Abstract: Local Tate duality is a duality for the Galois cohomology of finite modules over the absolute Galois group of a non-archimedean local field. This arithmetic duality is reminiscent of Poincaré duality for manifolds familiar to topologists. In joint work with Tomer Schlank we upgrade this to a duality for spectra with action by such an absolute Galois group, arriving at a Galois-equivariant Brown-Comenetz duality. This upgraded duality should lead to a better understanding of rational points on algebraic varieties.