

# On product of generators in finite transformation semigroups

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**Abstract:** The study of generating elements in finite semigroups of mappings was motivated by the work of John M. Howie in 1966 in which he proved that the singular part of the semigroup of all self mappings of a set into itself is generated its idempotent elements. This led to many interesting and important combinatorial questions in the theory of semigroups of transformations. In this talk, we present a survey of the works done in this direction concerning product of generator in finite semigroups partial, full and partial one-one transformations.

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