Supplementary materials

Screening of Anti-Inflammatory Activity and Metabolomics Analysis of Endophytic Fungal Extracts; Identification and Characterization of Perylenequinones and Terpenoids from the Interesting Active Alternaria Endophyte

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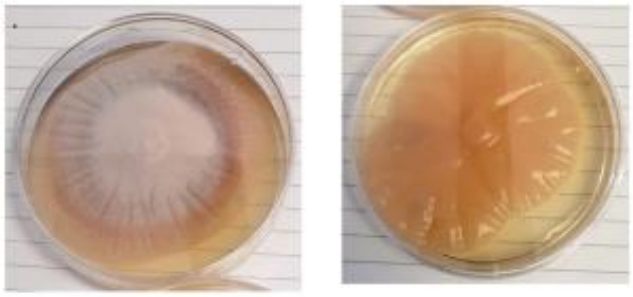

Figure S1: Endophytic fungus *Alternaria alternata*.

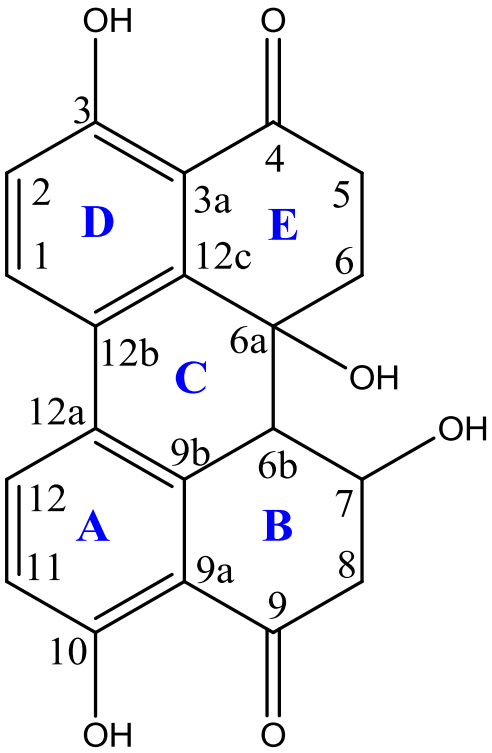

Figure S2: Chemical structure of compound **1,** altertoxin I

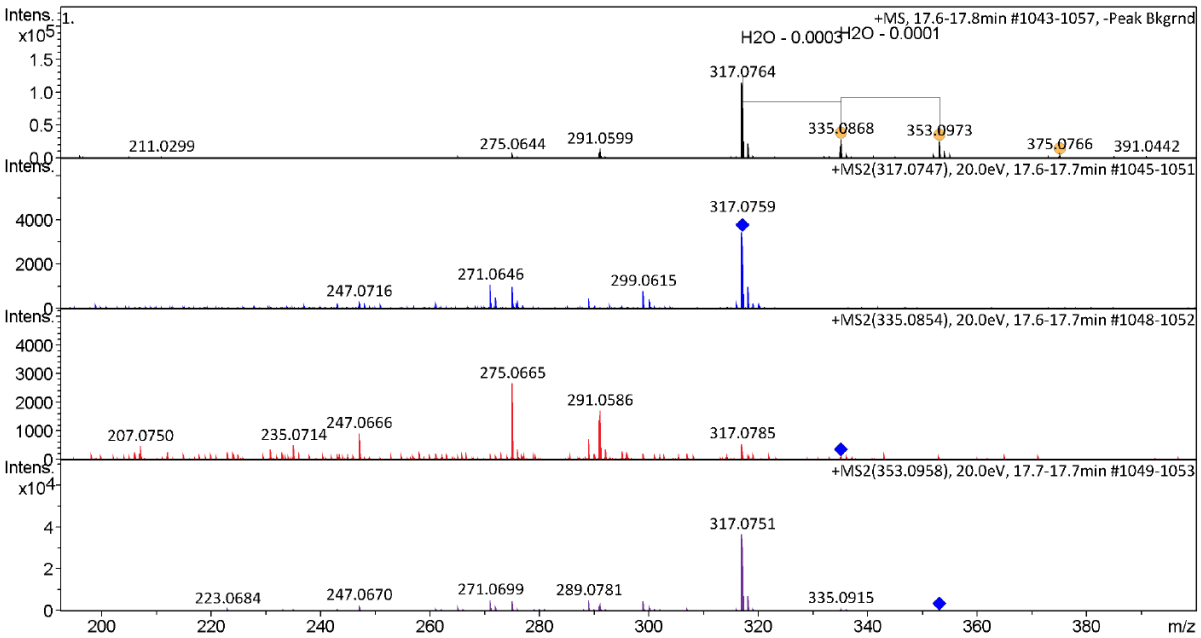

Figure S3: HR-ESI-MS spectrum of compound **1**, altertoxin

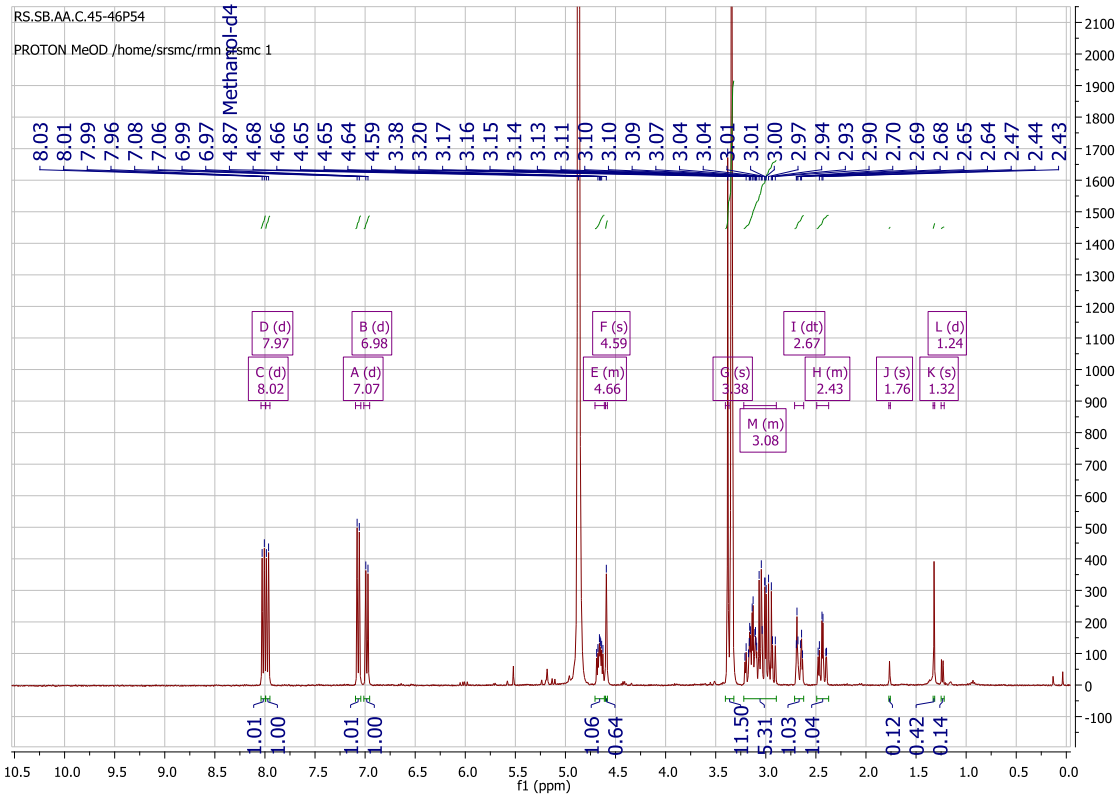

Figure S4: ^{1}H-NMR spectrum of compound **1,** altertoxin I, in CD_3OD (400 MHz)

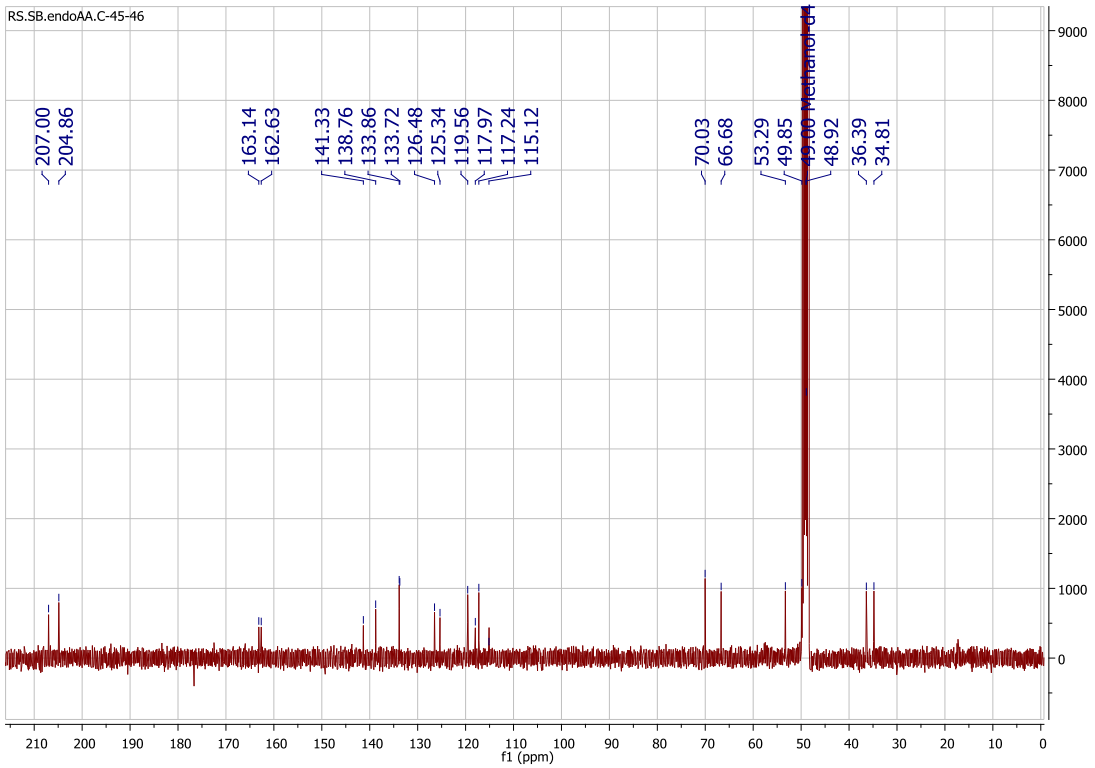

Figure S5: ^{13}C-NMR spectrum of compound **1,** altertoxin I, in CD_3OD (100 MHz)

