

DRUG PROFILE

ANTICOAGULANTS IN PEDIATRICS

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Abstract: *The incidence of provoked and unprovoked thromboembolism in children is increasing and hence the use of anticoagulants. There are many oral and parenteral anticoagulants in the market. Many of the newer agents are promising but pediatric data on safety and efficacy are scarce. The anticoagulants can be divided into the older multitargeted agents (heparin, low-molecular-weight heparin and warfarin) and the newer targeted agents (argatroban, bivalirudin and fondaparinux). The newer targeted anticoagulants have properties that may make them more attractive for use in specific clinical situations.*

Keywords: *Anticoagulants, Warfarin, Heparin, Lowmolecular weight heparin, Pediatrics*

Points to Remember

- *All the currently used multi-targeted anticoagulants, heparin, LMWH, and VKAs have significant limitations and will most likely eventually be replaced by a wide variety of targeted anticoagulants.*
- *Heparin utilization in pediatrics is limited by many factors and the most important ones are heparin induced thrombocytopenia and anaphylaxis. Low molecular weight heparin appears to be an effective and safe alternative treatment.*
- *Direct thrombin inhibitors (DTI) is a promising class over the other anticoagulants since it offers potential advantages.*
- *Most of the recommendations regarding the use of newer anticoagulants in children have been extrapolated from the adult literature, with very few randomized trials performed in the pediatric population.*

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