

Supplementary Materials: Characteristic Distribution of Ciguatoxins in the Edible Parts of a Grouper, *Variola louti*

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Table S1. LC-MS/MS conditions for CTX analysis.

LC: Agilent 1290 Infinity (Agilent Technologies)
Column: Zorbax Eclipse Plus C18
(1.8 µm, 2.1 × 50 mm, Agilent Technologies)
Column Temp.: 40 °C
Injection volume: 5 µL
Eluent A: 5 mM ammonium formate in 0.1% formic acid
Eluent B: methanol
Flow rate: 0.4 mL/min
Gradient conditions
1 (for general analysis):
0 min (60%B)–0.25 min (60%B)–0.5 min (75%B)–12 min (90%B)–14 min
(90%)–14.1 min (100%)
2 (for less polar analogs):
0 min (60%B)–0.25 min (60%B)–0.5 min (75%)–23 min (90%)–25 min
(90%)–25.1 min (100%)
3 (for higher polar analogs):
0 min (50%)–0.25 min (50%)–0.5 min (65%)–25 min (80%)–27 min
(80%)–27.1 min (100%)
MS: 6460 Triple Quad LC/MS (Agilent Technologies)
Ionization: ESI with Agilent Jet Stream
Nebulizer: N₂, 50 psi
Sheath gas: N₂, 380 °C, 11 L/min
Dry gas: 300 °C, 10 L/min
Capillary voltage: 5000 V
Fragmentor voltage: 300 V
Collision energy: 40 eV
Monitor ions ([M+Na]⁺ > [M+Na]⁺)
m/z 1045.6: CTX3C and 49-*epi*CTX3C
m/z 1061.6: 2-hydroxyCTX3C and 51-hydroxyCTX3C
m/z 1079.6: 2,3-dihydroxyCTX3C
m/z 1083.6: CTX4A and CTX4B
m/z 1095.6: 2,3,51-trihydroxyCTX3C
m/z 1117.6: 52-*epi*-54-deoxyCTX1B and 54-deoxyCTX1B
m/z 1133.5: CTX1B

