REMARKS ON INDUCTION OF G-ALGEBRAS AND SKEW GROUP ALGEBRAS

TIBERIU COCONEŢ

Abstract. In the first section we give a pointed group version of a result of Dade on Green theory. Related to this, in the second section we consider an H-algebra B, where H is a subgroup of a finite group G. For the skew group algebra B * H, we prove that its induction to G in the sense of Puig is isomorphic to the skew group algebra over G of the induction, in the sense of Turull, of B to G.

MSC 2000. 20C20, 16S35.

Key words. Pointed group, defect pointed group, *G*-interior algebra, induction of *G*-algebras.

REFERENCES

- [1] DADE, E.C., Block extensions, Illinois J. Math., 17 (1973), 198–272.
- [2] KLASEN, W. and SCHMID, P., Induced crossed products. Comm. Algebra, 18 (1990), 2573–2586.
- [3] MARCUS, A., Derived invariance of Clifford classes, J. Group Theory, 12 (2009), 83-94.
- [4] THÉVENAZ, J., G-Algebras and Modular Representation Theory, Clarendon Press, Oxford
- 1995.
- [5] TURULL, A., Reduction theorems for Clifford classes, J. Group Theory, 9 (2006), 27–47.

Received November 18, 2008 Accepted December 5, 2008 "Babeş-Bolyai" University Faculty of Mathematics and Computer Science Str. Mihail Kogălniceanu nr. 1 400084 Cluj-Napoca, România E-mail: coconet.tibi@gmail.com

The author acknowledges the support of the Romanian PN-II-IDEI-PCE-2007-1 project ID_532, contract no. 29/01.10.2007.