Structured interference-mitigation in two-hop networks – CORRECTION

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In August 2011, at the BIRS workshop on Algebraic Structure in Network Information Theory, the authors realized that Theorem 1 for Model 1 cannot be achieved using the presented techniques. In particular, the number of lists is NOT equal to the number of finer lattice codewords 2^{nR_q}, and as such the scheme collapses for Model 1. This error may be found on the bottom of column 1 / top of column 2 on page 4. Thus, the Decode-and-Forward rate of Theorem 1, for Model 1, is not known to be achievable. It still holds for Model 2. An alternative Compress-and-Forward based scheme for the same model was presented in [1].

REFERENCES

[1] Y. Song and N. Devroye, "A lattice Compress-and-Forward strategy for canceling known interference in Gaussian multi-hop channels," in *Proc. Conf. on Inf. Sci. and Sys. (CISS)*, Mar. 2011.