Electronic Supplementary Material (ESI) for New Journal of Chemistry.

Supplement Information

A New Possible Way of Anthracycline Cytostatics Decontamination

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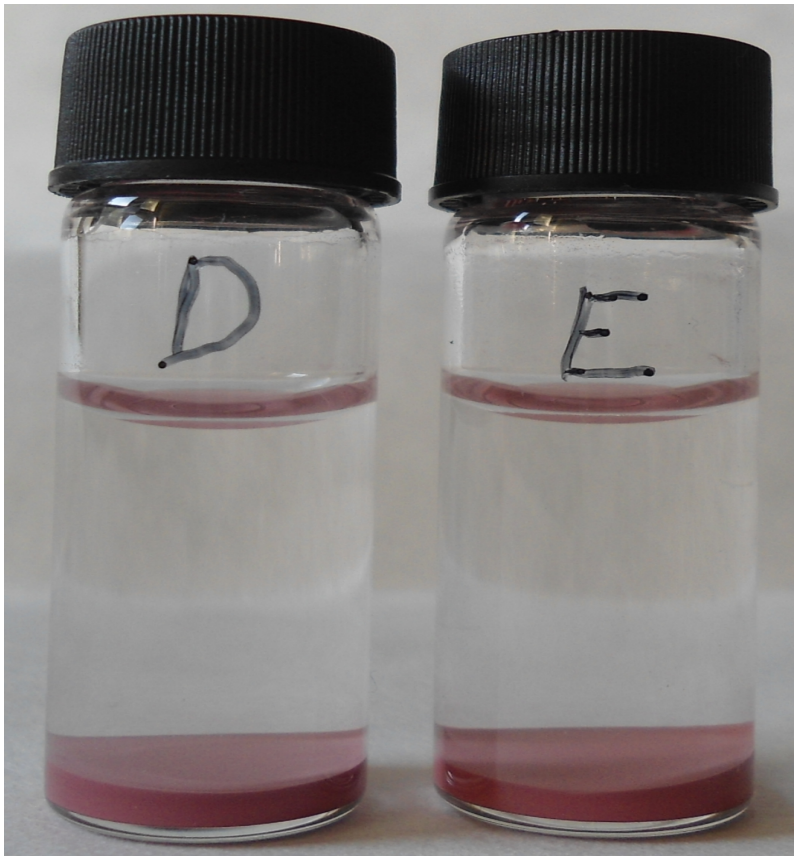

Figure S1. Sorption of the1mL solution of doxorubicin and epirubicin (2mg/mL) on the surface of 0.25g TiO_2 within 10 min.

