SUPPLEMENTARY INFORMATION

High desolvation temperature facilitates in ESI-source H/D exchange at non-labile sites of hydroxybenzoic acids and aromatic amino acids

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In-ESI source labeling

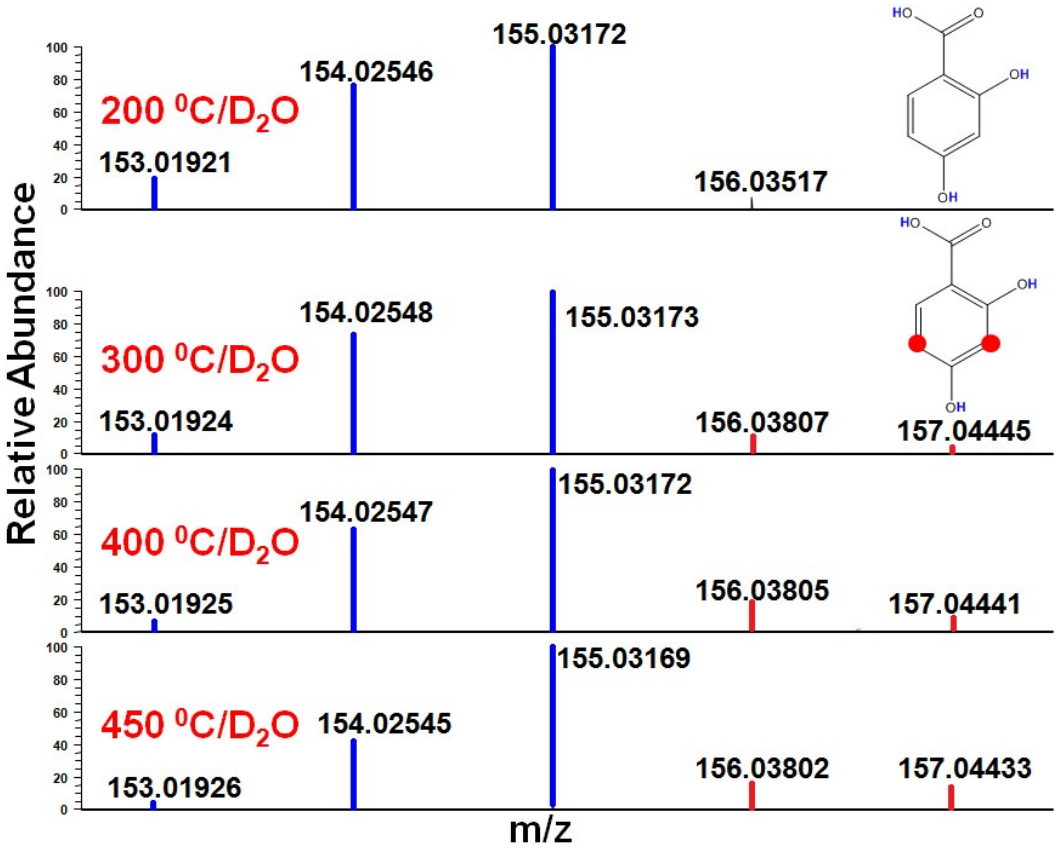

Fig. S1. In-ESI source H/D exchange series of DHB-2,4 at different temperatures of desolvation capillary: 200 ^{0}C (blue lines), 300, 400 and 450 ^{0}C (additional peaks are colored in red). Red dots in the structural formulas designate the feasible sites of deuteration in accordance with keto-enol tautomerism and mesomeric substituent effects in the aromatic ring.

