

Title: Scanning at High Fields... 7T and Beyond

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Abstract: This presentation will cover some of the advantages and challenges of Magnetic Resonance Imaging at High Magnetic Fields. Examples of the undisputed advantages observed at high field such as the increased signal to noise ratio, chemical shift dispersion, susceptibility based contrast and the increased specificity of BOLD contrast will be shown both at 7 and 14 Tesla. Sequence developments to circumvent some of the inherent limitations of high field imaging will be addressed both in the context of structural and functional imaging.