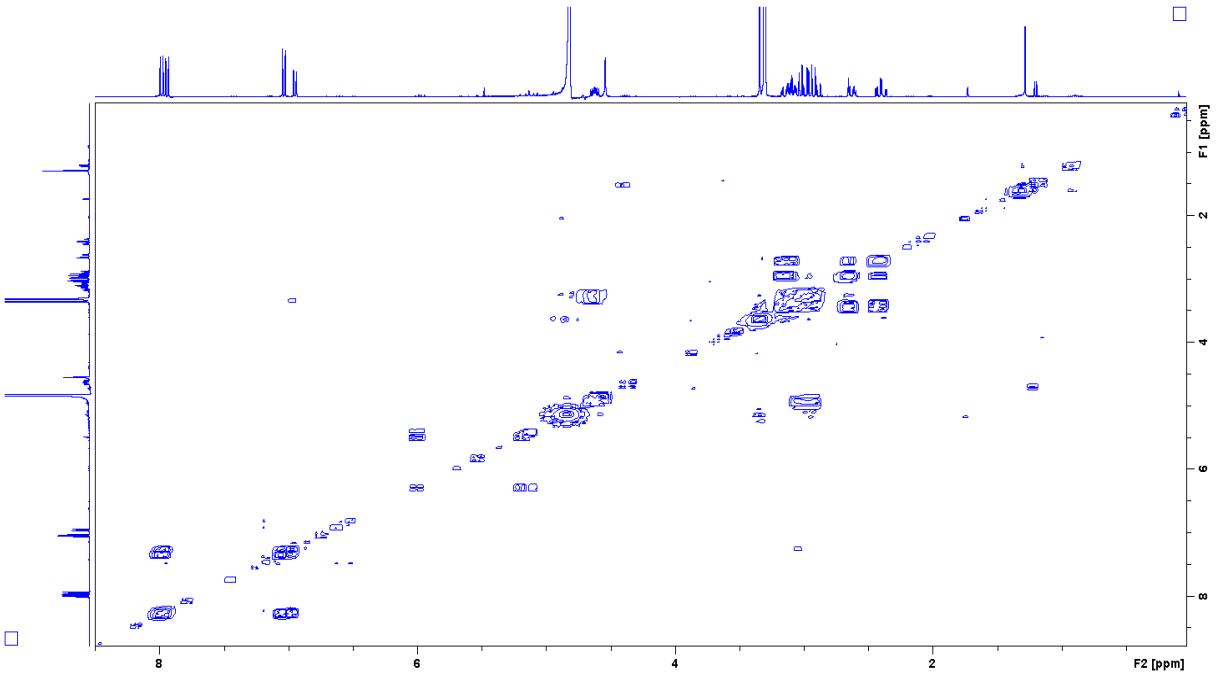

Figure S6: ^{1}H-^{1}H COSY spectrum of compound **1,** altertoxin I, in CD_3OD

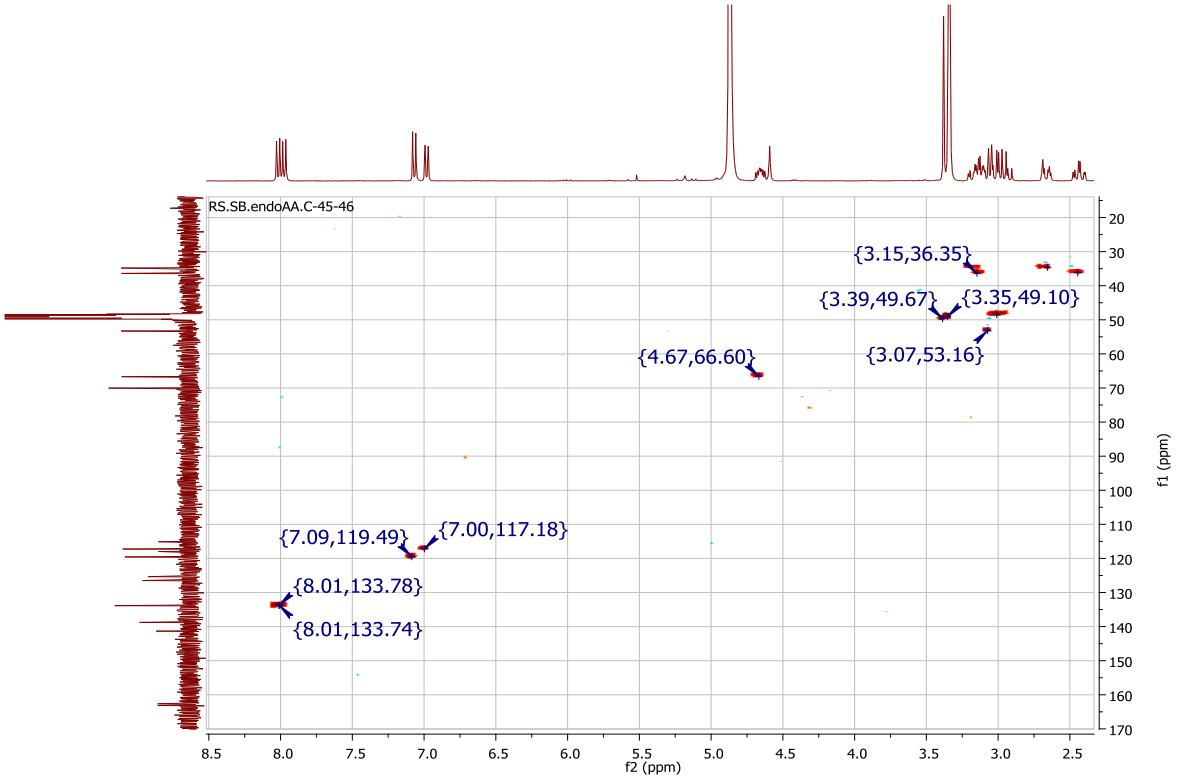

Figure S7: HSQC spectrum of compound **1,** altertoxin I, in CD_3OD

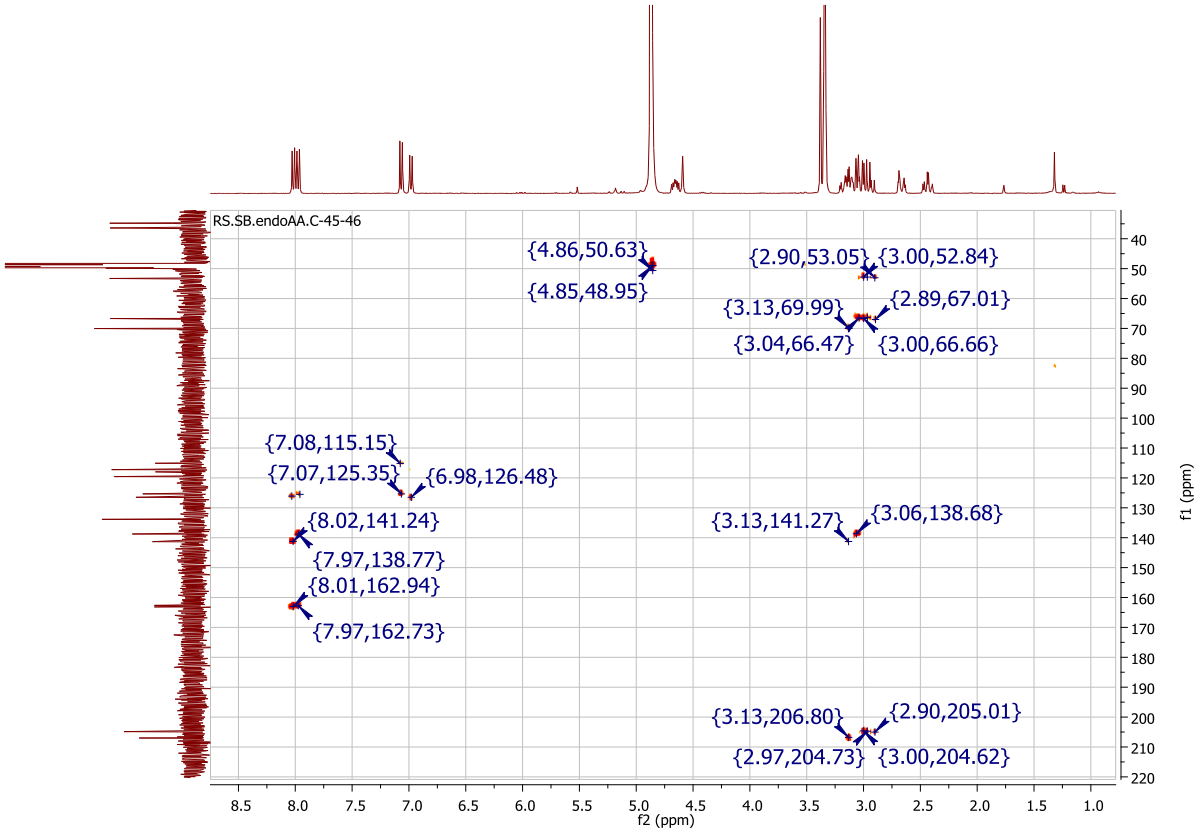

Figure S8: HMBC spectrum of compound **1,** altertoxin I, in CD_3OD

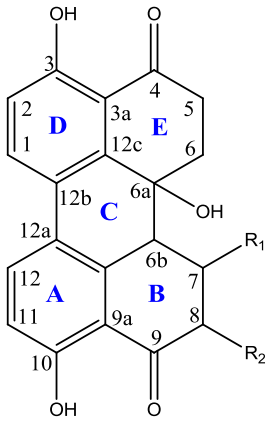

Figure S9: Chemical structure of compound **2,** altertoxin II

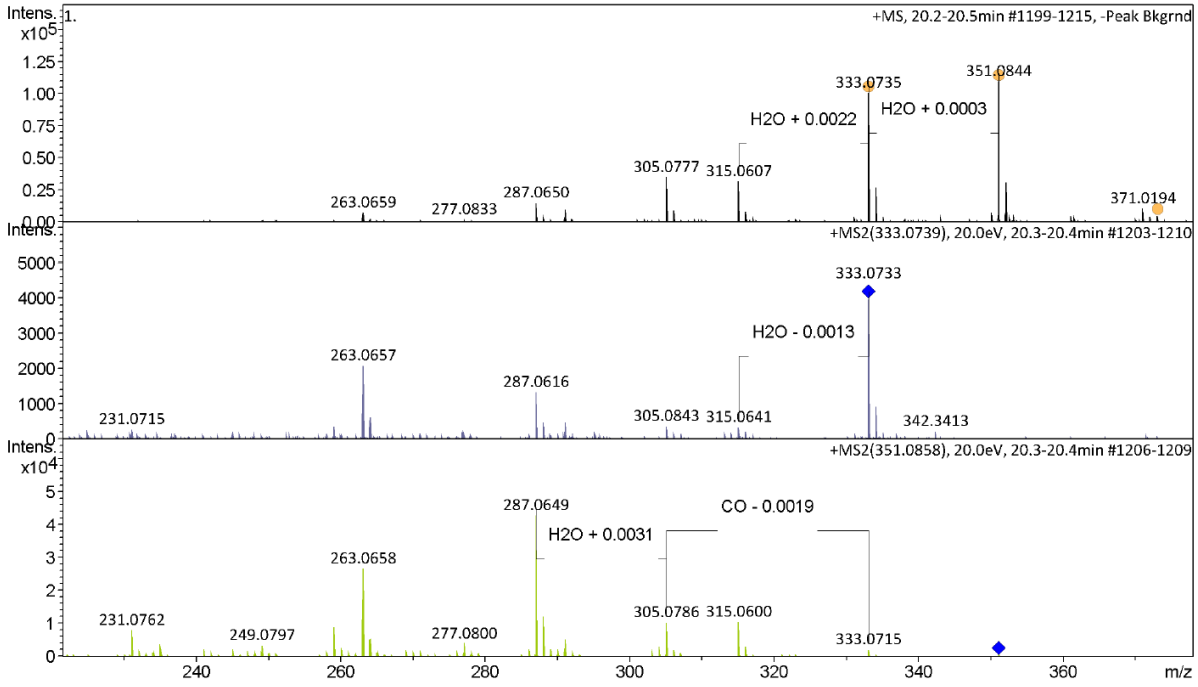

Figure S10: HR-ESI-MS spectrum of compound **2**, altertoxin II



Figure S11: ^{1}H-NMR spectrum of compound **2,** altertoxin II, in CD_3OD (400 MHz)