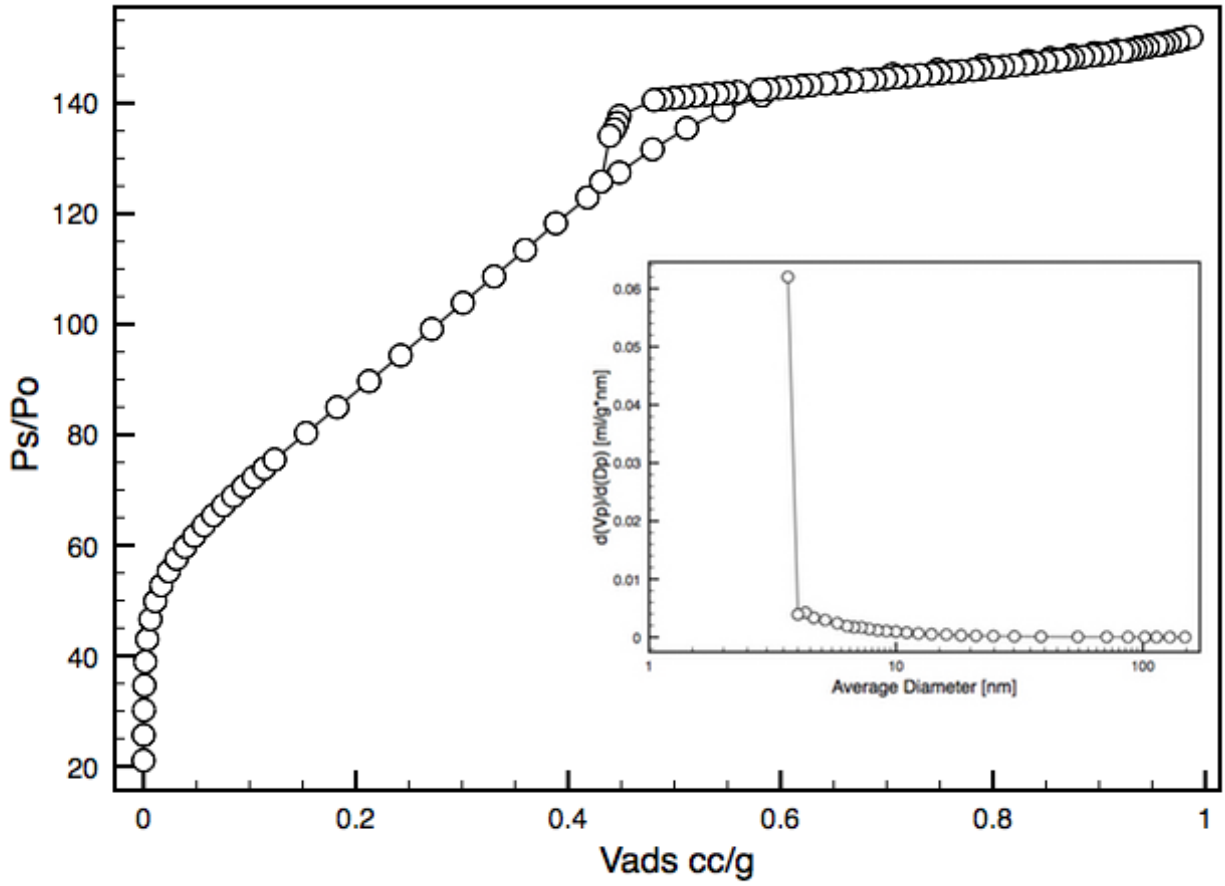

Figure S2. Nitrogen adsorption/desorption isotherm and inset is the pore volume distribution of the synthesized TiO2.

