

# 2012 PUBLICATIONS

All peer-reviewed publications listed are submitted by BMI core members.

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1. Ansari, D., De Smedt, B. & Grabner, R.H. (2012) "Euroeducation"—a critical overview of an emerging field. *Neuroethics*, 5, 105–117.
2. Vogel, S.E. & Ansari, D. (2012) Neurokognitive Grundlagen der typischen und atypischen Zahlenverarbeitung (Neurocognitive foundations of typical and atypical number processing). *Lernen und Lernstörungen* (Learning and Learning Disorders), 16, 35–49.
3. Karmiloff-Smith, A., D'Souza, D., Dekker, T.M., Van Herwegen, J., Xu, F., Rodriguez, M. & Ansari, D. (2012) Genetic and environmental vulnerabilities in children with neurodevelopmental disorders. *Proceedings of the National Academy of Sciences USA*, 109, 17264–17265.
4. Lyons, I.M., Ansari, D. & Beilock, S.L. (2012) Symbolic estrangement: Evidence against a strong association between numerical symbols and the quantities they represent. *Journal of Experimental Psychology: General*, 141, 635–641.
5. Bugden, S., Price, G.R., McLean, A. & Ansari, D. (2012) The role of the left intraparietal sulcus in the relationship between symbolic number processing and children's arithmetic competence. *Developmental Cognitive Neuroscience*, 2, e448–e457.
6. Price, G.R., Palmer, D., Battista, C. & Ansari, D. (2012) Nonsymbolic numerical magnitude comparison: Reliability and validity of different task variants and outcome measures, and their relationship to arithmetic achievement in adults. *Acta Psychologica*, 17, 45–57.
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26. Harris, C.T., Handler, W.B. & Chronik, B.A. (2012). Design study to investigate the effect of curvature on gradient coil performance for localized regions of interest. Concepts in Magnetic Resonance Part B: Magnetic Resonance Engineering, 41B, 62-71.
27. German, T. & Cohen, A.S. (2012). A cue-based approach to 'theory of mind': Reexamining the notion of automaticity. British Journal of Developmental Psychology, 30, 4558.
28. Farshadmanesh, F., Byrne, P., Yan, X., Wang, H., Cornelius, B.D., & Davy, J.D. (2012). Relationships between neck muscle electromyography and three dimensional head kinematics during centrally induced torsional head movements. Journal of Neurophysiology, 108, 2867-2883.
29. Goonetilleke, S.C., Wong, J.P., & Corneil, B.D. (2012). Validation of a within-trial measure of the oculomotor stop process. Journal of Neurophysiology, 108, 760-770.
30. Buchholz, V.N., Goonetilleke, S.C., Medendorp, W.H., & Corneil, B.D. (2012). Greater benefits of multisensory integration during complex sensorimotor transformations. Journal of Neurophysiology, 107, 3135-3143.
31. Corneil, B.D., Goonetilleke, S.C., Peel, T.R., Green, K.A. & Welch, I. (2012)

39. Biegler,F., Daley,M. & McQuillan,I. (2012). Algorithmic decomposition of shuffbn words. *Theoretical Computer Science*, 454, 38-50.
40. Brijder, R., Daley,M., Harju,T., JonoskaN., Petre,I. and Rozenberg,G.(2012).Computationahature of gene assembly in ciliatesThe Handbook of Natural Computing, Springer, 2012, pp. 123280.
41. ChiniforooshanE, Daley,M., Ibarra, O.H., Kari,L.& Seki, S. (2012). Oneversalcounter machines and multihead automata: revisited. *Theoretical Computer Science*, 454, 81-87.
42. Daley,M., Jürgensen,H., Kari, L& Mahalingam, K. (2012). Relativized codeTheoretical Computer Science,429, 54-64.
43. Phillips JM. & Everling S (2012) Neural activity in the macaque putamen associated with saccades and behavioral outcomePLoS ONE(12)
44. Shen K, BezginG., HutchisonRM., Gati,J, Menon, RS, Everling S & McIntosh,A. (2012) Information processing architecture of functionally defined clusters in the macaque cortex. *Journal of Neuroscience*, 32, 1746517476.
45. SkoblenickK.S & Everling S (2012) NMDA antagonist ketamine reduces taskselectivity in macaque dorsolateral prefrontal neuronsandimpairs performance of randomly interleaved p and anti-saccadesThe Journal of Neuroscience, 32, 1201812027.
46. Hutchison,RM. & Everling S (2012) Monkey in the middle: Why nonhuman primates are needed to bridge the gap in restingstate investigations. *Frontiers in Neuroanatomy*, 6:29.
47. Hutchison,RM., WomelsdorfT., Gati JS, LeungL.S, Menon, RS & Everling S (2012).Resting state connectivity identifies distinct functional networks in macaque cingulate cortex. *Cerebral Cortex*, 22, 12941308.
48. Hutchison,RM., GallivanJP., CulhamJC, Gati,JS, Menon, RS & Everling S (2012) Functional connectivity of the frontal eye fields in humans and monkeys investigated with restingstate fMRI. *Journal of Neurophysiology*, 107: 24632474.

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53. Milner, A.D., Ganel, T., & Goodale, M(2012). Does grasping in patient D.F. depend on vision? Trends in Cognitive Sciences, 16, 256-257.
54. Sperandio, I., Chouinard, P.A., & Goodale, M.A.

