

PUBLICATIONS – DAVID MOHRIG

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^ = undergraduate student member my research group

* = graduate student member my research group

** = post-doctoral member my research group

+ = graduate student

++ = post-doc

2018:

++Ayoub, F., Jones, C.E., Lamb, M.P., Holt, B., Shaw, J.B., Mohrig, D., and **Wagner, W., 2018, Inferring surface currents within submerged, vegetated deltaic islands and wetlands from multi-pass airborne SAR: Remote Sensing of Environment, v. 212, p. 148 – 160.

*Eluwa, A., Mohrig, D., Ogiesoba, O.C., and Ambrose, W.A., 2018, Depositional settings and history of the Lower Miocene Fleming Group, Refugio County, Texas, as defined using seismic geomorphology: Journal of Marine and Petroleum Geology, v. 92, p. 565 – 581, doi.org/10.1016/j.marpetgeo.2017.11.021

**Goudge, T.A., Mohrig, D., *Cardenas, B.T., *Hughes, C.M., and Fassett, C.I., 2018, Stratigraphy and paleohydrology of delta channel deposits, Jezero Crater, Mars: Icarus, v. 301, p. 58 – 75, doi: 10.1016/j.icarus.2017.09.034

^Hughes, C.M., Cardenas, B.T., Goudge, T.A., and Mohrig, D., *accepted*, Deltaic deposits indicative of a paleo-coastline at Aeolis Dorsa, Mars: Icarus.

Kocurek, G., Martindale, R.C., +Day, M., **Goudge, T.A., Kerans, C., *Mason, J., *Cardenas, B.T., *Hassenruck-Gudipati, H.J., +Petersen, E.I., Mohrig, D., *Aylward, D.S., ^Hughes, C.M., and ^Nazworth, C.M., *accepted*, Antecedent aeolian dune topographic control on carbonate and evaporite facies: Middle Jurassic Todilto Member, Wanakah Formation, Ghost Ranch, New Mexico, USA: Sedimentology, doi: 10.1111/sed.12518.

*Mason, J., and Mohrig, D., 2018, Using time-lapse lidar to quantify river bend evolution on the meandering coastal Trinity River, Texas, USA: Journal of Geophysical Research – Earth Surface, v. 123, p. 1133 – 1144, <https://doi.org/10.1029/2017JF004492>.

Paola, C., Ganti, V., Mohrig, D., Runkel, A.C., and Straub, K.M., 2018, Time not our time: physical controls on the preservation and measurement of geologic time: Annual Review of Earth and Planetary Sciences, v. 46, p. 409 – 438.

+Sendrowski, A., Sadid, K., Meselhe, E., **Wagner, W., Mohrig, D., and Passalacqua, P., 2018, Transfer entropy as a tool for hydrodynamic model validation: Entropy, v. 20, 58; doi:10.3390/e20010058

*Swanson, T., Mohrig, D., Kocurek, G., **Perillo, M., and Venditti, J., 2018, Bedform spurs: a result of a trailing helical vortex wake: Sedimentology, v. 65, p. 191 – 208, doi: 10.1111/sed.12383.

2017:

*Cardenas, B.T., Mohrig, D., and **Goudge, T.A., 2017, Fluvial stratigraphy of valley fills at Aeolis Dorsa, Mars: Evidence for base-level fluctuations controlled by a downstream water body: Geological Society of America Bulletin, doi: 10.1130/B31567.1.

+Fongngern, R., Olariu, C., Steel, R., Mohrig, D., Hess, T.E., and Krézsek, C., 2017, Subsurface and outcrop characteristics of fluvial-dominated deep lacustrine clinofolds: Sedimentology, doi: 10.1111/sed.12430

*McElroy, B., Willenbring, J., and Mohrig, D., 2017, Addressing time-scale – dependent erosion rates from measurement methods with censorship: Geological Society of America Bulletin, doi: 10.1130/B31644.1.

++Shields, M.R., Bianchi, T.S., Mohrig, D., Hutchings, J., Kenney, W.F., Kolker, A.S., and Curtis, J.H., 2017, Carbon storage in the Mississippi River Delta enhanced by ecosystem engineering: Nature Geoscience, doi: 10.1038/NGEO3044.

*Smith, V.B., and Mohrig, D., 2017, Geomorphic signature of a dammed sandy river: The lower Trinity River downstream of Livingston Dam in Texas, USA: *Geomorphology*, 297, 122 - 136.