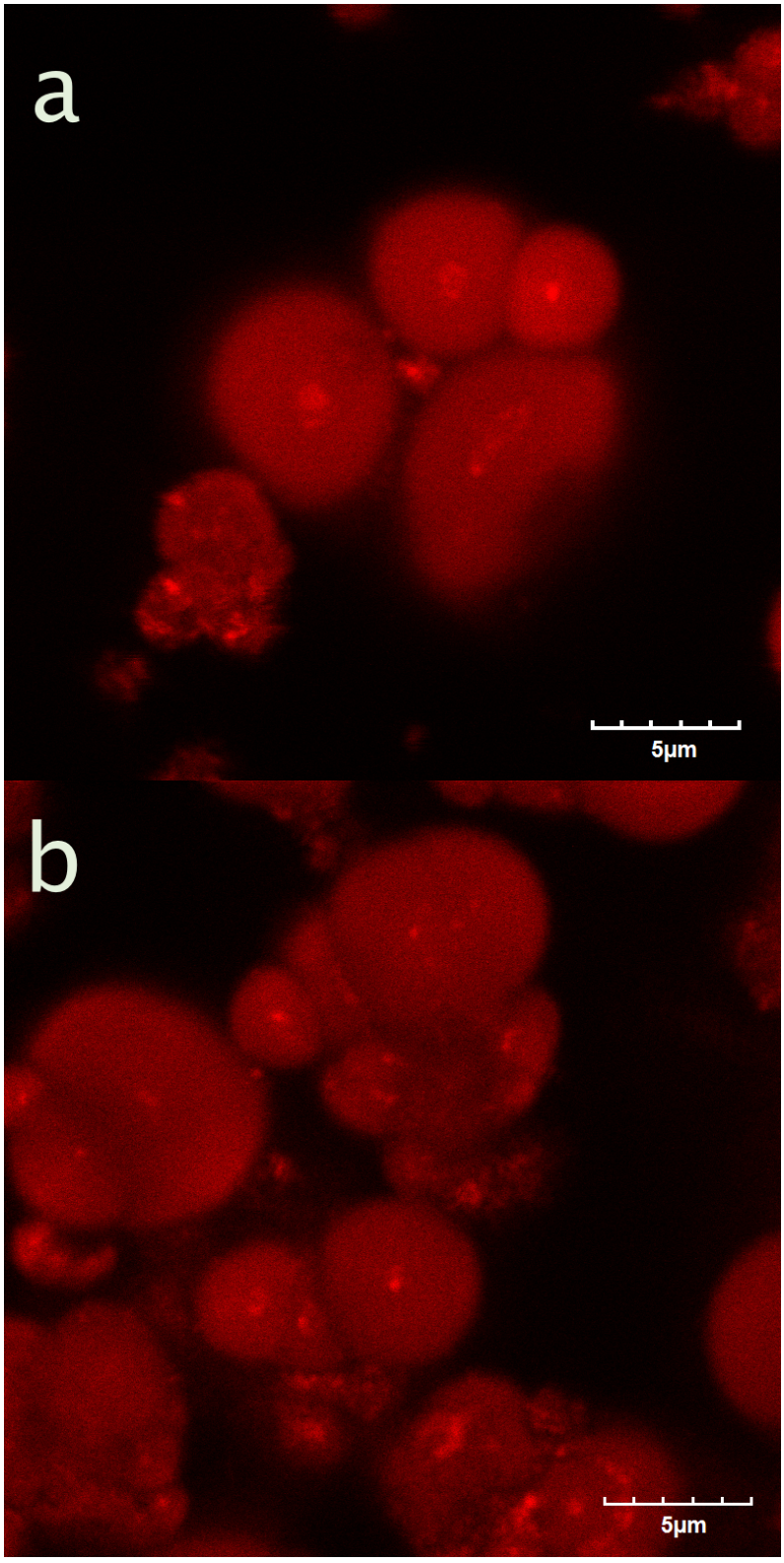

Figure S3. Fluorescence at 590 nm of a) doxorubicin and b) epirubicin on titania surface measured by scanning confocal microscope

