PIOTR SOLTAN, Institute of Mathematics of the Polish Academy of Sciences and Department of Mathematical Methods in Physics, Faculty of Physics, University of Warsaw *Homogeneous Spaces for Non-regular Quantum Groups*

I will describe two examples of quantum homogeneous spaces of non-regular (non-compact) quantum groups. I will also discuss the action of the quantum groups on their homogeneous spaces and focus on the notion of continuity of actions. The technical tools I will use will include unbounded elements affiliated with C^* -algebras and algebras generated by such elements.