**Wagner, R.W., Lague, D., Mohrig, D., Passalacqua, P., Shaw, J., and Moffett, K., 2017, Elevation change and stability on a prograding delta: *Geophysical Research Letters*, 44, doi: 10.1002/2016GL072070.

2016:

+Day, M., Anderson, W., Kocurek, G., and Mohrig, D., 2016, Carving intracrater layered deposits with wind on Mars: *Geophysical Research Letters*: v. 43(6), p. 2473-2479, DOI: 10.1002/2016GL068011

**Fernandes, A.M., Tornqvist, T.E., Straub, K.M., and Mohrig D., 2016, Connecting the backwater hydraulics of coastal rivers to fluvio-deltaic sedimentology and stratigraphy: *Geology*, doi:10.1130/G37965.1

Johnson, J.P.L., *Delbecq, K., Kim, W., and Mohrig, D., 2016, Experimental tsunami deposits: Linking hydrodynamics to sediment entrainment, advection lengths and downstream fining: *Geomorphology*, v. 253, p. 478 – 490.

Shaw, J.B., Ayoub, F., Jones, C.E., Lamb, M.P., Holt, B., Wagner, R.W., Coffey, T.S., Chadwick, J.A., and Mohrig, D., 2016, Airborne radar imaging of subaqueous channel evolution in Wax Lake Delta, Louisiana, USA: *Geophysical Research Letters*, 43, 5035–5042, doi:10.1002/2016GL068770.

*Shaw, J.B., Mohrig, D., and **Wagner, R.W., 2016, Flow patterns and morphology of a prograding river delta: *Journal of Geophysical Research – Earth Surface*, v. 121(2), p. 372-391. doi: 10.1002/2015JF003570

*Smith, V., G. Kocurek, D. Mohrig, +S. Christian, *E. Rhinehart, +A. Pedersen, and M. H. Reiser. 2016. Dune dynamics monitoring protocol for gypsum dune fields in White Sands National Monument, New Mexico: Version 1.0. Natural Resource Report NPS/CHDN/NRR—2016/1201. National Park Service, Fort Collins, Colorado.

+Steel, E., Buttles, J., Simms, A.R., Mohrig, D., and Meiburg, E., 2016, The role of buoyancy reversal in turbidite deposition and submarine fan geometry, *Geology*, doi: 10.1130/G38446.1

*Swanson, T., Mohrig, D., and Kocurek, G., 2016, Aeolian dune sediment flux variability over an annual cycle of wind: *Sedimentology*, v. 63, p. 1753 – 1764, DOI: 10.1111/sed.12287

*Swanson, T., Mohrig, D., Kocurek, G., and Liang, M., 2016, A surface model for aeolian dune topography: *Mathematical Geosciences*, DOI 10.1007/s11004-016-9654-x

2015:

+Czapiga, M.J., *Smith, V.B., Nittrouer, J.A., Mohrig, D., and Parker, G., 2015, Internal connectivity of meandering rivers: statistical generalization of channel hydraulic geometry: *Water Resources Research*, v. 51, doi:10.1002/2014WR016133.

Kadlec, J., Kocurek, G., Mohrig, D., Shinde, D.P., Murari, M.K., Varma, V., Stehlik, F., Benes, V., Singhvi, A.K., 2015, Response of fluvial, aeolian, and lacustrine systems to late Pleistocene to Holocene climate change, Lower Moravian Basin, Czech Republic: *Geomorphology*, v. 232, p. 193 – 208.

+Pedersen, A., Kocurek, G., Mohrig, D., and *Smith, V., 2015, Dune behavior in a multi-directional wind regime: White Sands Dune Field, New Mexico: *Earth Surface Processes and Landforms*, v. 40, p. 925 – 941.

**Perillo, M.M., *Minton, B., Buttles, J., and Mohrig, D., 2015, Acoustic imaging of experimental subaqueous sediment-laden flows and their deposits: *Journal of Sedimentary Research*, v. 85, p. 1 – 5.

*Shaw, J., *You, Y., Mohrig, D., and Kocurek, G., 2015, Tracking hurricane-generated storm surge with washover fan stratigraphy: *Geology*, v. 43, no. 2, p. 127 – 130.

