2

Question 27 (2 marks)

The diagram shows a particular cell with relevant half equations.

Insulation

KOH electrolyte parte

HgO, Hg & water parte

(atheole.

$$\operatorname{Zn}(s) + 2\operatorname{OH}^-(aq) \rightarrow \operatorname{ZnO}(s) + \operatorname{H}_2\operatorname{O}(l) + 2\operatorname{e}^-$$

 $\operatorname{HgO}(s) + \operatorname{H}_2\operatorname{O}(l) + 2\operatorname{e}^- \rightarrow \operatorname{Hg}(l) + 2\operatorname{OH}^-(aq)$

Identify the anode, cathode and electrolyte for this cell.

Button Ceu:	
Zinc Anode	
Merce, HgO cathode	
<i>J</i>	