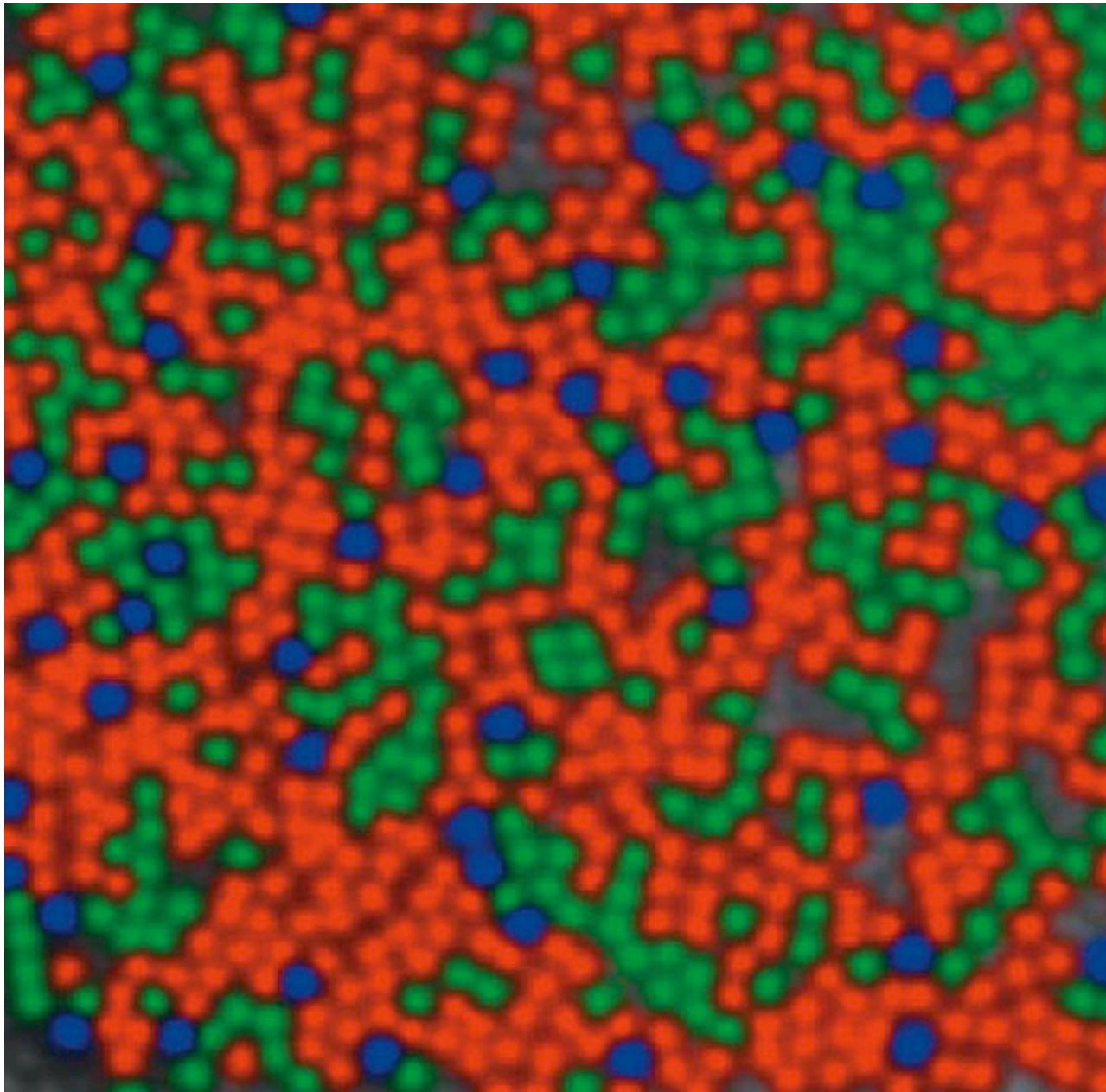
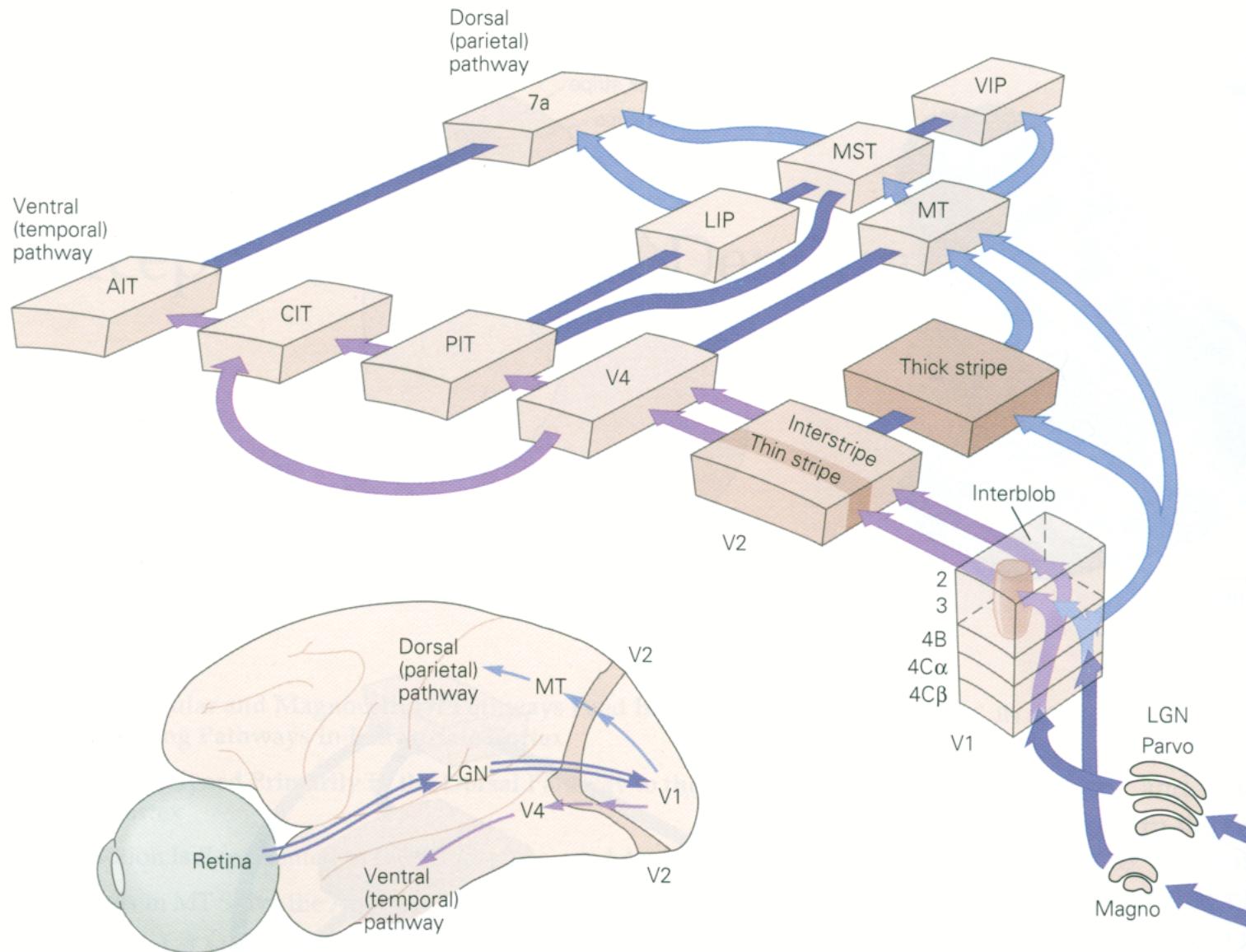