2014:

*Armstrong, C., Mohrig, D., Hess, T., George, T., and Straub, K.M., 2014, Influence of growth faults on coastal fluvial systems: Examples from the late Miocene to Recent Mississippi River Delta, *Sedimentary Geology*, v. 301, p. 120-132, <http://dx.doi.org/10.1016/j.sedgeo.2013.06.010>

+Baitis E., Kocurek, G., *Smith, V., Mohrig, D., Ewing, R.C., and *Peyret, A. –P.B., 2014, Definition and origin of the dune-field pattern at White Sands, New Mexico: *Aeolian Research*, v. 15, p. 269-287, <http://dx.doi.org/10.1016/j.aeolia.2014.06.004>

Kim, W., +Petter, A., Straub, K., & Mohrig, D., 2014, Investigating the autogenic process response to allogenic forcing: experimental geomorphology and stratigraphy. *From Depositional Systems to Sedimentary Successions on the Norwegian Continental Margin* (IAS SP 46), 46, p. 127-138.

*Lynds, R., Mohrig, D., +Hajek, E., and Heller, P., 2014, Paleoslope reconstruction in sandy suspended-load dominant rivers: *Journal of Sedimentary Research*, v. 84, p. 825-836, DOI: <http://dx.doi.org/10.2110/jsr.2014.60>

+Piliouras, A., Kim, W., Kocurek, G.A., Mohrig, D., +Kopp, J., 2014, Sand on salt: Controls on dune subsidence and determining salt substrate thickness: *Lithosphere*, V. 6 (3), p. 195-199.

*Shaw, J.B., and Mohrig, D., 2014, The importance of erosion in distributary channel network growth, Wax Lake Delta, Louisiana, USA: *Geology*, v. 42 (1), p. 31-34, doi:10.1130/G34751.1

*You, Y., Flemings, P., and Mohrig, D., 2014, Mechanics of dual-mode dilative failure in subaqueous sediment deposits: *Earth and Planetary Science Letters*, v. 397, p. 10–18.

*You, Y., Flemings, P., Mohrig, D., and Germaine, J., 2014, How heterogeneity in the shear dilation of a deposit controls the mechanics of breaching slope failure: *Journal of Geophysical Research – Earth Surface*, v. 119, doi:10.1002/2013JF002983.

2013:

+Dakin, N., Pickering, K.T., Mohrig, D., and Bayliss, N.J., 2013, Channel-like features created by erosive submarine debris flows: field evidence from the Middle Eocene Ainsa Basin, Spanish Pyrenees: *Marine and Petroleum Geology*, v.41, p.62-71.

**Kenney, M.A., Hobbs, B.F., Mohrig, D., Huang, H., *Nittrouer, J.A., Kim, W., Parker, G., 2013, Cost analysis of water and sediment diversions to optimize land building in the Mississippi River delta: *Water Resources Research*, v. 49 (6), p. 3388-3405, DOI: 10.1002/wrcr.20139.

+Petter, A., Steel, R., Mohrig, D., Kim, W., and Carvajal, C., 2013, Estimation of the paleoflux of terrestrial-derived solids across ancient basin margins using the stratigraphic record: *Geological Society of America Bulletin*, v. 125, n. 3-4, p. 578-593, doi: 10.1130/B30603.1.

*Shaw, J.B., Mohrig, D., and *Whitman, S.K., 2013, The morphology and evolution of channels on the Wax Lake Delta, Louisiana, USA: *Journal of Geophysical Research – Earth Surface*, v. 118, p. 1562 – 1584, DOI: 10.1002/jgrf.20123.

2012:

+Eastwood, E.N., Kocurek, G., Mohrig, D. and *Swanson, T., 2012, Methodology for reconstructing wind direction, wind speed, and duration of wind events from aeolian cross-strata: *Journal of Geophysical Research – Earth Surface*, v. 117 (F3), doi:10.1029/2012JF002368

Kocurek, G., D. Mohrig, +E. Baitis, R. C. Ewing, *V. Smith, and *A. Peyret. 2012. LiDAR surveys of gypsum dune fields in White Sands National Monument, New Mexico. Natural Resource Technical Report NPS/CHDN/NRTR—2012/558. National Park Service, Fort Collins, Colorado.

