

## Liste der Publikationen

Prof. Dr.-Ing. Fabian Herz

### *Bücher*

1. Herz, F.: Entwicklung eines mathematischen Modells zur Simulation thermischer Prozesse in Drehrohröfen. Dissertation, Otto-von-Guericke-Universität Magdeburg, Docupoint Verlag GmbH, Magdeburg, 2012 (ISBN 978-386912-075-1)

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1. Liu, X.Y.; Zhang, J.; Specht, E.; Shi, Y.C.; Herz, F.: Analytical solution for the axial solid transport in rotary kilns. *Chemical Engineering Science*, 64 (2009), 428-431
2. Herz, F.; Sonavane, Y.; Specht, E.; Bensmann, S.; Walzel, P.: Mixing behaviour of granular material in the agitated bed of rotating drums. *Bulk Solids and Powder – Science and Technology*, Vol. 4 (2009), No. 3, 109-116
3. Shi, Y.C.; Specht, E.; Herz, F.; Knabbe, J.; Sprinz, U.: Experimental investigation of the axial discharging velocity of particles from rotary kilns. *Granular Matter*, 13 (2011), 465-473
4. Herz, F.; Mitov, I.; Specht, E.; Stanev, R.: Experimental study of the contact heat transfer coefficient between the covered wall and solid bed in rotary drums. *Chemical Engineering Science*, 82 (2012), 312-318
5. Herz, F.; Mitov, I.; Specht, E.; Stanev, R.: Influence of operational parameters and material properties on the contact heat transfer in rotary kilns. *The International Journal of Heat and Mass Transfer*, 55 (2012), 7941-7948
6. Sunkara, K.R.; Herz, F.; Specht, E.; Mellmann, J.; Erpelding, R.: Modeling the discharge characteristics of rectangular flights in a flighted rotary drum. *Powder Technology*, 234 (2013), 107-116
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11. Herz, F.; Specht, E.: Comparative life cycle assessment of various pipe materials. *BFT-Concrete Plant + Precast Technology International*, 5 (2014), 48-54
12. Komossa, H.; Wirtz, S.; Scherer, V.; Herz, F.; Specht, E.: Transversal bed motion in rotating drums using spherical particles: Comparison of experiments with DEM simulations. *Powder Technology*, 264 (2014), 96-104
13. Hallak, B.; Herz, F.; Specht, E.; Kehse, G.: Energy consumption and CO<sub>2</sub> content in the flue gas of normal shaft kilns – Part 1: Influence of the air excess number. *Cement Lime Gypsum International*, 11 (2014), 60-66
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15. Herz, F.; Mitov, I.; Specht, E.; Stanev, R.: Influence of the motion behavior on the contact heat transfer between the covered wall and solid bed in rotary kilns. *Experimental Heat Transfer*, 28 (2015), 174-188
16. Sunkara, K.R.; Herz, F.; Specht, E.; Mellmann, J.: Transverse flow at the flight surface in flighted rotary drums. *Powder Technology*, 275 (2015), 161-171
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23. Nafsun, A.I.; Herz, F.; Specht, E.; Scherer, V.; Wirtz, S.: Heat transfer experiments in a rotary drum for a variety of granular materials. *Experimental Heat Transfer*, 29 (2016), 520-535
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25. Herz, F.; Specht, E.: Simulation thermischer Prozesse in direkt beheizten Drehrohröfen – Teil 1 Modellentwicklung. *gwi – Gaswärme International*, 65, 3 (2016), 37-45
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42. Liu, X.Y.; Herz, F.; Specht, E.; Bensmann, S.; Guerra Gonzalez, O.; Walzel, P.: Modeling the transversal motion of granular materials in rotating drums. *Proceedings of the 8th International Conference on Measurement and Control of Granular Materials*, August 27-29, 2009, Shenyang, China
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