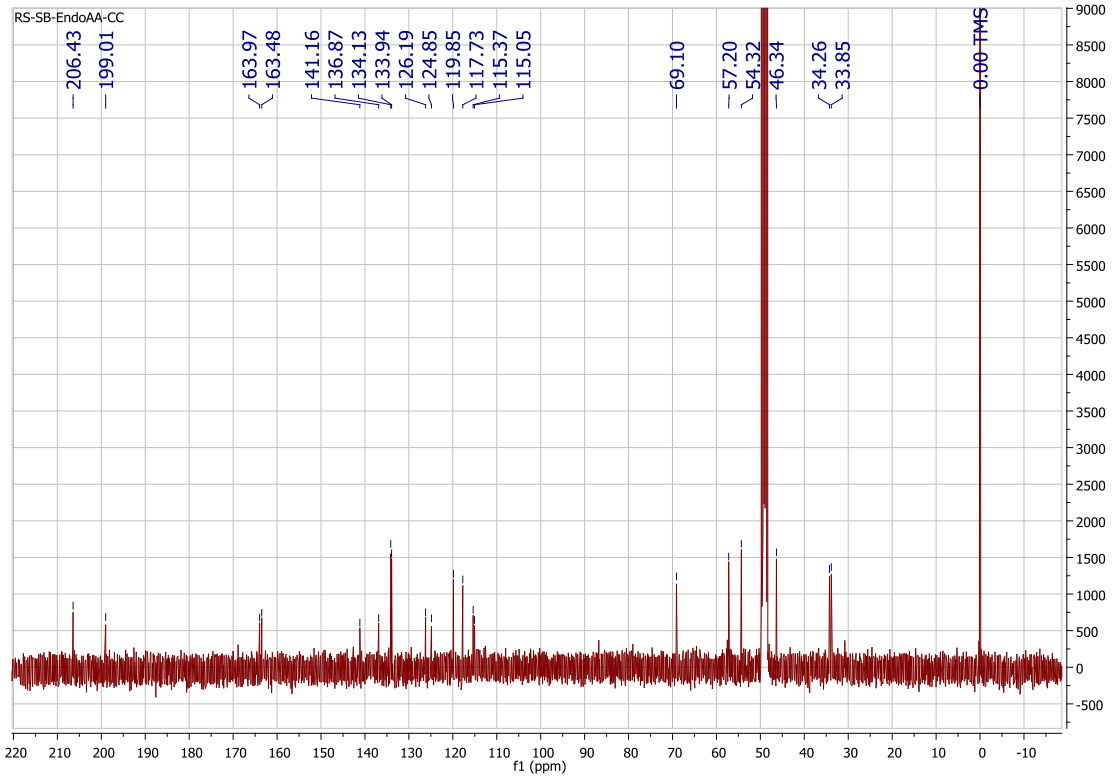

Figure S12: ^{13}C-NMR spectrum of compound **2,** altertoxin II, in CD_3OD (100 MHz)

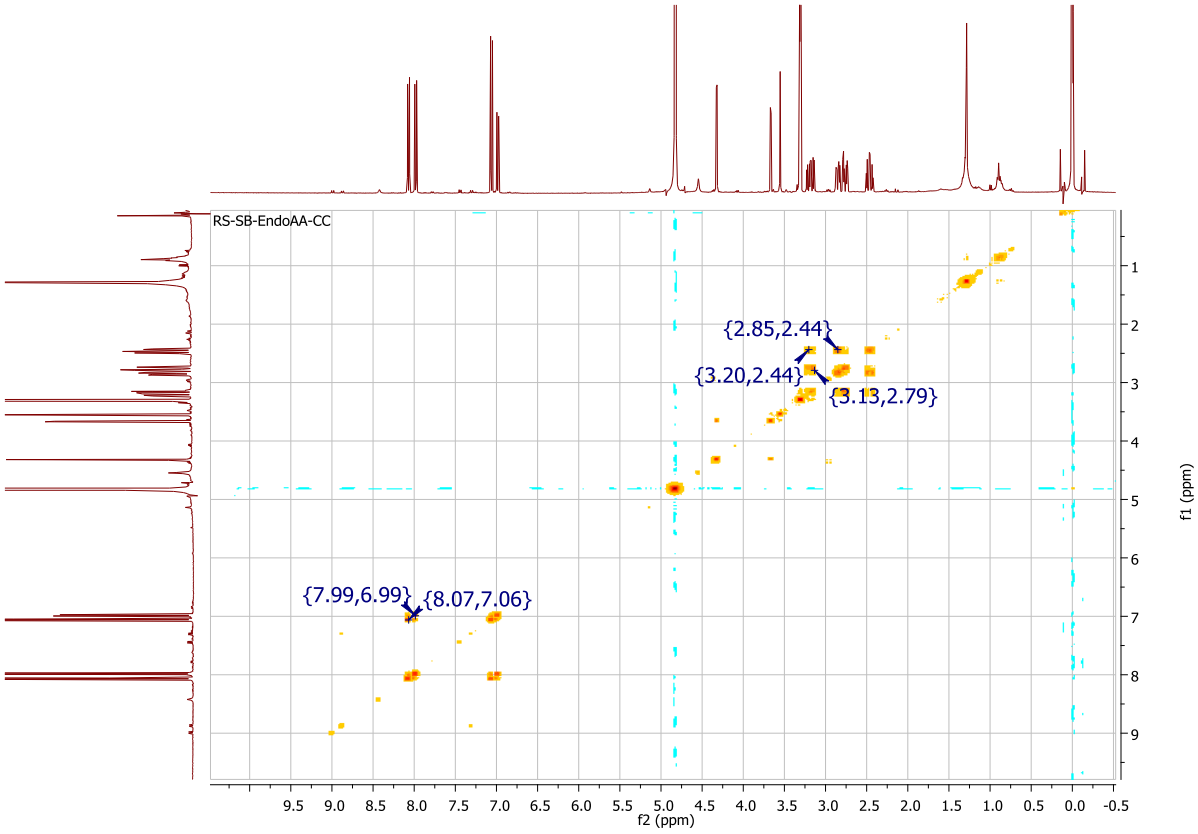

Figure S13: ^{1}H-^{1}H COSY spectrum of compound **2,** altertoxin II, in CD_3OD