**Lamb, M.P., *Nittrouer, J., Mohrig, D. and *Shaw, J., 2012, Backwater and river plume controls on scour upstream of river mouths: Implications for fluvio-deltaic morphodynamics: *Journal of Geophysical Research – Earth Surface*, v. 117, F01002, doi:10.1029/2011JF002079.

*Nittrouer, J.A., *Shaw, J., **Lamb, M.P., and Mohrig, D., 2012, Spatial and temporal trends for water-flow velocity and bed material sediment transport in the lower Mississippi River: Geological Society of America Bulletin, v. 124, p. 400-414, doi: 10.1130/B30497.1.

Prather, B.E., Deptuck, M.E., Mohrig, D., Van Hoorn, B., and Wynn, R.B., 2012, Application of the principles of seismic geomorphology to continental-slope and base-of-slope systems: Case studies from seafloor and near-seafloor analogues, *in* Case Studies from Seafloor and Near-Seafloor Analogues: SEPM Special Publication No. 99, ISBN 978-1-56576-304-3, p. 5-9.

*Sawyer, D.E., Flemings, P.B., Buttles, J., and Mohrig, D., 2012, Mudflow transport behavior and deposit morphology: role of shear stress to yield strength ratio in subaqueous experiments: Marine Geology, 307–310, p. 28–39, doi:10.1016/j.margeo.2012.01.009.

*Straub, K.M., Mohrig, D., and Pirmez, C., 2012, Architecture of an aggradational tributary submarine-channel network on the continental slope, offshore Brunei Darussalam, in Case Studies from Seafloor and Near-Seafloor Analogues: SEPM Special Publication No. 99, ISBN 978-1-56576-304-3, p. 13–30.

*You, Y., Flemings, P., and Mohrig, D., 2012, Dynamics of dilative slope failure: Geology, v. 40, no. 7, p. 663-666, doi: 10.1130/G32855.1

2011:

Cantero, M.I., Cantelli, A., Pirmez, C., Balachandar, S., Mohrig, D., Hickson, T.A., Yeh, T-H, Naruse, H., and Parker, G., 2011, Emplacement of massive turbidites linked to extinction of turbulence in turbidity currents: Nature Geoscience, v. 5, p. 42 – 45, DOI:10.1038/NGEO1320.

**Edmonds, D., *Shaw, J., and Mohrig, D., 2011, Topset-dominated deltas: a new model for river delta stratigraphy: Geology, v. 39, p. 1175-1178, doi:10.1130/G32358.1.

*Nittrouer, J. A., Mohrig, D., Allison, M. A., *Peyret, A.-P., 2011, The Lowermost Mississippi River: A Mixed Bedrock-Alluvial Channel: Sedimentology, v. 58, p. 1914-1934, doi:10.1111/j.1365-3091.2011.01245.x.

*Nittrouer, J.A., Mohrig, D., and Allison, M.A., 2011, Punctuated sand transport in the lowermost Mississippi River: Journal of Geophysical Research-Earth Surface, v. 116, F04025, doi:10.1029/2011JF002026.

Mohrig, D., 2011, Quantitative stratigraphy: GeoPrisms Newsletter No. 26, Spring 2011, p. 21.

Paola, C., Twilley, R.R., **Edmonds, D.A., Kim, W., Mohrig, D., Parker, G., **Viparelli, E., and Voller, V.R., 2011, Natural processes in delta restoration: Application to the Mississippi delta: Annual Review of Marine Science, v. 3, p. 67-91.

*Straub, K.M., Mohrig, D., Buttles, J., *McElroy, B., and Pirmez, C., 2011, Quantifying the influence of channel sinuosity on the depositional mechanics of channelized turbidity currents: A laboratory study: Marine and Petroleum Geology, v. 28, p. 744-760, doi: 10.1016/j.marpetgeo.2010.05.014.

**Viparelli, E., *Shaw, J., +Bevington, A., Meselhe, E., +Holm, G.O., Mohrig, D., Twilley, R., and Parker, G., 2011, Inundation model as an aid for predicting ecological succession on newly-created deltaic land associated with Mississippi River diversions: application to the Wax Lake Delta, in Beighley, R.E., and Mark W. Killgore, M.W. (eds.), World Environmental and Water Resources Congress 2011: Bearing Knowledge for Sustainability, American Society of Civil Engineers, ISBN 978-0-7844-1173-5, [http://dx.doi.org/10.1061/41173\(414\)243](http://dx.doi.org/10.1061/41173(414)243), p.2340-2349.

