

Abstract Submitted
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Radiofrequency Spectroscopy of Imbalanced Fermi Gases ANDRE SCHIROTZEK, YONG-IL SHIN, CHRISTIAN SCHUNCK, WOLFGANG KETTERLE, MIT — We studied the radiofrequency spectrum of the majority component of a number imbalanced ultracold Fermi gas of Lithium-6 in the BEC-BCS crossover. Using 3D density reconstruction we extracted the local excitation spectrum in the different parts of the atomic cloud ranging from the superfluid central core with equal densities of the two spin components to the spin-polarized part in the outer wings of the trapped atomic sample.

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