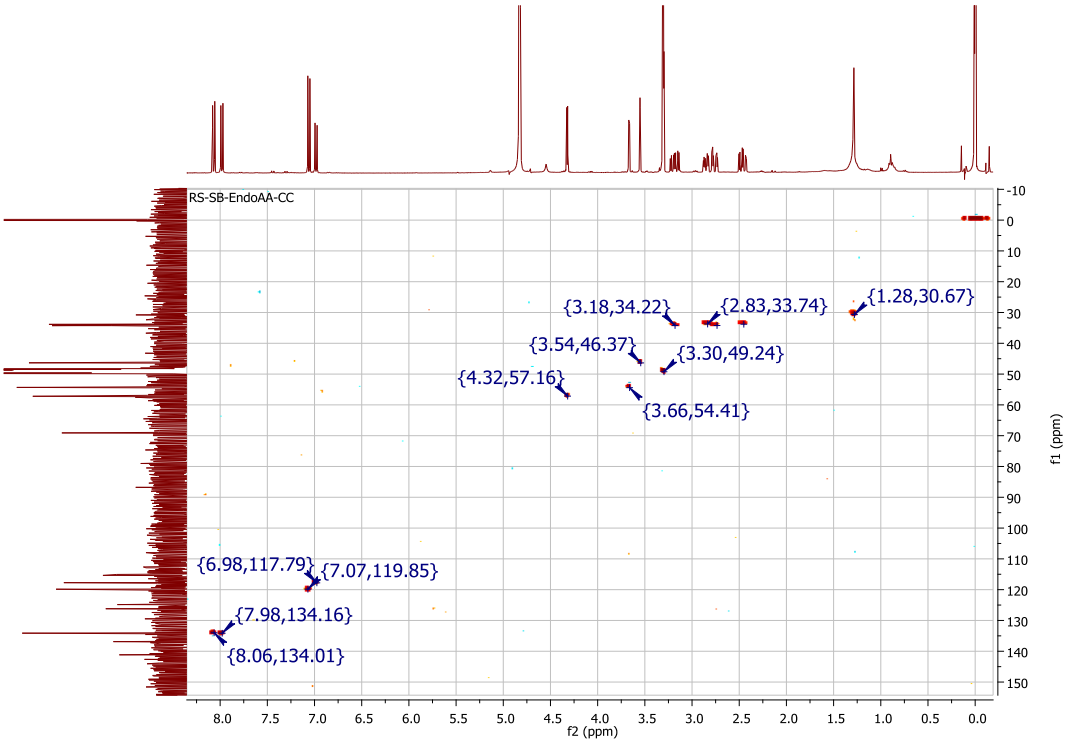

Figure S14: HSQC spectrum of compound **1,** altertoxin II, in CD_3OD

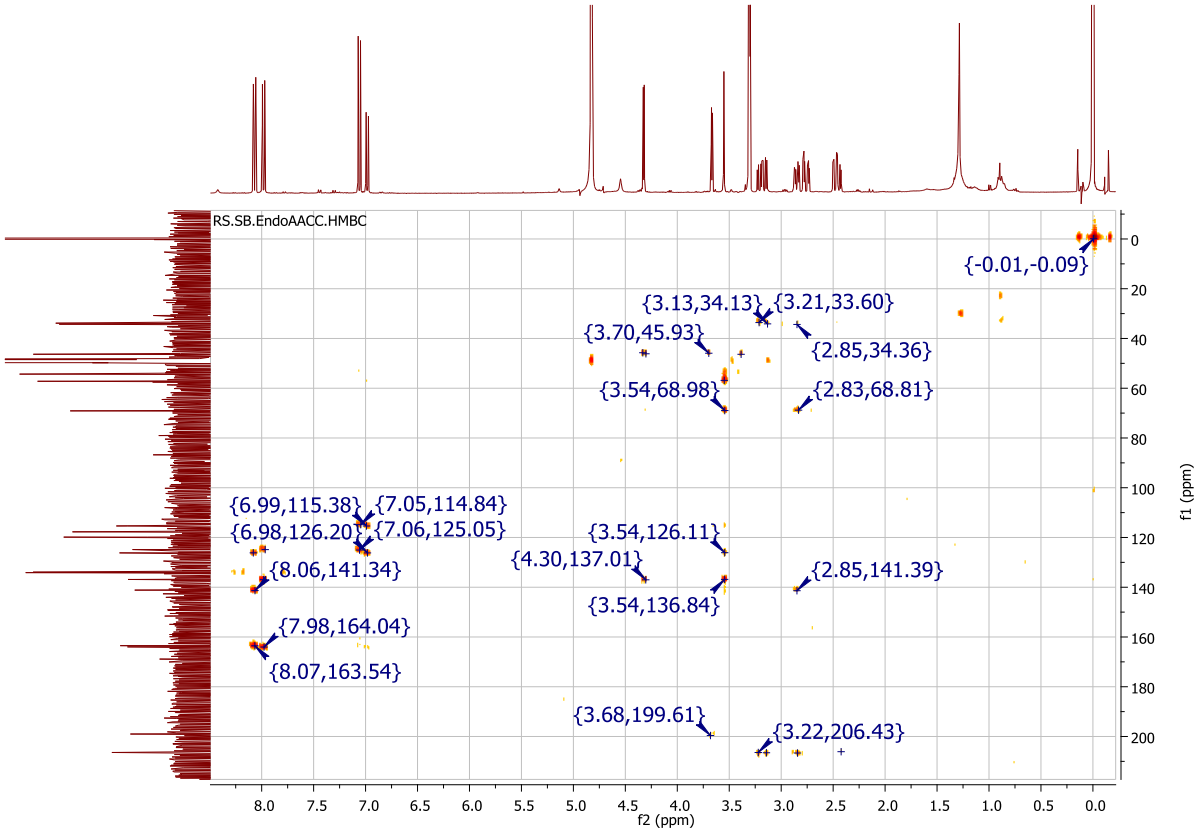

Figure S15: HMBC spectrum of compound **1,** altertoxin II, in CD_3OD

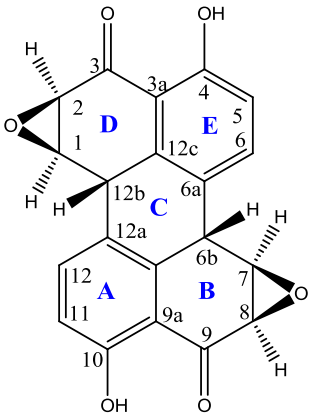

Figure S16: Chemical structure of compound **3,** altertoxin III

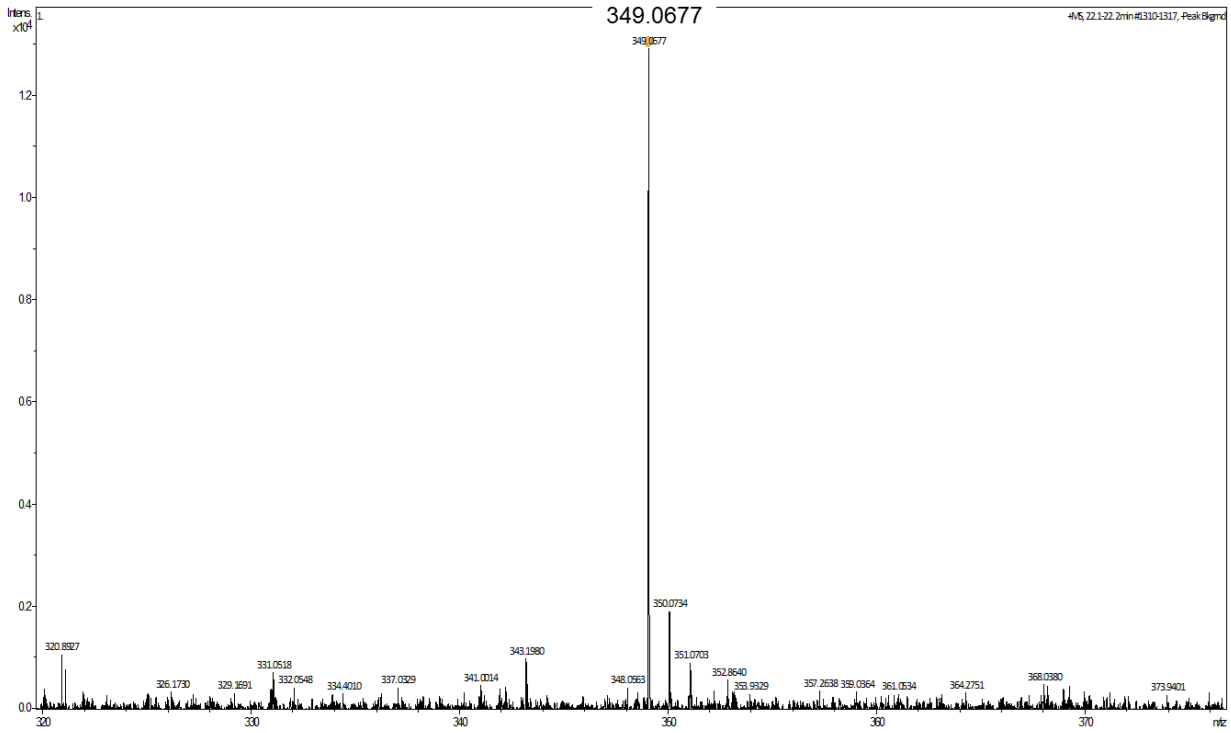

Figure S17: HR-ESI-MS spectrum of compound **3**, altertoxin III

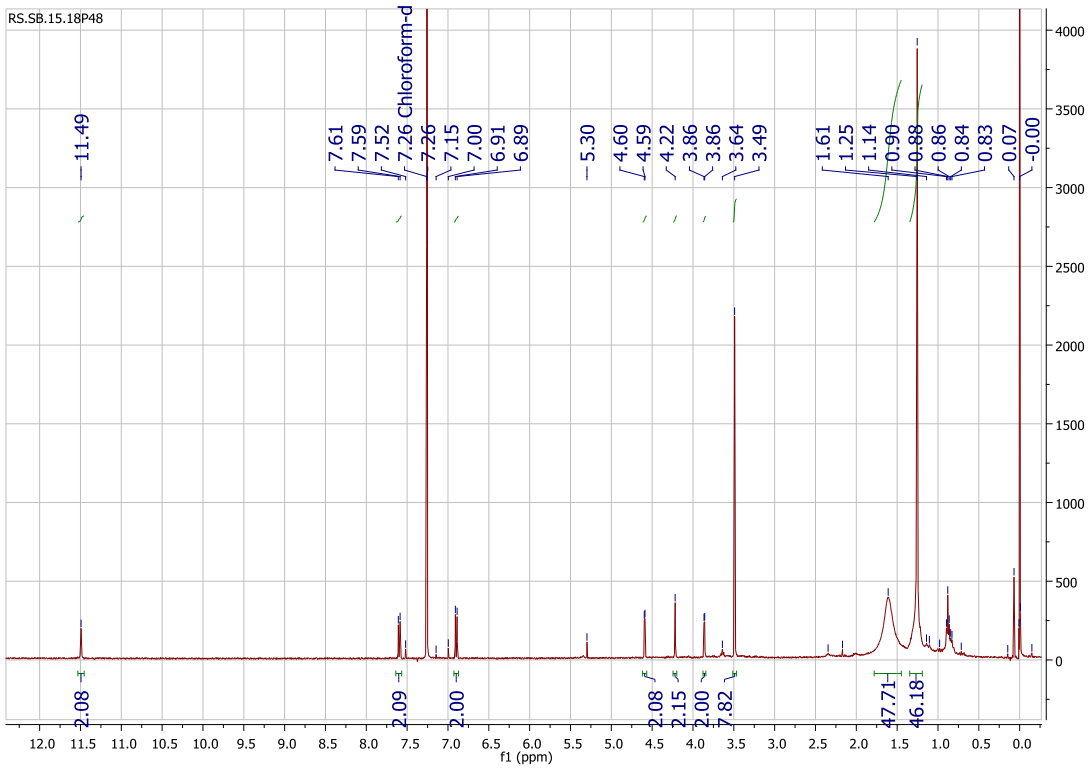

Figure S18: ^{1}H-NMR spectrum of compound **3,** altertoxin III, in $CDCl_3$ (400 MHz)

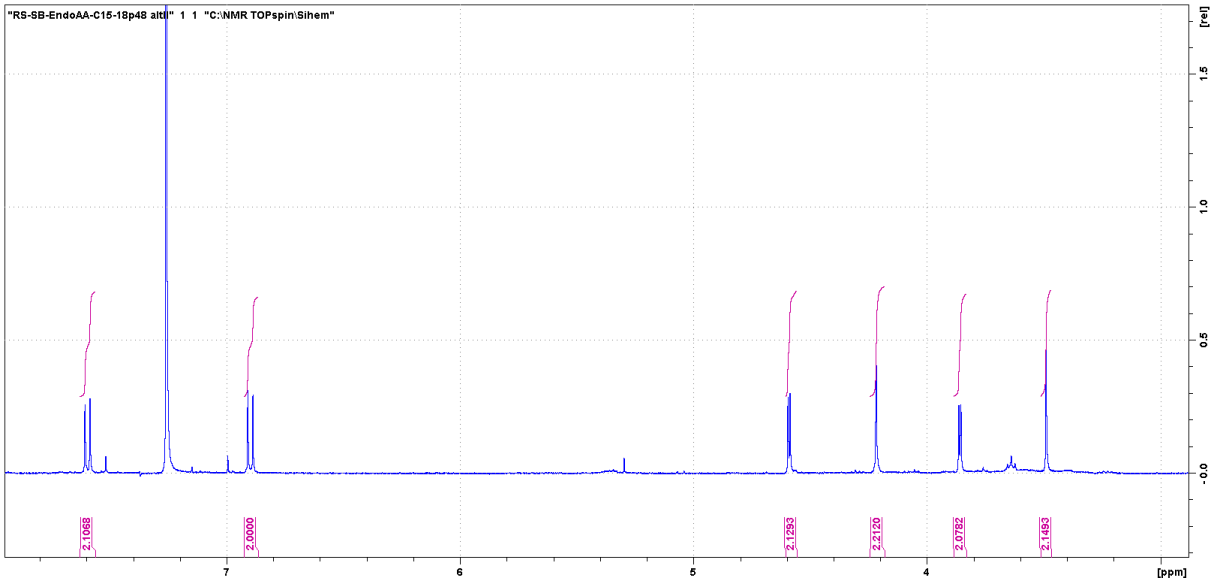

Figure S19: Zoom ^{1}H-NMR spectrum of compound **3,** altertoxin III, in $CDCl_3$ (400 MHz)