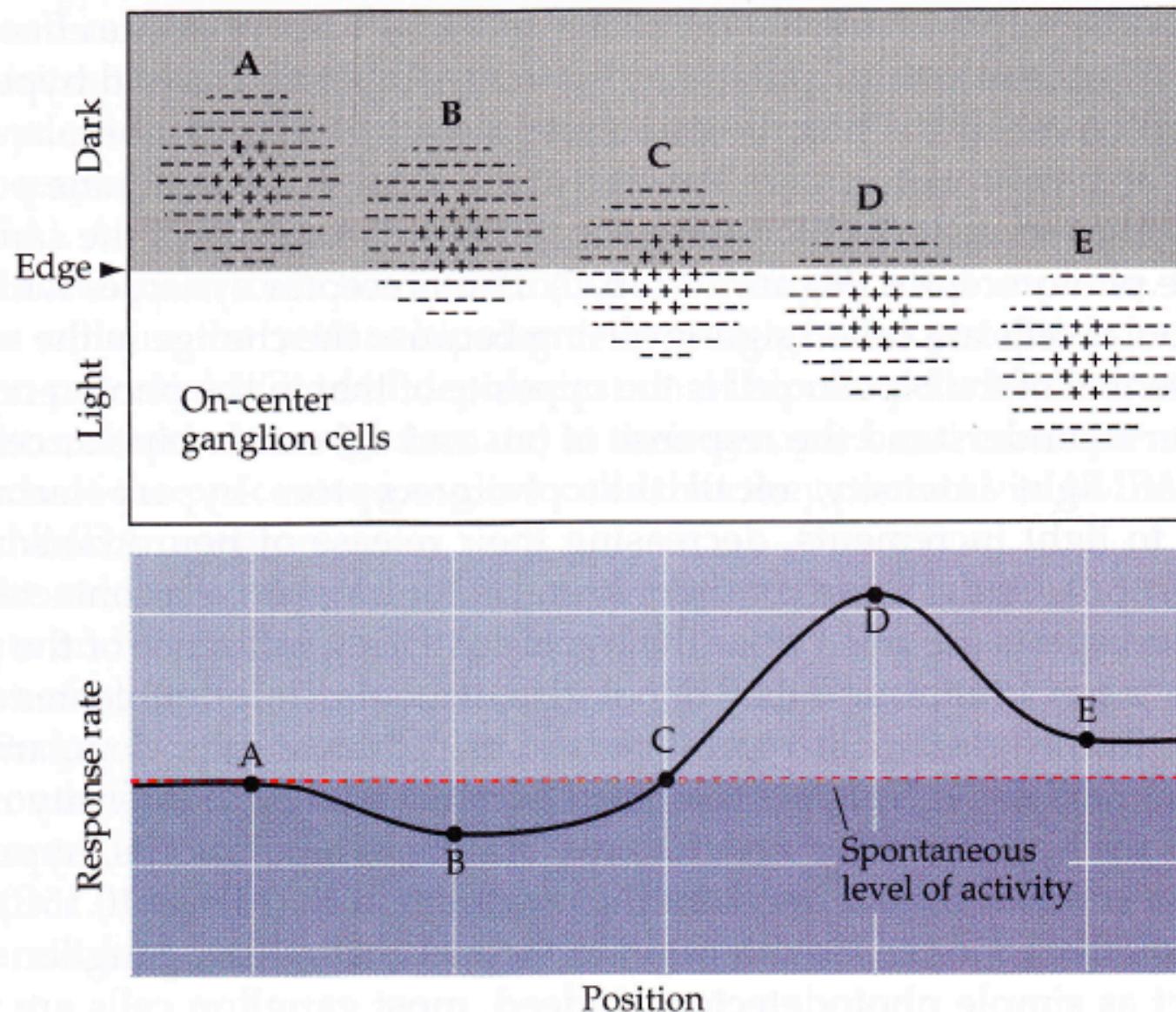
VISUAL INPUTS ARE LIKE MEGAPIXEL CAMERA IMAGES

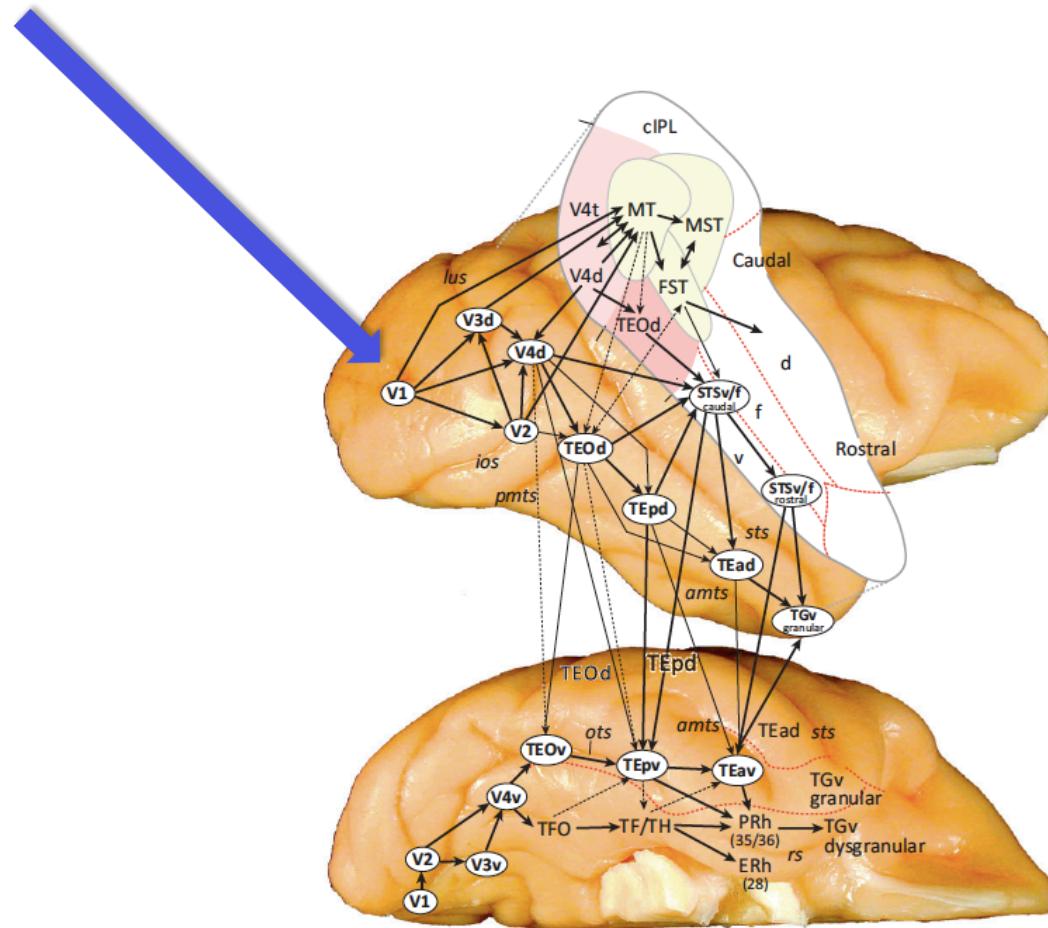


CHANNELS AND PATHWAYS

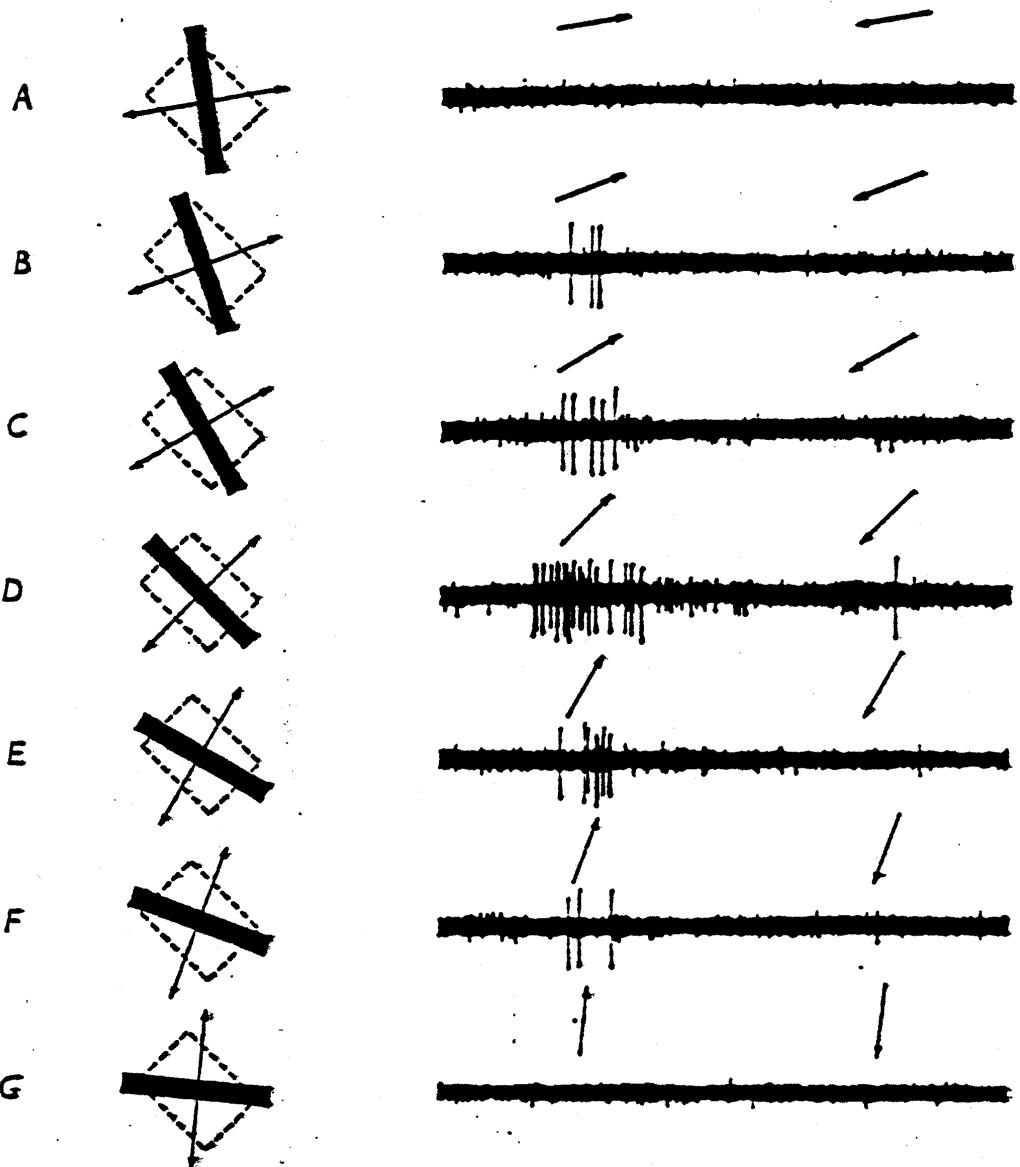


CENTER-SURROUND CELLS RESPOND TO EDGES

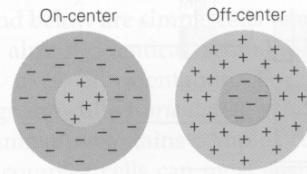




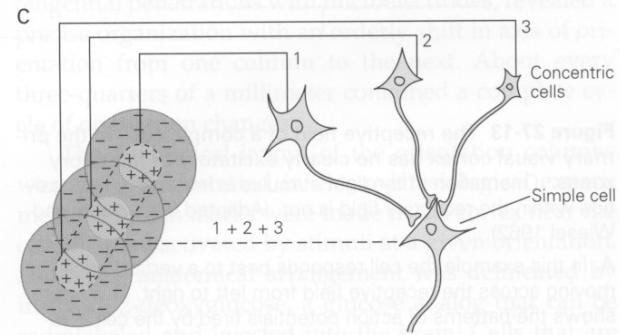
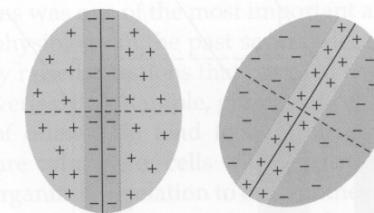
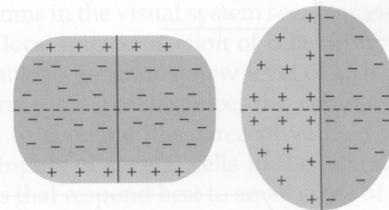
ORIENTATION TUNING IN V1

