53.

Hazan, E., Ben-Yehuda, O., Madar, N., & Gelbstein, Y. (2015). Functional Graded Germanium-Lead Chalcogenide-Based Thermoelectric Module for Renewable Energy Applications. *Advanced Energy Materials, vol.5, issue 11*, 1-8.

Heremans, J. P., Dresselhaus, M. S., Bell, L. E., & Mcreli, D. T. (2013). When Thermoelectrics Reached the Nanoscale,8. *Nature Nanotechnology*, 471-473.

Hung, L. T. (2015). Segmented Thermoelectric Oxide-Based Module for High-Temperature Waste Heat Harvesting. *Energy Technology, 3*, 7143-7151.

Iwasaki, H., & Hori, H. (2005). Thermoelectric Property Measurements by the Improved Harman Method. *International Conference on Thermoelectrics, ICT, Proceedings*, (pp. 501-504).

Iwasaki, H., Koyano, M., & Hori, H. (2003). Evaluation of the Figure of Merit on Thermoelectric Materials by Harman Method. *Japanese Journal of Applied Physics, Part 1: Regular Papers and Short Notes and Review Papers, vol.42, issue 6A*, 3707-3708.

Jacquot, A., Jagle, M., Konig, J., Ebling, D. G., & Bottner, H. (2007). Theoretical Study of the Harman-Method for Evaluating the Thermoelectric Performance of Materials and Components at High Temperature. *Proceedings of the 5th European Conference on Thermoelectrics, ECT2007*, (p. issue 6).

Jia, X., & Gao, Y. (2014). Estimation of Thermoelectric and Mechanical Performance of Segmented Thermoelectric Generator Under Optimal Operating Conditions. *Applied Thermal Engineering, vol.73(1)*, 335-342.

Jood P., O. M. (2018). Excessively Doped PbTe with Ge-Induced Nanostructures Enables High-Efficiency Thermoelectric Modules. *Joule 2*, 1339-1355.

Kim S. I., A. K. (2011). Enhancement of Seebeck Coefficient in Bi0.5Sb1.5Te3 with High-Density Tellurium Nanoinclusions. *Applied Physics Express 4*, 091801.

Kim S. I., L. K. (2015). Dense Dislocation Arrays Embedded in Grain Boundaries for High-Performance Bulk Thermoelectrics. *Science 348*, 109-114.

Kim, H. S., Liu, W., Chen, G., Chu, C.-W., & Ren, Z. (2015). Relationship between Thermoelectric Figure of Merit and Energy Conversion Efficiency. *Proceedings of the National Academy of Sciences of the United States ofAmerica, vol.112, issue 27*, 8205-8210.

Kok S. Ong, L. J. (2018). 4.20 Thermoelectric Energy Conversion. In I. Dincer, *Comprehensive Energy System* (pp. 794-815). Elsevier.

Kuznetsov, V. L., Kuznetsova, L. A., Kaliazin, A. E., & Rowe, D. M. (2002). High-Performance Functionally Graded and Segmented Bi2Te3-based Materials for Thermoelectric Power Generation. *Journal of Material Science, vol.37, issue 14*, 2893 - 2897.

Kwon, S., Kim, Y.-G., Lee, S., & Kim, J. C. (2012). Measurement of The Figure-of-Merit of Thermoelectric Devices. *XX IMEKO World Congress Metrology for Green Growth*.

Lakeh, K. H., Abardeh, R. H., & Kaatuzian, H. (2015). Numerical Simulation of a Segmented Thermoelectric Generator. *Energy and Power*, *vol.5, issue 1*, 1-9.

Le, T. H., & Linderoth, S. (2014). Segmented Thermoelectric Oxide-based Module. *Thesis Ph.D*.

Li J. Q., L. S. (2011). Synthesis and Thermoelectric Properties of the PbSe1-xTex Alloys. *Journal of Alloys and Compounds 509*, 4516 - 4519.

Lim Y. S., W. S. (2017). Synthesis on n-type Bi2Te1-xSex Compounds Through Oxide Reduction Process and Related Thermoelectric Properties. *Journal of the European Ceramic Society*, xxx-xxx.

Md Yatim, N. (2012). Development of "Open-Short Circuit" Dimensionless Figure- of-Merit (ZT) Measurement Technique for Investigation of Thermoelements and Segmented Thermoelectric Structures. *Ph.D. Thesis*, (2).

Md. Yatim, N. (2012). Development of “Open-Short circuit” dimensionless figure-of-merit (ZT) measurement technique for investigation of thermoelectric and segmented thermoelectric structures. *Ph. D Thesis, Cardiff University*.

Md. Yatim, N., & Min, G. (2015). ZT Measurement of Thermoelectric under Large Temperature Difference. *Advanced Materials Research, vol.1107*, 716-721.

Min, G., & Rowe, D. M. (2001). A novel principle allowing rapid and accurate measurement of the dimensionless figure of merit. *Meas. Sci.Technol.12*, 1261 - 1262.

Min, G., Singh, T., Gracia-Canadas, J., & Ellor, R. (2015). Evaluation ofThermoelectric Generators By I-V Curves. *Journal of Electronic Materials, vol.45, issue 3*, 1700-1704.

Ming, T., Wu, Y., Peng, C., & Tao, Y. (2015). Thermal Analysis on a Segmented Thermoelectric Generator. *Energy, vol.80*, 388-399.

Ming, T., Yang, W., Wu, Y., Xiang, Y., Huang, X., Cheng, J., . . . Zhao, J. (2016). Numerical analysis of the thermal behavior of a segmented thermoelectric generator. *International Journal of Hydrogen Energy, vol.42, issue 5*, 3521-3535.