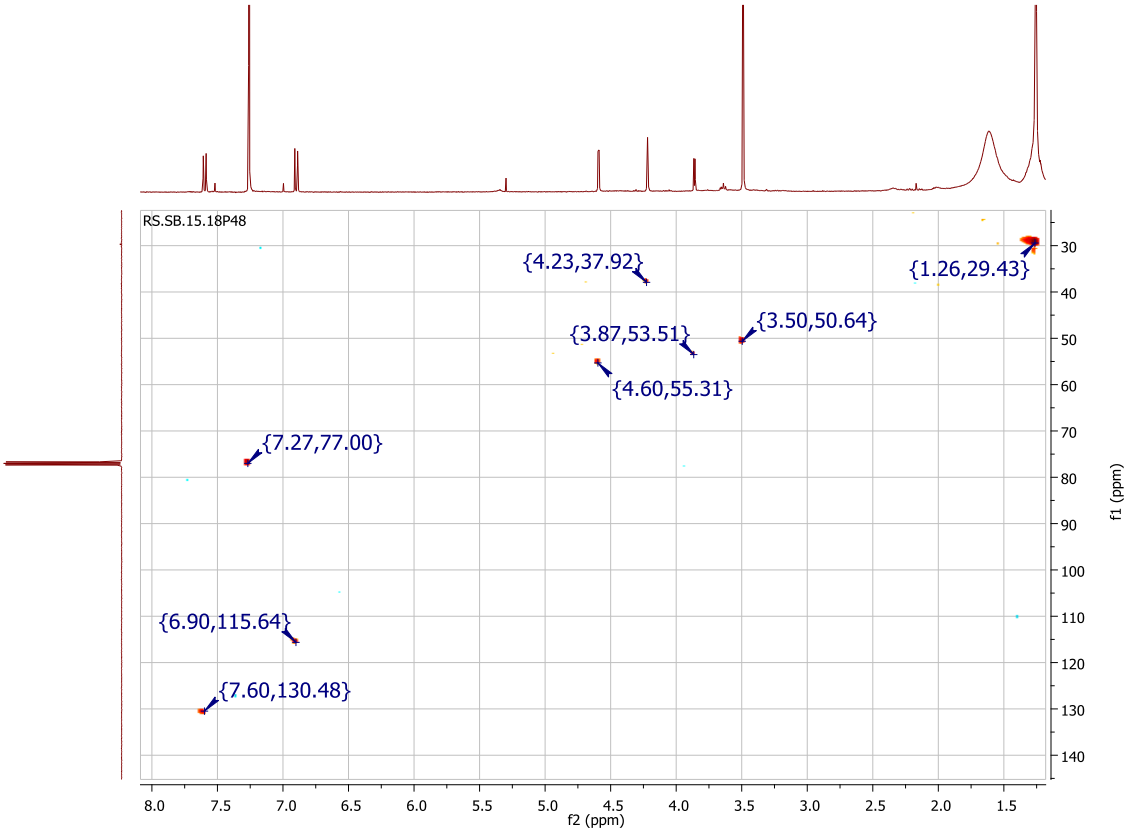

Figure S20: HSQC spectrum of compound **3,** altertoxin III, in $CDCl_3$

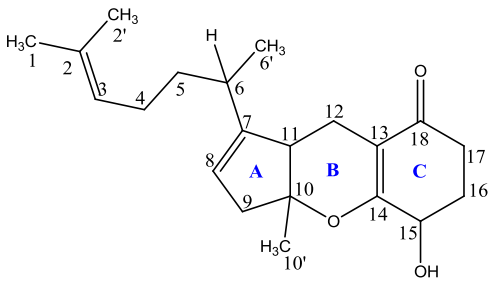

Figure S21: Chemical structure of compound **4,** Tricycloalternarene 3a

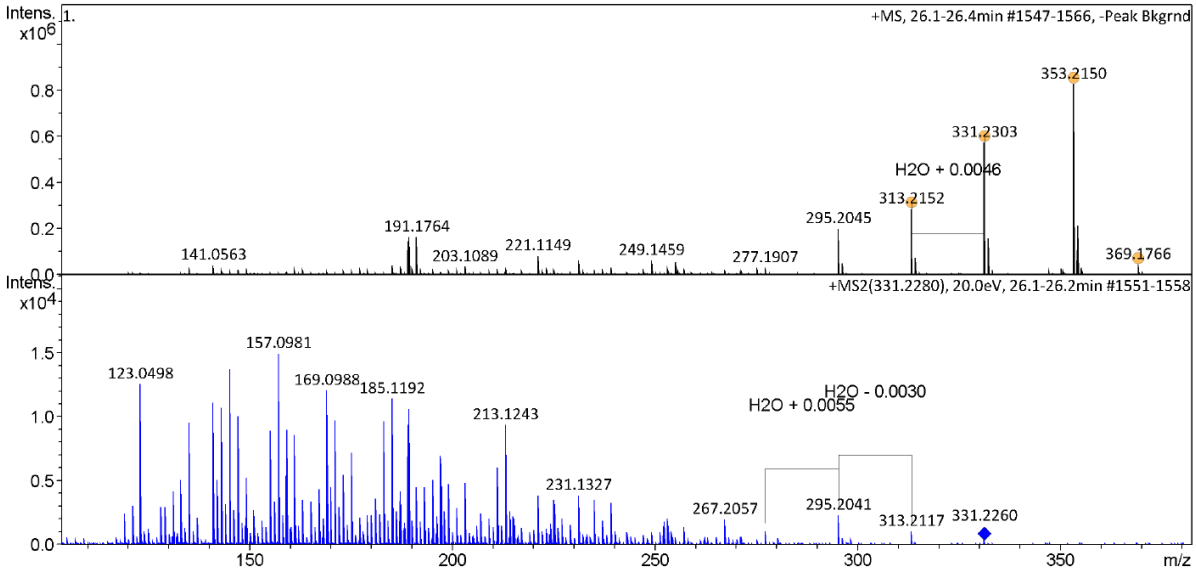

Figure S22: HR-ESI-MS spectrum of compound **4**, Tricycloalternarene 3a

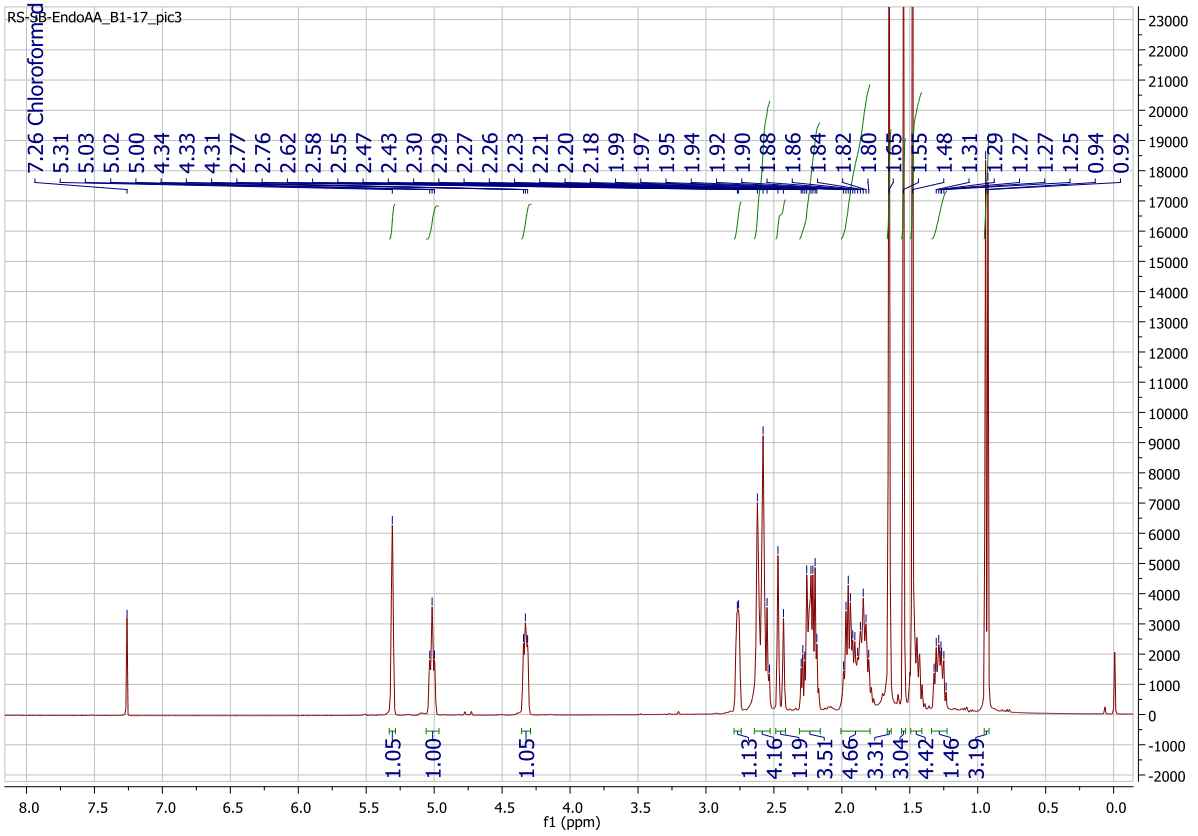

Figure S23: ^{1}H-NMR spectrum of compound **4,** Tricycloalternarene 3a, in $CDCl_3$ (400 MHz)

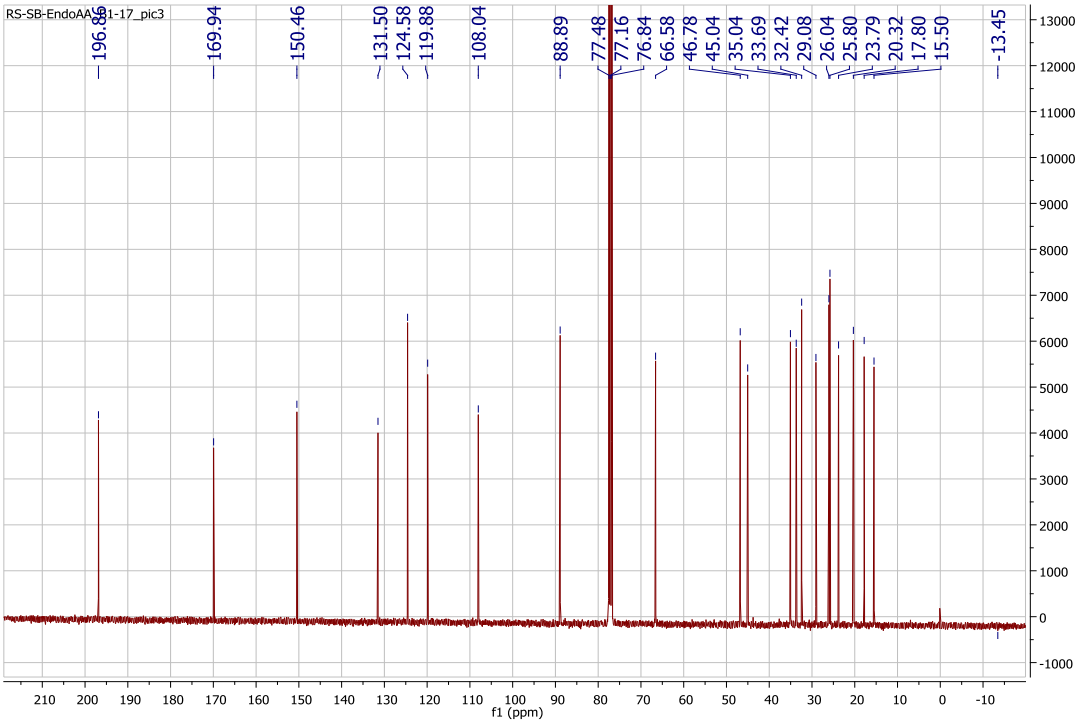

Figure S24: ^{13}C-NMR spectrum of compound **4,** Tricycloalternarene 3a, in $CDCl_3$ (100 MHz)