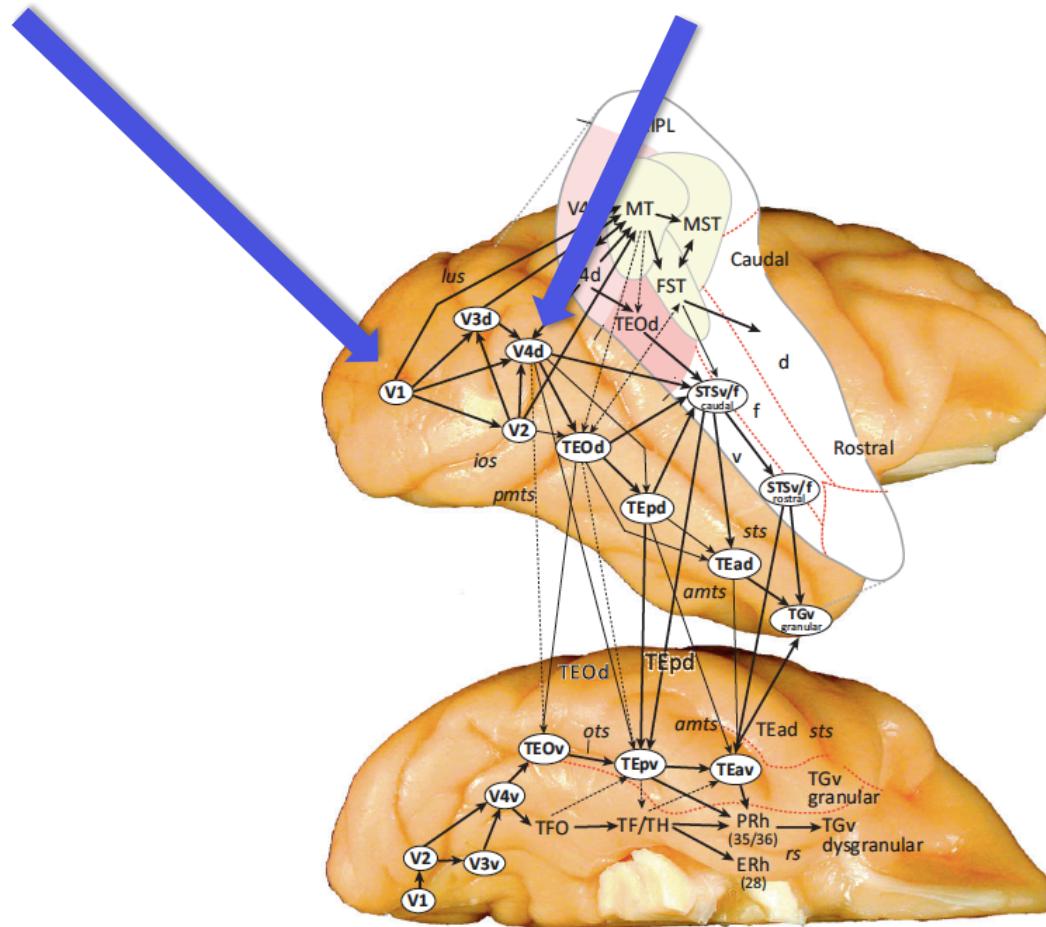


A Receptive fields of concentric cells of retina and lateral geniculate nucleus

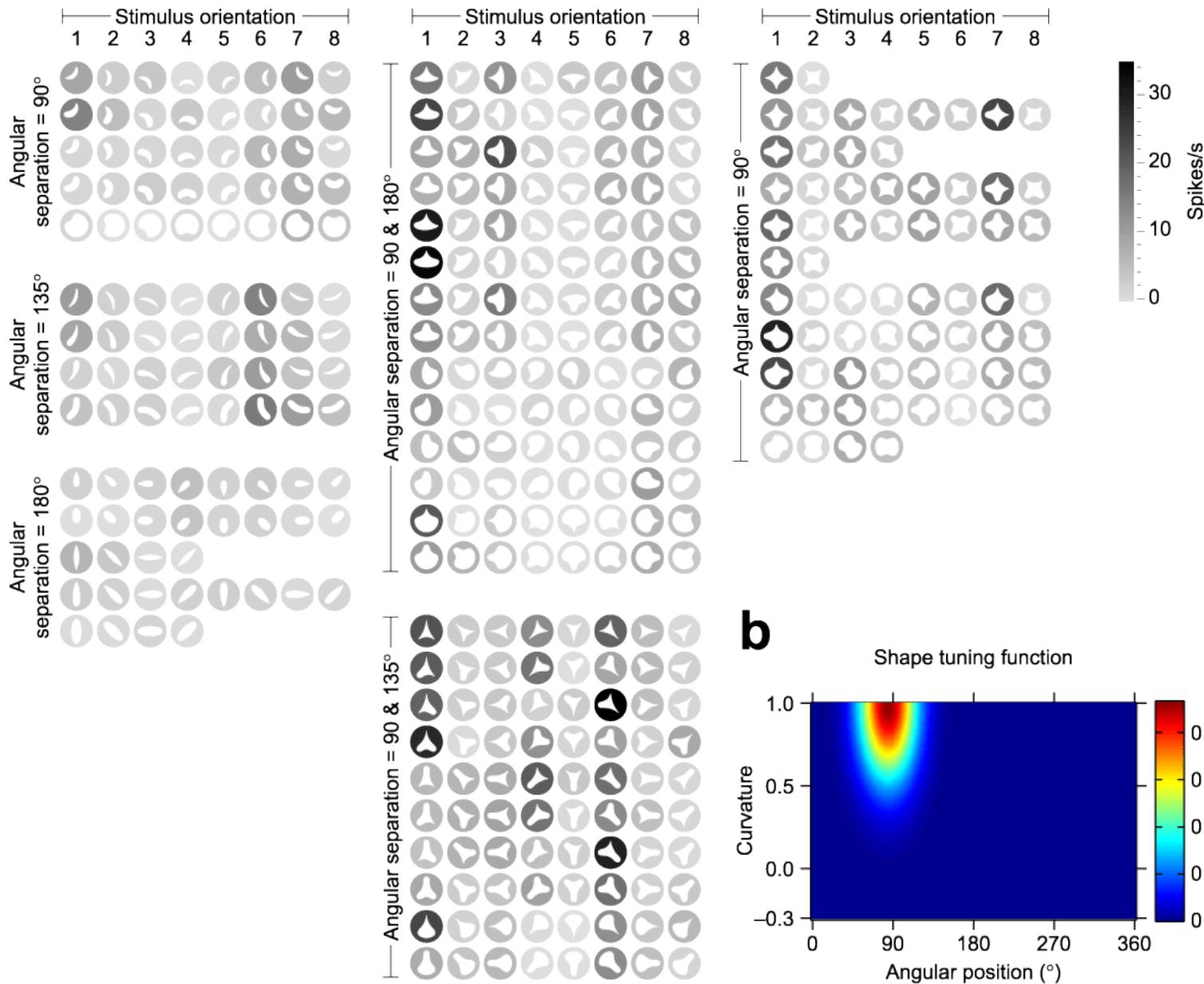


B Receptive fields of simple cells of primary visual cortex

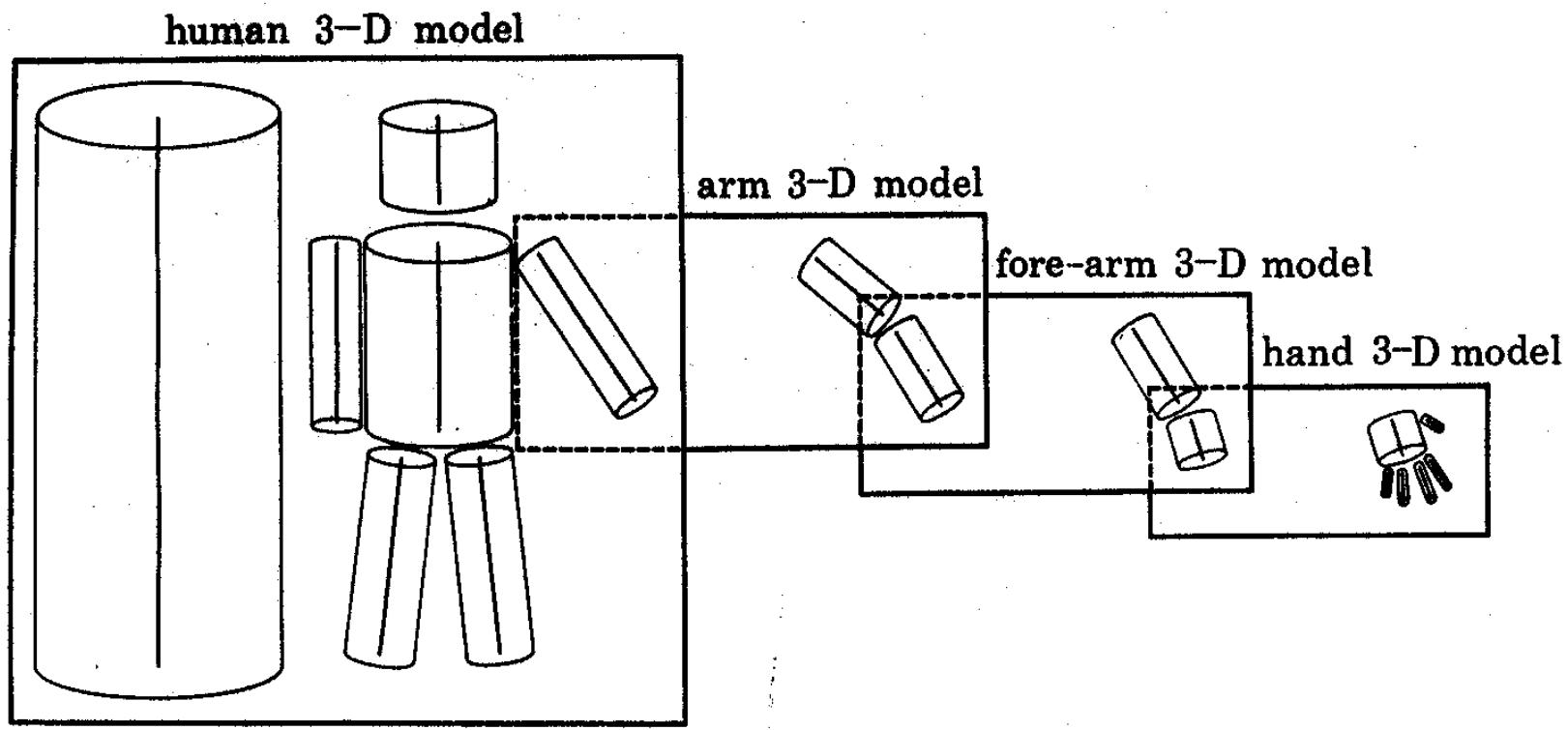




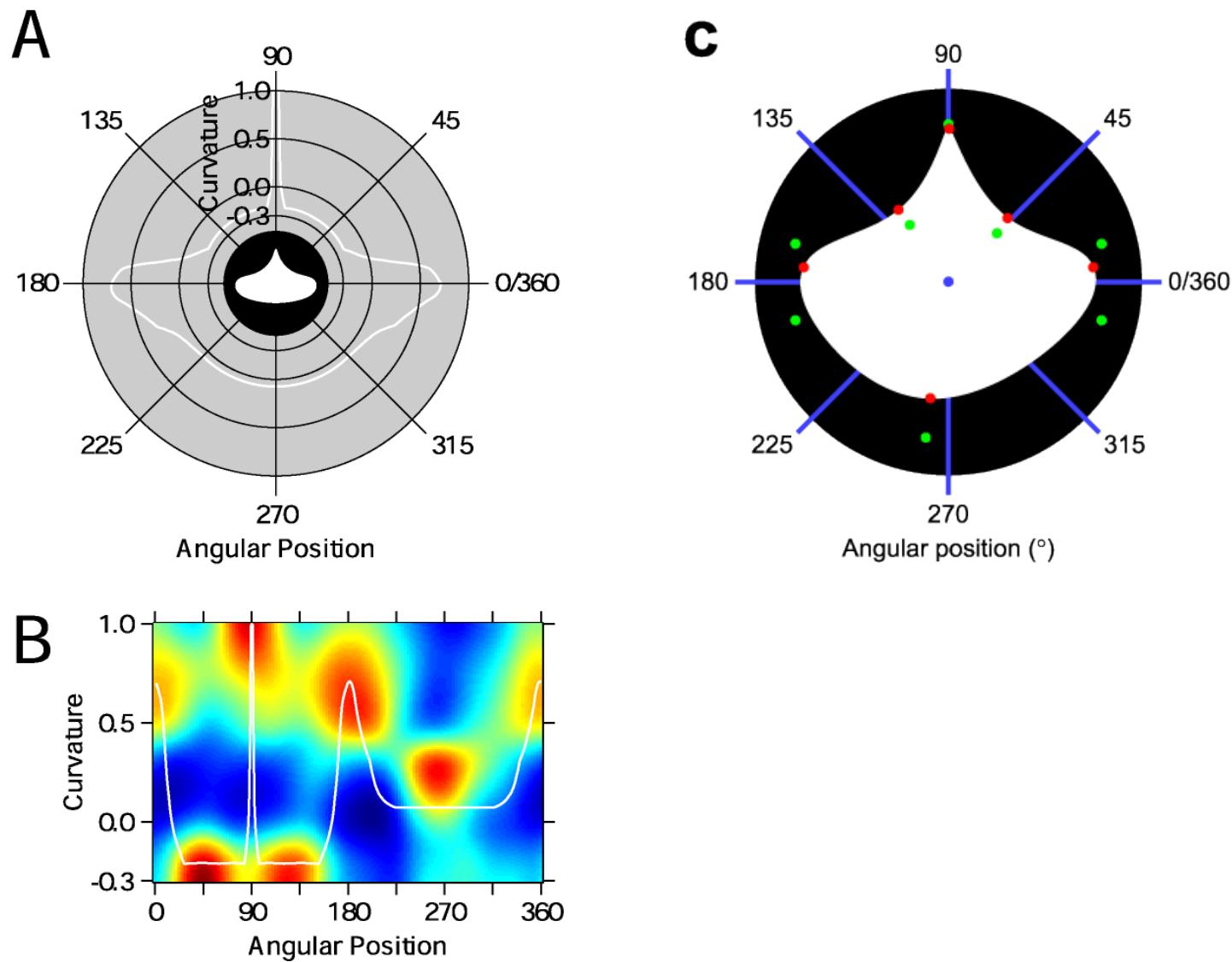
CURVATURE TUNING IN AREA V4

