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POINTWISE CONVERGENCE AND CESÀRO SUMMABILITY OF DOUBLE ORTHOGONAL SERIES

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Abstract. Let $(X,\mathscr{F},\mu)$ be a positive measure space and $\{\phi_{j,k}(x) : j,k = 1,2,\dots\}$ be a double orthonormal system of real-valued functions on X. We extend four previous results of Borgen [2] and Tandori [4, 5] from single to double orthogonal series.

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