^{2}H NMR spectroscopy

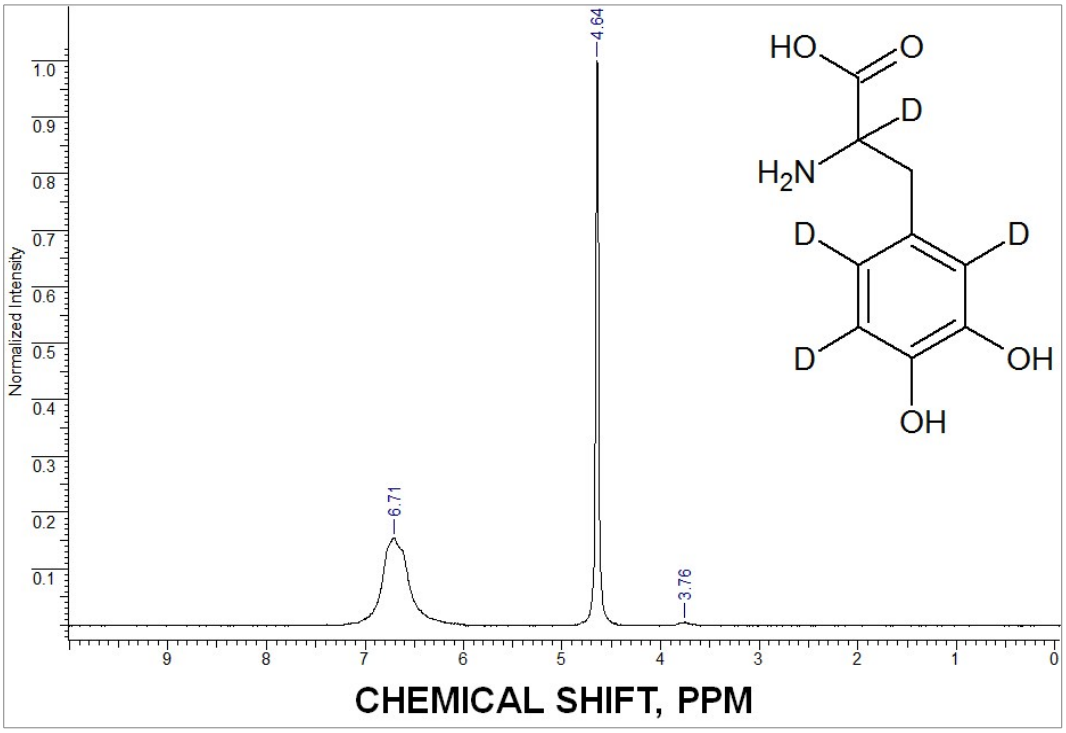

Fig. S2. ^{2}H NMR spectra of DOPA labeled under basic catalysis.

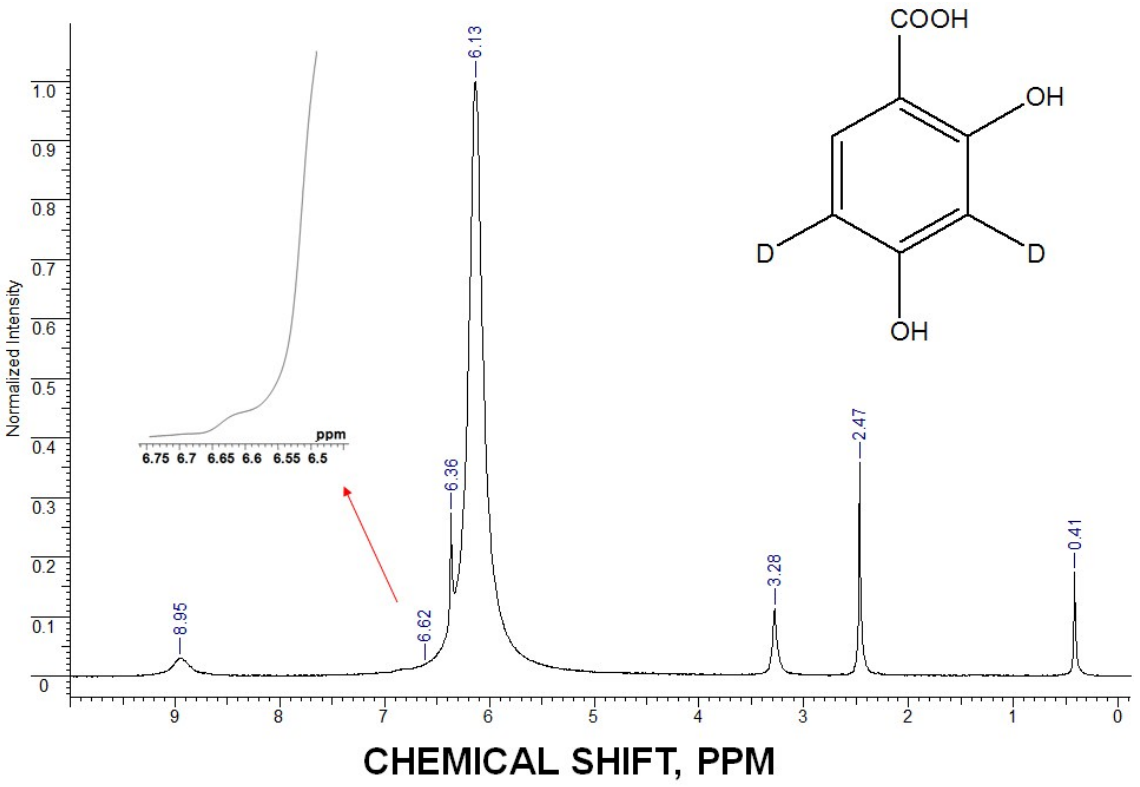

Fig. S3. ^{2}H NMR spectra of 2-4 dihydroxybenzoic acid labeled under basic catalysis. Spectrum includes signals of C_6D_{12} (0.44 ppm), $CDCl_3$ (6.36 ppm), which were used as external standards.

