

## REFERENCES

- Amancio-Filho, S. T., Sheikhi, S., dos Santos, J. F., & Bolfarini, C. (2008). Preliminary study on the microstructure and mechanical properties of dissimilar friction stir welds in aircraft aluminium alloys 2024-T351 and 6056-T4. *Journal of Materials Processing Technology*, 206(1–3), 132–142.
- Askeland, D.R and Fulay, P. . (2009). *Materials Science and Engineering*.
- Askeland, D. R., Fulay, P. P., & Wendelin J. Wright. (2010). The Science and Engineering Materials. In *Material Engineering* (Sixth Edit). Cengage Learning, Inc.
- ASM Handbook, Vol 03 - Alloy Phase Diagrams (2005). (n.d.).
- Association, T. A. (1990). *Rolling Aluminum : From the Mine Through the Mill on the Sheet and Plate Division ' s Technology Committee*. 135.
- Bailey, J. (2000). *Mechanical Testing and Evaluation*.
- Barabash, O. M., Barabash, R. I., Ice, G. E., Feng, Z., & Gandy, D. (2009). X-ray microdiffraction and EBSD study of FSP induced structural/phase transitions in a Ni-based superalloy. *Materials Science and Engineering A*, 524(1–2), 10–19. <https://doi.org/10.1016/j.msea.2009.03.086>
- Baumann, J. A. (2012). *Production of Energy Efficient Preform Structures (PEEPS)*.
- Davis, J. R. (2001). Aluminum and Aluminum Alloys. In *Light Metals and Alloys* (pp. 351–416). ASM International.
- De, P. S., & Mishra, R. S. (2011). Friction stir welding of precipitation strengthened aluminium alloys: Scope and challenges. *Science and Technology of Welding and Joining*, 16(4), 343–347. <https://doi.org/10.1179/1362171811Y.0000000020>
- DebRoy, T., & Bhadeshia, H. K. D. H. (2010). Friction stir welding of dissimilar alloys - A perspective. *Science and Technology of Welding and Joining*, 15(4), 266–270.
- Devaiah, D., Kishore, D. K., & Laxminarayana, D. P. (2016). Effect of Material Location and Tool Rotational Speed on the Mechanical Properties of Dissimilar Friction Stir Welded Aluminum Alloys (5083-H321to 6061-T6). *Bonfring International Journal of Industrial Engineering and Management Science*, 6(4), 186–190. <https://doi.org/10.9756/bijiems.8311>
- Ellis. (1996). Joining of aluminium based metal matrix composites. *International Materials Reviews*.

