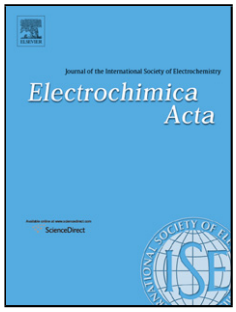


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# One-step electrochemical synthesis of three-dimensional graphene foam loaded nickel−cobalt hydroxides nanoflakes and its electrochemical properties

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Highlights

- Three-dimensional porous $Ni_xCo_{2x}(OH)_{6x}$/graphene nanohybrid foam has been prepared by a facile and green one-step electrochemical method.
- $Ni_xCo_{2x}(OH)_{6x}$/graphene foam exhibits better structural integration of optimal component and improved electrochemical properties.
- $Ni_xCo_{2x}(OH)_{6x}$/graphene foam servers as binder-free electrode for supercapacitor.
- $Ni_xCo_{2x}(OH)_{6x}$/graphene foam has been used for nonenzymatic $H_2O_2$ biosensing.

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