**ELECTRONIC SUPPLEMENTAL MATERIAL**

Separating and Identifying Multiple Structural Isomers of 3-hydroxy-3-(3’-hydroxyphenyl)propanoic acid (3,3’-HPHPA)

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|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Source | Mouse Status | Sample Status | Isomers Detected | 3’,3’-HPHPA  (Isomer 1) | 3’,4’- HPHPA  (Isomer 2) | 4’-HPLA  (Isomer 3) | 2’,3’-DHHCA (Isomer 4) | 2’,4’-DHHCA (Isomer 5) | 3’,4’-DHHCA  (Isomer 6) | 3’,5’-DHHCA (Isomer 7) |
| Brain | CON | U | 1,2,3,6,7 | √ | √ | √ | ND | ND | √ | √ |
| Brain | CON | D | 1,2,3,4,6,7 | √ | √ | √ | √ | ND | √ | √ |
|  |  |  |  |  |  |  |  |  |  |  |
| Brain | GT | U | 1,2,3,6,7 | √ | √ | √ | ND | ND | √ | √ |
| Brain | GT | D | 1,2,3,4,6,7 | √ | √ | √ | √ | ND | √ | √ |
|  |  |  |  |  |  |  |  |  |  |  |
| Urine | CON | U | 1,2,3,5 | √ | √ | √ | ND | √ | ND | ND |
| Urine | CON | D | 1,2,3,4,5,6 | √ | √ | √ | √ | √ | √ | ND |
|  |  |  |  |  |  |  |  |  |  |  |
| Urine | GT | U | 1,2,3,4,5,7 | √ | √ | √ | √ | √ | ND | √ |
| Urine | GT | D | 1,2,3,4,5,6,7 | √ | √ | √ | √ | √ | √ | √ |

Supplemental Table 1. Digestion patterns of samples from mice (n = 2) one of which was a control (CON) and the other treated with green tea (GT) in drinking water for 11 days. Isomer abbreviations are as in Figure 1. Standards, consisting of the seven isomers (200 ng/ml) (m/z 181) were injected at the beginning and end of the set of samples. Each sample contained 100 ng/ml deuterium-labeled internal standard mix for peak area integration and quantitation. U – undigested, D – treated with aryl sulfatase and β-glucuronidase before analysis, √ - detected, ND – not detected.