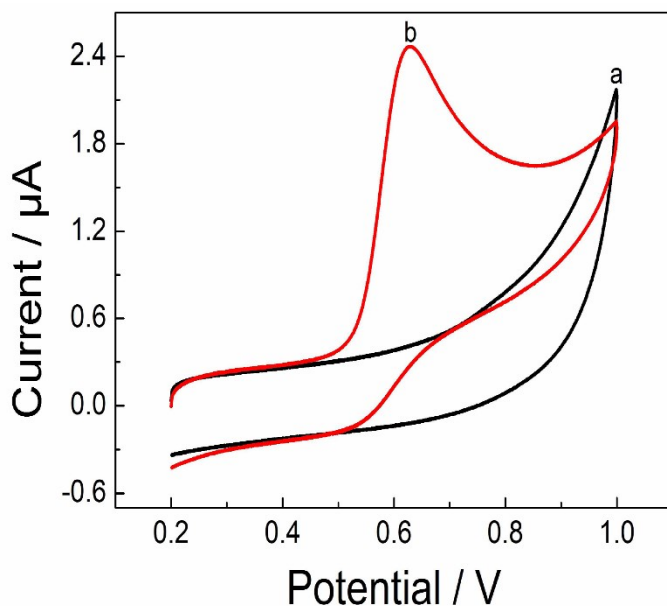
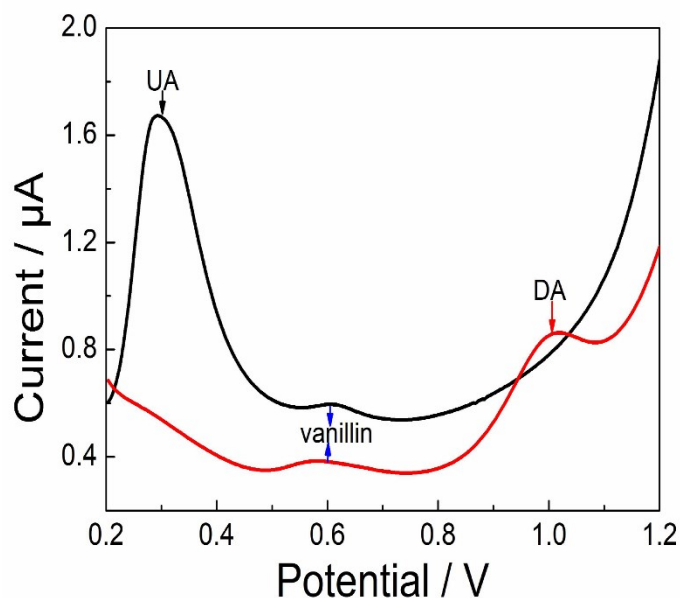


**Fig. S1** XPS data for FePc MOF: (A) survey scan; (B) Fe 2p spectrum. (C) XRD spectra of FePc MOF (black: experimental); (red: simulation).



**Fig. S2.** CV of without (a) and with vanillin (b) on FePc MOF/GCE.



**Fig. S3.** DPV of 1.5  $\mu\text{M}$  vanillin at FePc MOF/GCE when coexisting with 150  $\mu\text{M}$  UA and DA.

**Table S1.** Analytical results for the determination of vanillin in human serum.

Sample	Added ( $\mu\text{M}$ )	Found ( $\mu\text{M}$ )	Recovery(% , n=5)	RSD(%)
Serum	15	15.5	102.9	3.16

**Table S2.** Analytical results for the determination of vanillin in tablets.

Sample	Labeled amount (mg)	Found (mg)	Percentage of labeled amount (% , n = 5)	RSD (%)
Vanillin tablets	200	UV: 207	103.6	1.18
		EC: 204	102.3	3.92