# Kalanit Grill-Spector

## List of Publications by Citations



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| 117 papers | 13,089 citations | 44 h-index | 114 g-index |
| 140 ext. papers | 15,250 ext. citations | 7 avg, IF | 6.79 L-index |

| # | Paper | IF | Citations |
|---|---|---|---|
| 117 | Repetition and the brain: neural models of stimulus-specific effects. *Trends in Cognitive Sciences*, **2006**, 10, 14-23 | 14 | 1827 |
| 116 | Differential processing of objects under various viewing conditions in the human lateral occipital complex. *Neuron*, **1999**, 24, 187-203 | 13.9 | 987 |
| 115 | The lateral occipital complex and its role in object recognition. *Vision Research*, **2001**, 41, 1409-22 | 2.1 | 949 |
| 114 | fMR-adaptation: a tool for studying the functional properties of human cortical neurons. *Acta Psychologica*, **2001**, 107, 293-321 | 1.7 | 827 |
| 113 | The human visual cortex. *Annual Review of Neuroscience*, **2004**, 27, 649-77 | 17 | 764 |
| 112 | The fusiform face area subserves face perception, not generic within-category identification. *Nature Neuroscience*, **2004**, 7, 555-62 | 25.5 | 713 |
| 111 | The dynamics of object-selective activation correlate with recognition performance in humans. *Nature Neuroscience*, **2000**, 3, 837-43 | 25.5 | 479 |
| 110 | The functional architecture of the ventral temporal cortex and its role in categorization. *Nature Reviews Neuroscience*, **2014**, 15, 536-48 | 13.5 | 438 |
| 109 | The neural basis of object perception. *Current Opinion in Neurobiology*, **2003**, 13, 159-66 | 7.6 | 420 |
| 108 | Differential development of high-level visual cortex correlates with category-specific recognition memory. *Nature Neuroscience*, **2007**, 10, 512-22 | 25.5 | 382 |
| 107 | Visual recognition: as soon as you know it is there, you know what it is. *Psychological Science*, **2005**, 16, 152-60 | 7.9 | 365 |
| 106 | A sequence of object-processing stages revealed by fMRI in the human occipital lobe. *Human Brain Mapping*, **1998**, 6, 316-28 | 5.9 | 352 |
| 105 | Cue-invariant activation in object-related areas of the human occipital lobe. *Neuron*, **1998**, 21, 191-202 | 13.9 | 344 |
| 104 | High-resolution imaging reveals highly selective nonface clusters in the fusiform face area. *Nature Neuroscience*, **2006**, 9, 1177-85 | 25.5 | 247 |
| 103 | Electrical stimulation of human fusiform face-selective regions distorts face perception. *Journal of Neuroscience*, **2012**, 32, 14915-20 | 6.6 | 238 |
| 102 | Sparsely-distributed organization of face and limb activations in human ventral temporal cortex. *NeuroImage*, **2010**, 52, 1559-73 | 7.9 | 219 |
| 101 | The mid-fusiform sulcus: a landmark identifying both cytoarchitectonic and functional divisions of human ventral temporal cortex. *NeuroImage*, **2014**, 84, 453-65 | 7.9 | 149 |