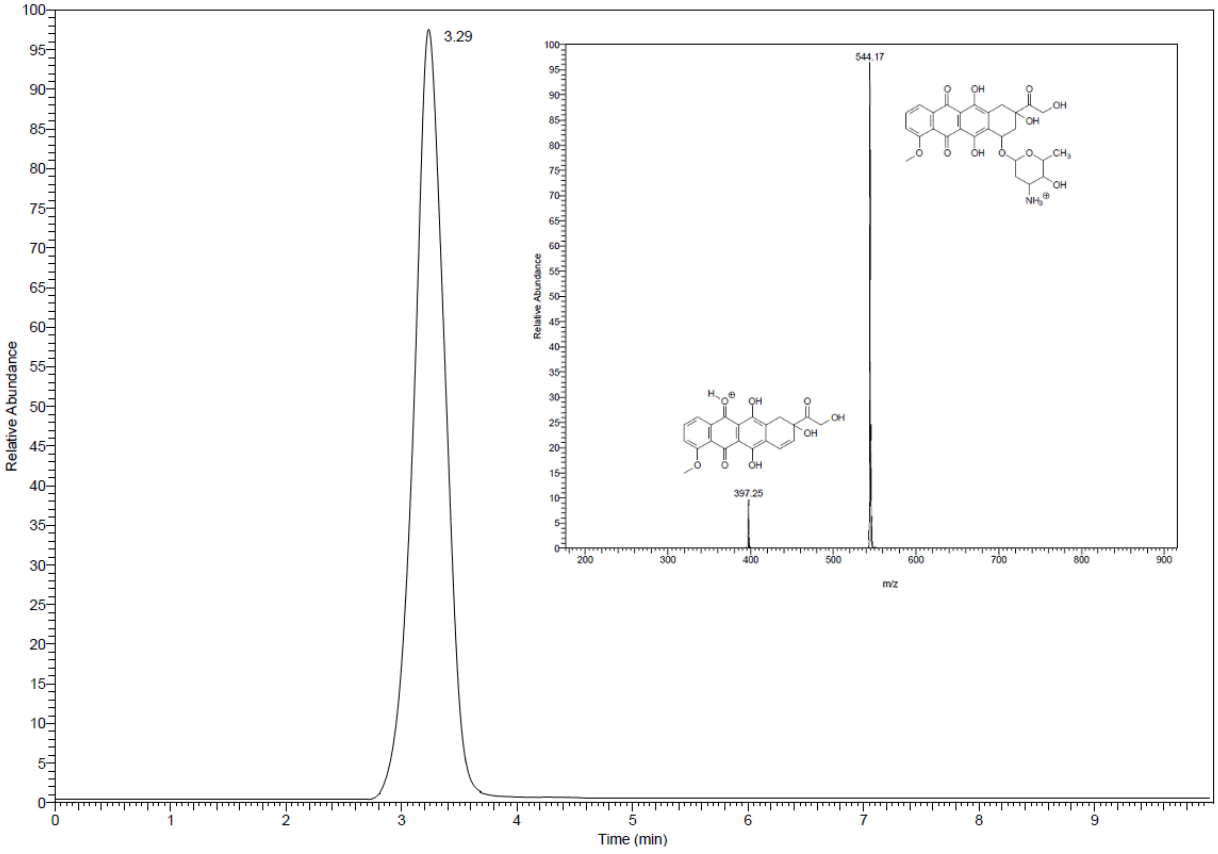

Figure S4. HPLC-MS chromatogram and mass spectra of doxorubicin

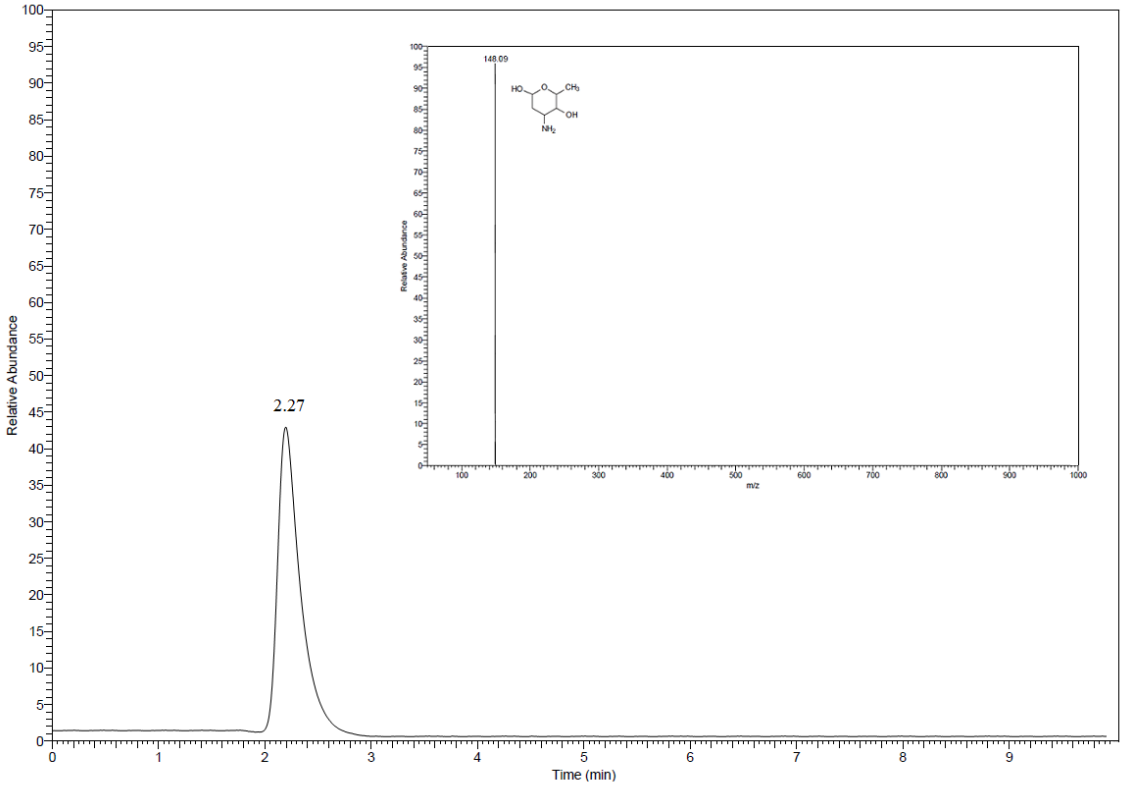

Figure S5. HPLC-MS chromatogram and mass spectra of doxorubicin after TiO2 sorption

