



**ΕΘΝΙΚΟ ΚΑΙ ΚΑΠΟΔΙΣΤΡΙΑΚΟ ΠΑΝΕΠΙΣΤΗΜΙΟ ΑΘΗΝΩΝ**  
ΤΜΗΜΑ ΜΑΘΗΜΑΤΙΚΩΝ  
ΤΟΜΕΑΣ ΜΑΘΗΜΑΤΙΚΗΣ ΑΝΑΛΥΣΗΣ  
ΠΑΝΕΠΙΣΤΗΜΙΟΠΟΛΗ 15784 ΑΘΗΝΑ  
ΤΗΛ 210-7276397, FAX 210-7276398

## **Ομιλίες Γενικού Σεμιναρίου:**

**Ημερομηνία: Πέμπτη 19 Δεκεμβρίου 2019**

**Ωρα: 14:00**

**Αίθουσα: Γ31**

**Ομιλητής:** Ηλίας Κατσούλης, East Carolina University, USA

**Τίτλος:** Hyperrigidity and the Hao-Ng isomorphism

**Περίληψη:** We review Arveson's concept of a  $C^*$ -envelope and hyperrigidity for an operator algebra. We show that a hyperrigid operator algebra  $A$  obeys the crossed product identity

$$C^*_e(A \rtimes_{\alpha} G) = C^*_e(A) \rtimes_{\alpha} G$$

(the  $C^*$ -envelope of the reduced crossed product of  $A$  by  $G$  coincides with the reduced crossed product of  $C^*$ -envelope of  $A$  by  $G$ ).

We then discuss applications on the Hao-Ng isomorphism problem.

**Ημερομηνία: Πέμπτη 19 Δεκεμβρίου 2019**

**Ωρα: 15:00**

**Αίθουσα: Γ31**

**Ομιλητής:** Ευγένιος Κακαριάδης, Newcastle University, UK

**Τίτλος:** Equivalences of  $C^*$ -correspondences and their impact on the associated Cuntz-Pimsner algebras

**Περίληψη:** Williams's celebrated Theorem asserts that conjugacy of edge shifts coincides with strong shift equivalence (SSE), that is with a sequence of moves on the associated graphs. Williams also introduced a weaker notion of shift equivalence (SE) and conjectured that SSE coincides with SE. This question has been the driving force in Symbolic Dynamics and was finally disproved by Kim and Roush in the 1990s. In the Operator Algebras universe the community has been studying the impact on the associated graph  $C^*$ -algebras with the aim of completely classifying different levels of rigidity up to graph moves.

In this talk we will present how these questions elevate to the realm of  $C^*$ -correspondences and the impact of SSE of SE on their associated Cuntz-Pimsner algebras, surveying previous work of Muhly-Solel (2000) and Muhly-Pask-Tomforde (2008). Our main tool is the Pimsner dilation of a  $C^*$ -correspondence to its minimal essential Hilbert bimodule.

This is joint work with Elias Katsoulis and also with George Eleftherakis and Elias Katsoulis.

*Δείτε και τη σελίδα του σεμιναρίου:* <http://users.uoa.gr/~akatavol/anak1920.html>