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|---|---|---|---|
| 100 | Global similarity and pattern separation in the human medial temporal lobe predict subsequent memory. *Journal of Neuroscience*, **2013**, 33, 5466-74 | 6.6 | 139 |
| 99 | Neural representations of faces and limbs neighbor in human high-level visual cortex: evidence for a new organization principle. *Psychological Research*, **2013**, 77, 74-97 | 2.5 | 132 |
| 98 | Relating retinotopic and object-selective responses in human lateral occipital cortex. *Journal of Neurophysiology*, **2008**, 100, 249-67 | 3.2 | 128 |
| 97 | Functionally defined white matter reveals segregated pathways in human ventral temporal cortex associated with category-specific processing. *Neuron*, **2015**, 85, 216-227 | 13.9 | 126 |
| 96 | Electrical stimulation of the left and right human fusiform gyrus causes different effects in conscious face perception. *Journal of Neuroscience*, **2014**, 34, 12828-36 | 6.6 | 124 |
| 95 | Object-selective cortex exhibits performance-independent repetition suppression. *Journal of Neurophysiology*, **2006**, 95, 995-1007 | 3.2 | 123 |
| 94 | Attention reduces spatial uncertainty in human ventral temporal cortex. *Current Biology*, **2015**, 25, 595-600 | 8.9 | 119 |
| 93 | Not one extrastriate body area: using anatomical landmarks, hMT+, and visual field maps to parcellate limb-selective activations in human lateral occipitotemporal cortex. *NeuroImage*, **2011**, 56, 2183-99 | 7.9 | 116 |
| 92 | Differential development of the ventral visual cortex extends through adolescence. *Frontiers in Human Neuroscience*, **2010**, 3, 80 | 3.3 | 115 |
| 91 | Autism and the development of face processing. *Clinical Neuroscience Research*, **2006**, 6, 145-160 | | 115 |
| 90 | The Functional Neuroanatomy of Human Face Perception. *Annual Review of Vision Science*, **2017**, 3, 167-196 | 8.6 | 114 |
| 89 | The improbable simplicity of the fusiform face area. *Trends in Cognitive Sciences*, **2012**, 16, 251-4 | 14 | 112 |
| 88 | Apparent thinning of human visual cortex during childhood is associated with myelination. *Proceedings of the National Academy of Sciences of the United States of America*, **2019**, 116, 20750-20759 | 11.5 | 110 |
| 87 | fMRI-adaptation and category selectivity in human ventral temporal cortex: regional differences across time scales. *Journal of Neurophysiology*, **2010**, 103, 3349-65 | 3.2 | 110 |
| 86 | Microstructural proliferation in human cortex is coupled with the development of face processing. *Science*, **2017**, 355, 68-71 | 33.3 | 107 |
| 85 | Developmental neuroimaging of the human ventral visual cortex. *Trends in Cognitive Sciences*, **2008**, 12, 152-62 | 14 | 106 |
| 84 | Temporal Processing Capacity in High-Level Visual Cortex Is Domain Specific. *Journal of Neuroscience*, **2015**, 35, 12412-24 | 6.6 | 80 |
| 83 | Toward direct visualization of the internal shape representation space by fMRI. *Cognitive, Affective and Behavioral Neuroscience*, **1998**, 26, 309-321 | | 80 |

