## Daniel Buscombe

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CONTACT Information

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EDUCATION

Ph.D. (2008), Coastal Geomorphology/Nearshore Oceanography, University of Plymouth, Plymouth, UK. Morphodynamics, Sediment Dynamics and Sedimentation of a Gravel Beach. Advisor: Prof. Gerhard Masselink.

BSc (Hons), 1st class (2003), Physical Geography with Minors in Environmental Sciences and Biology, Lancaster University, Lancaster, UK. Morphodynamics of a Ridge-and-Runnel System on a Macrotidal Beach. Advisor: Dr Suzanna Ilic.

## EMPLOYMENT HISTORY

- 1 November 2012 present. Research Geologist, Grand Canyon Monitoring and Research Center, U.S. Geological Survey, Flagstaff, AZ, USA.
- 2 October 2009 November 2012. Post-doctoral Research Fellow, School of Marine Science & Engineering, University of Plymouth, UK.
- 3 September, 2008 2011. Computer Programming Contractor, Marine Biology & Ecology Research Centre, University of Plymouth, UK.
- 4 October, 2008 October 2009. Post-doctoral Research Scholar, United States Geological Survey, Santa Cruz, California, USA.
- 5 June, 2008 September, 2008. Research Assistant, School of Geography, University of Plymouth, UK.
- 6 December, 2007 April, 2008. Research Assistant, School of Earth, Ocean & Environmental Science, University of Plymouth, UK.
- 7 October, 2004 July 2008. Associate Lecturer and Demonstrator (part-time), School of Geography, University of Plymouth. UK.
- 8 August 2003 September, 2004. Assistant tutor, Field Studies Council, Castle Head, Grange-over-Sands, UK.

## TEN SELECTED PUBLICATIONS

- 1 Buscombe, D., and Masselink, G. (2006) Concepts in Gravel Beach Dynamics. Earth Science Reviews 79, 33-52.
- 2 Austin, M.J., and Buscombe, D. (2008) Morphological Change and Sediment Dynamics of the Beach Step on a Macrotidal Gravel Beach. Marine Geology 249, 167-183.
- 3 Buscombe, D., Rubin, D.M., and Warrick, J.A. (2010) Universal Approximation of Grain Size from Images of Non-Cohesive Sediment. *Journal of Geophysical Research Earth Surface* 115, F02015.
- 4 Williams, J.J., **Buscombe, D.**, Masselink, G., Turner, I., and Swinkels, C. (2012) Barrier Dynamics Experiment (BARDEX): Aims, Design and Procedures. *Coastal Engineering* 63, 3-12.
- 5 Buscombe, D., and Conley, D.C. (2012) Effective Shear Stress of Graded Sediment. Water Resources Research 48, W05506.
- 6 Buscombe, D., and Rubin, D.M. (2012) Advances in the Simulation and Automated Measurement of Granular Material, Part 1: Simulations. *Journal of Geophysical Research - Earth Surface* 117, F02001.
- 7 Lacy, J.R., Rubin, D.M. and Buscombe, D. (2012) Currents and sediment transport induced by a tsunami far from its source. *Journal of Geophysical Research - Oceans* 117, C09028.
- 8 Buscombe, D. (2013) Transferable Wavelet Method for Grain Size-Distribution from Images of Sediment Surfaces and Thin Sections, and Other Natural Granular Patterns. Sedimentology 60, 1709–1732.
- 9 Buscombe, D., Rubin, D.M., Lacy, J.R., Storlazzi, C., Hatcher, G., Chezar, H., Wyland, R. and Sherwood, C. (2014) Autonomous bed-sediment imaging-systems for revealing temporal variability of grain size. Limnology and Oceanography: Methods, 12, 390 406
- 10 Buscombe, D., Grams, P.E., Kaplinski, M.A. (2014), Characterizing riverbed sediment using high-frequency acoustics 2: Scattering signatures of Colorado River bed sediment in Marble and Grand Canyons. *Journal of Geophysical Research Earth Surface*, 119, doi:10.1002/2014JF003191.