- Frigaard, Grong, & Midling, O. T. (2001). A process model for friction stir welding of age hardening aluminum alloys. *Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science*, 32(5), 1189–1200. <https://doi.org/10.1007/s11661-001-0128-4>
- Gratecap, F., Girard, M., Marya, S., & Racineux, G. (2012). Exploring material flow in friction stir welding: Tool eccentricity and formation of banded structures. *International Journal of Material Forming*, 5(2), 99–107. <https://doi.org/10.1007/s12289-010-1008-5>
- Guo, J. F., Chen, H. C., Sun, C. N., Bi, G., Sun, Z., & Wei, J. (2014). *Friction stir welding of dissimilar materials between AA6061 and AA7075 Al alloys effects of process parameters*. 56, 185–192. <https://doi.org/10.1016/j.matdes.2013.10.082>
- Ilman, M. N., Triwibowo, N. A., Wahyudianto, A., & Muslih, M. R. (2017). Environmentally assisted fatigue behaviour of stress relieved metal inert gas (MIG) AA5083 welds in 3.5% NaCl solution. *International Journal of Fatigue*, 100, 285–295. <https://doi.org/10.1016/j.ijfatigue.2017.03.041>
- Jamshidi Aval, H., Serajzadeh, S., Sakharova, N. A., Kokabi, A. H., & Loureiro, A. (2012). A study on microstructures and residual stress distributions in dissimilar friction-stir welding of AA5086-AA6061. *Journal of Materials Science*, 47(14), 5428–5437. <https://doi.org/10.1007/s10853-012-6430-2>
- Jariyaboon, M., Davenport, A. J., Ambat, R., Connolly, B. J., Williams, S. W., & Price, D. A. (2006). Corrosion of a dissimilar friction stir weld joining aluminium alloys AA2024 and AA7010. *Corrosion Engineering Science and Technology*, 41(2), 135–142. <https://doi.org/10.1179/174327806X107905>
- Jones, D. A. (1996). *Principles and prevention of corrosion*, Prentice-Hall International, NJ, USA (p. Prentice-Hall International, NJ, USA). p. Prentice-Hall International, NJ, USA.
- Kakaei, K., Esrafil, M., and E. (2018). Graphene Surfaces: Particles and Catalysts. In *Materials Science and Engineering*.
- Krishnan, K. N. (2002). On the formation of onion rings in friction stir welds. *Materials Science and Engineering A*, 327(2), 246–251. [https://doi.org/10.1016/S0921-5093\(01\)01474-5](https://doi.org/10.1016/S0921-5093(01)01474-5)
- Kumar, A., Sharma, S. K., Pal, K., & Mula, S. (2017). Effect of Process Parameters on Microstructural Evolution, Mechanical Properties and Corrosion Behavior of Friction Stir Processed Al 7075 Alloy. *Journal of Materials Engineering and Performance*, 26(3), 1122–1134. <https://doi.org/10.1007/s11665-017-2572-3>
- Lee, W. B., Yeon, Y. M., & Jung, S. B. (2003). The mechanical properties related to the dominant microstructure in the weld zone of dissimilar formed Al alloy

- joints by friction stir welding. *Journal of Materials Science*, 38(20), 4183–4191. <https://doi.org/10.1023/A:1026337807920>
- Leitao, C., Leal, R. M., Rodrigues, D. M., Loureiro, A., & Vilaça, P. (2009). Mechanical behaviour of similar and dissimilar AA5182-H111 and AA6016-T4 thin friction stir welds. *Materials and Design*, 30(1), 101–108. <https://doi.org/10.1016/j.matdes.2008.04.045>
- Mathers. (2002). *The Welding of Aluminum and Its Alloys*. Woodhead Publishing Series in Welding and Other joining Technologies.
- Mishra, R. and Sidhar, H. (2016). Friction Stir Welding of 2XXX Aluminum Alloys Including Al-Li Alloys Friction Stir Welding of 2XXX Aluminum Alloys Including Al-Li Alloys A Volume in the Friction Stir Welding and Processing Book Series. In *Friction Stir Welding of 2XXX Aluminum Alloys Including Al-Li Alloys*.
- Mishra, R. S., & Ma, Z. Y. (2005). Friction stir welding and processing. *Materials Science and Engineering R: Reports*, 50(1–2), 1–78. <https://doi.org/10.1016/j.mser.2005.07.001>
- Moradi, M. M., Jamshidi Aval, H., Jamaati, R., Amirkhanlou, S., & Ji, S. (2018). Microstructure and texture evolution of friction stir welded dissimilar aluminum alloys: AA2024 and AA6061. *Journal of Manufacturing Processes*, 32, 1–10. <https://doi.org/10.1016/j.jmapro.2018.01.016>
- Mukhopadhyay, P. (2012). Alloy Designation, Processing, and Use of AA6XXX Series Aluminium Alloys. *ISRN Metallurgy*, 2012(Table 1), 1–15. <https://doi.org/10.5402/2012/165082>
- Nandan, R., DebRoy, T., & Bhadeshia, H. K. D. H. (2008). Recent advances in friction-stir welding - Process, weldment structure and properties. *Progress in Materials Science*, 53(6), 980–1023. <https://doi.org/10.1016/j.pmatsci.2008.05.001>
- Palanivel, S., Nelaturu, P., Glass, B., & Mishra, R. S. (2015). Friction stir additive manufacturing for high structural performance through microstructural control in an Mg based WE43 alloy. *Materials and Design*, 65, 934–952. <https://doi.org/10.1016/j.matdes.2014.09.082>
- Rai, R., De, A., Bhadeshia, H. K. D. H., & DebRoy, T. (2011). Review: Friction stir welding tools. *Science and Technology of Welding and Joining*, 16(4), 325–342. <https://doi.org/10.1179/1362171811Y.0000000023>
- Riahi, M., & Nazari, H. (2011). Analysis of transient temperature and residual thermal stresses in friction stir welding of aluminum alloy 6061-T6 via numerical simulation. *International Journal of Advanced Manufacturing Technology*, 55(1–4), 143–152. <https://doi.org/10.1007/s00170-010-3038-z>