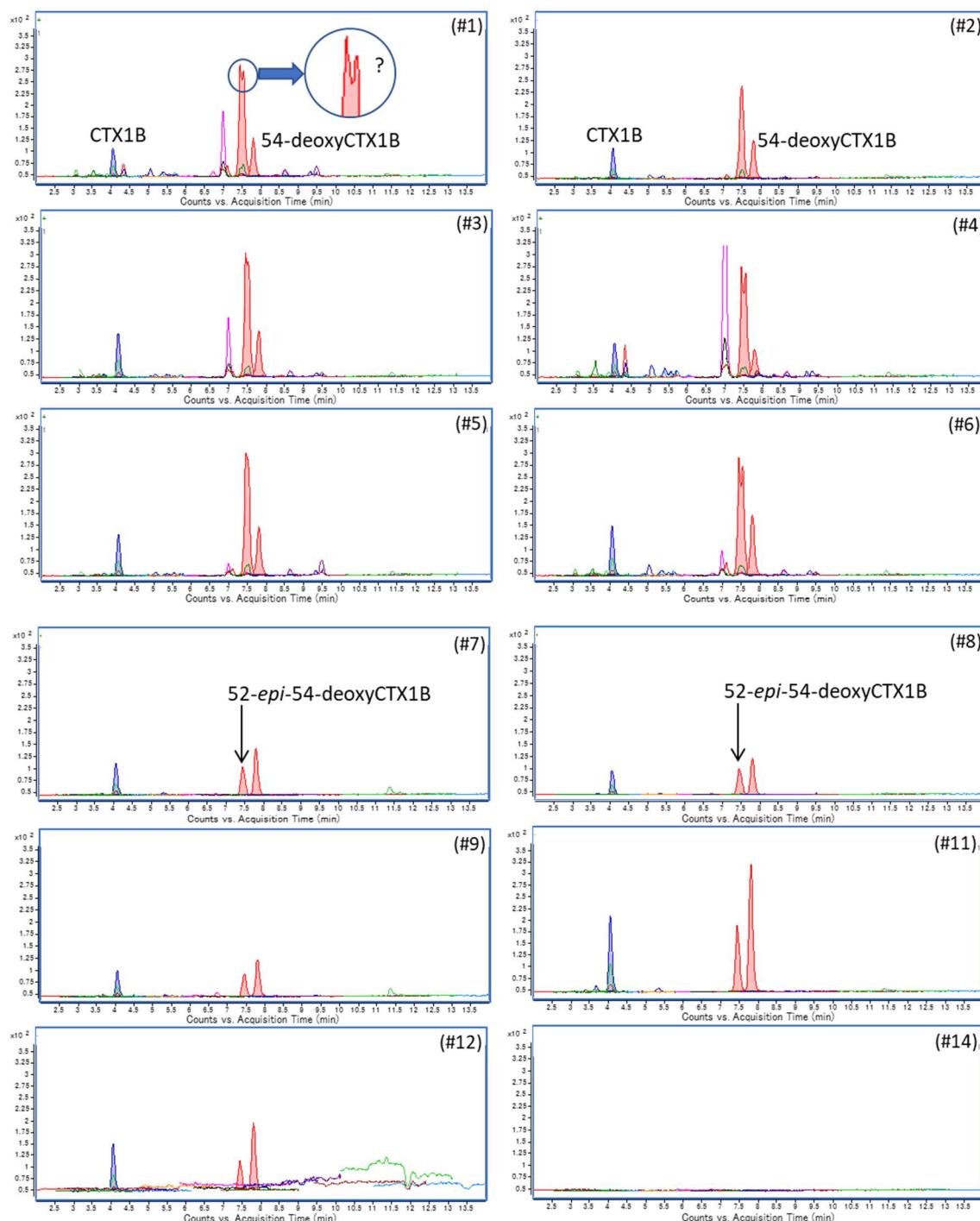


Figure S1. LC-MS/MS chromatograms in Gradient I of samples (#1–#9, #11, #12, and #14) prepared from Specimen E (ID 160136).

