Retrospective study (2008-2018):
- 103 term neonates were enrolled.
- 80 received phenobarbitone & 23 phenytoin.

Outcome:
- Time to achieve seizure cessation, requirement of second line AED.

Long term outcome assessment:
- At 18-24 months with Denver and Bayley's scale

Key Message
In this retrospective observational study efficacy of phenobarbitone & phenytoin was similar (45% vs 52%) for acute seizures control, however at 18-24 months significantly higher number of infants in phenobarbitone arm had mod to severe developmental delay (30% vs 5%, p= 0.02).

Conclusion:
Fosphenytoin & phenobarbitone were equally efficacious for acute neonatal seizure control. Fosphenytoin had the potential for significantly better neurodevelopmental outcomes at 18-24 months of age.

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"Choice of antiepileptic agent for neonatal seizures should take consideration about long-term developmental outcome”
Dr Renu Suthar, DM (Ped Neuro) Associate professor Pediatric Neurology Unit Post Graduate Institute of Medical Education and Research (PGIMER), Chandigarh, India


Reference

Neonatal Seizures: Choice of 1st Line Antiepileptic (Updated)

ACADEMIC P.E.A.R.L.S
Pediatric Evidence And Research Learning Snippet

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