

Determination of malachite green and leucomalachite green based on electrochemiluminescence of $\text{Ru}(\text{bpy})_3^{2+}$ at graphene oxide modified glassy carbon electrodes

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Supporting information

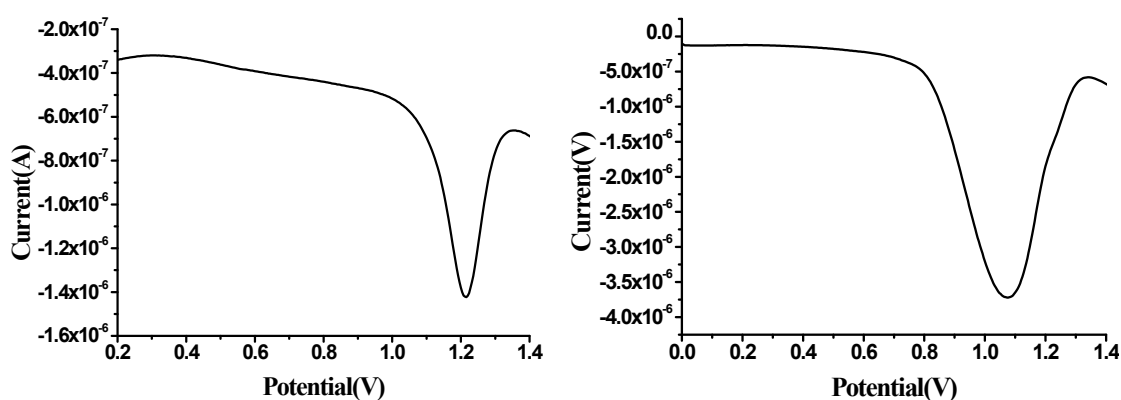


Fig. S1 DPV curves of $1.0 \times 10^{-4} \text{ mol} \cdot \text{L}^{-1} \text{ Ru}(\text{bpy})_3^{2+}$ in 0.1 M phosphate buffer (pH = 10) at GC(left) and GO-modified (right) electrodes, Scan rate: $25 \text{ mV} \cdot \text{s}^{-1}$.

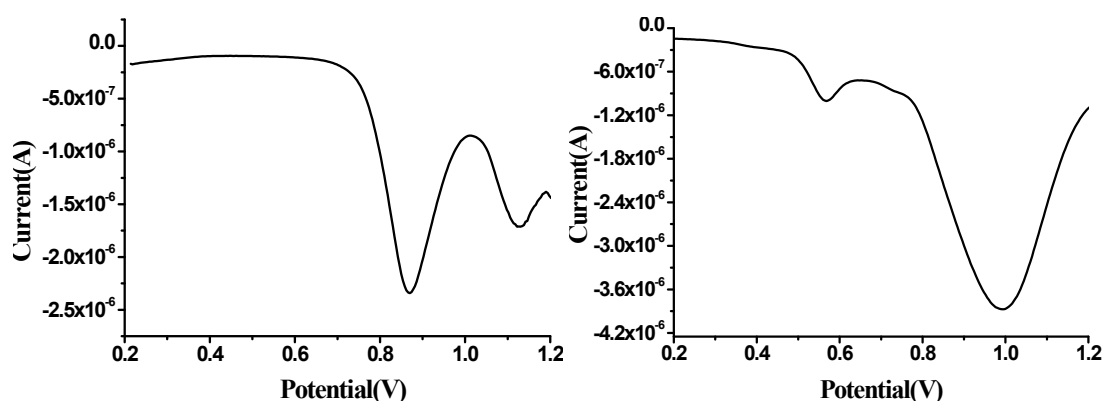


Fig. S2 DPV curves of $1.0 \times 10^{-12} \text{ mol} \cdot \text{L}^{-1}$ malachite green(MG) in 0.1 M phosphate buffer (pH = 10) at GC(left) and GO-modified(right)electrodes, Scan rate: $25 \text{ mV} \cdot \text{s}^{-1}$.

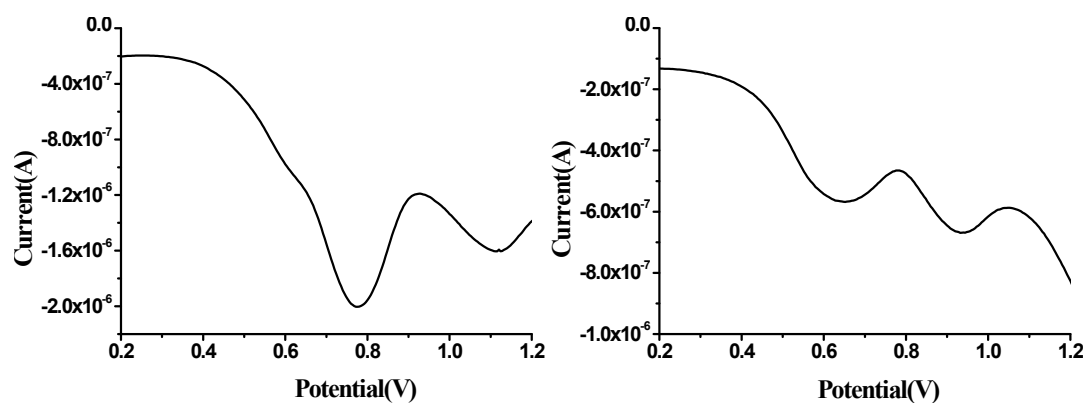


Fig. S3 DPV curves of $1.0 \times 10^{-12} \text{ mol} \cdot \text{L}^{-1}$ leucomalachite green (LMG) in 0.1 M phosphate buffer (pH = 10) at GC(left) and GO-modified(right) electrodes, Scan rate: $25 \text{ mV} \cdot \text{s}^{-1}$.

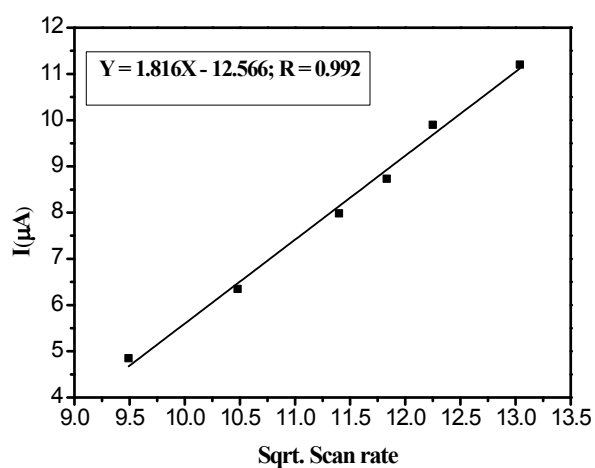


Fig. S4 Dependence of the plots of peak current vs. square root of scan rates of 90, 110, 130, 150, 170 and 190 $\text{mV} \cdot \text{s}^{-1}$ for $1.0 \times 10^{-4} \text{ mol} \cdot \text{L}^{-1} \text{ Ru}(\text{bpy})_3^{2+} + 1.0 \times 10^{-12} \text{ mol} \cdot \text{L}^{-1} \text{ MG}$ in 0.1 $\text{mol} \cdot \text{L}^{-1}$ phosphate buffer (pH = 10) at GO-modified GC electrodes.