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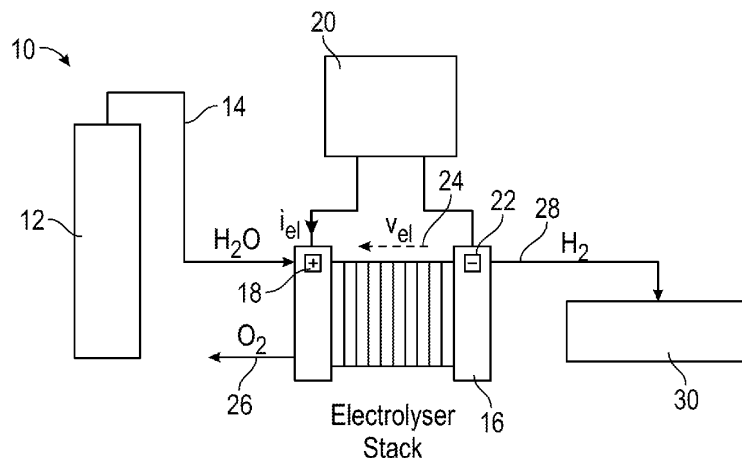


FIG. 1

(57) Abstract: An electrolyser system and method of electrode manufacture. The electrolyser system may comprise a first vessel in communication with an electrolyser stack, a power supply, an electrode, a separator, a membrane, and a second vessel in communication with the electrolyser stack. The electrode may comprise a catalytic material and a micro-porous and/or nano-porous structure. The method of electrode manufacture may comprise providing a substrate, contacting the substrate with an acidic solution, applying an electric current to the substrate, simultaneously depositing a main material and supporting material comprising a scarifying material onto the substrate, and leaching the scarifying material.

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