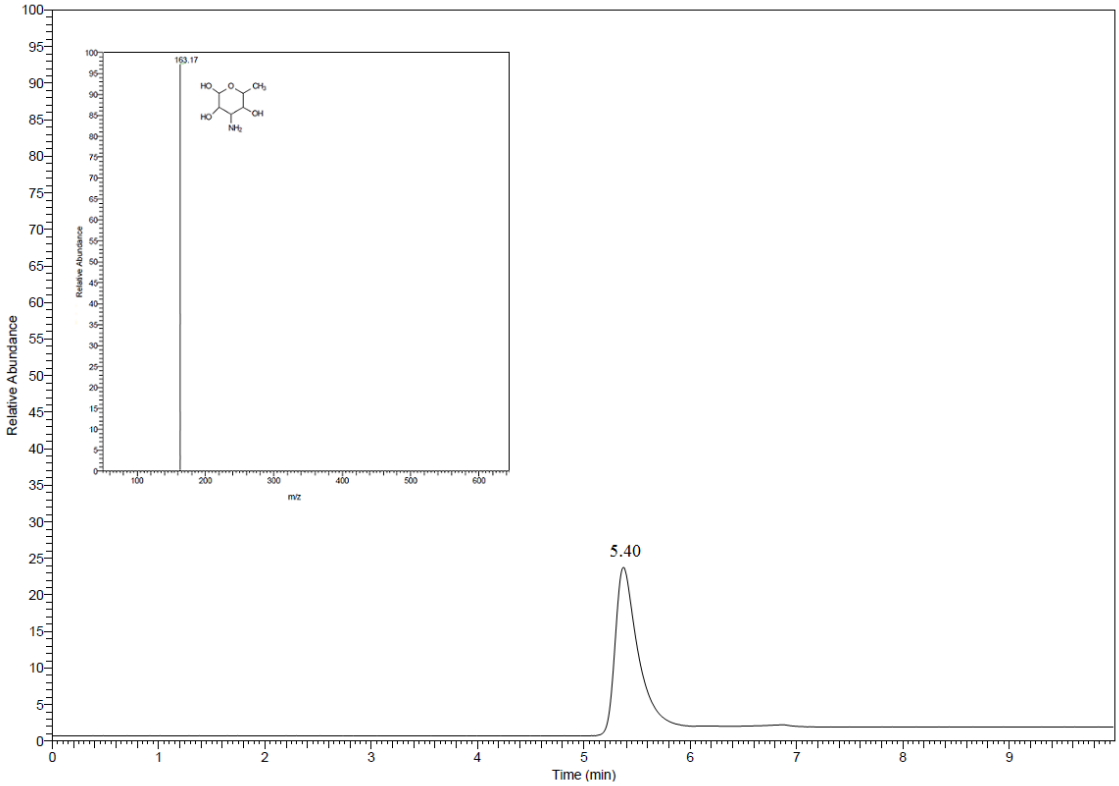

Figure S6. HPLC-MS chromatogram and mass spectra of doxorubicin after photodegradation on TiO2

