## **Supporting Information**

## Porous Co-Ru@C Shell as Bifunctional Catalyst for Lithium-Oxygen Batteries

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Element	Weight/%	Atomic/%
С	26.75	73.32
Со	12.07	6.74

Table S1. Relative element contents of Co-Ru@C shell from EDS (TEM)

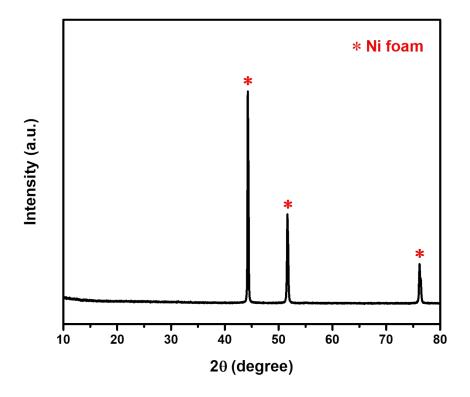


Figure S1. XRD patterns of Co-Ru@C shell electrodes after 1<sup>st</sup> discharge.