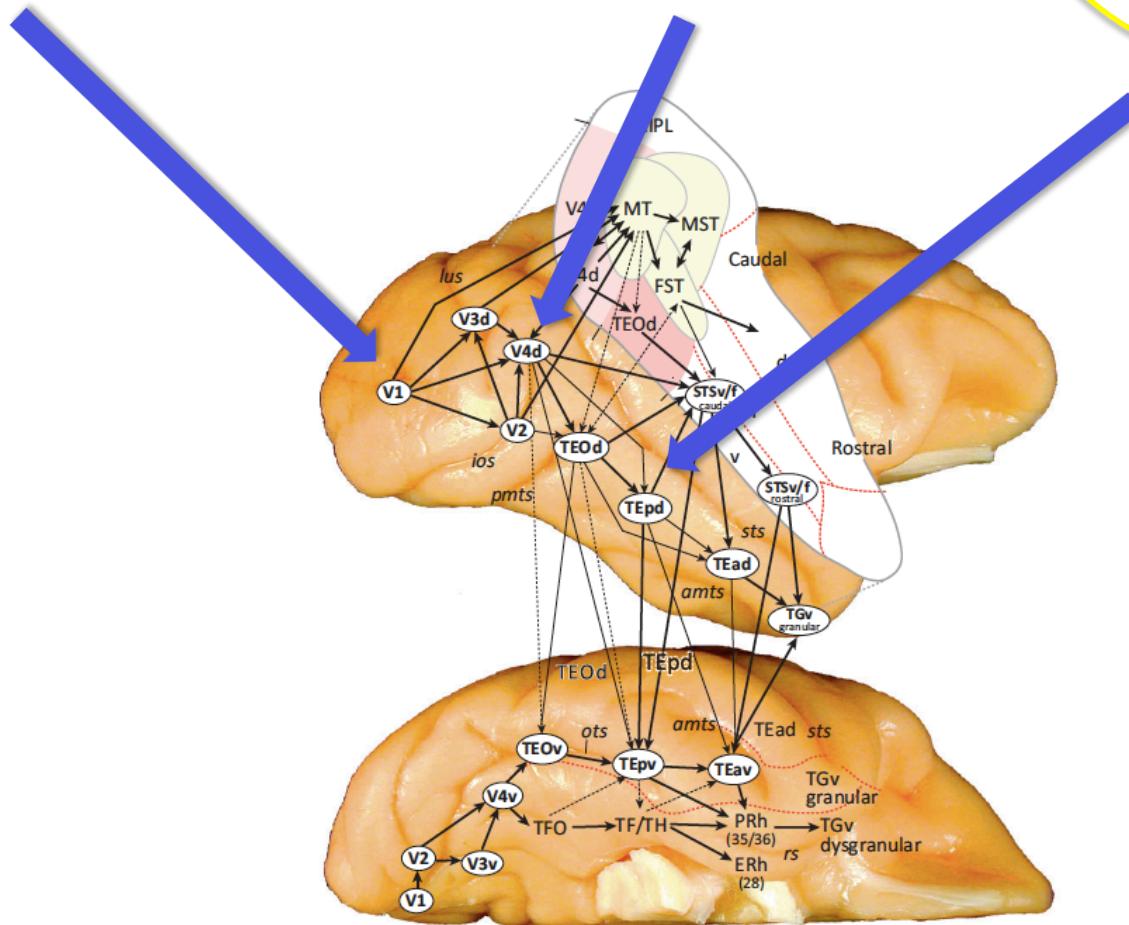


CONFIGURAL CODING OF OBJECT STRUCTURE

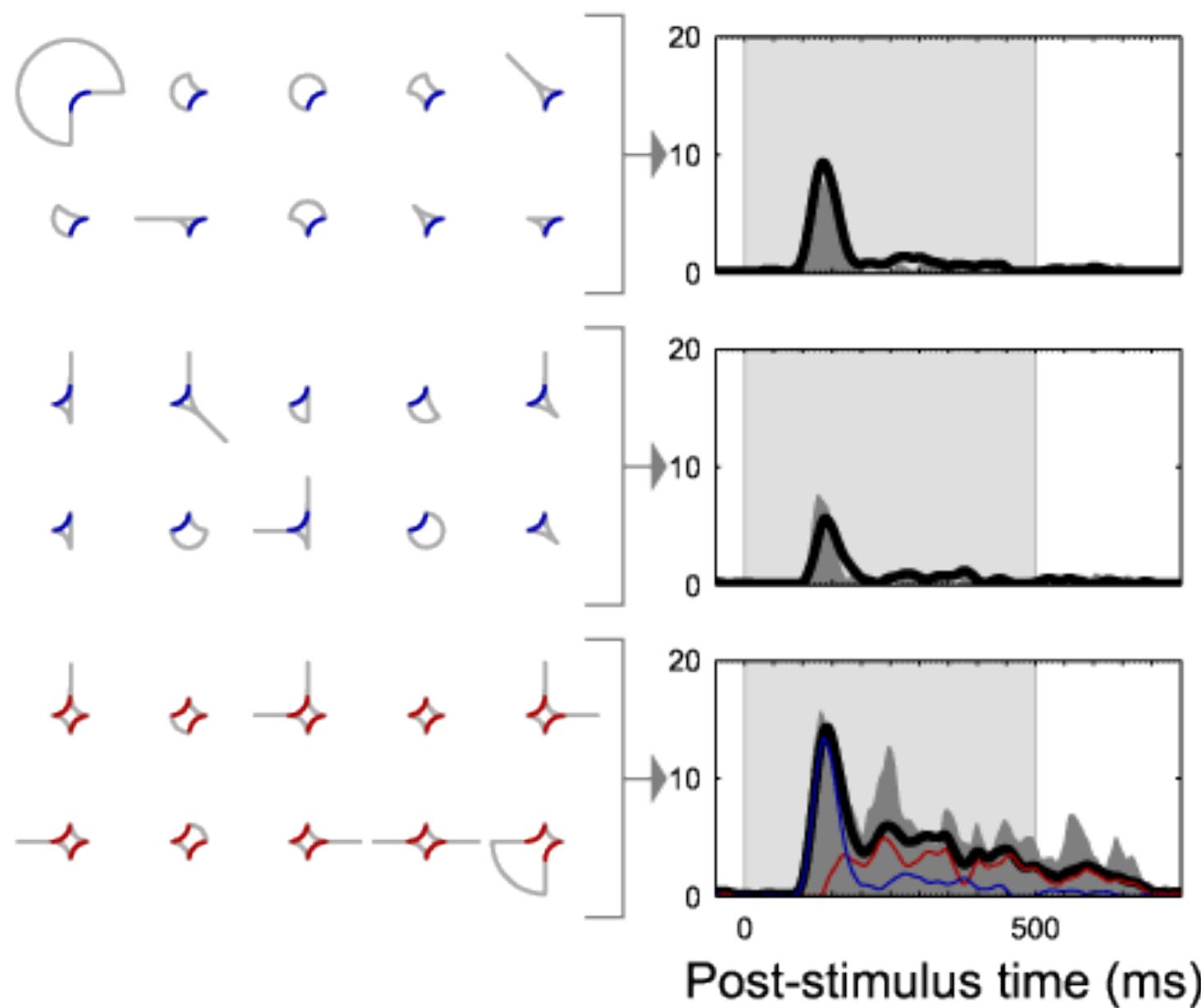


CONFIGURAL CODING IN AREA V4

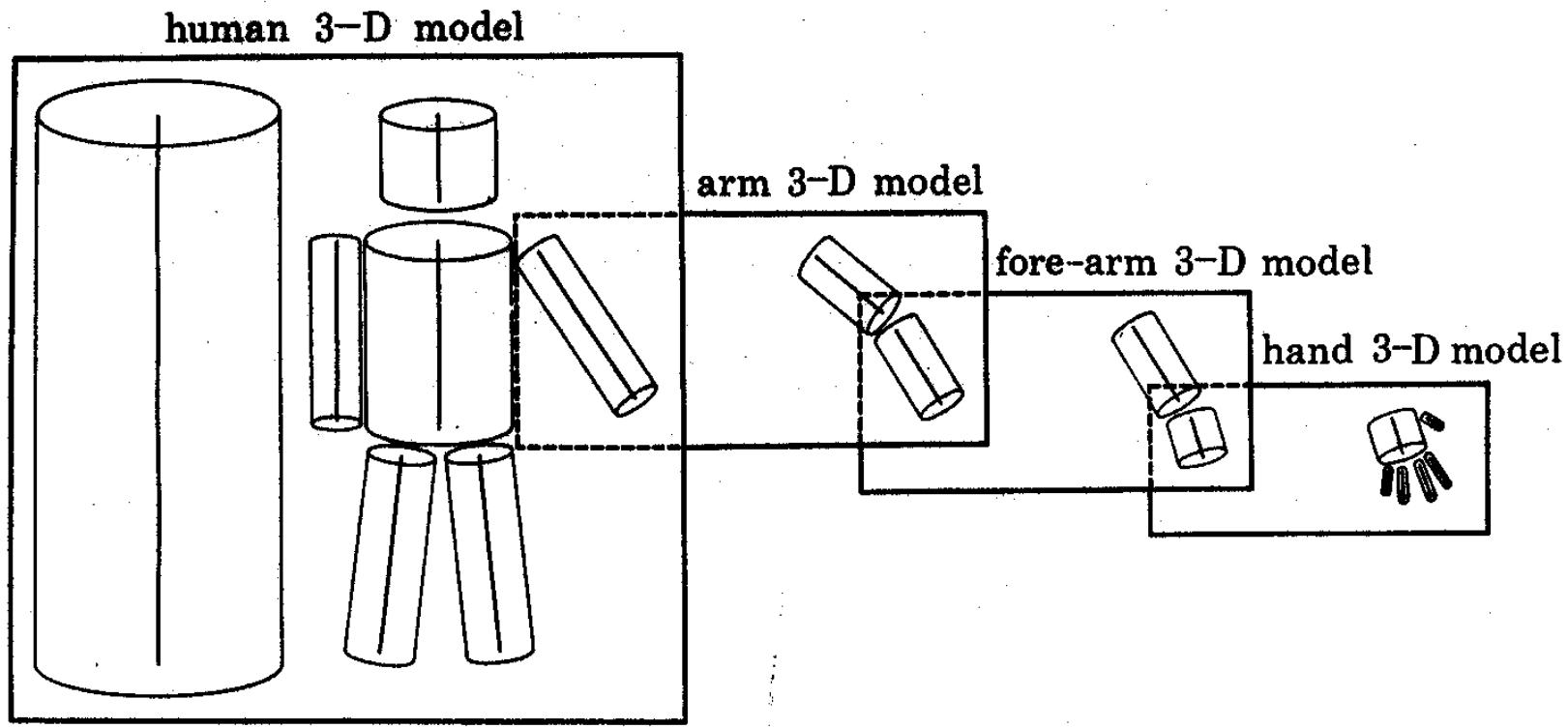




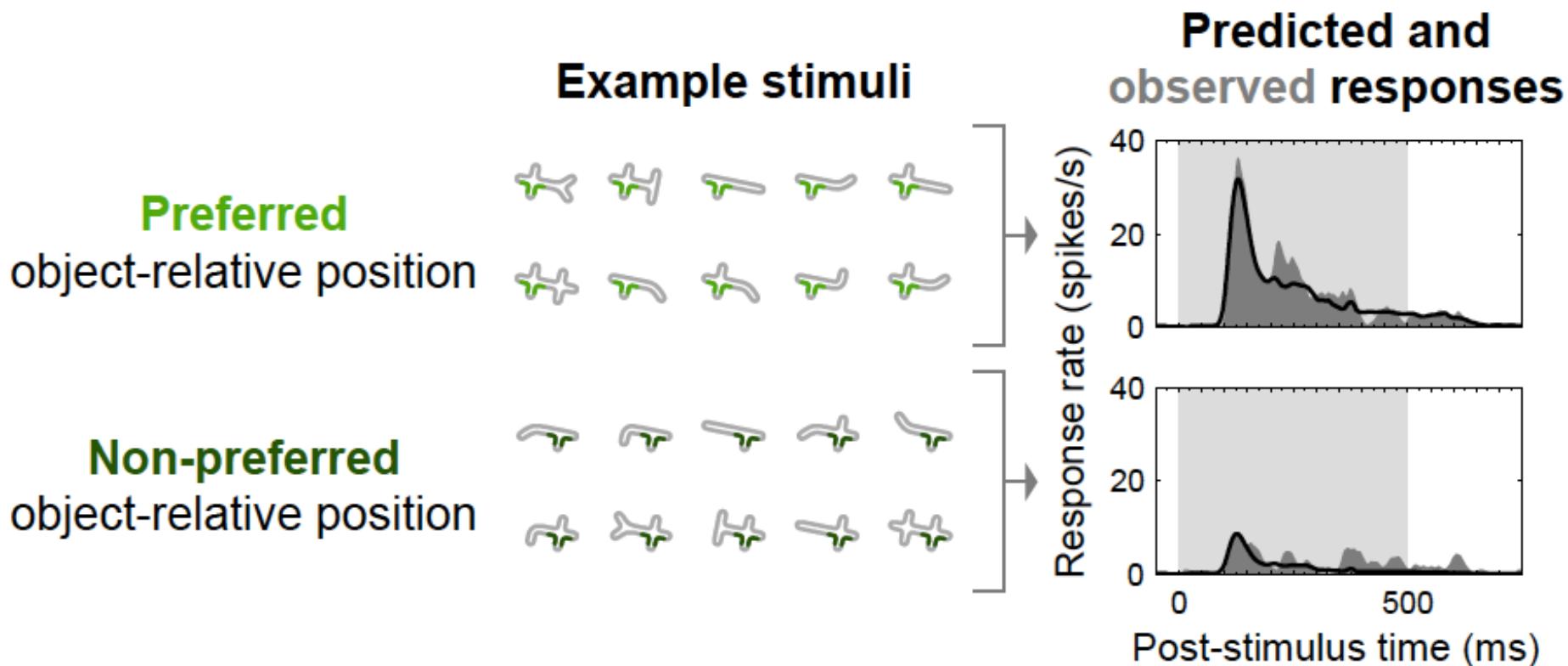
CONFIGURAL CODING IN HIGH-LEVEL VENTRAL PATHWAY

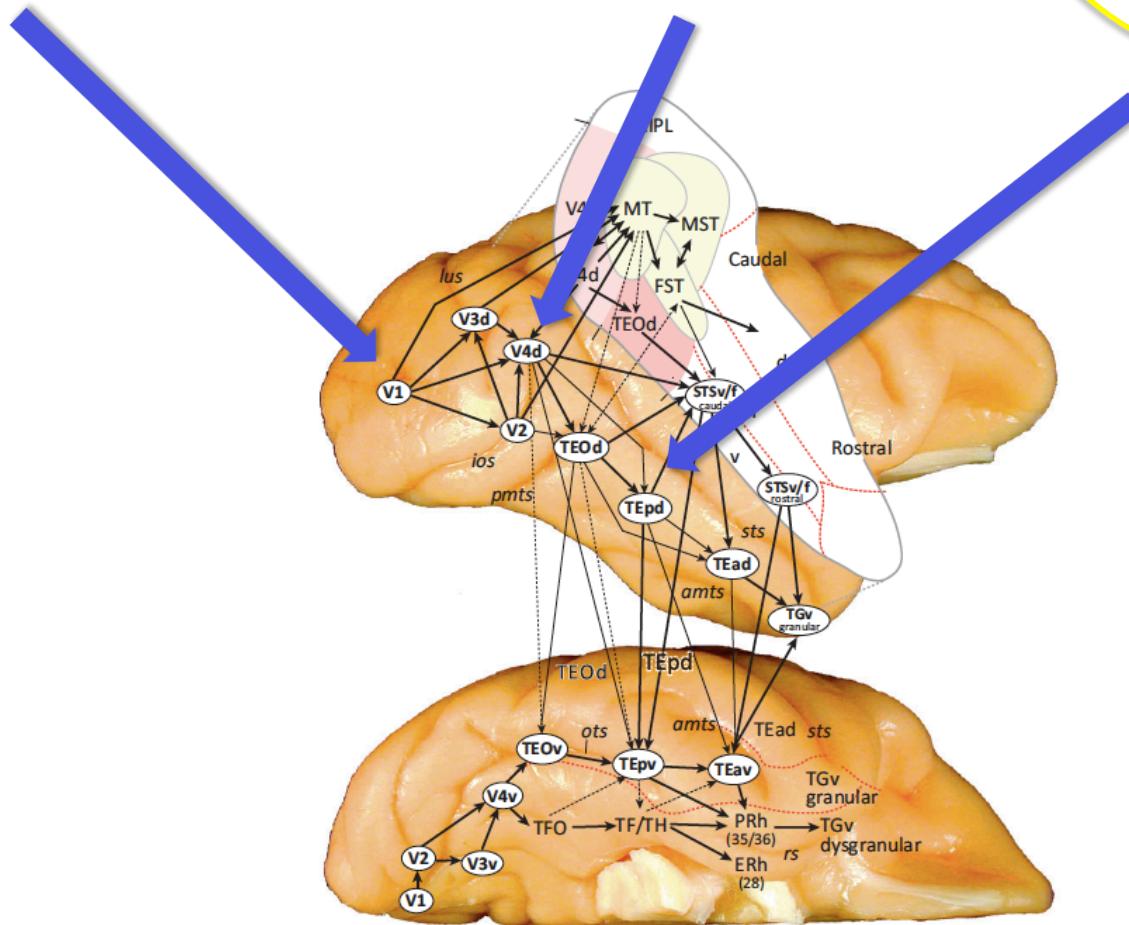


