

Selected Publications

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Jogler, C., M. Kube, S. Schübbe, S. Ullrich, H. Teeling, D.A. Bazylinski, R. Reinhardt, and D. Schüler. 2009. Comparative analysis of magnetosome gene clusters in magnetotactic bacteria provides further evidence for horizontal gene transfer. *Env. Microbiol.* 11: 1267-1277.

Schübbe, S., T.J. Williams, G. Xie, H.E. Kiss, T.S. Brettin, D. Martinez, C.A. Ross, D. Schüler, B.L. Cox, K.H. Nealson, and D.A. Bazylinski. 2009. Complete genome sequence of the chemolithoautotrophic marine magnetotactic coccus strain MC-1. *Appl. Environ. Microbiol.* 75: 4835-4852.

Lam, K.P., A.P. Hitchcock, M. Obst, J.R. Lawrence, G.D.W. Swerhone, G.G. Leppard, T. Tyliczszak, C. Karunakaran, J. Wang, K. Kaznatcheev, D.A. Bazylinski, and U. Lins. 2010. Characterizing magnetism of individual magnetosomes by X-ray magnetic circular dichroism in a scanning transmission X-ray microscope. *Chem. Geol.* 270: 110-116.

Jimenez-Lopez, C., C.S. Romanek, and D.A. Bazylinski. 2010. Magnetite as a prokaryotic biomarker: a review. *J. Geophys. Res.-Biogeo.* 115: G00G03 (pp. 1-19).

Lefèvre C.T., F. Abreu, U. Lins, and D.A. Bazylinski. 2010. Non-magnetotactic multicellular prokaryotes from low saline, nonmarine aquatic environments and their unusual negative phototactic behavior. *Appl. Environ. Microbiol.* 76: 3220-3227.

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Fang, J., L. Zhang, and D.A. Bazylinski. 2010. The deep-sea piezosphere and piezophiles: geomicrobiology and biogeochemistry. *Trends Microbiol.* 18: 413-422.

Chen, L., D.A. Bazylinski, and B.H. Lower. 2010. Bacteria that synthesize nano-sized compasses to navigate using Earth's geomagnetic field. *Nature Education Knowledge* 1: 14.

Alphandéry, E., S. Faure, L. Raison, E. Duguet, P.A. Howse, and D.A. Bazylinski. 2011. Heat production by bacterial magnetosomes exposed to an oscillating magnetic field. *J. Phys. Chem. C* 115: 18-22.

Lefèvre C.T., R.B. Frankel, F. Abreu, U. Lins, and D.A. Bazylinski. 2011. Culture-independent characterization of a novel, uncultivated magnetotactic member of the Nitrospirae phylum. *Environ. Microbiol.* 13: 538-549.

Lefèvre, C.T., F. Abreu, U. Lins, and D.A. Bazylinski. 2011. A bacterial backbone: magnetosomes in magnetotactic bacteria. In: *Metal Nanoparticles in Microbiology*, M. Raj and N. Duran (eds.). Springer-Verlag, New York, NY; pp. 75-102.

Abreu, F., M.E. Cantão, M.F. Nicolás, F.G. Barcellos, V. Morillo, L.G. Paula de Almeida, F. Ferreira do Nascimento, C.T. Lefèvre, D.A. Bazylinski, A.T. Ribeiro de Vasconcelos, and U. Lins. 2011. Common ancestry of iron oxide- and iron-sulfide-based biomineralization in magnetotactic bacteria. *ISME J.* In press.

Lefèvre, C.T., R.B. Frankel, M. Pósfai, T. Prozorov, and D.A. Bazylinski. 2011. Isolation of obligately magnetotactic bacteria in extremely alkaline environments. *Environ. Microbiol.* In press.

Bazylinski, D.A., C.T. Lefèvre, and R.B. Frankel. 2011. Magnetotactic protists at the oxic-anoxic transition and anoxic zones of coastal aquatic environments. In: *Anoxia: Paleontological Strategies and Evidence for Eukaryote Survival*, A. Altenbach, J. Bernhard, and J. Seckbach (eds.). Springer-Verlag, New York, NY. In press.