

FAST COMPUTING OF THE MOORE-PENROSE INVERSE MATRIX*

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Abstract. In this article a fast computational method is provided in order to calculate the Moore-Penrose inverse of full rank $m \times n$ matrices and of square matrices with at least one zero row or column. Sufficient conditions are also given for special type products of square matrices so that the reverse order law for the Moore-Penrose inverse is satisfied.

Key words. Moore-Penrose inverse matrix, Computational methods, Tensor-product matrix, Reverse order law.

AMS subject classifications. 15A09.

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