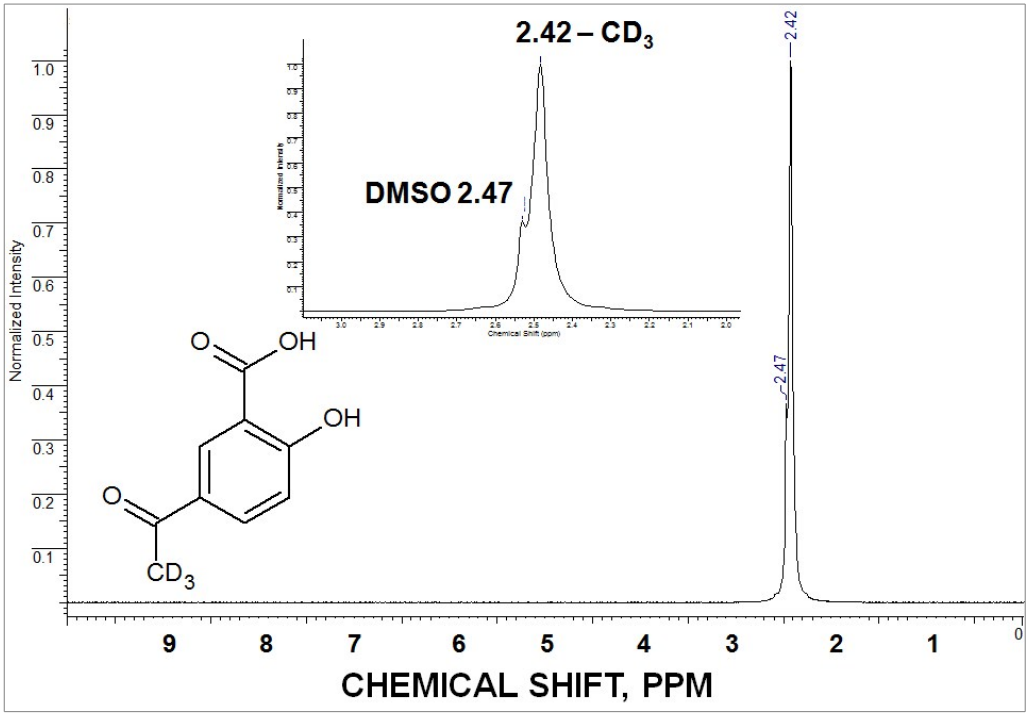

Fig. S4. ^{2}H NMR spectra of 5-acetylsalicylic acid

Mass-spectrometry of labeled compound

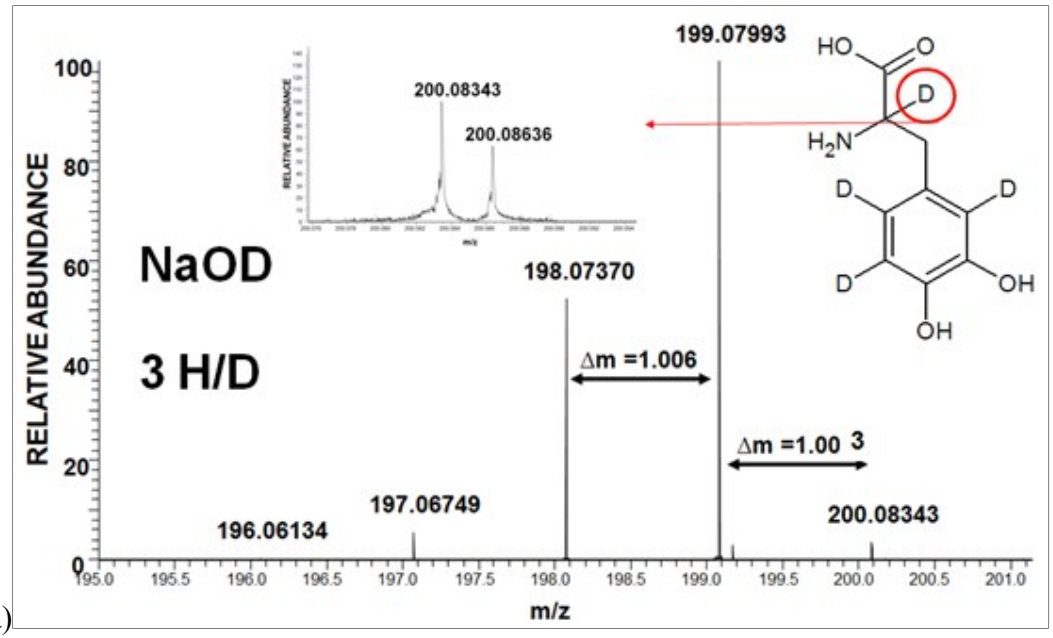

Fig. S5. Mass-spectra of a) DOPA b) 5-acetylsalicilic acid labeled under basic condition.