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	Sommario/riassunto	In the burdened scenes of everyday life, our brains must select from among many competing inputs for perceptual synthesis - so that only the most relevant receive full attention and irrelevant (distracting) information is suppressed. At the same time, we must remain responsive to salient events outside our current focus of attention - and balancing these two processing modes is a fundamental task our brain constantly needs to solve. Both the physical saliency of a stimulus, as well as top-down predictions about imminent sensations crucially influence attentional selection and consequently the response to unexpected events. Research over recent decades has identified two separate brain networks involved in predictive top-down control and reorientation to unattended events (or oddball stimuli): the dorsal and ventral fronto-parietal attention systems of the human brain. Moreover,

specific electrophysiological brain responses are known to characterize attentional orienting as well as the processing of deviant stimuli. However, many key questions are outstanding. What are the exact functional differences between these cortical attention systems? How are they lateralised in the two hemispheres? How do top-down and bottom-up signals interact to enable flexible attentional control? How does structural damage to one system affect the functionality of the other in brain damaged patients? Are there sensory-specific and supra-modal attentional systems in the brain? In addition to these questions, it is now accepted that brain responses are not only affected by the saliency of external stimuli, but also by our expectations about sensory inputs. How these two influences are balanced, and how predictions are formed in cortical networks, or generated on the basis of experience-dependent learning, are intriguing issues. In this Research Topic, we aim to collect innovative contributions that shed further light on the (cortical) mechanisms of attentional control in the human brain. In particular, we would like to encourage submissions that investigate the behavioural correlates, functional anatomy or electrophysiological markers of attentional selection and reorientation. Special emphasis will be given to studies investigating the context-sensitivity of these attentional processes in relation to prior expectations, trial history, contextual cues or physical saliency. We would like to encourage submissions employing different research methods (psychophysical recordings, neuroimaging techniques such as fMRI, MEG, EEG or ECoG, as well as neurostimulation methods such as TMS or tDCS) in healthy volunteers or neurological patients. Computational models and animal studies are also welcome. Finally, we also welcome submission of meta-analyses and reviews articles that provide new insights into, or conclusions about recent work in the field.