Andreas Zastrow, *University of Gdansk, Poland*

Fundamental groups of spaces
that are not homotopically Hausdorff

In attempts to generalize the classical notion of covering spaces to spaces that are not semilocally simply connected, the failure of the property "homotopically Hausdorff" has turned out to be a crucial obstruction. The probably oldest example for a space where this property fails is Griffiths' space from the fifties. The Harmonic Archipelago of Bogley and Sieradski is another example which has the additional nice property that a non-trivial image of it sits in every space that is not homotopically Hausdorff. In a joint research project with Oleg Bogopolski (Novosibirsk) we investigated fundamental groups of such spaces.

By a theorem of Shelah, Peano Continua are known to have either finitely generated or uncountable fundamental group. Cannon and Conner conjectered 10 years ago already, that those Peano Continua which are not homotopically Hausdorff can only have uncountable fundamental group. The talk might also explain, how this conjecture by joint research efforts finally could be confirmed.