Pituitary Hypophysits in Langerhans Cell Histiocytosis

Joseph Junewick, MD FACR

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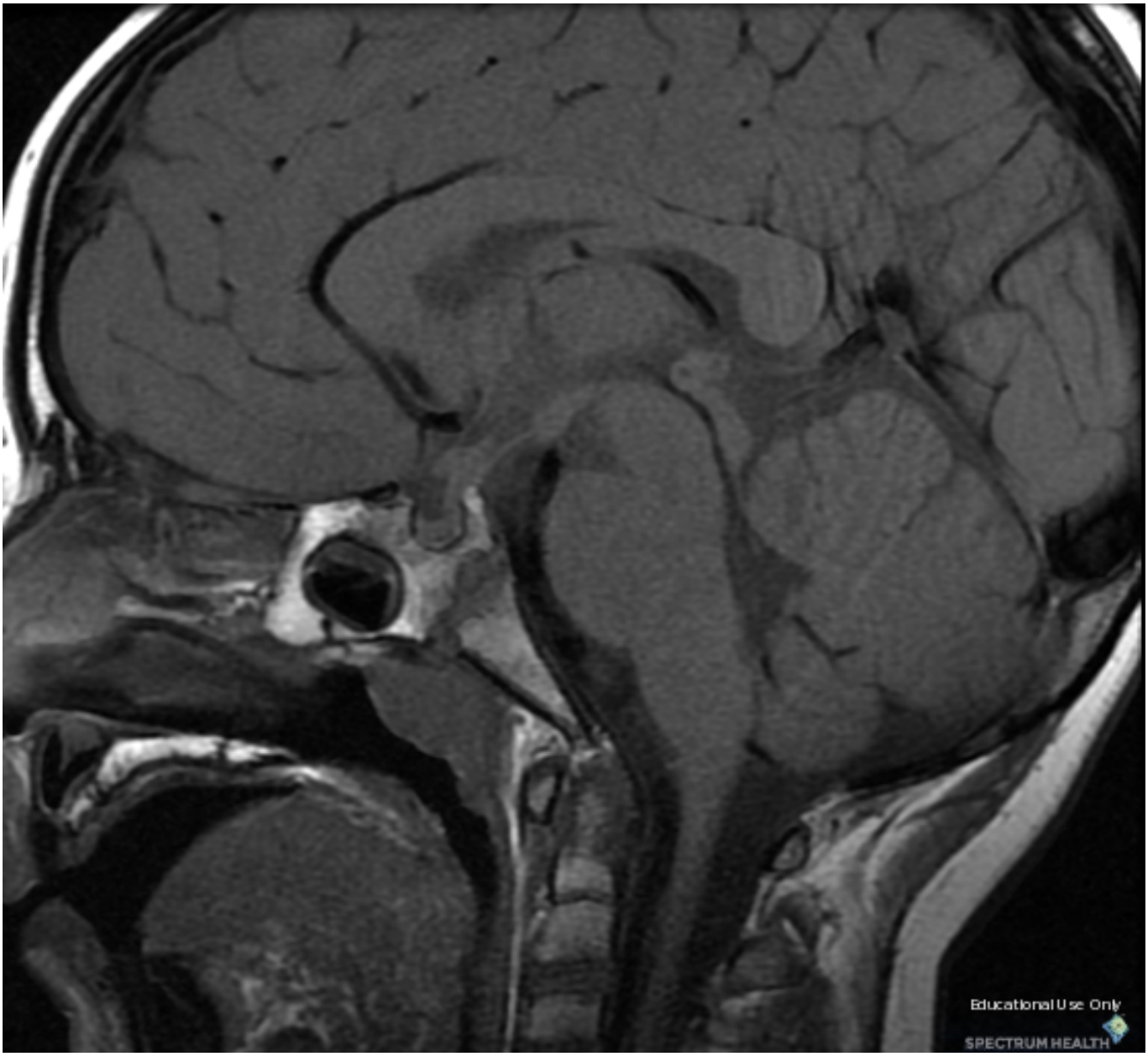
History
Child with polydipsia.

Diagnosis
Pituitary Apophysitis Langerhans Cell Histiocytosis

Discussion
The hypothalamic-pituitary system is involved input to half of pediatric LCH, particularly in those with craniofacial or systemic disease. Central diabetes insidious may antedate the diagnosis of LCH and usually develops within a year of diagnosis. Pathogenesis may relate to an autoimmune process that involves antibodies reacting against vasopressin, LCH-infiltration and/or scarring in the hypothalamic pituitary area. On MR, absent posterior pituitary T1 bright spot, thickening of the pituitary stalk (>3.5 mm) and hyper enhancement of the stalk and/or infundibulum/hypothalamic eminence are seen with neurohypophyseal dysfunction.