- Rodriguez, R. I., Jordon, J. B., Allison, P. G., Rushing, T., & Garcia, L. (2015). Microstructure and mechanical properties of dissimilar friction stir welding of 6061-to-7050 aluminum alloys. *Materials and Design*, 83, 60–65. <https://doi.org/10.1016/j.matdes.2015.05.074>
- Rudolf, A. (2006). Extrusion of semifinished products in aluminum alloys. In *Extrusion*. Retrieved from [www.asminternational.org](http://www.asminternational.org)
- Sadeesh, P., Venkatesh, K. M., Rajkumar, V., Avinash, P., Arivazhagan, N., Devendranath, R. K., & Narayanan, S. (2014). Studies on friction stir welding of aa 2024 and aa 6061 dissimilar metals. *Procedia Engineering*, 75, 145–149. <https://doi.org/10.1016/j.proeng.2013.11.031>
- Schneider, J. A., & Nunes, A. C. (2004). Characterization of plastic flow and resulting microtextures in a friction stir weld. *Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science*, 35(4), 777–783. <https://doi.org/10.1007/s11663-004-0018-4>
- Scialpi, A., De Giorgi, M., De Filippis, L. A. C., Nobile, R., & Panella, F. W. (2008). Mechanical analysis of ultra-thin friction stir welding joined sheets with dissimilar and similar materials. *Materials and Design*, 29(5), 928–936. <https://doi.org/10.1016/j.matdes.2007.04.006>
- Shen, C., Zhang, J., & Ge, J. (2011). Microstructures and electrochemical behaviors of the friction stir welding dissimilar weld. *Journal of Environmental Sciences*, 23(SUPPL.), S32–S35. [https://doi.org/10.1016/S1001-0742\(11\)61072-3](https://doi.org/10.1016/S1001-0742(11)61072-3)
- Threadgill, P. L., Leonard, A. J., Shercliff, H. R., & Withers, P. J. (2009). Friction stir welding of aluminium alloys. *International Materials Reviews*, 54(2), 49–93. <https://doi.org/10.1179/174328009X411136>
- Tongne, A., Jahazi, M., Feulvarch, E., & Desrayaud, C. (2015). Banded structures in friction stir welded Al alloys. *Journal of Materials Processing Technology*, 221, 269–278. <https://doi.org/10.1016/j.jmatprotec.2015.02.020>
- Vilaca, P. and Thomas, W. (2011). *Friction Stir Welding Technology*. 8, 85–124.
- Yan, J., Sutton, M. A., & Reynolds, A. P. (2005). Process-structure-property relationships for nugget and heat affected zone regions of AA2524-T351 friction stir welds. *Science and Technology of Welding and Joining*, 10(6), 725–736. <https://doi.org/10.1179/174329305X68778>
- Zhang, C., Huang, G., Cao, Y., Zhu, Y., & Liu, Q. (2019). On the microstructure and mechanical properties of similar and dissimilar AA7075 and AA2024 friction stir welding joints: Effect of rotational speed. *Journal of Manufacturing Processes*, 37(December 2018), 470–487. <https://doi.org/10.1016/j.jmapro.2018.12.014>
- Zhang, Y. N., Cao, X., Larose, S., & Wanjara, P. (2012). Review of tools for friction

stir welding and processing. *Canadian Metallurgical Quarterly*, 51(3), 250–261. <https://doi.org/10.1179/1879139512Y.0000000015>