CONFIGURAL CODING OF OBJECT STRUCTURE

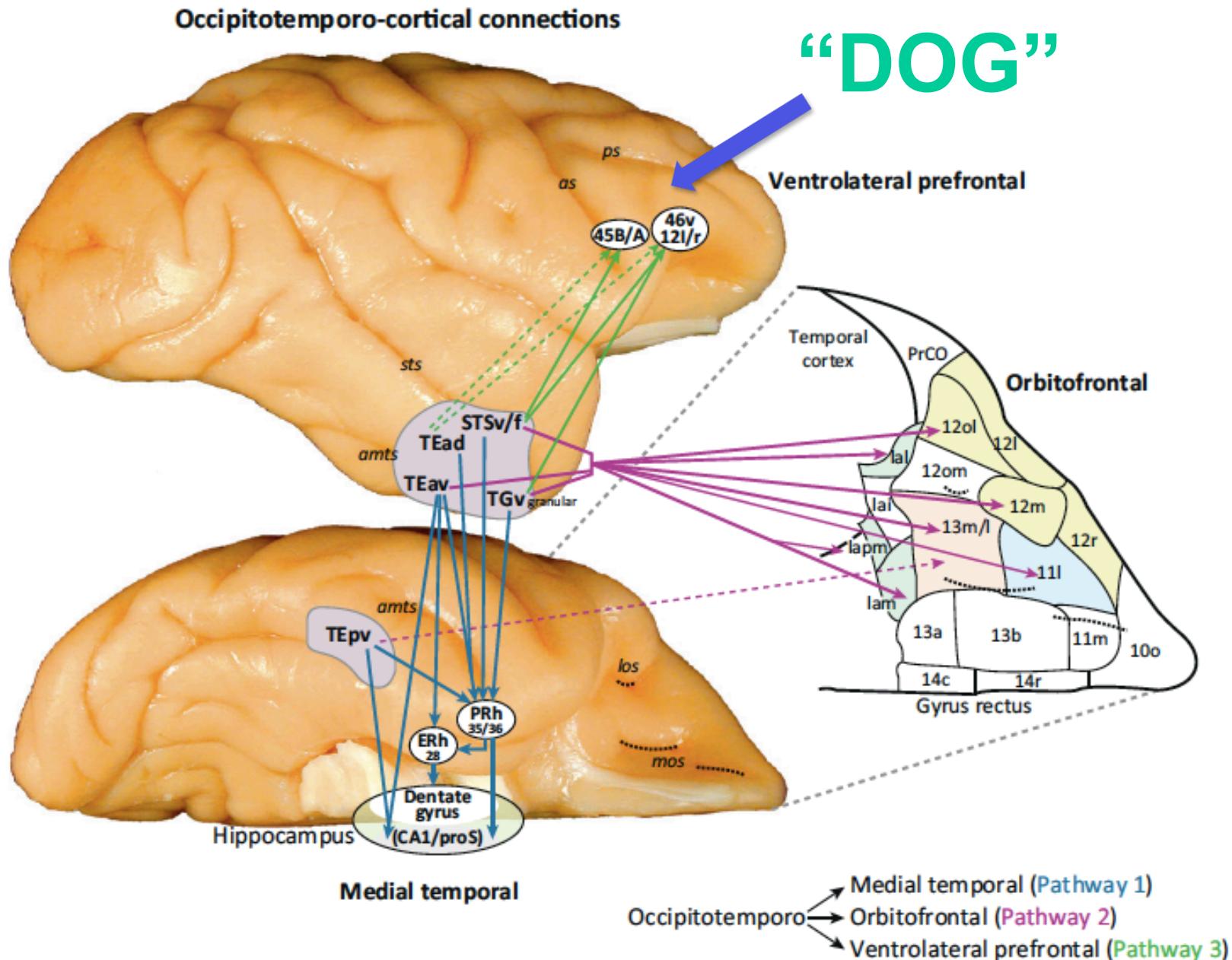


OBJECT-CENTERED POSITION CODING IN VENTRAL PATHWAY



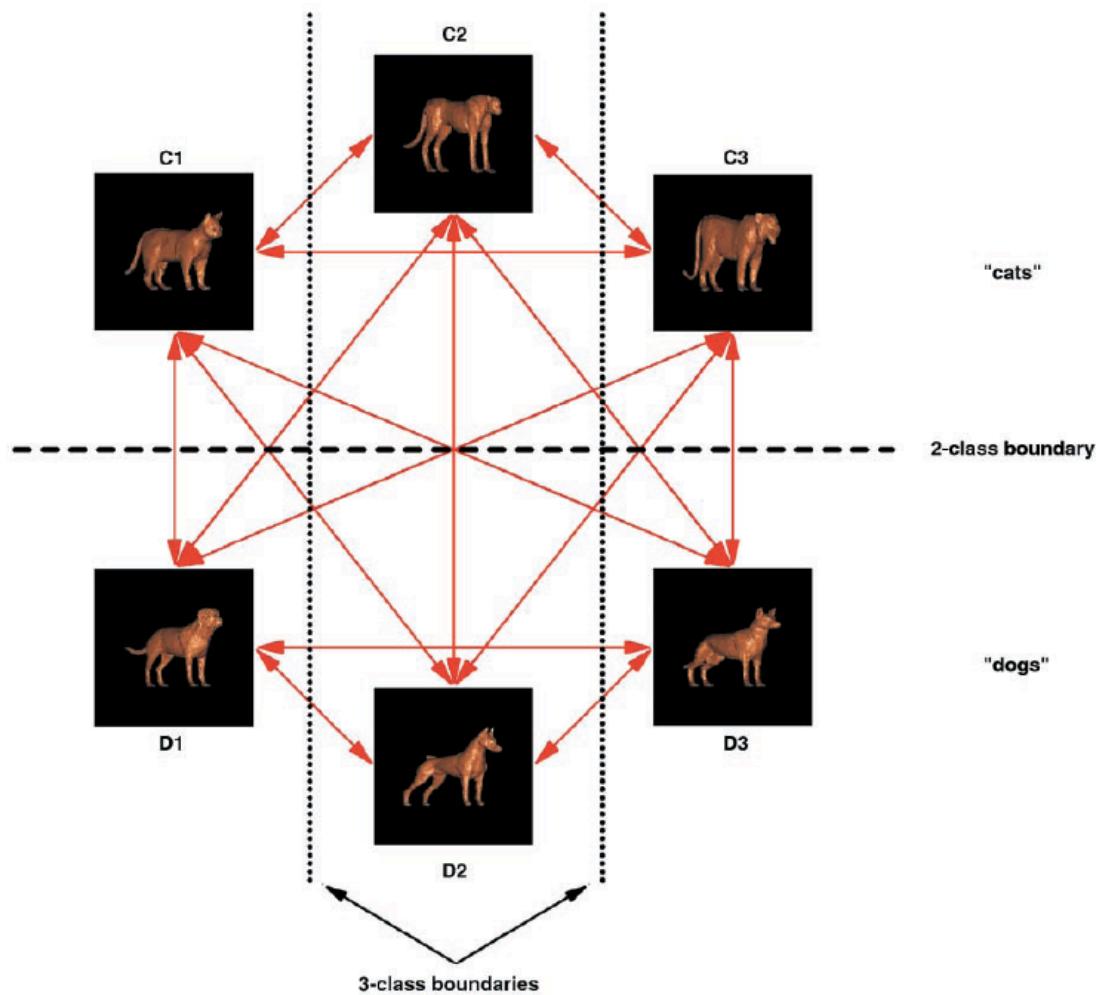


VENTRAL PATHWAY OUTPUTS

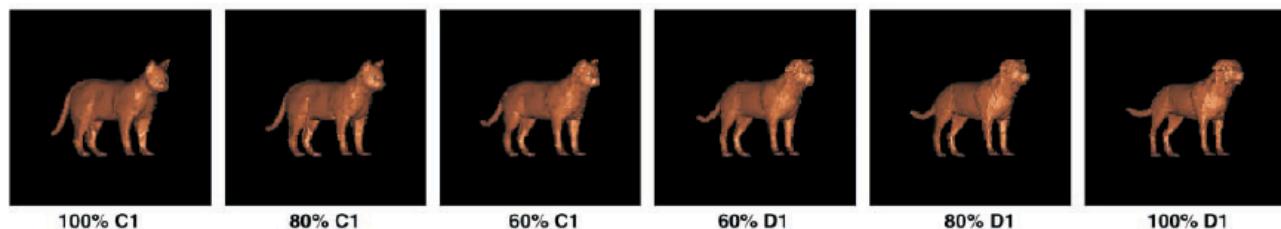


CAT/DOG CATEGORIZATION TASK

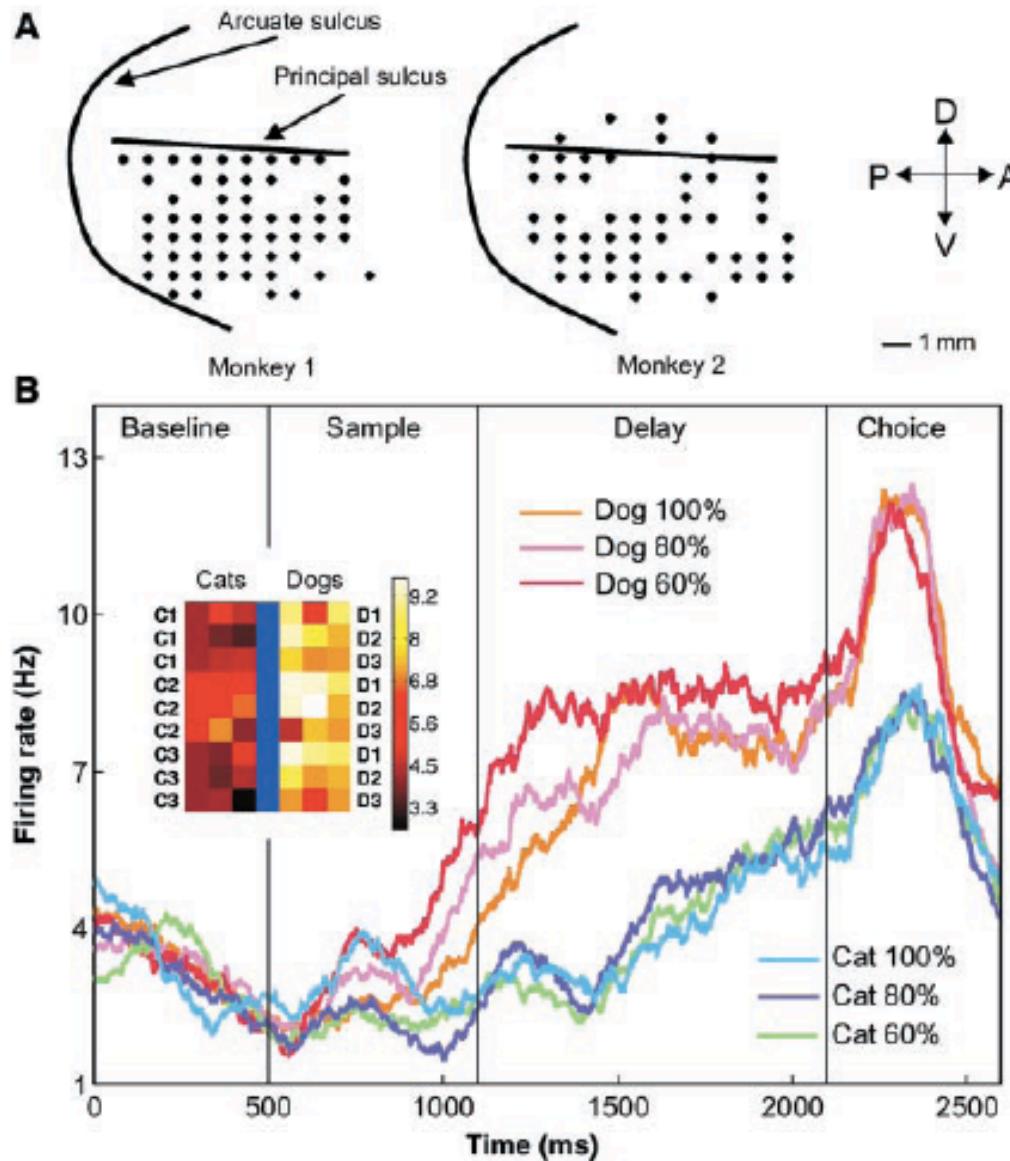
A



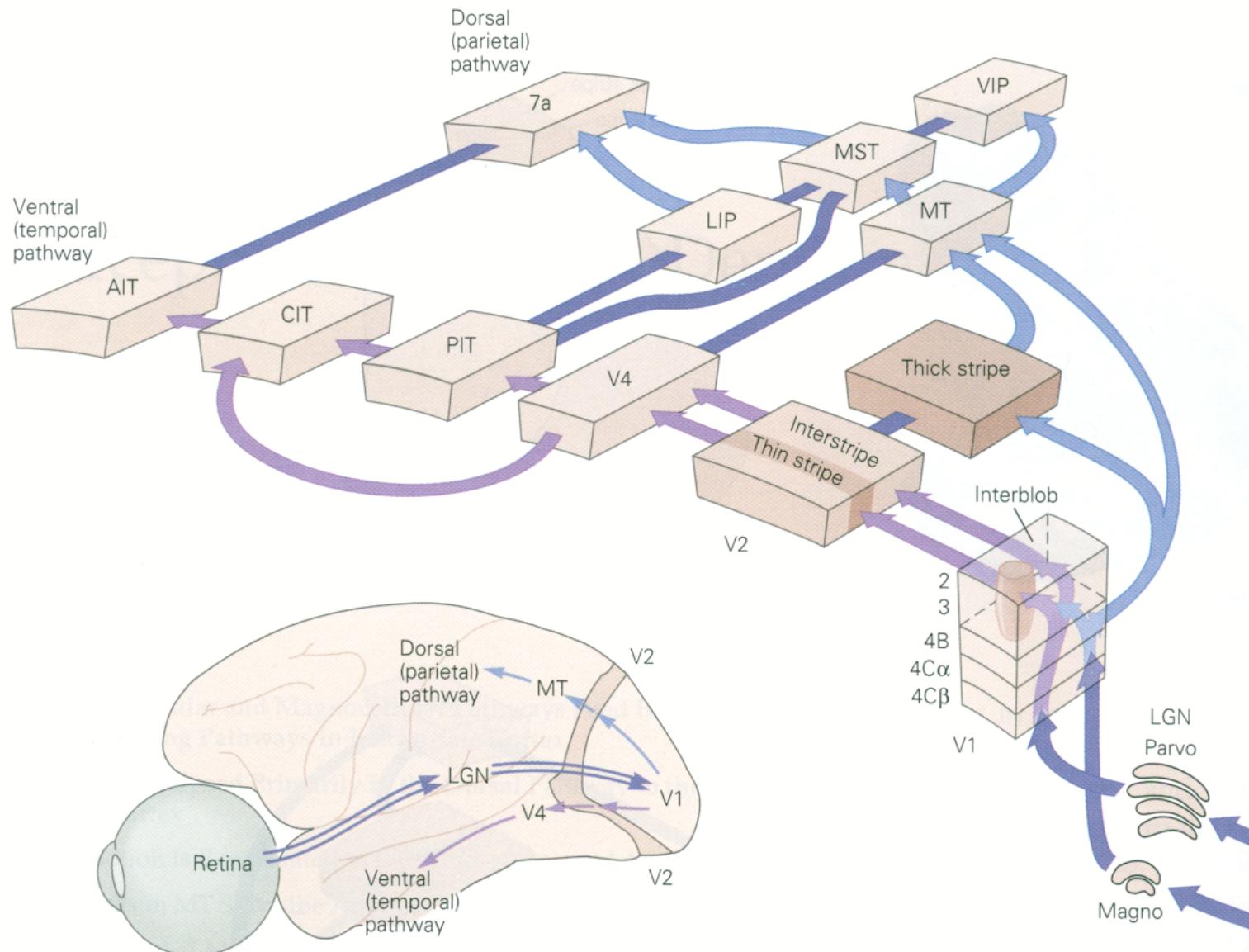
