I will talk about some results concerning the non-vanishing of $L$-functions associated to fixed order characters at the central point over functions fields. More specifically, I will explain how one can compute the one-level density of zeros in a thin family of such $L$–functions and obtain a positive proportion of non-vanishing, which goes to 0 as the order of the character goes to infinity. This is based on joint work with C. Bujold, C. David and M. Lalin.