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## Bigraded Cohen-Macaulay Rees algebras

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Multi-Rees algebras were introduced by Rees for investigation of joint reductions and mixed multiplicities. In this talk we address the problem of Cohen-Macaulay property of multi-Rees algebras. We review some of the known results and then focus on the Cohen-Macaulay property of bigraded Rees algebra of zerodimensional ideals in two dimensional Cohen-Macaulay local rings. The picture is complete in dimension two and almost nothing is known in higher dimension.