2010:

+Hajek, E., Huzurbazar, S., Mohrig, D., +Lynds, R., and Heller, P., 2010, Statistical characterization of grain-size distributions in sandy fluvial systems: Journal of Sedimentary Research, v. 80, p. 184-192, DOI: 10.2110/jsr.2010.020.

Kocurek, G., +Ewing, R., and Mohrig, D., 2010, How do bedform patterns arise? New views on the role of bedform interactions within a set of boundary conditions: Earth Surface Processes and Landforms, v. 35, p. 51-63, DOI: 10.1002/esp.1913.

**Lamb, M.P., *McElroy, B., *Kopriva, B., *Shaw, J., and Mohrig, D., 2010, Linking river-flood dynamics to hyperpycnal-plume deposits: Experiments, theory and geological implications: Geological Society of America Bulletin, v. 122, p. 1389-1400, DOI: 10.1130/B30125.1.

2009:

Abrams, D.M., Lobkovsky, A.E., Petroff, A.P., Straub, K.M., McElroy, B., Mohrig, D.C., Kudrolli, A., and Rothman, D.H., 2009, Growth laws for channel networks incised by groundwater flow: Nature Geoscience, v. 2 (3), p. 193-196, DOI: 10.1038/NNGEO432.

Kim, W., Mohrig, D., Twilley, R., Paola, C., and Parker, G., 2009, Is it feasible to build new land in the Mississippi River delta?: EOS, Transactions, American Geophysical Union. v. 90, n. 42, p. 373–384.

**Lamb, M.P., and Mohrig, D., 2009, Do hyperpycnal-flow deposits record river-flood dynamics?: Geology, v. 37; no. 12; p. 1067–1070; doi: 10.1130/G30286A.1.

*McElroy, B.D., and Mohrig, D., 2009, Nature of deformation of sandy bedforms: Journal of Geophysical Research-Earth Surface, v.114, F00A04, doi:10.1029/2008JF001220.

Metz, J.M., Grotzinger, J.P., Mohrig, D., Milliken, R., Prather, B., Pirmez, C., McEwen, A.S., and Weitz C.M., 2009, Sublacustrine depositional fans in southwest Melas Chasma: Journal of Geophysical Research-Planets, v. 114, E10002, doi:10.1029/2009JE003365.

Paola, C., Straub, K.M., Mohrig, D., and Reinhardt, L., 2009, The “unreasonable effectiveness” of stratigraphic and geomorphic experiments: Earth Science Reviews, v. 97, p. 1-43, doi:10.1016/j.earscirev.2009.05.003

*Straub, K.M., and Mohrig, D., 2009, Constructional canyons built by sheet-like turbidity currents: Observations from offshore Brunei Darussalam: Journal of Sedimentary Research, v.79, p. 24-39, DOI:10.2110/jsr2009.006.

*Straub, K.M., Paola, C., Mohrig, D., Wolinsky, M.A., and George, T., 2009, Compensational stacking of channelized sedimentary deposits: Journal of Sedimentary Research, v.79, p. 673-688, DOI:10.2110/jsr2009.070.

2008:

McElroy, B., and Mohrig, D., 2008, Correlation decay and dynamic equilibria in sandy transport systems, *in* Dohmen-Janssen C.M., and Hulscher S.J.M.H. (eds.), River, Coastal and Estuarine Morphodynamics: RCEM 2007, Volumes 1 & 2, Taylor & Francis, London, ISBN 9780415453639, p. 891-896.

Straub, K.M., and Mohrig, D., 2008, Quantifying the morphology and growth of levees in aggrading submarine channels: Journal of Geophysical Research – Earth Surface, v. 113 (F3), F03012, doi: 10.1029/2007JF000896.

Straub, K.M., Mohrig, D., Buttles, J., McElroy, B., and Pirmez, C., 2008, Interactions between turbidity currents and topography in aggrading sinuous submarine channels: A laboratory study: Geological Society of America Bulletin, v. 120 (3-4), p. 368–385; doi: 10.1130/B25983.1.

Woodruff, J.D., Donnelly, J.P., Mohrig, D., Geyer, W.R., 2008, Reconstructing relative flooding intensities responsible for hurricane-induced deposits from Laguna Playa Grande, Vieques, Puerto Rico: Geology, v. 36 (5), p. 391-394, doi: 10.1130/G24731A.1.