Mohsen, K. K. (2014). Synthesis and Characterization of Bismuth Telluride Based Nanostructured Thermoelectric Composite Materials. *Ph.D. Thesis*, (1).

Muto, A., Kraemer, D., Hao, Q., Ren, Z. F., & Chen, G. (2009). Thermoelectric Properties and Efficiency Measurements Under Large Temperature Differences. *Review of Scientific Instruments*, *80, issue 9*, 0-7.

Nagami Y., M. K. (2014). Preparation and Characterization of Bi0.4Sb1.6Te3 Bulk Thermoelectric Materials. *Journal of Electronic Materials*, 2262-2268.

Nguyen T. H., O. S. (2000). The Dependence of The Fermi Level on Temperature, Doping Concentration, and Disorder in Disordered Semiconductors. *J. Appl. Phys. 88*, 3479.

Ouyang, Z. L. (2016). Modeling of Segmented High-Performance Thermoelectric Generators with Effects of Thermel Radiation, Electrical, and Thermal Contact Resistances. *Scientific Reports, vol.6*, 24123.

Riffat, S., & Ma, X. (2003). Thermoelectric: A Review of Present and Potential Applications. *Applied Thermal Engineering, vol.23*, 913-935.

Rizwan M, G. K. (2020). In vitro evaluation of novel low-pressure spark plasma sintered HA-BG composite scaffolds for bone tissue engineering. *RSC Adv.*, DOI: 10.1039/d0ra04227g.

Rowe, D. M. (1995). CRC Handbook of Thermoelectrics. CRC Press Inc.

Rowe, D. M. (2006). *Thermoelectric Handbook.* CRC Press: Boca Raton.

S Surbhi. (2018, February 10). *Difference Between Conduction, Convection, and Radiation*. Retrieved from Key Differences: https://keydifferences.com/difference-between-conduction-convection-and-radiation.html

Sakamoto T., L. T. (2012). The Use of Transition-Metal Silicades to Reduce the Contact Resistance between The Electrode and Sintered n-type Mg2Si. *Journal of Electronic Materials, 41 (6)*, 1805-1810.

Serrano-S'anchez F., G. M. (2017). Enhanced Figure of Merit in Nanostructured (Bi, Sb)2 Te3 with Optimized Composition. *Sci Rep*, 7:6277.

Sharma S., S. U. (2016). Thermoelectric Response in Single Quintuple Layer Bi2Te3. *ACS Energy Lett. 1*, 875-879.

Shen, Z. G., Liu, X., Wu S., L., Xiao, L., & Chen, Z. X. (2018). Theoretical Analysis on Segmented Annular Thermoelectric Generator. *Energy*, DOI: 10.1016/j.energy.2018.05.163.

Soleimani Z., Z. S. (2020). A Review on Recent Developments of thermoelectric Materials for Room-Temperature Applications. *Sustainable Energy Technologies and Assessments 37*, 100604.

Sootman J. R., C. J. (2009). New and Old Concepts in Thermoelectric Materials. *Angew Chem Int Ed. 48*, 8616-8639.

Synder, G. J., & Ursell, T. S. (2003). Thermoelectric Efficiency and Compatibility. *Physical Review Letter, vol.91, no.14*, 148301.

Terasaki, I. (2005). Introduction to Electricity. In S. S. Charles C. Sorell, *Materials for Energy Conversion Devices* (pp. 339-357). Woodhead Publishing Series in Electronic and Optical Materials.

Tian, Z., Lee, S., & Chen, G. (2013). Heat Transfer in Thermoelectric Materials and Devices. *Journal of Heat Transfer, Vol.135,* Issue 6, 061605.

Tzounis L. (2019). Organic Thermoelectrics and Thermoelectric Generators (TEGs). In Memon S., *Advanced Thermoelectric Materials for Energy Harvesting Applications* (p. 67825). IntechOpen.

Verma, J. S. (2013). A Comparison of Figure of Merit for Some Common. *Global Journal of Researches in Engineering*, Volume 13 Issue 11.

Wei He, G. Z. (2015). Recent development and Application of Thermoelectric Generator and Cooler. *Applied Energy 143*, 1-25.

You H. J., C. H. (2019). Influence of Different Substrate Materials on Thermoelectric Module with Bulk Legs. *Journal of Power Sources*, 1 - 10.

Yu C., Z. X. (2013). Preparation and Thermoelectric Properties of Inhomogeneous Bismuth Telluride Alloyed Nanorods. *Journal of Alloys and Compounds 570*, 85-93.

Zeng Minxiang, Z. D.-J. (2022). Printing thermoelectric inks toward next-generation energy and thermal devices. *Chem Soc Rev, 51*, 485-512.

Zhang, Q., Chere, E. K., Sun, J., Cao, F., Dalhal, K., Chen, S., . . . Ren, Z. (2015). Studies on Thermoelectric Properties on N-Type Polycrystalline SnSe1-xSx by Iodine Doping. *Advanced Energy Materials, vol.5, no.12*.

Zhang, Qian, Chere, E. K., Sun, J., Cao, F., Dahal, K., . . . Ren, Z. (2015). Studies on Thermoelectric Properties Of SnSe[1-x]S[x] by Iodine Doping. *Advanced Energy Materials 5*.

Zhao, L. D., Dravid, V. P., & Kanatzidis, M. G. (2014). The Panasonic Approach to High-Performance Thermoelectrics. *Energy. Environ. Sci. 7*, 251-268 (10).

Zhao, L.-D., Lo, S.-H., Zhang, Y., Sun, H., Tan, G., Uher, C., . . . Kanatzidis, M. G. (2014). Ultralow Thermal Conductivity and High Thermoelectric Figure of Merit in SnSe Crystals. *Nature*, 373-377 (17).