B



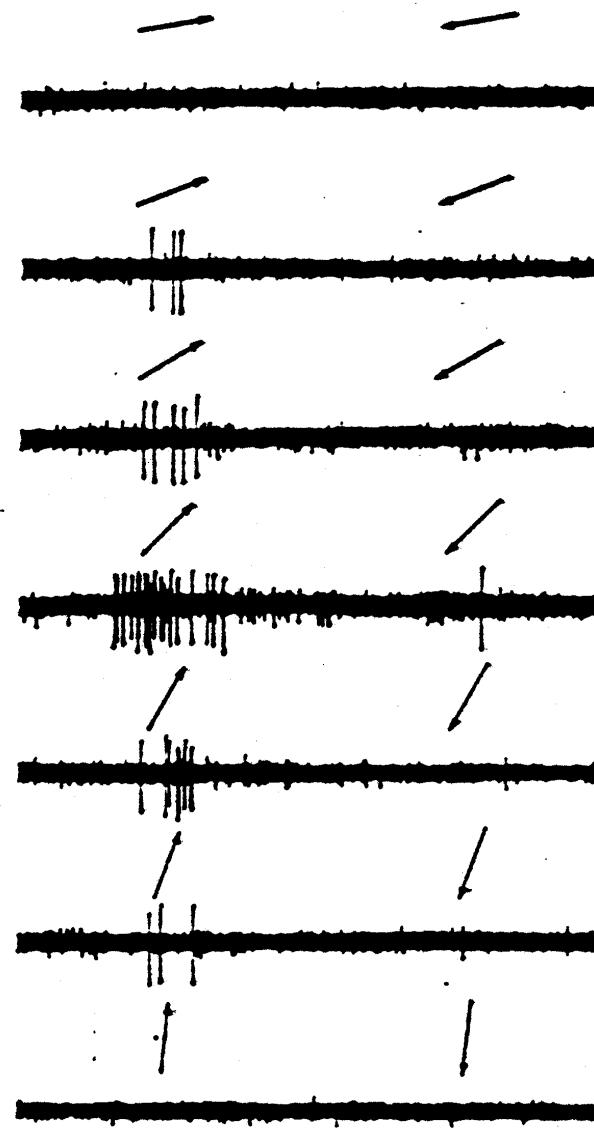
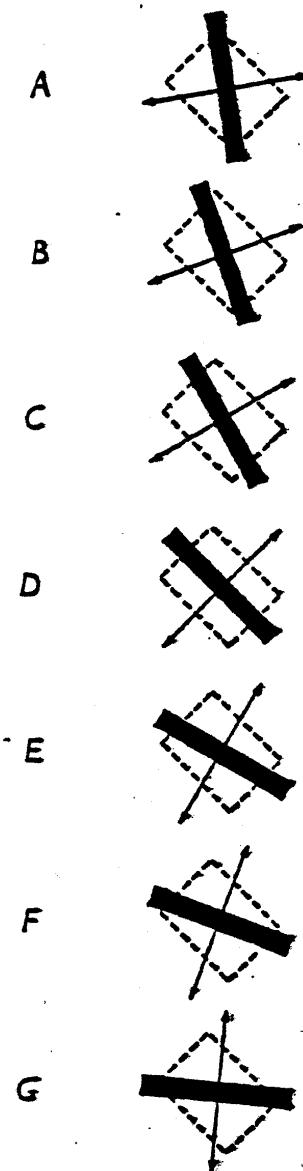
EXAMPLE PREFRONTAL NEURON ENCODING “DOG”



CHANNELS AND PATHWAYS

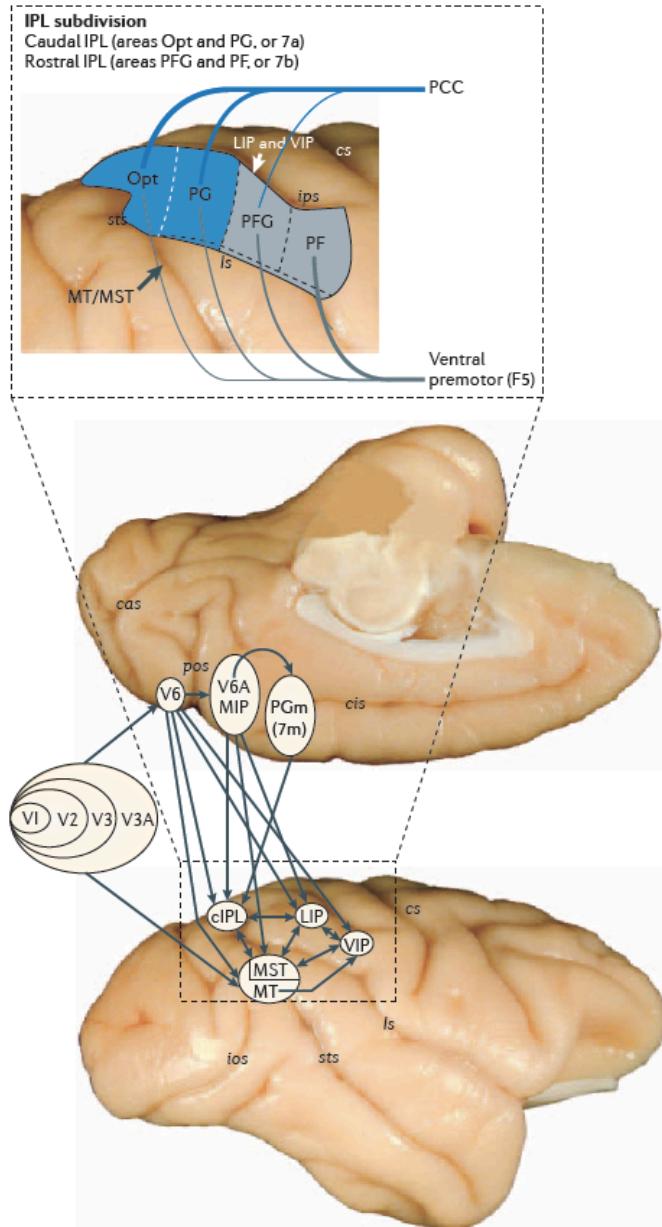


MOTION-DIRECTION TUNING IN V1



DORSAL PATHWAY

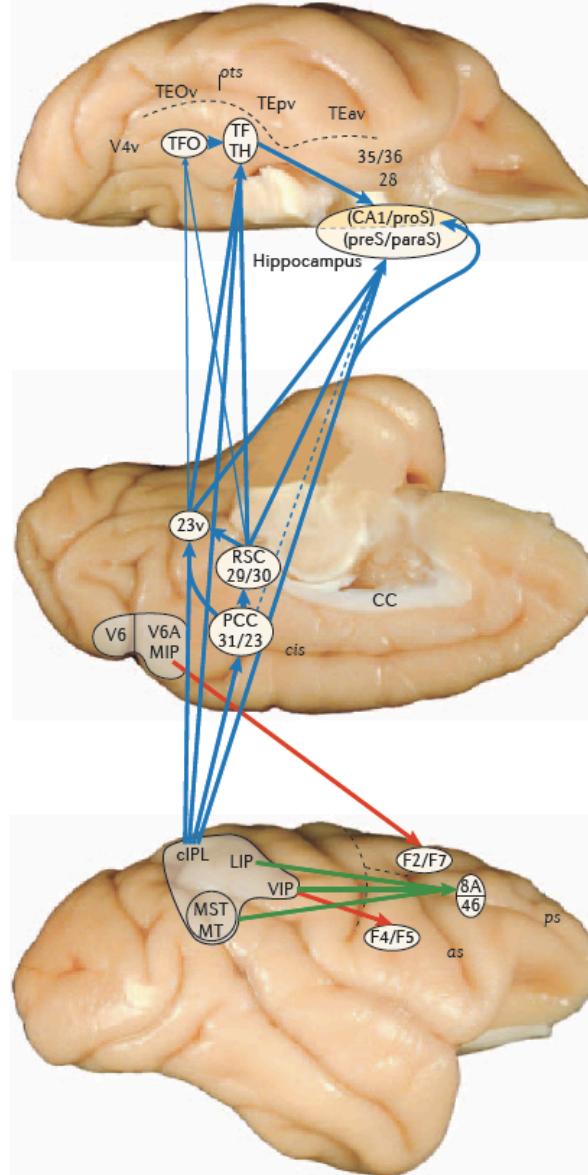
a Dorsal stream: Occipito-parietal circuit