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| 82 | Representation of shapes, edges, and surfaces across multiple cues in the human visual cortex. *Journal of Neurophysiology*, **2008**, 99, 1380-93 | 3.2 | 78 |
| 81 | Corresponding ECoG and fMRI category-selective signals in human ventral temporal cortex. *Neuropsychologia*, **2016**, 83, 14-28 | 3.2 | 71 |
| 80 | Two New Cytoarchitectonic Areas on the Human Mid-Fusiform Gyrus. *Cerebral Cortex*, **2017**, 27, 373-385 | 5.1 | 70 |
| 79 | Development differentially sculpts receptive fields across early and high-level human visual cortex. *Nature Communications*, **2018**, 9, 788 | 17.4 | 63 |
| 78 | The representation of object viewpoint in human visual cortex. *NeuroImage*, **2009**, 45, 522-36 | 7.9 | 59 |
| 77 | The Cytoarchitecture of Domain-specific Regions in Human High-level Visual Cortex. *Cerebral Cortex*, **2017**, 27, 146-161 | 5.1 | 57 |
| 76 | The fusiform face area is enlarged in Williams syndrome. *Journal of Neuroscience*, **2010**, 30, 6700-12 | 6.6 | 52 |
| 75 | Selectivity of adaptation in single units: implications for FMRI experiments. *Neuron*, **2006**, 49, 170-1 | 13.9 | 47 |
| 74 | Where is human V4? Predicting the location of hV4 and VO1 from cortical folding. *Cerebral Cortex*, **2014**, 24, 2401-8 | 5.1 | 45 |
| 73 | Defining the most probable location of the parahippocampal place area using cortex-based alignment and cross-validation. *NeuroImage*, **2018**, 170, 373-384 | 7.9 | 43 |
| 72 | Development of Neural Sensitivity to Face Identity Correlates with Perceptual Discriminability. *Journal of Neuroscience*, **2016**, 36, 10893-10907 | 6.6 | 42 |
| 71 | A cross-validated cytoarchitectonic atlas of the human ventral visual stream. *NeuroImage*, **2018**, 170, 257-270 | 7.9 | 40 |
| 70 | White matter microstructure on diffusion tensor imaging is associated with conventional magnetic resonance imaging findings and cognitive function in adolescents born preterm. *Developmental Medicine and Child Neurology*, **2012**, 54, 809-14 | 3.3 | 40 |
| 69 | Task alters category representations in prefrontal but not high-level visual cortex. *NeuroImage*, **2017**, 155, 437-449 | 7.9 | 39 |
| 68 | Experience Shapes the Development of Neural Substrates of Face Processing in Human Ventral Temporal Cortex. *Cerebral Cortex*, **2017**, 27, 1229-1244 | 5.1 | 39 |
| 67 | The functional neuroanatomy of face perception: from brain measurements to deep neural networks. *Interface Focus*, **2018**, 8, 20180013 | 3.9 | 38 |
| 66 | The Face-Processing Network Is Resilient to Focal Resection of Human Visual Cortex. *Journal of Neuroscience*, **2016**, 36, 8425-40 | 6.6 | 34 |
| 65 | Fine-scale spatial organization of face and object selectivity in the temporal lobe: do functional magnetic resonance imaging, optical imaging, and electrophysiology agree?. *Journal of Neuroscience*, **2008**, 28, 11796-801 | 6.6 | 31 |

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| 64 | Extensive childhood experience with Pokémon suggests eccentricity drives organization of visual cortex. *Nature Human Behaviour*, **2019**, 3, 611-624 | 12.8 | 29 |
| 63 | The evolution of face processing networks. *Trends in Cognitive Sciences*, **2015**, 19, 240-1 | 14 | 29 |
| 62 | Encoding model of temporal processing in human visual cortex. *Proceedings of the National Academy of Sciences of the United States of America*, **2017**, 114, E11047-E11056 | 11.5 | 29 |
| 61 | Face-likeness and image variability drive responses in human face-selective ventral regions. *Human Brain Mapping*, **2012**, 33, 2334-49 | 5.9 | 29 |
| 60 | A preference for mathematical processing outweighs the selectivity for Arabic numbers in the inferior temporal gyrus. *NeuroImage*, **2018**, 175, 188-200 | 7.9 | 25 |
| 59 | Neural adaptation to faces reveals racial outgroup homogeneity effects in early perception. *Proceedings of the National Academy of Sciences of the United States of America*, **2019**, 116, 14532-14537 | 11.5 | 25 |
| 58 | On object selectivity and the anatomy of the human fusiform gyrus. *NeuroImage*, **2018**, 173, 604-609 | 7.9 | 22 |
| 57 | Object Recognition: Insights From Advances in fMRI Methods. *Current Directions in Psychological Science*, **2008**, 17, 73-79 | 6.5 | 22 |
| 56 | Separate lanes for adding and reading in the white matter highways of the human brain. *Nature Communications*, **2019**, 10, 3675 | 17.4 | 15 |
| 55 | A Probabilistic Functional Atlas of Human Occipito-Temporal Visual Cortex. *Cerebral Cortex*, **2021**, 31, 603-619 | 5.1 | 15 |
| 54 | Reduced spatial integration in the ventral visual cortex underlies face recognition deficits in developmental prosopagnosia | | 14 |
| 53 | Differential sustained and transient temporal processing across visual streams. *PLoS Computational Biology*, **2019**, 15, e1007011 | 5 | 12 |
| 52 | Semantic versus perceptual priming in fusiform cortex. *Trends in Cognitive Sciences*, **2001**, 5, 227-228 | 14 | 12 |
| 51 | fMRI Adaptation: A Tool for Studying Visual Representations in the Primate Brain **2005**, 173-188 | | 12 |
| 50 | Learning to Read Increases the Informativeness of Distributed Ventral Temporal Responses. *Cerebral Cortex*, **2019**, 29, 3124-3139 | 5.1 | 12 |
| 49 | Development of population receptive fields in the lateral visual stream improves spatial coding amid stable structural-functional coupling. *NeuroImage*, **2019**, 188, 59-69 | 7.9 | 11 |
| 48 | Ultra-high-resolution fMRI of Human Ventral Temporal Cortex Reveals Differential Representation of Categories and Domains. *Journal of Neuroscience*, **2020**, 40, 3008-3024 | 6.6 | 8 |
| 47 | Differential spatial computations in ventral and lateral face-selective regions are scaffolded by structural connections. *Nature Communications*, **2021**, 12, 2278 | 17.4 | 8 |