Findings
MR-Sagittal high resolution pre and post gadolinium T1 images of the sella turcica show loss of normal T1 hyper intensity of the neurohypophysis and diffuse hyper enhancement of the pituitary stalk and infundibulum with focal thickening.

Reference
Machine M, Arico M, Genovese E, et al. MR of the hypothalamic-pituitary axis in Langerhans cell histiocytosis. AJNR (1992); 13: 1365-1371.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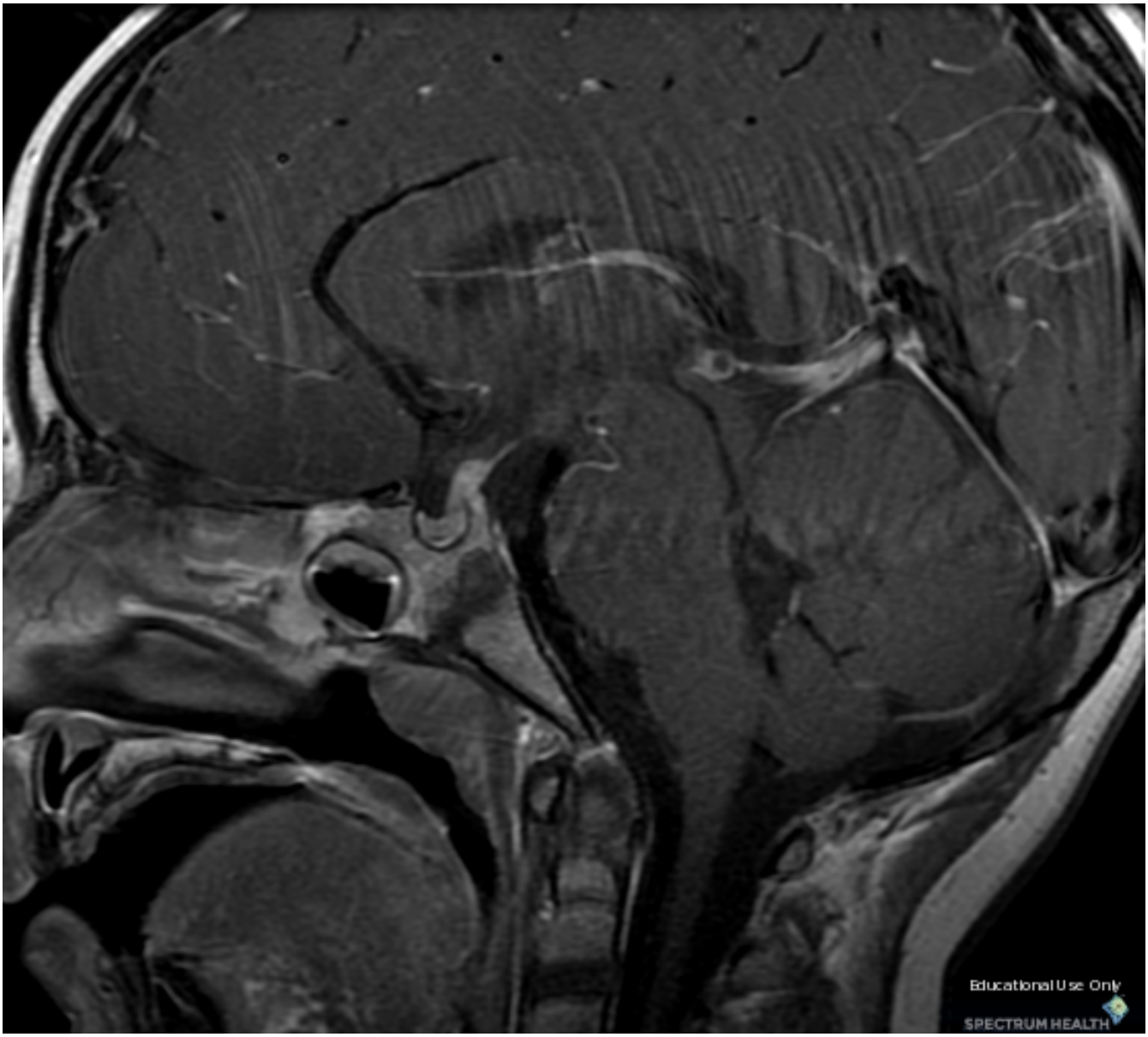
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