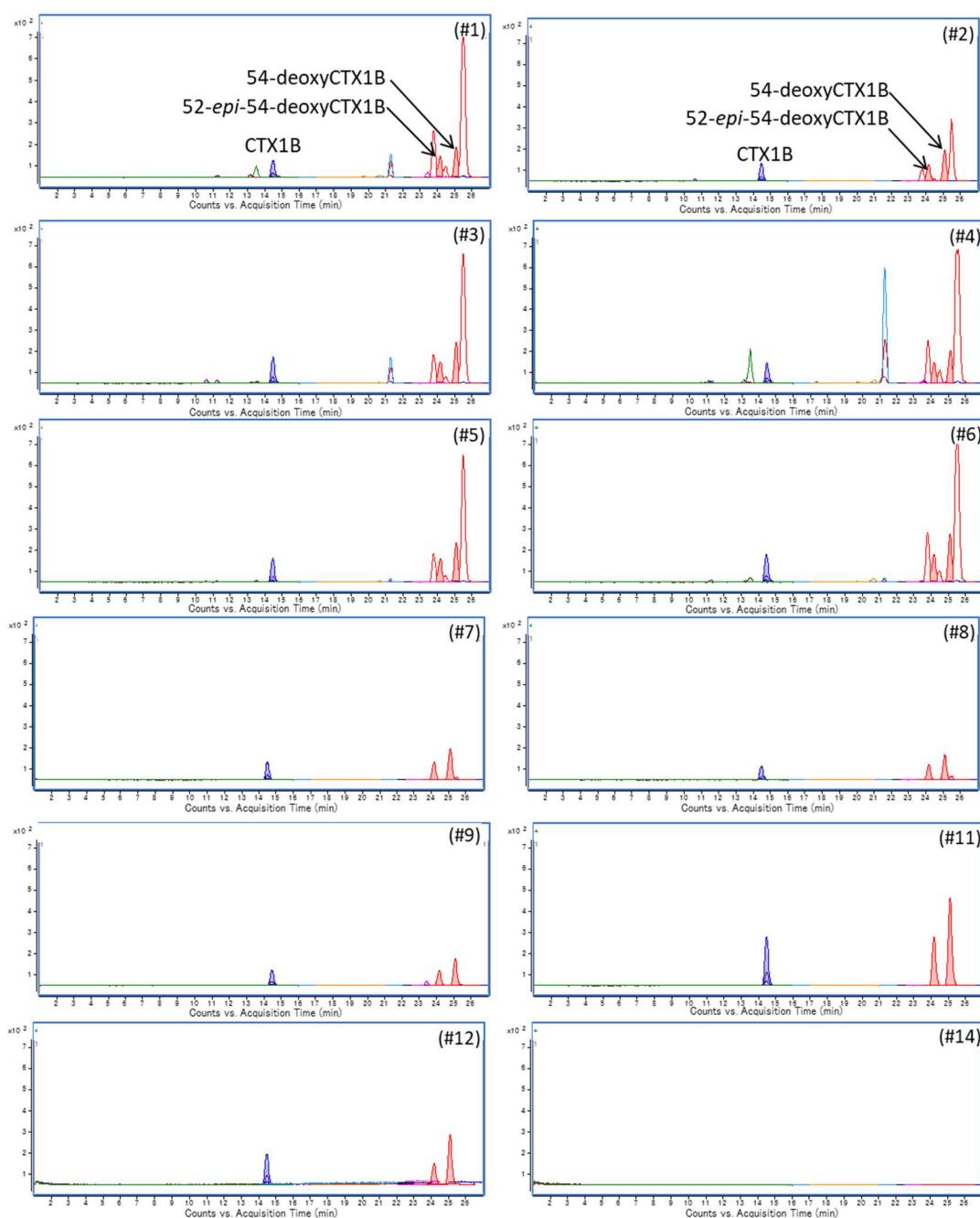


Figure S2. LC-MS/MS chromatograms in Gradient II of samples (#1–#9, #11, #12, and #14) prepared from Specimen E (ID 160136).

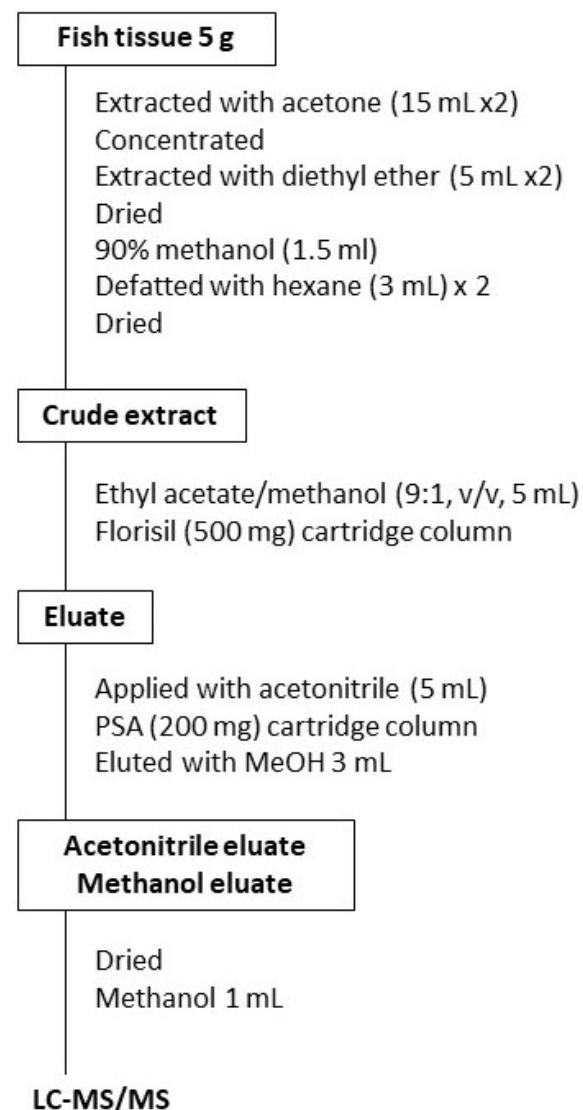


Figure S3. Sample preparation from fish flesh for LC-MS/MS.