2007:

Mohrig, D., and Buttles, J., 2007, Deep turbidity currents in shallow channels: Geology, v. 35, p. 155-158, doi: 10.1130/G22716A..

Jerolmack, D.J., and Mohrig, D., 2007, Conditions for branching in depositional rivers: Geology, v. 35; no. 5; p. 463–466, doi: 10.1130/G23308A.

Lobkovsky, A. E., Smith, B.E., Kudrolli, A., Mohrig, D.C., and Rothman, D.H., 2007, Erosive dynamics of channels incised by subsurface water flow, Journal of Geophysical Research-Earth Surface, 112, F03S12, doi:10.1029/2006JF000517.

Lyons, W., Swart, R., and Mohrig, D., 2007, Deepwater lobes of the Zerrissene Turbidite System, Namibia, in T.H. Nilsen, R.D. Shew, G.S. Steffens, and J.R.J. Studlick (eds.), *Atlas of Deep-Water Outcrops*: American Association of Petroleum Geologists Studies in Geology #56, p. 235-237.

Parsons, J.D., Friedrichs, C.T., Traykovski, P., Mohrig, D., Imran, J., Syvitski, J.P.M., Parker, G., Puig P., Buttes, J.L., and García, M.H., 2007, Chapter 7: The mechanics of marine sediment gravity flows, in C. Nittrouer, J. Austin, M. Field, M. Steckler, J. Syvitski, P. Wiberg, Editors: *Continental Margin Sedimentation: from Sediment Transport to Sequence Stratigraphy*, Int. Assoc. Sedimentol., Spec. Publ. 37, Blackwell Publishing, Oxford, UK, p.275-338.

Straub, K.M., Jerolmack, D.J., Mohrig, D., and Rothman, D.H., 2007, Channel network scaling laws in submarine basins: *Geophysical Research Letters*, v. 34, L12613, doi:10.1029/2007GL030089.

Törnqvist, T.E., Paola, C., Parker, G., Liu, K., Mohrig, D., Holbrook, J.M., and Twilley, R.R., 2007, Comment on "Wetland Sedimentation from Hurricanes Katrina and Rita": *Science*, v. 316, 201b, doi:10.1126/science.1136780.

2006:

Jerolmack, D.J., Mohrig, D., Grotzinger, J.P., Fike, D.A., and Watters, W.A., 2006, Spatial grain size sorting in eolian ripples and estimation of wind conditions on planetary surfaces: Application to Meridiani Planum, Mars: *Journal of Geophysical Research*, v. 111, E03S90, doi:10.1029/2005JE002544.

Paola, C., Fofoula-Georgiou, E., Dietrich, W.E., Hondzo, M., Mohrig, D., Parker, G., Power, M.E., Rodriguez-Iturbe, I., Voller, V., and Wilcock, P., 2006, Toward a unified science of the Earth's surface: Opportunities for synthesis among hydrology, geomorphology, geochemistry and ecology: *Water Resources Research*, v. 42, W03S10, doi:10.1029/2005WR004336.

Porter, M. L., A. R. G. Sprague, M. D. Sullivan, D. C. Jennette, R. T. Beaubouef, T. R. Garfield, C. Rossen, D. K. Sickafoose, G. N. Jensen, S. J. Friedmann, and D. C. Mohrig, 2006, Stratigraphic organization and predictability of mixed coarse- and fine-grained lithofacies successions in a lower Miocene deep-water slope-channel system, Angola Block 15, in P. M. Harris and L. J. Weber (eds.), *Giant hydrocarbon reservoirs of the world: From Rocks to reservoir characterization and modeling*: AAPG Memoir 88/SEPM Special Publication, p. 281-305.

2005:

Mohrig, D., Straub, K.M., Buttes, J., and Pirmez, C., 2005, Controls on geometry and composition of a levee built by turbidity currents in a straight laboratory channel, in Parker, G., and Garcia, M.H. (eds.), *River, Coastal and Estuarine Morphodynamics: RCEM 2005*, Taylor & Francis/Balkema, London, ISBN 0415392705, p. 579-584.

Jerolmack, D.J., and Mohrig, D., 2005, Frozen dynamics of migrating bedforms: *Geology*, v.33, p. 57-60.

