Topology
Seminar

What is symmetric homology?

Zbigniew Fiedorowicz
The Ohio State University

Abstract: We outline the general development of a theory of symmetric homology of algebras, an analog of cyclic homology where the cyclic groups are replaced by symmetric groups. This theory is developed using the framework of crossed simplicial groups and the homological algebra of module-valued functors. The symmetric homology of group algebras is related to stable homotopy theory. Two spectral sequences for computing symmetric homology are constructed. The E_1 term of one of these relates to a new class of geometric complexes for Coxeter groups. Many open questions remain.

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Mathematics and Science Center: W303

Mathematics and Computer Science
Emory University