1125-46-488 Konrad Aguilar* (konrad.aguilar@du.edu). Convergence of Quotients of AF Algebras in Quantum Propinquity by Convergence of Ideals.

We provide conditions for when quotients of AF algebras are quasi-Leibniz quantum compact metric spaces building from our previous work with F. Latremoliere. Given a C*-algebra, the ideal space may be equipped with natural topologies. Next, we impart criteria for when convergence of ideals of an AF algebra can provide convergence of quotients in quantum propinquity, while introducing a metric on the ideal space of a C*-algebra. We then apply these findings to a certain class of ideals of the Boca-Mundici AF algebra by providing a continuous map from this class of ideals equipped with various topologies including the Jacobson and Fell topologies to the space of quotients with the quantum propinquity topology. Lastly, we introduce new Leibniz Lip-norms on any unital AF algebra motivated by Rieffel's work on Leibniz seminorms and best approximations. (Received September 05, 2016)