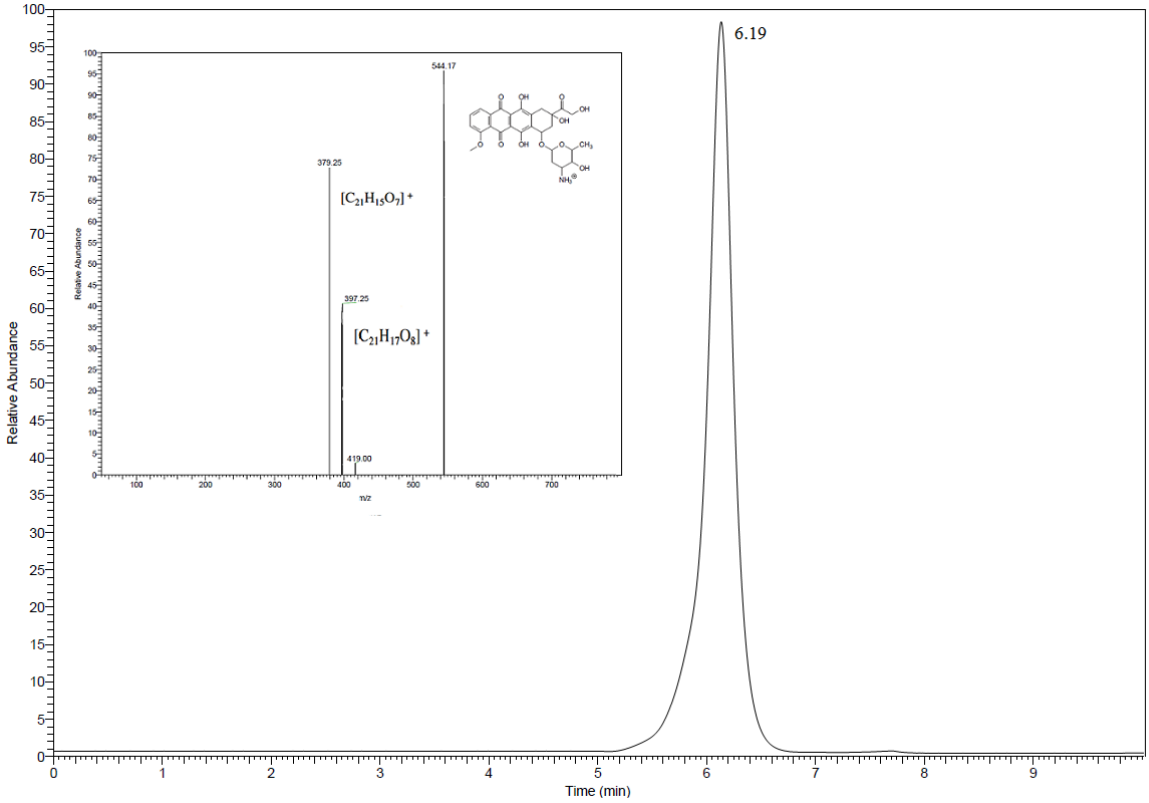

Figure S7. HPLC-MS chromatogram and mass spectra of epiorubicin

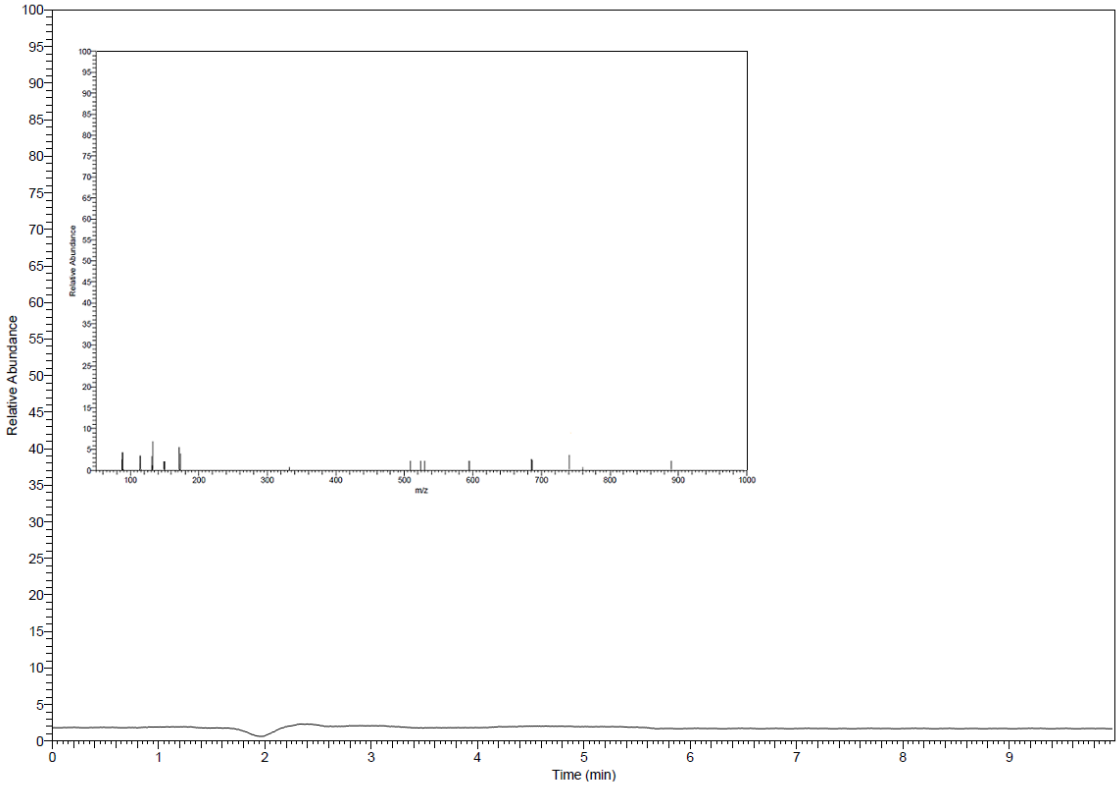

Figure S8. HPLC-MS chromatogram and mass spectra of epirubicin after TiO2 sorption