Jerolmack, D., and Mohrig, D., 2005, Interactions between bedforms: topography, turbulence and transport: *Journal of Geophysical Research*, v. 110, F02014, doi:10.1029/2004JF000126.

Jerolmack D.J., and Mohrig, D., 2005, Formation of Precambrian sediment ripples: *Nature*, Brief Communications Arising from P.A. Allen & P.F. Hoffman *Nature* 433, 123-127 (2005), v. 436, 21July2005, E1, doi:10.1038/nature04025.

Jerolmack, D.J., and Mohrig, D., 2005, A unified model for subaqueous bedform dynamics: *Water Resources Research*, v. 41, W12421, doi:10.1029/2005WR004329.

Jerolmack, D.J., Mohrig, D., and McElroy, B., 2005, A unified description of ripples and dunes in rivers, in Parker, G., and Garcia, M.H. (eds.), *River, Coastal and Estuarine Morphodynamics: RCEM 2005*, Taylor & Francis/Balkema, London, ISBN 0415392705, p. 843-851.

van der Mark, C.F., Blom, A., Hulscher, S.J.M.H., Leclair, S.F., and Mohrig, D., 2005, On modeling the variability of bedform dimensions, in Parker, G., and Garcia, M.H. (eds.), *River, Coastal and Estuarine Morphodynamics: RCEM 2005*, Taylor & Francis/Balkema, London, ISBN 0415392705, p. 831-841.

2004:

Jerolmack, D., and Mohrig, D., 2004, Modeling bedform evolution as an interface problem: comparing bedform kinematics generated by advection-diffusion equations against reality, in Hulscher, S., Garlan, T., and Idier, D. (Eds.):

Marine Sandwaves and River Dune Dynamics 2, International Workshop, University of Twente, The Netherlands, p. 118-124.

Jerolmack, D.J., Mohrig, D., Zuber, M.T., and Byrne, S., 2004, A minimum time for the formation of Holden Northeast fan, Mars: *Geophysical Research Letters*, v. 31, L21701, doi:10.1029/2004GL021326.

Das, H.S., Imran, J., Pirmez, C., and Mohrig, D., 2004, Numerical modeling of flow and bed evolution in meandering submarine channels: *Journal of Geophysical Research*, v. 109, C10009, doi:10.1029/2002JC001518.

2003:

Mohrig, D., and Marr, J.G., 2003, Constraining the efficiency of turbidity current generation from submarine debris flows and slides using laboratory experiments: *Marine and Petroleum Geology*, v. 20, p. 883-899.

Abreu, V., Sullivan, M., Pirmez, C., and Mohrig, D., 2003, Lateral accretion packages (LAPs): an important reservoir element in deep water sinuous channels: *Marine and Petroleum Geology*, v. 20, p. 631-648.

Harbitz, C.B., Parker, G., Elverhøi, A., Marr, J.G., Mohrig, D., and Harff, P., 2003, Hydroplaning of subaqueous debris flows and glide blocks: analytical solutions and discussion: *Journal of Geophysical Research*, v. 108, B7, doi:10.1029/2001JB001454.

2001:

Paola, C., Mullin, J., Ellis, C., Mohrig, D.C., Swenson, J.B., Parker, G., Hickson, T., Heller, P.L., Pratson, L., Syvitski, J., Sheets, B., and Strong, N., 2001, Experimental stratigraphy: *GSATODAY*, v.11, n.7, p.4-9.

2000:

Mohrig, D., Heller, P.L., Paola, C., Lyons, W.J., 2000, Interpreting avulsion process from ancient alluvial sequences: Guadalupe-Matarranya system, northern Spain and Wasatch Formation, western Colorado: *Geological Society of America Bulletin*, v. 112, p. 1787-1803.

Campion, K.M., Sprague, A.R., Mohrig, D., Lovell, R.W., Drzewiecki, P.A., Sullivan, M.D., Ardill, J.A., Jensen, G.N., Sickafoose, D.K., 2000, Outcrop expression of confined channel complexes, *in* P. Weimer et al., editors, *Deep-Water Reservoirs of the World: SEPM (Society for Sedimentary Geology)*, Gulf Coast Section, Houston, TX, p. 127-150.

Elverhøi, A., Harbitz, C.B., Dimakis, P., Mohrig, D., Marr, J., and Parker, G., 2000, On the dynamics of subaqueous debris flows: *Oceanography*, v. 13, p.109-117.

