

# A functorial approach to monomorphism categories for species

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We investigate abstract versions of the monomorphism category as studied by Ringel and Schmidmeier. We prove that analogues of the kernel and cokernel functor send almost split sequences over the path algebra and the preprojective algebra to split or almost split sequences in the monomorphism category. This is based on the joint work with Julian Külshammer, Chrysostomos Psaroudakis and Sondre Kvamme.