

The Average Hull Dimension of Cyclic Codes over Finite non Chain Rings

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a joint work with

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Abstract

In this work, we study the hull of cyclic codes over a finite non chain ring $\mathcal{R} = F_q + vF_q$, where $v^2 = v$. The main tool for the characterization of the hull of cyclic codes is given in term of their generator polynomials. We also establish the average q -dimension of the hull of cyclic codes of length n over \mathcal{R} . The formula for the average q -dimension of the hull of cyclic codes of length n over \mathcal{R} is derived.

Keywords

Hulls, Cyclic codes, Average q -dimension.

References

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