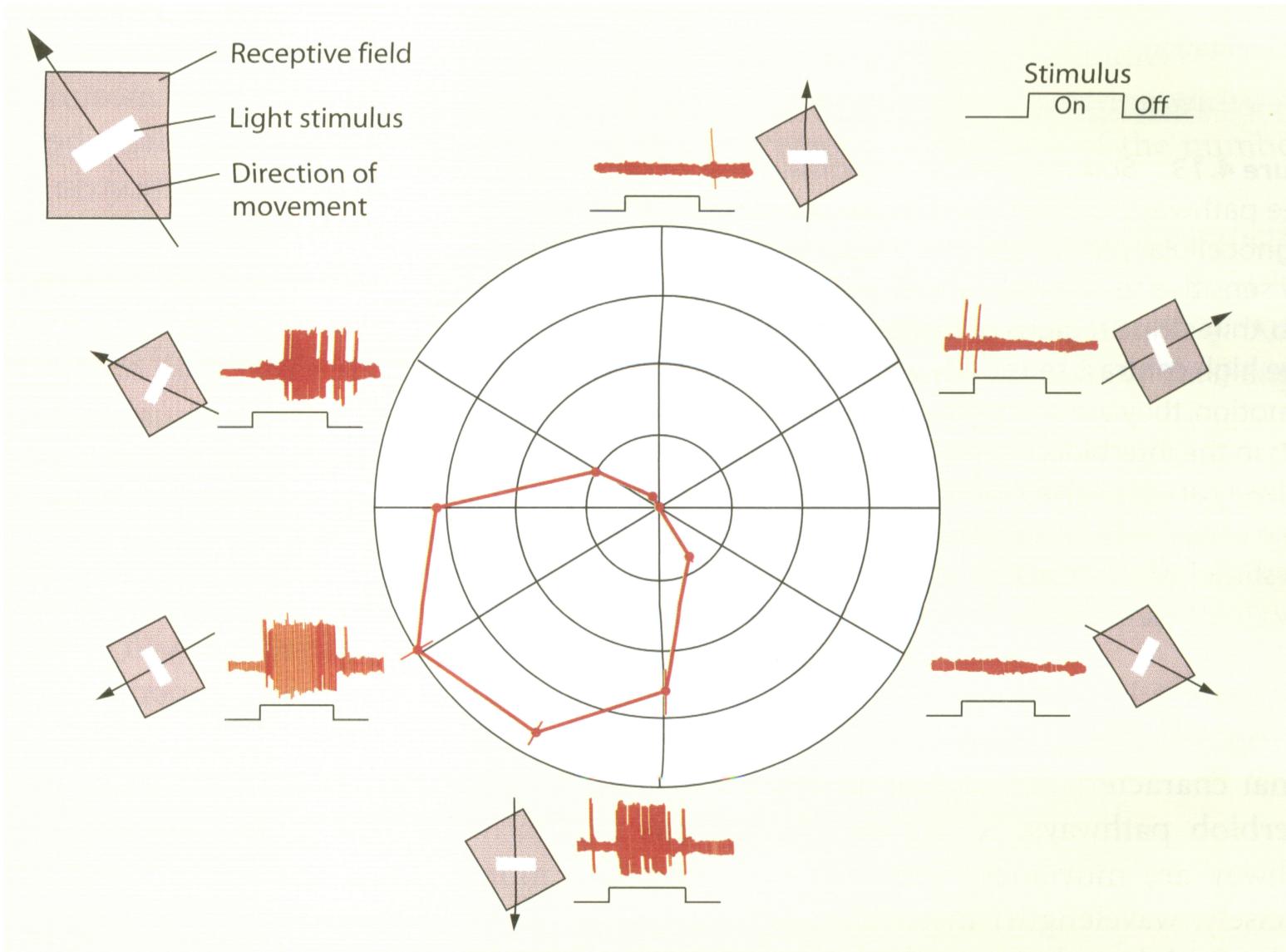
DORSAL OUTPUTS

b Parietal pathways

— Parieto-prefrontal — Parieto-premotor — Parieto-medial temporal

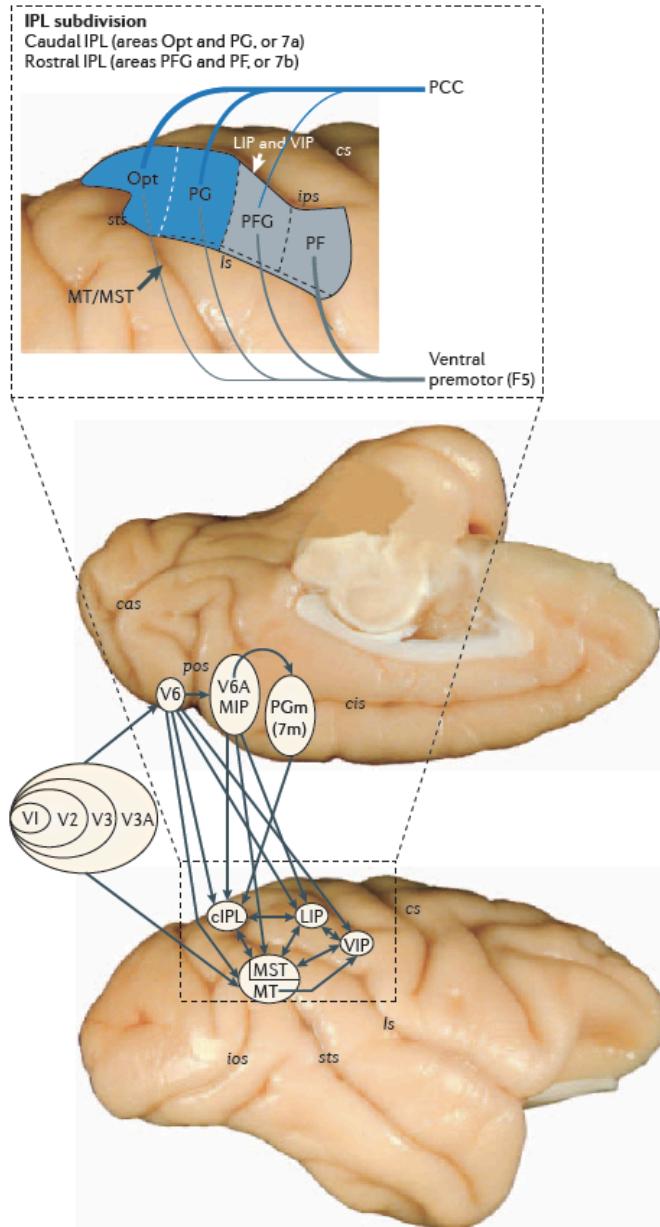


MOTION DIRECTION TUNING IN AREA MT



DORSAL PATHWAY

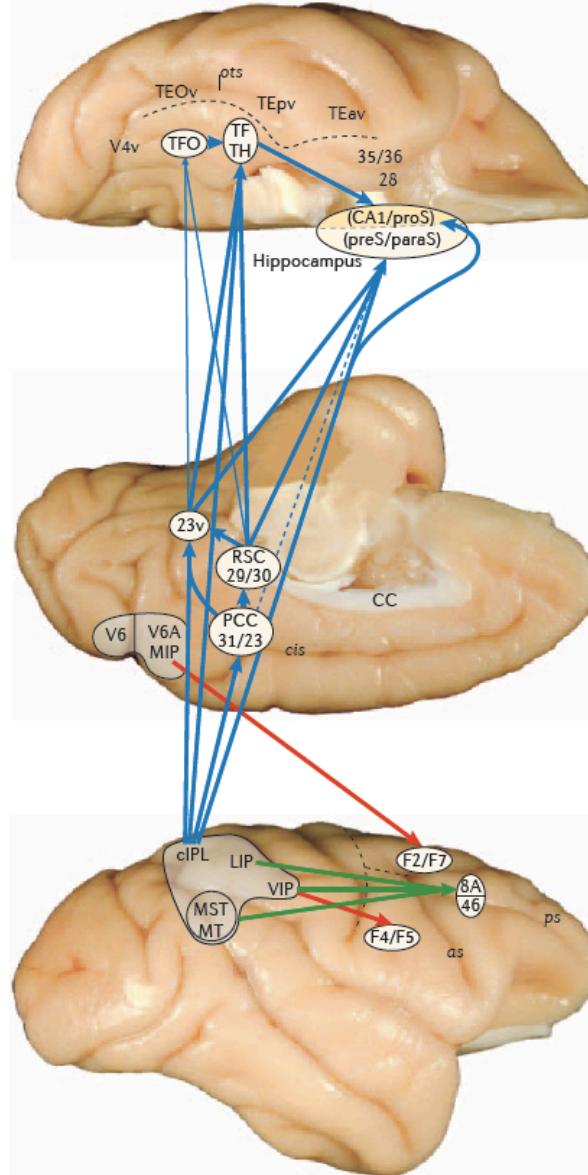
a Dorsal stream: Occipito-parietal circuit



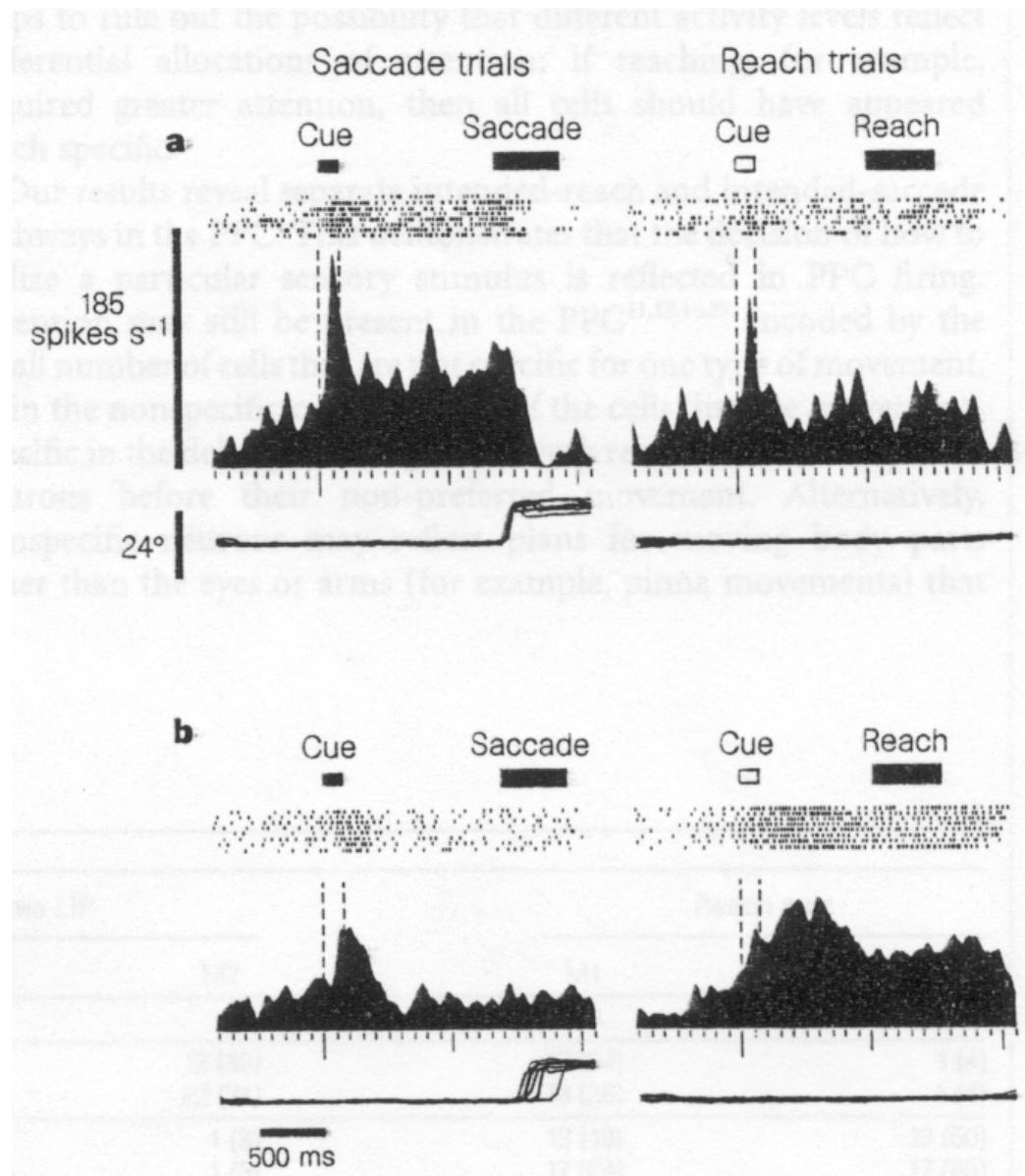
DORSAL OUTPUTS

b Parietal pathways

— Parieto-prefrontal — Parieto-premotor — Parieto-medial temporal

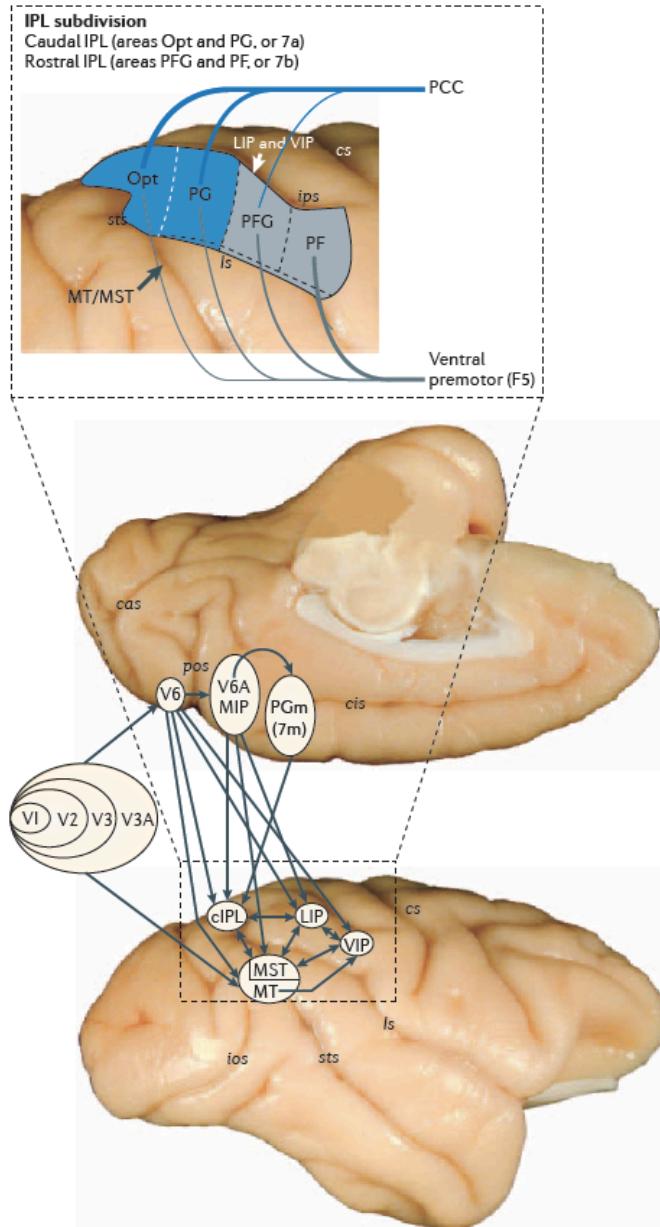


TARGET REPRESENTATION IN DORSAL PATHWAY



DORSAL PATHWAY

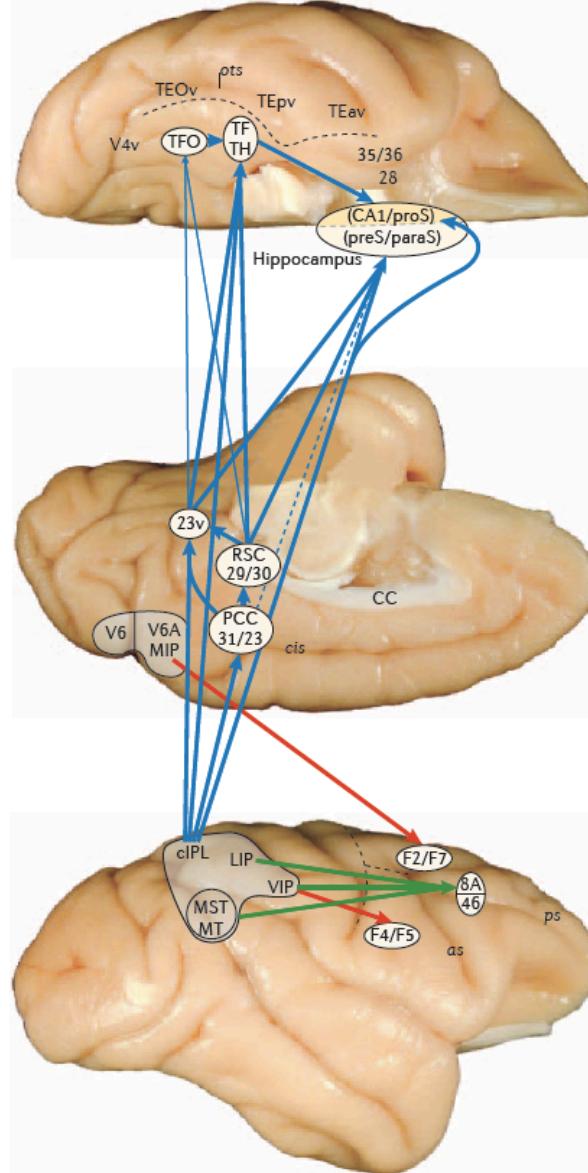
a Dorsal stream: Occipito-parietal circuit



