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Fixed Points of Homeomorphisms of Knaster Continua

J. Aarts and R. Fokkink proved that every homeomorphism of the standard (dyadic) Knaster continuum has two fixed points. This answered in the affirmative a question asked by W. Mahavier. In this paper we show that for generalized Knaster continua defined by an arbitrary sequence of primes, this result may be false. On the other hand, there are many circumstances where homeomorphisms on generalized Knaster continua do have more than one fixed point. In certain cases, one can give a lower bound to the number of fixed points of a homeomorphism. Very often this lower bound is in fact very large.

We also discuss a generalization of Knaster continua defined for dimensions greater than one. We show that some of the properties of Knaster continua hold for these generalized examples.

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