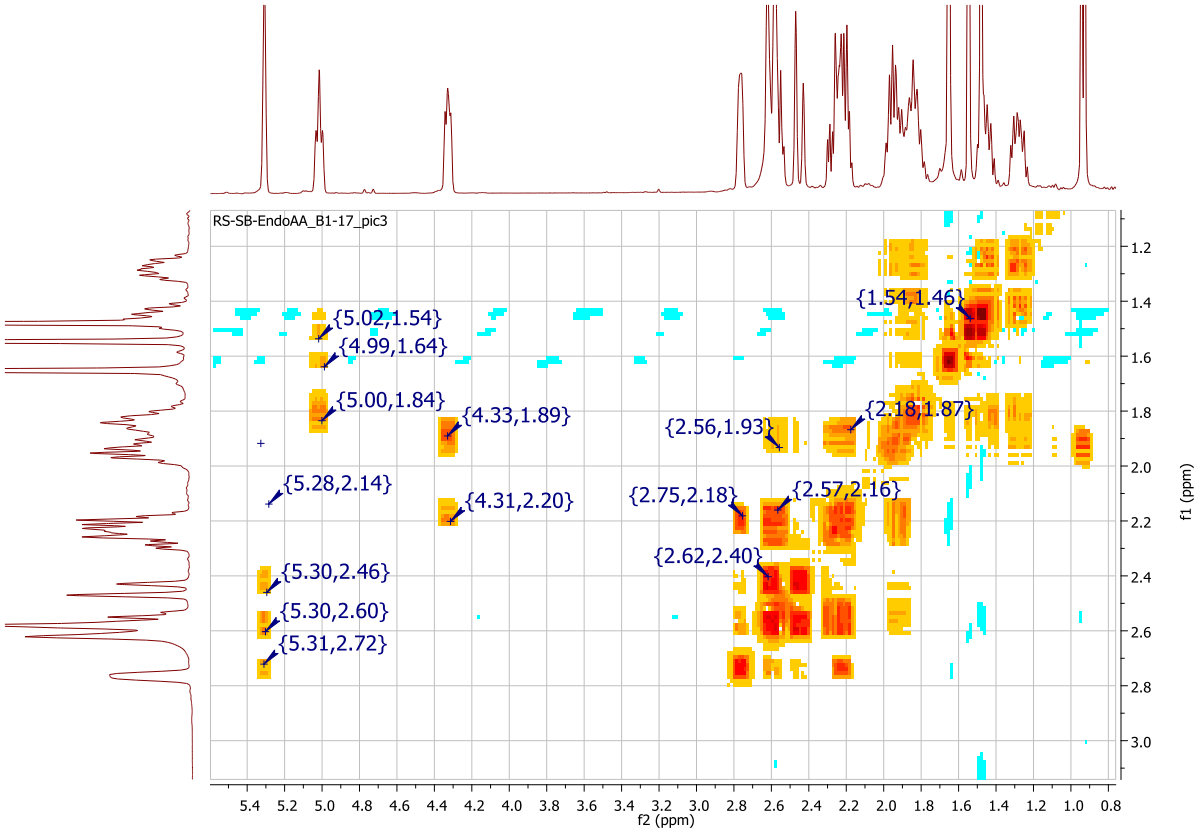

Figure S25: ^{1}H-^{1}H COSY spectrum of compound **4,** Tricycloalternarene 3a, in $CDCl_3$

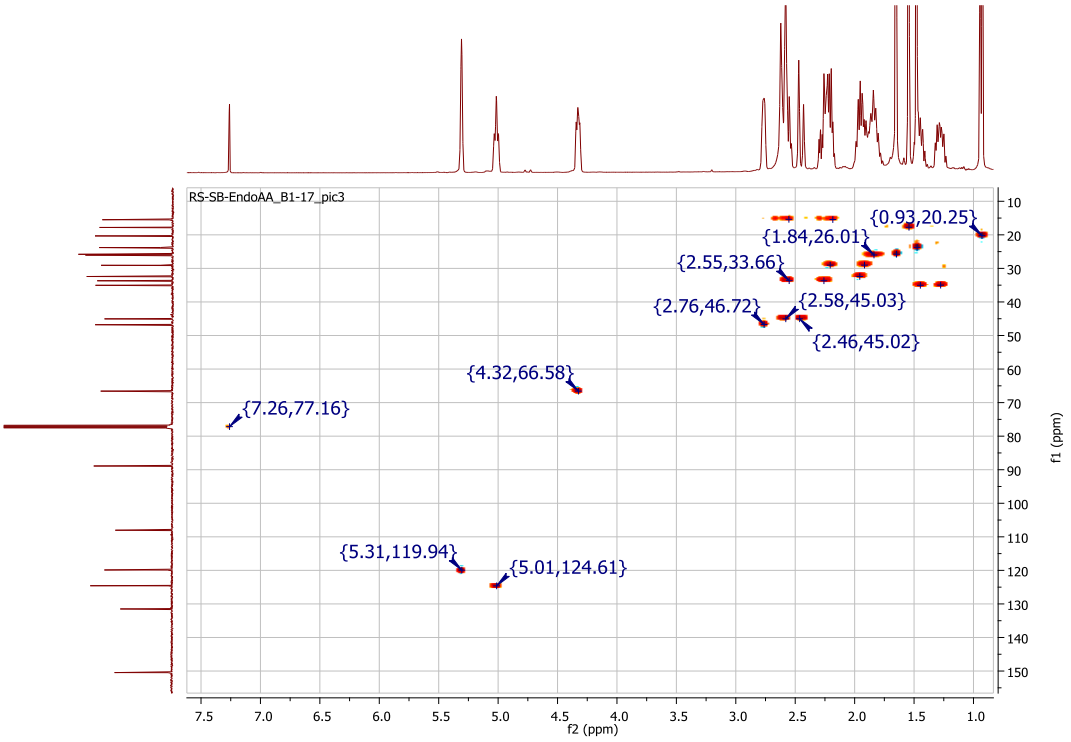

Figure S26: HSQC spectrum of compound **4,** Tricycloalternarene 3a, in $CDCl_3$

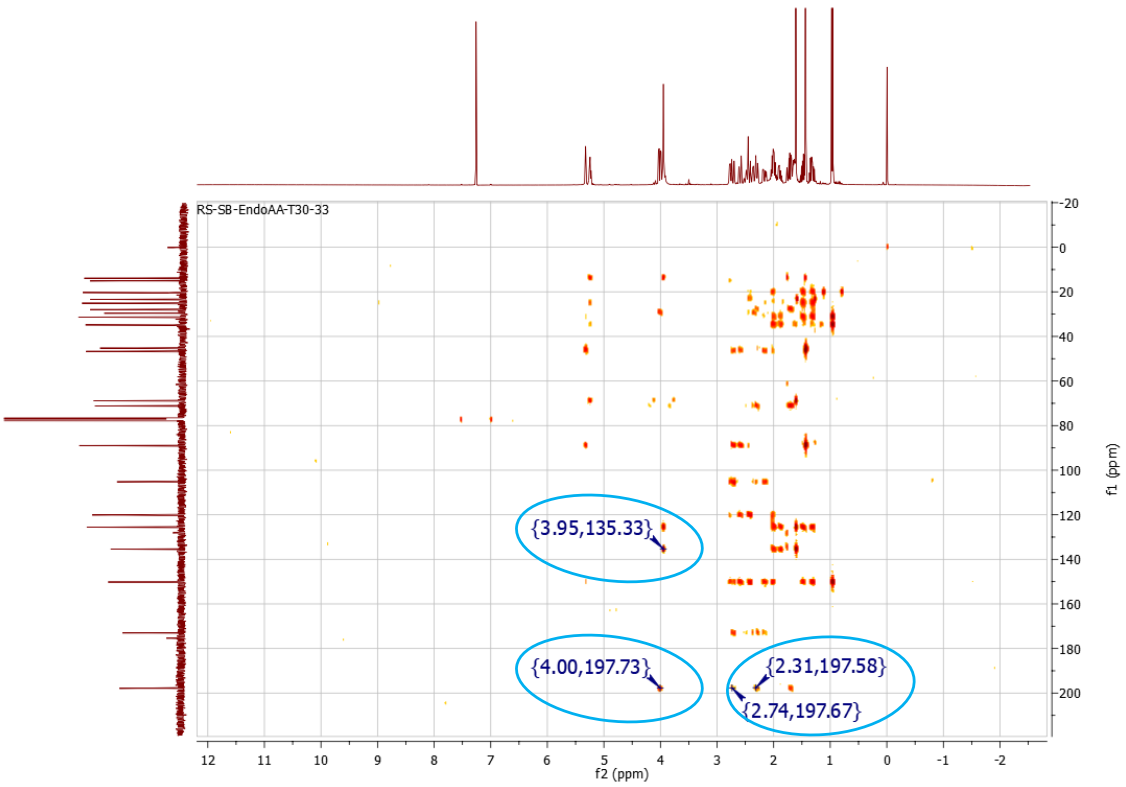

Figure S27: HMBC spectrum of compound **4,** Tricycloalternarene 3a, in $CDCl_3$

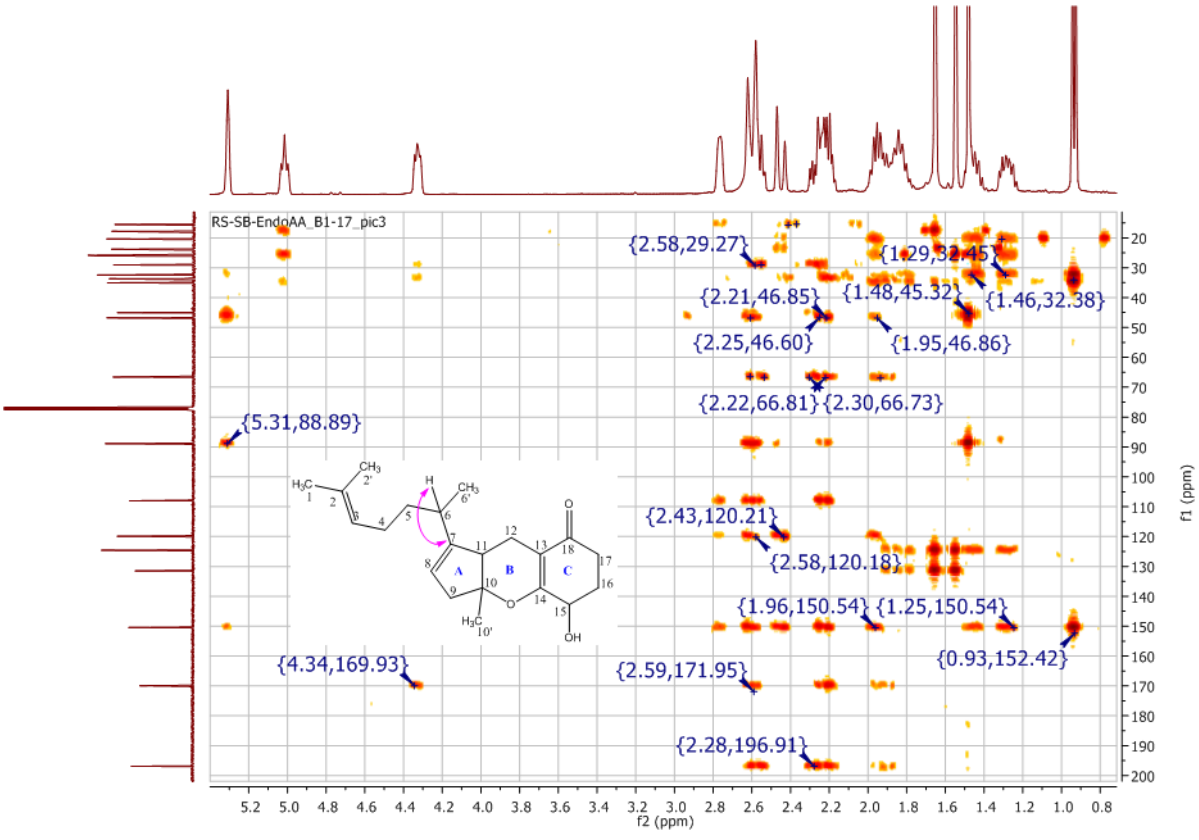

Figure S28: Zoom of HMBC spectrum of compound **4,** Tricycloalternarene 3a, in $CDCl_3$