68. Archibald, L.M.D& JoanisseM.F. (2012). Atypical neural responses to phonological detail in children with developmental language impairment. *Developmental Cognitive Neuroscience* 2, e139-151.
69. Sutton, J.E., Twyman, A.D., Joanisse, M.F. Newcomb N.S. (2012). Geometry three ways: fMRI investigation of geometric information processing during reorientation. *Journal of Experimental Psychology: Learning Memory and Cognition* 38, 1530-1541.
70. Welcome S.E. & Joanisse M.F. (2012). Individual differences in skilled adult readers reveal dissociable patterns of neural activity associated with component processes of reading. *Reading and Language* 120:3, 360-71.
71. Malins, J.G. & Joanisse, M.F. (2012) Setting the Tone: An ERP Investigation of the Influences of Phonological Similarity on Spoken Word Recognition in Mandarin Chinese. *Neuropsychologia*, 50 2032-2043.
72. Friesen, D. C. & Joanisse, M.F. (2012). Homophone effects in deaf readers: Evidence from lexical decision. *Reading and Writing: An Interdisciplinary Journal* 25, 375-388.
73. Wayne RV. & Johnsrude I.S. (2012). The role of visual speech information in supporting perceptual learning of degraded speech. *Journal of Experimental Psychology: Applied* 18, 419-435.
74. Wild, C.J., Yusuf A., Wilson D., Peelle J.E., Daviš M.H. & Johnsrude I.S. (2012). Effortful listening: The processing of degraded speech depends critically on attention. *Journal of Neuroscience* 32, 14010-14021.
75. Zekveld A.A., Rudner M., Johnsrude, I.S., Hoenfeld, D.J. & Bonnefond, A. (2012). How does the brain process speech in noise? *Journal of Speech, Language, and Hearing Research* 55, 265-279.



95. Menon, R.S.(2012). Mental chronometry with fMRI. *NeuroImage* 62, 1068-1071.
96. Miles, SJ & Minda, JP. (2012). Perceptual fluency can be used as a cue for categorization decisions. *Psychonomic Bulletin & Review* 19, 737-742.
97. Han, T., Alders, G, Greening, S.G., Neufeld, R, & Mitchell, D.G.V. (2012). Do fearful eyes activate empathy related brain regions in individuals with callous traits? *Social Cognitive and Affective Neuroscience* 7, 958-968.
98. Mitchell, D.G.V. & Greening, S.G. (20

109. Naci,L., Monti, M., Cruse, D., Kubler, A., Sorger, B., Goebel, R., Kotchoubey, W., Owen, A.M (2012). Brain computer interfaces for communication with nonresponsive patientsAnnals of Neurology, 72, 312323.
110. Cruse, D., Chennu, S., Fernández-Espejo, D., Ryne, W.L., Young, B., Owen, A.M (2012). Detecting Awareness in the Vegetative State: Electroencephalographic Evidence for Attempted Movements to CommandPlos One7(11): e49933.
111. Hampshire, A., Highfield, R., Parkin, B., Owen, A.M (2012). Fractioning human intelligence. Neuron, 76, 1225-1237.
112. Owen, A.M (2012). When thoughts become actions: Neuroimaging in nonresponsive patients. S. Edwards, S. Richmond, G. Rees (Eds) Show what you are thinking: brain imaging and mental privacy.Oxford University Press, 6, 7387.
113. Martin, I., Kamen, M., Pirouz, D.M., Grover, A., Mukherjee, S., Haws, K., Mirabito, A.M., Davis, S. & Rapp, J. (2012).

121. Lehembre R, Bruno M.A., Vanhaudenhuyse A., Chatelle C, Cologan V., Leclercq Y., Soddu A., Macq B., Laureys S & Noirhomme Q. (2012). Resting state EEG study of comatose patients: a connectivity and frequency analysis to find differences between Vegetative and Minimally Conscious States. *Functional Neurology*, 27, 41-47.
122. Ovadia Caro S, Nir Y., Soddu A., Ramot M., Hesselman G., Vanhaudenhuyse A., Dinstein I., Tshibanda JF., Boly M., Harel M., Laureys S & Malach R. (2012). Reduction in interhemispheric connectivity in disorders of consciousness. *PLoS One* 7(5):e37238.
123. Maudoux A, Lefebvre P., Demertzi A., Cabay JE, Vanhaudenhuyse A., Laureys S. & Soddu A. (2012). Connectivity graph analysis of the auditory resting state network in tinnitus. *Brain Res* 1485, 10-21.
124. Maudoux A, Lefebvre P., Cabay JE, Demertzi A., Vanhaudenhuyse A., Laureys S. & Soddu A. (2012). Auditory resting state fMRI activity in tinnitus: an IC analysis. *PLoS One* 7(5):e36222.
125. Boly M., Massimini M., Garrido M.I., Gosseries O., Noirhomme Q., Laureys S & Soddu A. (2012). Brain connectivity in disorders of consciousness. *Brain Connect*, 2, 1-10.
126. Demertzis A., Racine E., Bruno M.A., Ledoux D., Gosseries O., Vanhaudenhuyse A., Thonnard M., Soddu A., Moonen G. & Laureys S. (2012). Pain Perception in Disorders of Consciousness: Neuroscience, Clinical Care, and Ethics in Dialogue. *Neuroethics* 6, 37-50.
127. Soddu A., Vanhaudenhuyse A., Bahri M., Bruno M.A., Boly M., Demertzis A., Tshibanda JF., Phillips C., Stanziano