

Integer Sequences Arising From Auslander-Reiten Quivers of Some Hereditary Artin Algebras

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Abstract

In [5] Ringel introduces *Dynkin functions* as a tool to investigate combinatorial properties of hereditary artin algebras. A Dynkin function associates a real number, a set, or a sequence to a Dynkin diagram, if Λ denotes a hereditary artin algebra associated to a Dynkin diagram Δ_n then $r(\Delta_n)$ the number of indecomposable modules, $a(\Delta_n)$ the number of antichains in $\text{mod } \Lambda$, and $t_n(\Delta_n)$ the number of tilting modules are Dynkin functions. In this talk, we use lattice paths connecting points of some suitable posets to investigate the number of sections $S(\Delta_n)$ in the Auslander-Reiten quiver of some algebras as a Dynkin function.

Bibliography

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