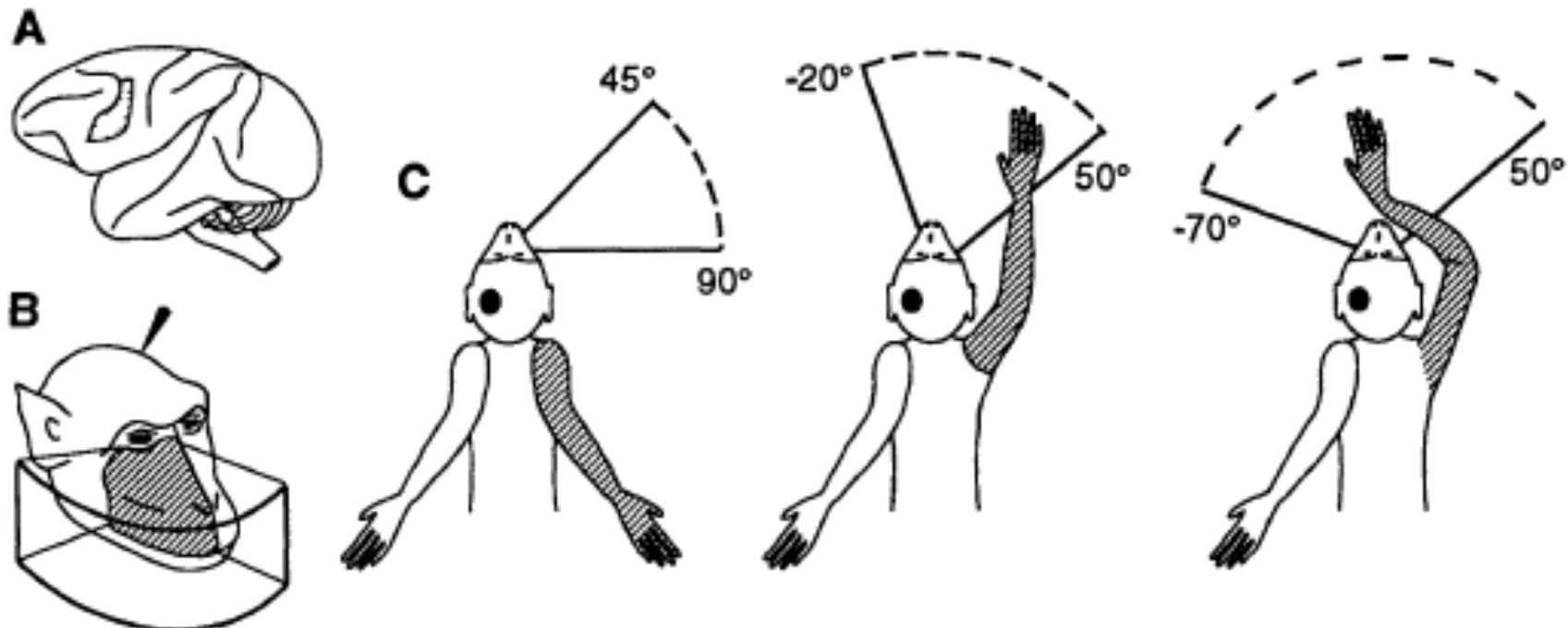
DORSAL OUTPUTS

b Parietal pathways

— Parieto-prefrontal — Parieto-premotor — Parieto-medial temporal

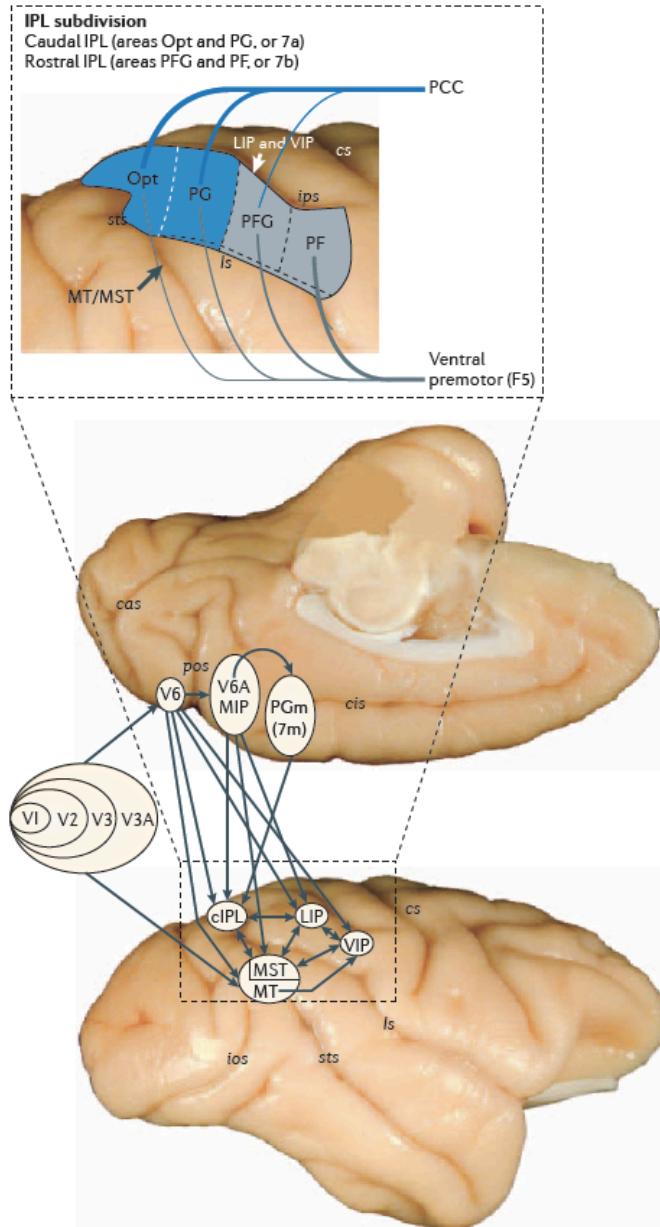


HAND-CENTERED VISUAL CODING IN VENTRAL PREMOTOR



DORSAL PATHWAY

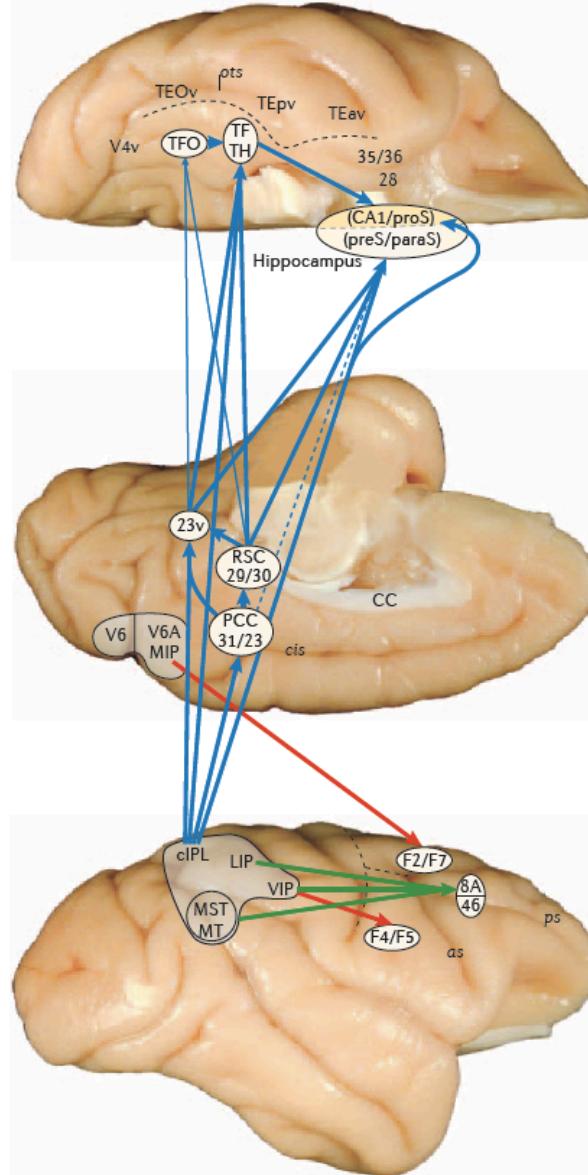
a Dorsal stream: Occipito-parietal circuit



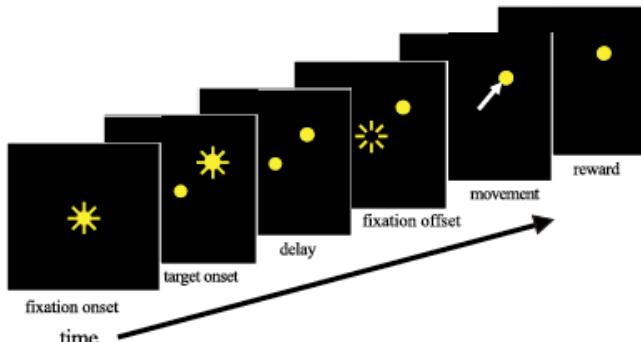
DORSAL OUTPUTS

b Parietal pathways

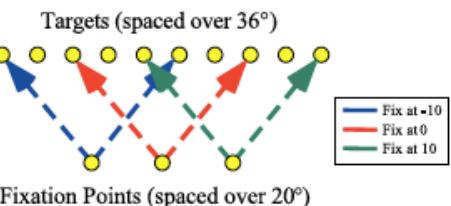
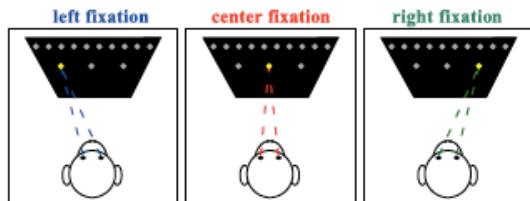
— Parieto-prefrontal — Parieto-premotor — Parieto-medial temporal



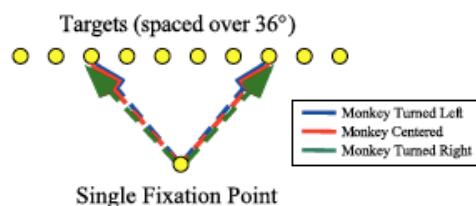
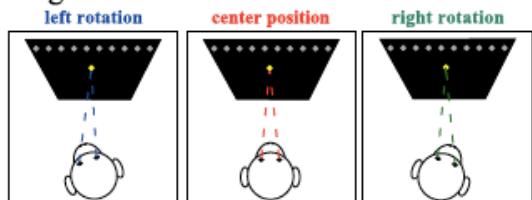
a. Delayed Saccade Task



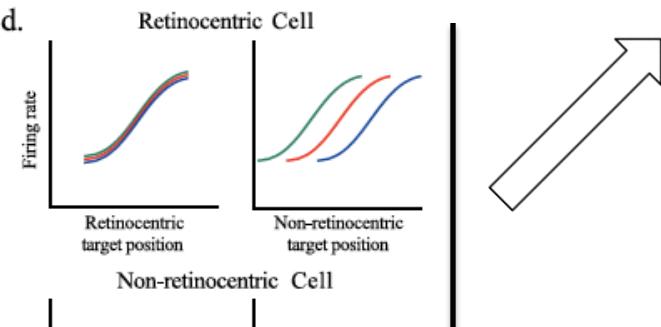
b. Retinocentric vs. Nonretinocentric Test



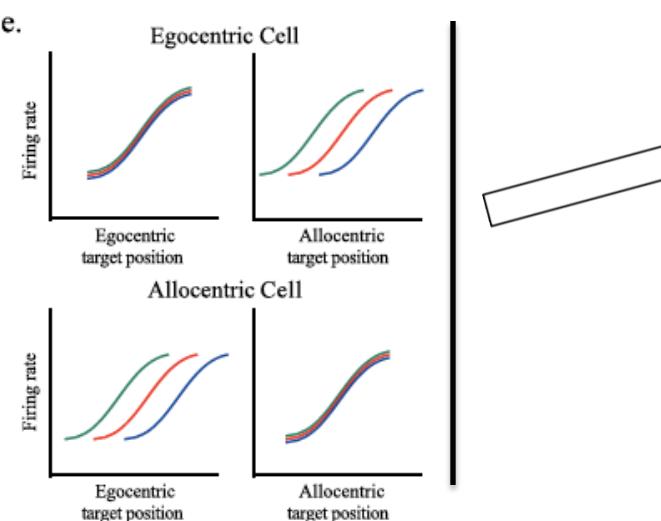
c. Egocentric vs. Allocentric Test



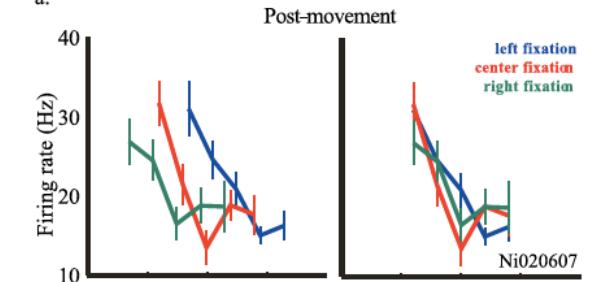
d.



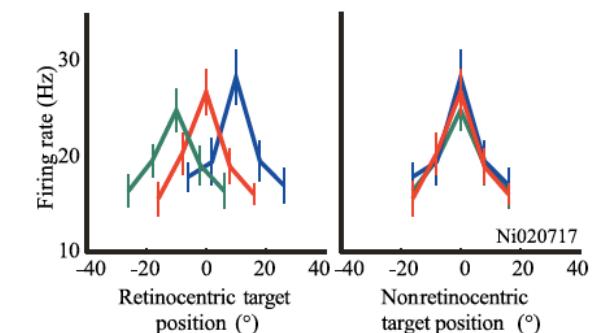
e.



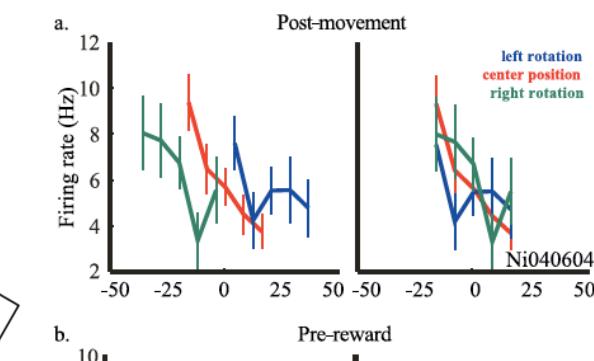
a.



b.



a.



b.