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| 46 | Feature saliency and feedback information interactively impact visual category learning. *Frontiers in Psychology*, **2015**, 6, 74 | 3.4 | 7 |
| 45 | Apparent thinning of visual cortex during childhood is associated with myelination, not pruning | | 7 |
| 44 | Cortical recycling in high-level visual cortex during childhood development. *Nature Human Behaviour*, **2021**, | 12.8 | 7 |
| 43 | Spatiotemporal information during unsupervised learning enhances viewpoint invariant object recognition. *Journal of Vision*, **2015**, 15, 7 | 0.4 | 6 |
| 42 | Diverse Temporal Dynamics of Repetition Suppression Revealed by Intracranial Recordings in the Human Ventral Temporal Cortex. *Cerebral Cortex*, **2020**, 30, 5988-6003 | 5.1 | 5 |
| 41 | Sulcal Depth in the Medial Ventral Temporal Cortex Predicts the Location of a Place-Selective Region in Macaques, Children, and Adults. *Cerebral Cortex*, **2021**, 31, 48-61 | 5.1 | 5 |
| 40 | Data on a cytoarchitectonic brain atlas: effects of brain template and a comparison to a multimodal atlas. *Data in Brief*, **2017**, 12, 327-332 | 1.2 | 4 |
| 39 | What Has fMRI Taught Us About Object Recognition?102-128 | | 4 |
| 38 | The Interplay between Feature-Saliency and Feedback Information in Visual Category Learning Tasks **2012**, 2012, 420-425 | | 4 |
| 37 | X-Chromosome Insufficiency Alters Receptive Fields across the Human Early Visual Cortex. *Journal of Neuroscience*, **2019**, 39, 8079-8088 | 6.6 | 3 |
| 36 | Synchrony upon repetition: One or multiple neural mechanisms?. *Cognitive Neuroscience*, **2012**, 3, 243-4 | 1.7 | 3 |
| 35 | Cortical recycling in high-level visual cortex during childhood development | | 3 |
| 34 | White matter fascicles and cortical microstructure predict reading-related responses in human ventral temporal cortex. *NeuroImage*, **2021**, 227, 117669 | 7.9 | 3 |
| 33 | The Functional Neuroanatomy of Face Processing: Insights from Neuroimaging and Implications for Deep Learning. *Advances in Computer Vision and Pattern Recognition*, **2017**, 3-31 | 1.1 | 2 |
| 32 | Deos the bairn not raed ervey lteter by istlef, but the wrod as a wlohe?. *Neuron*, **2009**, 62, 161-2 | 13.9 | 2 |
| 31 | Occipital Lobe **2003**, 653-660 | | 2 |
| 30 | Establishing the functional relevancy of white matter connections in the visual system and beyond. *Brain Structure and Function*, **2021**, 1 | 4 | 2 |
| 29 | InfantsXcortex undergoes microstructural growth coupled with myelination during development. *Communications Biology*, **2021**, 4, 1191 | 6.7 | 2 |