Jennette, D.C., Garfield, T.R., Mohrig, D.C., and Cayley, G.T., 2000, The interaction of shelf accommodation, sediment supply and sea level in controlling facies, architecture and sequence stacking patterns of the Tay and Forties/Sele basin-floor fans, central North Sea, *in* P. Weimer et al., editors, *Deep-Water Reservoirs of the World: SEPM (Society for Sedimentary Geology)*, Gulf Coast Section, Houston, TX, p. 402-421.

Pirmez, C., Beaubouef, R.T., Friedmann, S.J., and Mohrig, D.C., 2000, Equilibrium profile and baselevel in submarine channels: Examples from Late Pleistocene systems and implications for the architecture of deepwater reservoirs, *in* P. Weimer et al., editors, *Deep-Water Reservoirs of the World: SEPM (Society for Sedimentary Geology)*, Gulf Coast Section, Houston, TX, p. 782-805.

1999:

Mohrig, D., Elverhøi, A., Parker, G., 1999, Experiments on the relative mobility of muddy subaqueous and subaerial debris flows, and their capacity to remobilize antecedent deposits: *Marine Geology*, v. 154, p. 117-129.

Beaubouef, R.T., Rossen, C., Zelt, F.B., Sullivan, M.D., Mohrig, D.C., Jennette, D.C., 1999, Deep-water sandstones, Brushy Canyon Formation, west Texas; field guide for AAPG Hedberg Field Research Conference: AAPG Continuing Education Course Note Series #40, The American Association of Petroleum Geologists, Tulsa, OK, 50 p.

Paola, C., Parker, G., Mohrig, D.C., and Whipple, K.X., 1999, The influence of transport fluctuations on spatially averaged topography on a sandy, braided fluvial fan, *in* Harbaugh, J.W., Watney, W.L., Rankey, E.C., Slingerland, R., and Goldstein, R.H., eds., *Numerical experiments in stratigraphy; recent advances in stratigraphic and sedimentologic computer simulations: SEPM Special Publication 62, Society for Sedimentary Geology (SEPM)*, Tulsa, OK, p. 211-218.

1998:

Mohrig, D., Whipple, K.X., Hondzo, M., Ellis, C., and Parker, G., 1998, Hydroplaning of subaqueous debris flows: Geological Society of America Bulletin, v.110, p. 387-394.

Parker, G., Paola, C., Whipple, K.X., and Mohrig, D., 1998, Alluvial fans formed by channelized fluvial and sheet flow. 1: Theory: Journal of Hydraulic Engineering, v. 124, p. 985-995.

Parker, G., Paola, C., Whipple, K.X., and Mohrig, D., 1998, Alluvial fans formed by channelized fluvial and sheet flow. 2: Application: Journal of Hydraulic Engineering, v. 124, p. 996-1004.

Whipple, K.X., Parker, G., Paola, C., and Mohrig, D., 1998, Channel dynamics, sediment transport, and the slope of alluvial fans: Experimental study: The Journal of Geology, v. 106, p. 677-693.

1996:

Mohrig, D., and Smith, J.D., 1996, Predicting the migration rates of subaqueous dunes: Water Resources Research, v. 32, p. 3207-3217.

Paola, C., and Mohrig, D., 1996, Palaeohydraulics revisited: palaeoslope estimation in coarse-grained braided rivers: Basin Research, v. 8, p. 243-254.

Pratson, L.F., Lee, H.J., Parker, G., Garcia, M.H., Coakley, B.J., Mohrig, D., Locat, J., Mello, U., Parsons, J.D., Choi, S., and Isreal, K., 1996, Studies of mass-movement processes on submarine slopes: Oceanography, v. 9, p. 168-172.

1985:

Baird, A.K., Mohrig D.C., and Welday, E.E., 1985, Vapor deposition in basaltic stalactites, Kilauea, Hawaii: Lithos, v. 18, p. 151-160.

BOOK

2012:

Application of the principles of seismic geomorphology to continental-slope and base-of-slope systems: Case studies from seafloor and near-seafloor analogues: Prather, B.E., Deptuck, M.E., Mohrig, D., Van Hoorn, B., and Wynn, R.B., (eds.) 2012, SEPM Special Publication No. 99, ISBN 978-1-56576-304-3.