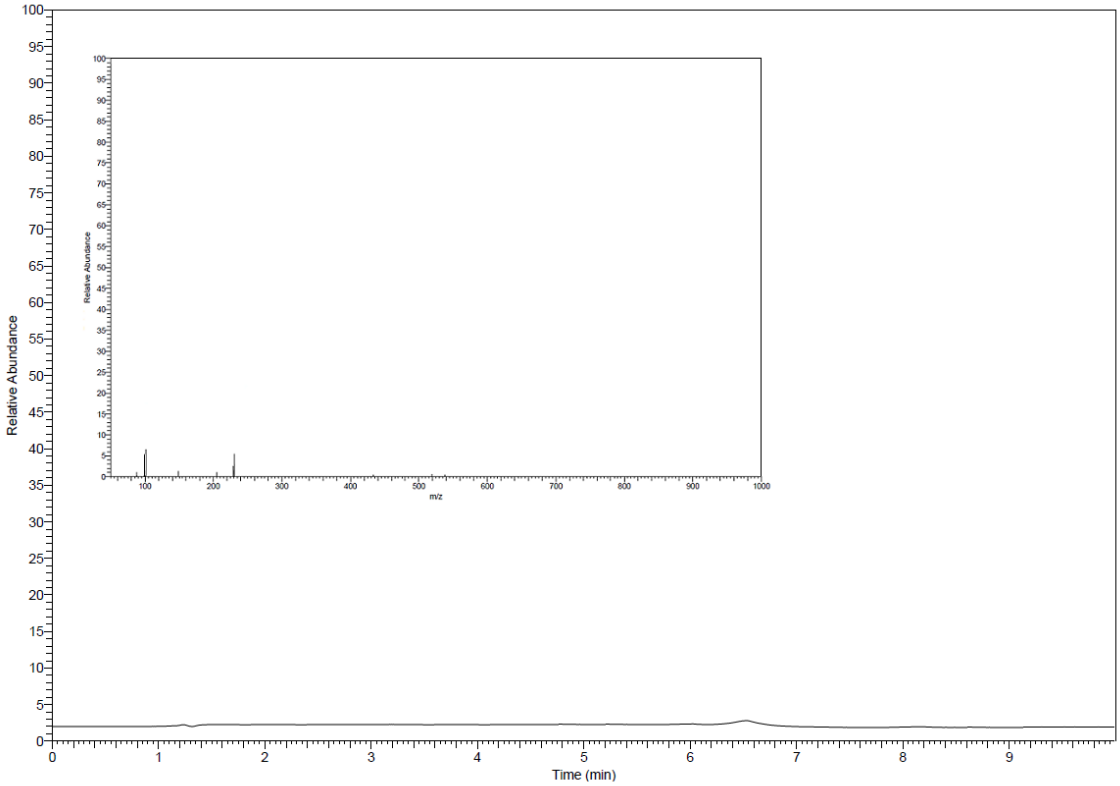

Figure S9. HPLC-MS chromatogram and mass spectra of epirubicin after photodegradation on TiO2

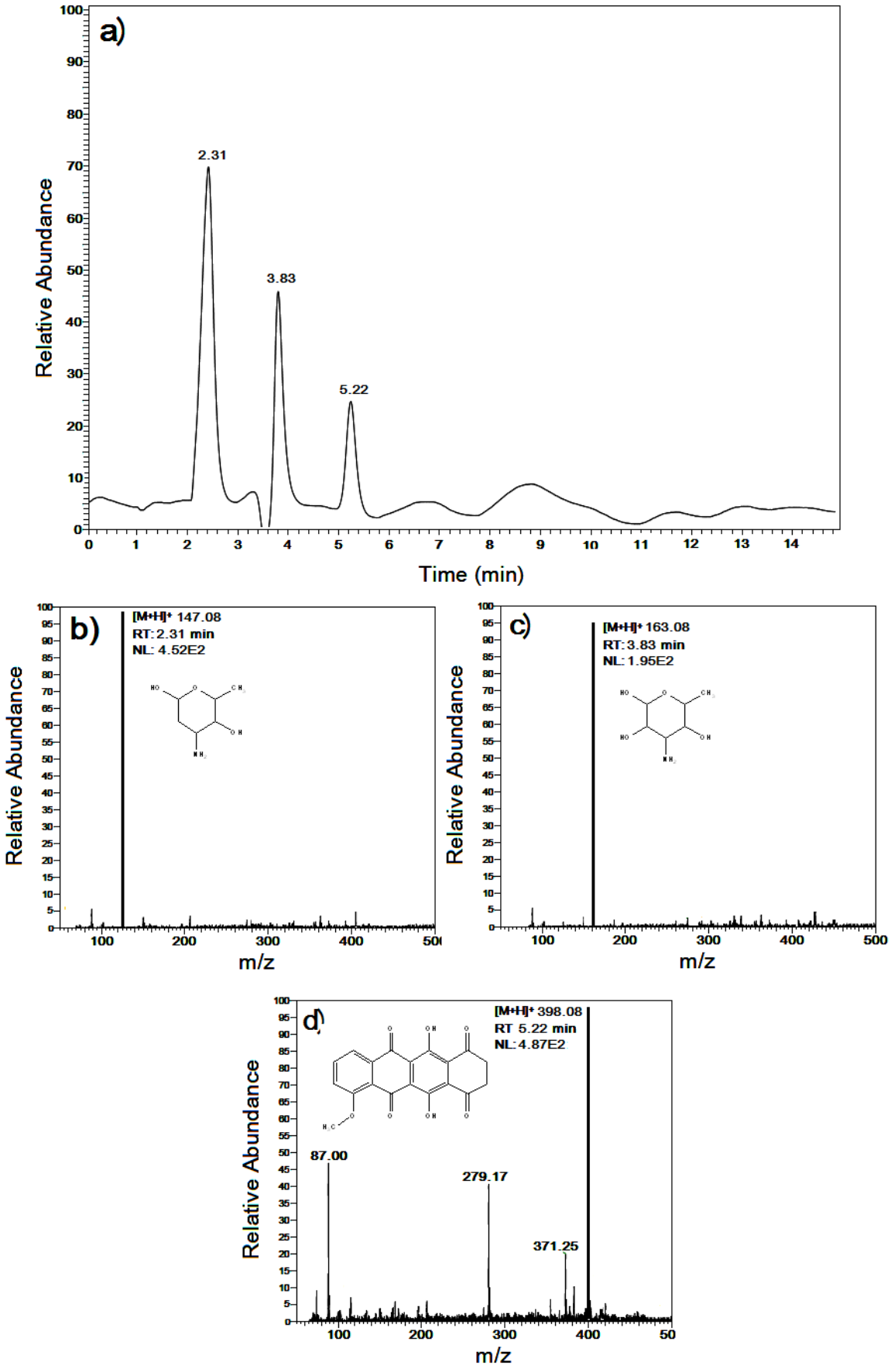

Figure S10.HPLC-MS chromatogram (a) and mass spectra of transformation products (b-d) of doxorubicin in sodium hypochlorite 10% NaClO agent.

