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A RIGIDITY THEOREM OF SPACE-LIKE HYPERSURFACES IN THE DE SITTER SPACE

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Abstract

M^n is a compact space-like hypersurfaces in the de Sitter space $S_1^{n+1}(1)$, and its Ricci curvature tensor is a Codazzi tensor. In this paper, we give a rigidity theorem for this kind of hypersurfaces in a de sitter space which shows that such a hypersurface is isotemic to a sphere.

Key Words : *Space-like hypersurfaces, de Sitter space, Ricci curvature, Codazzi tensor*

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