

REMARKS ON ESSENTIALLY MINIMAL CLONES

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For a non-empty set A , a clone C on A is *essentially minimal* if C is not a minimal clone but is minimal among all clones on A containing essential functions. For an essentially minimal clone C the *rank* of C is the least arity of the generators of C . For a finite set A , the rank of any essentially minimal clone on A is shown to be no greater than $|A|$. For a three-element set E_3 , all conjugate classes of essentially minimal clones on E_3 whose rank is 2 are determined. Some examples of essentially minimal clones on E_3 whose rank is 3 will also be presented.

This is a joint work with Ivo G. Rosenberg (Montréal).

REFERENCES

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