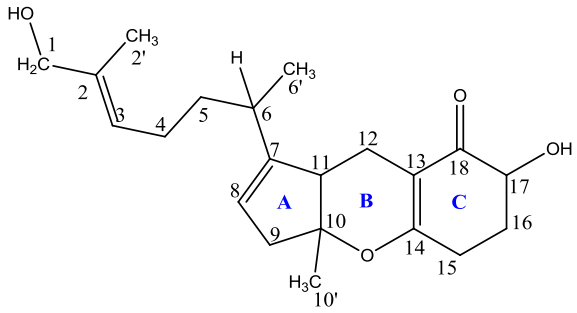

Figure S29: Chemical structure of compound **5,** Tricycloalternarene 2b

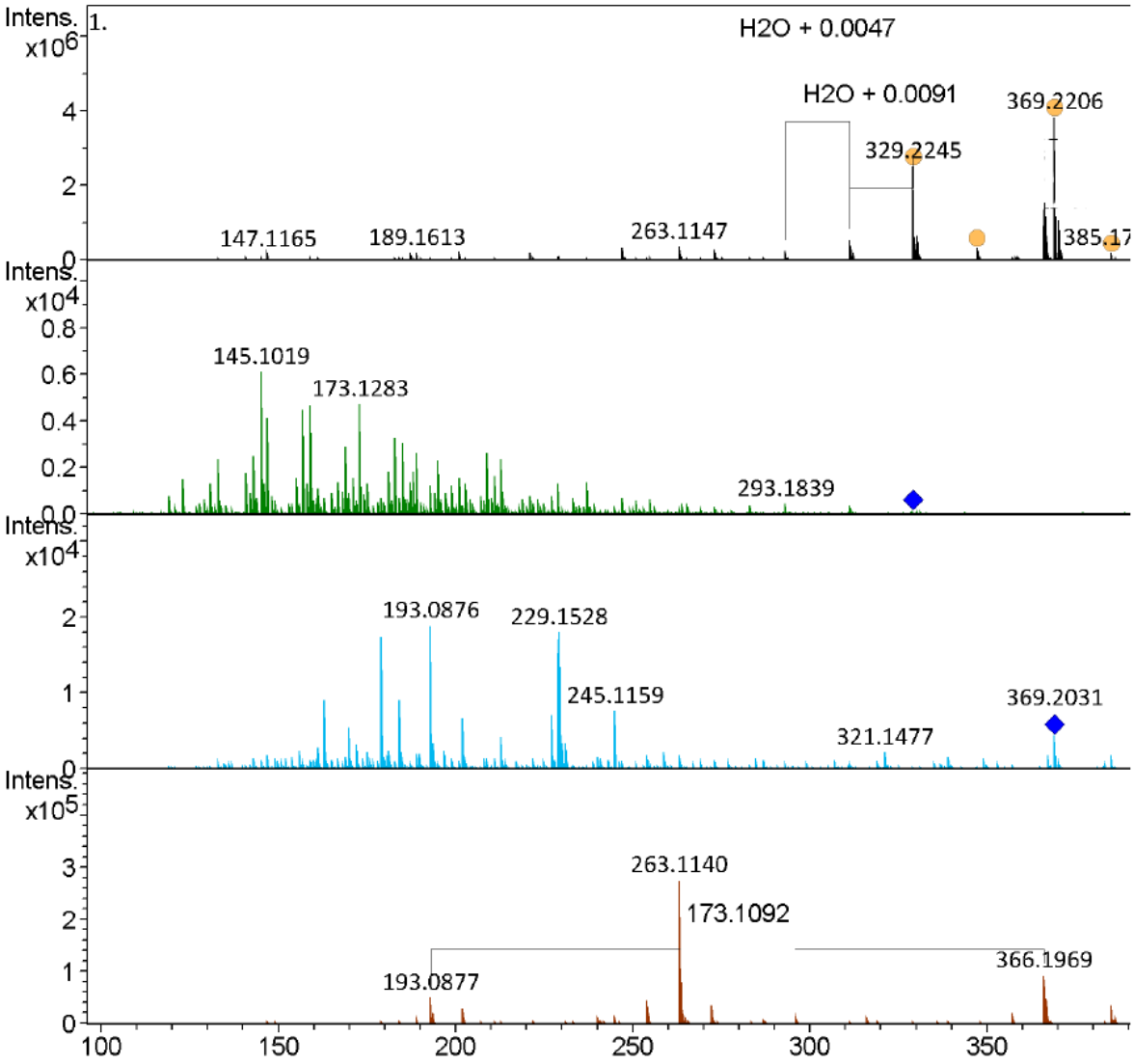

Figure S30: HR-ESI-MS spectrum of compound **5**, Tricycloalternarene 2b

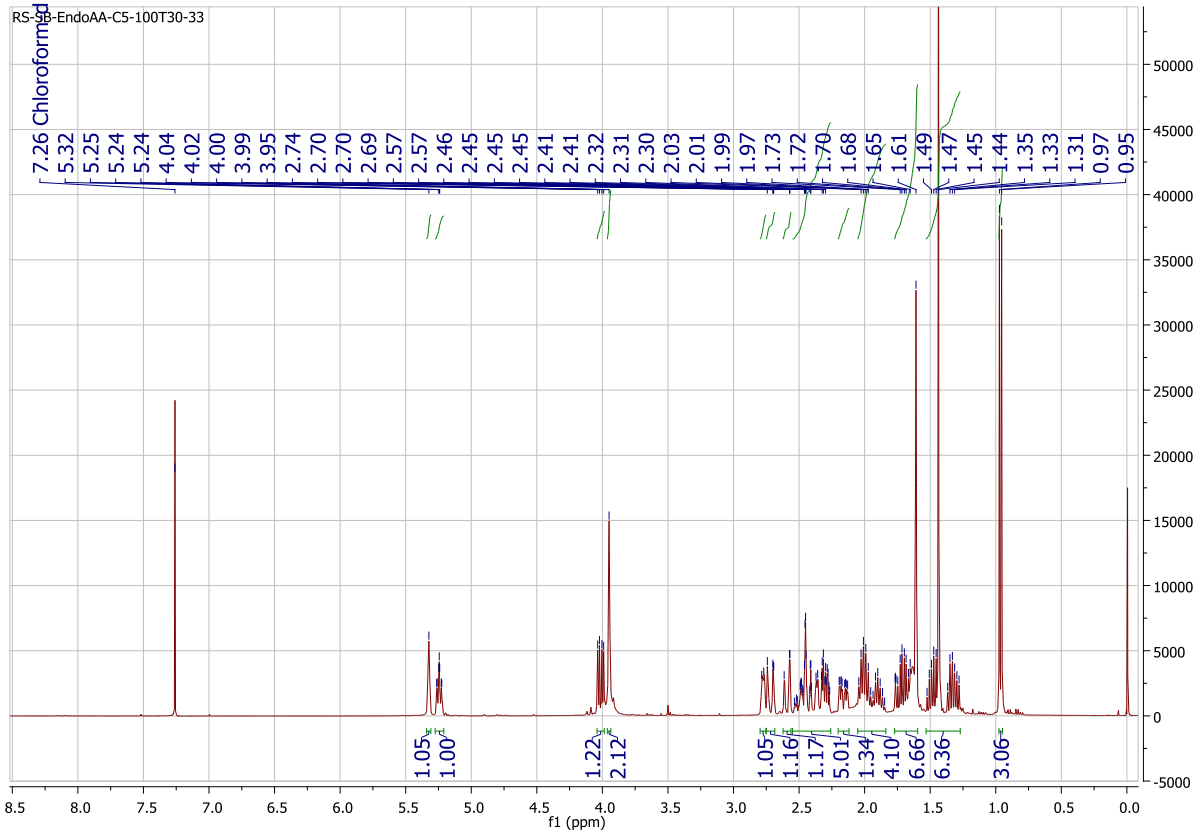

Figure S31: ^{1}H-NMR spectrum of compound **5,** Tricycloalternarene 2b, in $CDCl_3$ (400 MHz)

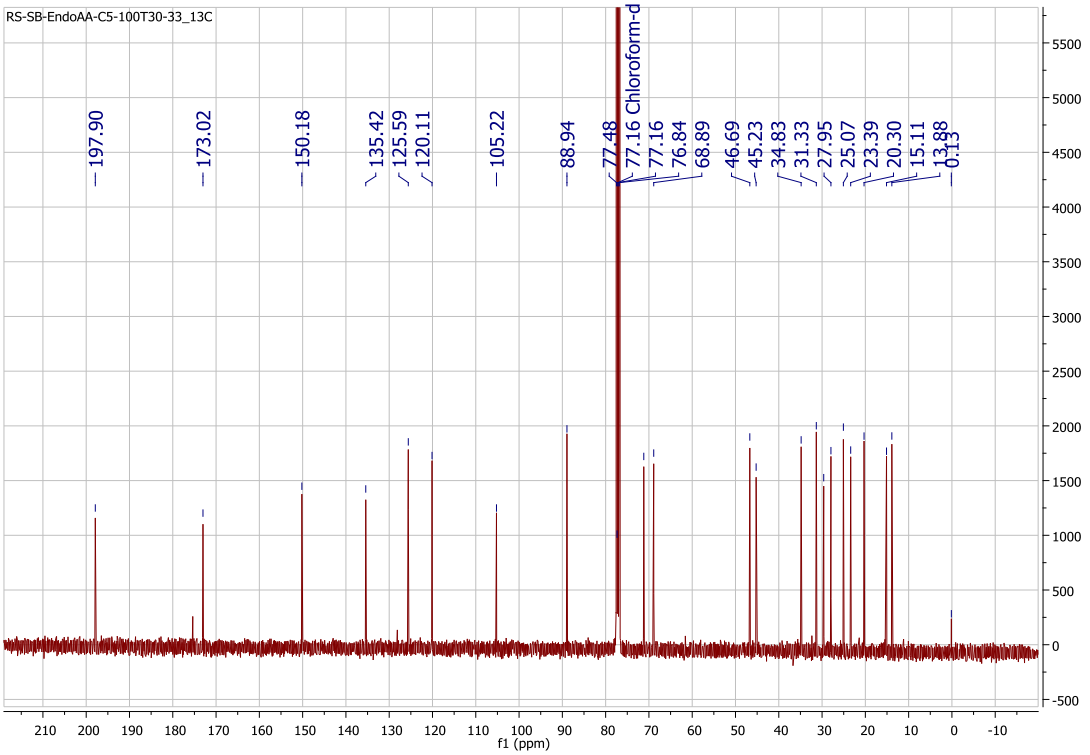

Figure S32: ^{13}C-NMR spectrum of compound **5,** Tricycloalternarene 2b, in $CDCl_3$ (100 MHz)

