Classification of Floyd-Auslander systems

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Floyd gave a first example of a minimal non-homogeneous dynamical system in [2]. Later Auslander provided a related geometrical construction in [1]. This construction was generalized in [3] by Haddad and Johnson. Floyd-Auslander systems form a class of minimal systems on cantoroids with a nice geometric structure.

Despite the fact that Floyd-Auslander systems are relatively well understood, not much is known about their classification with respect to topological conjugacy. In the talk I will present new results related to this problem. Floyd-Auslander systems are strongly associated with adding machines being their almost one-one extensions. Adding machines play a crucial role in proving the main results and I will mention also new results concerning conjugacies of adding machines.

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References

[1] Auslander, J.: *Mean-L-Stable systems.* Illinois Journal of Mathematics. **3** (1959) 566–579.

[2] Floyd, E. E.: *A non-homogeneous minimal set.* Bulletin of the American Mathematical Society. **55** (1949) 957–960.

[3] Haddad, K. N., Johnson, A. S. A.: *Auslander systems.* Proceedings of the American Mathematical Society. **125** (1997) 2161-2170.