

Guideline Evidence

Guideline Topic: Management of Stroke in Pediatric Sickle Cell Patients

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Search Criteria: pediatric stroke, sickle cell disease, sickle cell emergencies

Management of Stroke in Infants and Children AHA scientific statement
(Stroke.2008;2644-2691.)

Key Guidelines (Dates) Pediatric stroke. Emerg Med Clin North Am. 2012;30:805–828.

#	Recommendation	Source	Classification	Level of Evidence
1	Acute management of ischemic stroke resulting from SCD should include optimal hydration, correction of hypoxemia, and correction of systemic hypotension.	Management of Stroke in Infants and Children AHA scientific statement (Stroke.2008;2644-2691.)	Class I	Level C Recommendation
2	In people with SCD who present with severe headache, altered level of consciousness, seizures, speech problems, and/or paralysis, evaluate for acute stroke by seeking neurologic consultation and considering urgent head computerized tomography (CT) scan or magnetic resonance imaging (MRI) and magnetic resonance angiography (MRA) if available.	Evidence Based Medicine in Sickle Cell Disease, Expert Panel Report 2014 Freundlich CL, Cervantes-Arslanian AM, Dorfman DH. Pediatric stroke. Emerg Med Clin North Am. 2012;30:805–828.	Class II	Level C Recommendation
3	For acute cerebral infarction, exchange transfusion designed to reduce sickle hemoglobin to <30% total hemoglobin is reasonable.	Management of Stroke in Infants and Children AHA scientific statement (Stroke.2008;2644-2691.) Evidence Based Medicine in Sickle Cell Disease, Expert Panel Report 2014	Class IIa	Level C Recommendation
4	In children with SCD and an ICH, it is reasonable to evaluate for a structural vascular lesion	Management of Stroke in Infants and Children AHA scientific statement (Stroke.2008;2644-2691.)	Class IIa	Level B Recommendation
5	Supportive measures for AIS should include control of fever, maintenance of normal oxygenation and normalization of glucose levels.	Management of Stroke in Infants and Children AHA scientific statement (Stroke.2008;2644-2691.)	Class I	Level C Recommendation
6	In the absence of additional data confirming it's safety and efficacy, hypothermia should not be used in children with stroke.	Management of Stroke in Infants and Children AHA scientific statement (Stroke.2008;2644-2691.) Freundlich CL, Cervantes-Arslanian AM, Dorfman DH. Pediatric stroke. Emerg Med Clin North Am. 2012;30:805–828.	Class III	Level C Recommendation
7	In the absence of clinical or electrographic seizures, prophylactic administration of antiepileptic medications in children with ischemic stroke is not necessary.	Management of Stroke in Infants and Children AHA scientific statement (Stroke.2008;2644-2691.)	Class III	Level C Recommendation
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CPQE Guideline Evidence, cont.

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