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| 28 | Learning to read increases the informativeness of distributed ventral temporal responses | | 2 |
| 27 | An encoding model of temporal processing in human visual cortex | | 2 |
| 26 | Learning the 3-D structure of objects from 2-D views depends on shape, not format. *Journal of Vision*, **2016**, 16, 7 | 0.4 | 2 |
| 25 | Holistic face recognition is an emergent phenomenon of spatial processing in face-selective regions. *Nature Communications*, **2021**, 12, 4745 | 17.4 | 2 |
| 24 | Holistic face recognition is an emergent phenomenon of spatial integration in face-selective regions | | 1 |
| 23 | Selectivity to limbs in ventral temporal cortex decreases during childhood as selectivity to faces and words increases. *Journal of Vision*, **2020**, 20, 152 | 0.4 | 1 |
| 22 | Gray Matter Thinning in Ventral Temporal Cortex from Childhood to Adulthood is Associated with Increased Myelination. *Journal of Vision*, **2018**, 18, 542 | 0.4 | 1 |
| 21 | Differential spatial computations in ventral and lateral face-selective regions are scaffolded by structural connections | | 1 |
| 20 | Sulcal depth in medial ventral temporal cortex predicts the location of a place-selective region in macaques, children, and adults | | 1 |
| 19 | Separate lanes for math and reading in the white matter highways of the human brain | | 1 |
| 18 | Development differentially sculpts population receptive fields across human visual cortex. *Journal of Vision*, **2017**, 17, 608 | 0.4 | 1 |
| 17 | The structure of depressive symptoms and characteristics and their relation to overall severity in major depressive disorder. *Psychiatry Research*, **2020**, 294, 113399 | 9.9 | 1 |
| 16 | White matter myelination during early infancy is explained by spatial gradients and myelin content at birth | | 1 |
| 15 | InfantsXcortex undergoes microstructural growth coupled with myelination | | 1 |
| 14 | White matter myelination during early infancy is linked to spatial gradients and myelin content at birth.. *Nature Communications*, **2022**, 13, 997 | 17.4 | 1 |
| 13 | Combined Neural Tuning in Human Ventral Temporal Cortex Resolves the Perceptual Ambiguity of Morphed 2D Images. *Cerebral Cortex*, **2020**, 30, 4882-4898 | 5.1 | 0 |
| 12 | Attention enhances category representations across the brain with strengthened residual correlations to ventral temporal cortex.. *NeuroImage*, **2022**, 249, 118900 | 7.9 | 0 |
| 11 | White matter anatomy and cortical microstructure predict reading-related responses in ventral temporal cortex. *Journal of Vision*, **2020**, 20, 201 | 0.4 | |

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| 10 | Eccentricity drives developmental organization of human high-level visual cortex. *Journal of Vision*, **2018**, 18, 1149 | 0.4 |
| 9 | A preference for mathematical tasks outweighs the selectivity for Arabic numbers in the inferior temporal gyrus. *Journal of Vision*, **2018**, 18, 551 | 0.4 |
| 8 | Differential responses across body- and face-selective cortex predict visual categorization behavior. *Journal of Vision*, **2018**, 18, 1091 | 0.4 |
| 7 | Ultra-high-resolution fMRI reveals differential representation of categories and domains across lateral and medial ventral temporal cortex. *Journal of Vision*, **2019**, 19, 249a | 0.4 |
| 6 | How learning to read affects the function and structure of ventral temporal cortex. *Journal of Vision*, **2019**, 19, 4c | 0.4 |
| 5 | Differential white matter connections to ventral and lateral occipito-temporal face-selective regions underlie differences in visual field coverage. *Journal of Vision*, **2019**, 19, 54b | 0.4 |
| 4 | Population receptive field measurements of stimulus-driven effects in face-selective areas. *Journal of Vision*, **2019**, 19, 258c | 0.4 |
| 3 | Human visual cortex as a window into the developing brain. *Journal of Vision*, **2019**, 19, 17 | 0.4 |
| 2 | Training a deep convolutional neural network with multiple face sizes and positions, but not resolutions, is necessary for generating invariant face recognition across these transformations. *Journal of Vision*, **2017**, 17, 247 | 0.4 |
| 1 | Development of neural sensitivity to face identity correlates with perceptual discriminability. *Journal of Vision*, **2017**, 17, 23 | 0.4 |