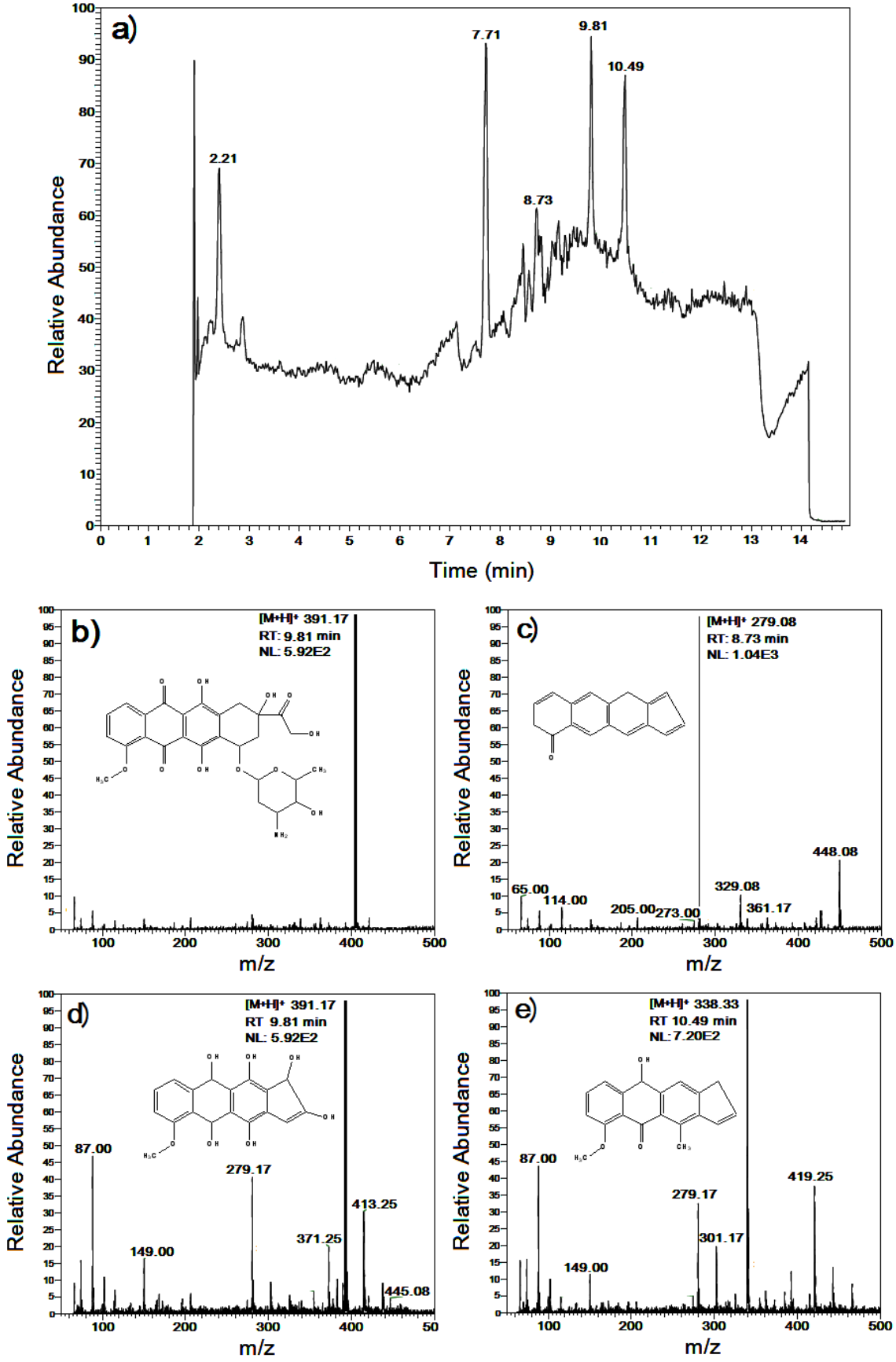

Figure S11. HPLC-MS chromatogram (a) and mass spectra of transformation products (b-e) of doxorubicin in sodium hydroxide NaOH (0.01 M) agent.