

Department of Mathematics, BGU

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# Operator Algebras and Operator Theory

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*On Monday, February 5, 2024*

*At 14:00 – 15:00*

*In 201*

Tattwamasi Amrutam (BGU)

will talk about

## **On amenable subalgebras of the group von Neumann algebra**

Abstract: In a joint work with Yair Hartman and Hanna Oppelmayer, we study the sub-von Neumann Algebras of the group von Neumann algebra  $L\Gamma$ . We will first show that  $L\Gamma$  admits a maximal invariant amenable subalgebra. We will also introduce the notion of invariant probability measures on the space of sub-von Neumann algebras (IRAs) which is analogous to the concept of Invariant Random Subgroups. We shall show that amenable IRAs are supported on the maximal amenable invariant subalgebra.