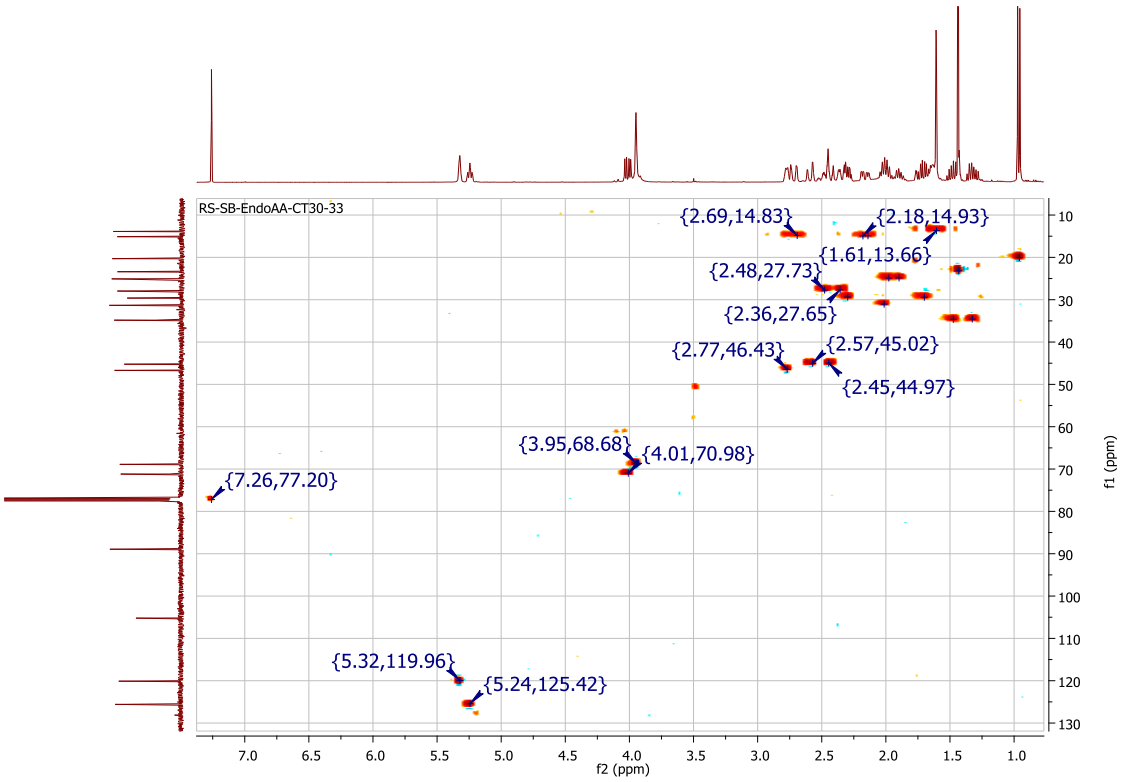

Figure S33: HSQC spectrum of compound **5,** Tricycloalternarene 2b, in $CDCl_3$

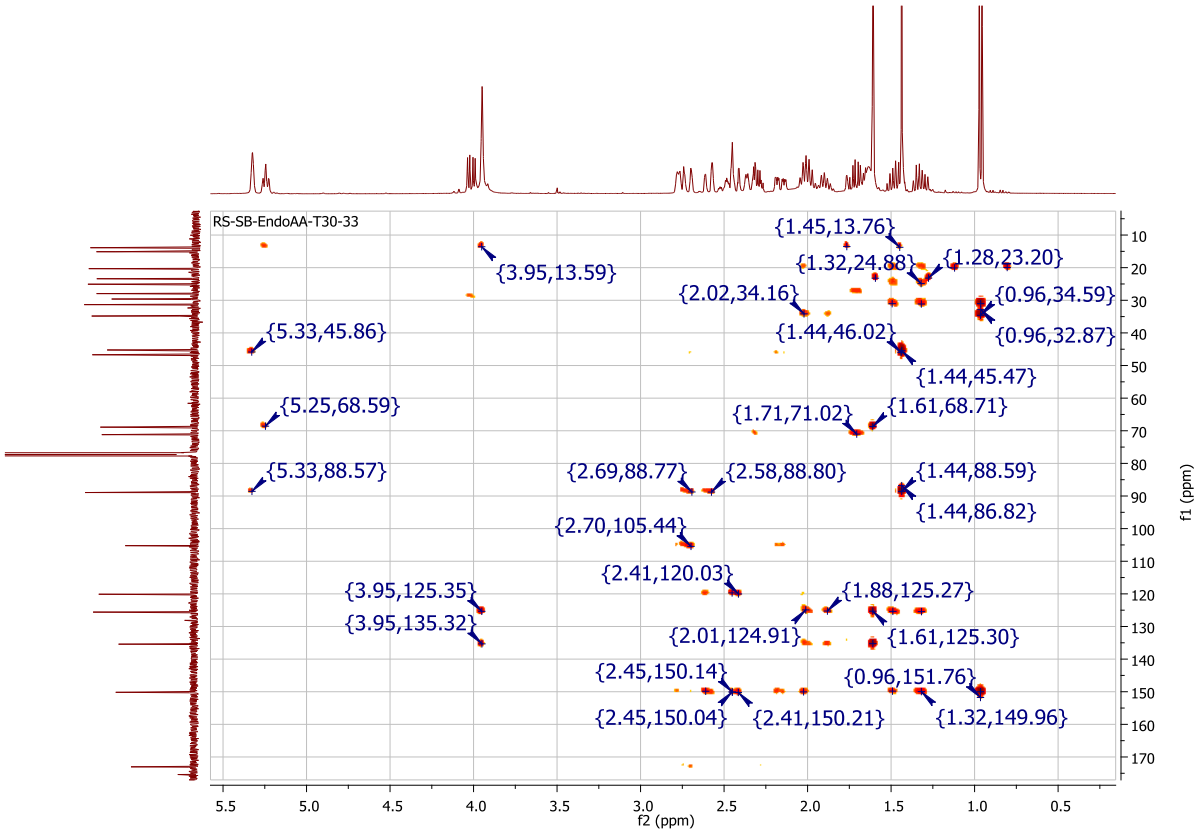

Figure S34: HMBC spectrum of compound **5,** Tricycloalternarene 2b, in $CDCl_3$

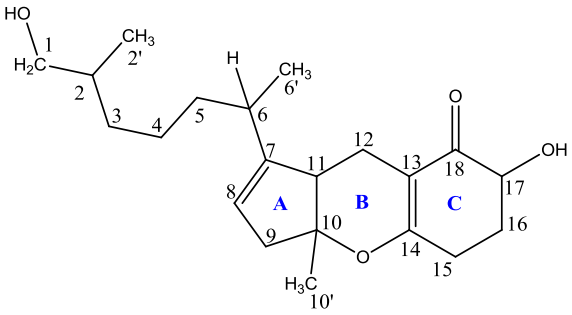

Figure S35: Chemical structure of compound **6,** Tricycloalternarene 1b

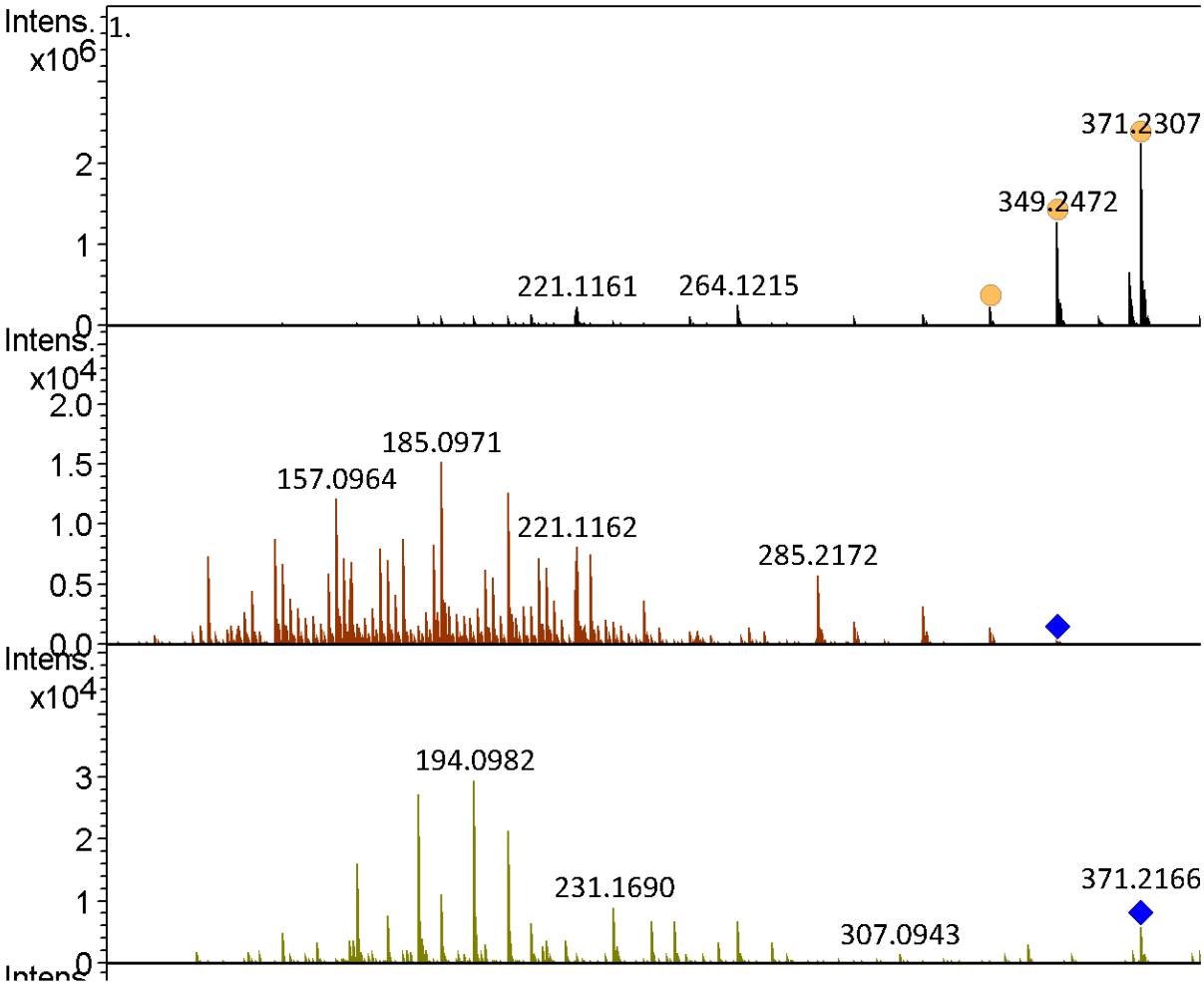

Figure S36: HR-ESI-MS spectrum of compound **6**, Tricycloalternarene 1b

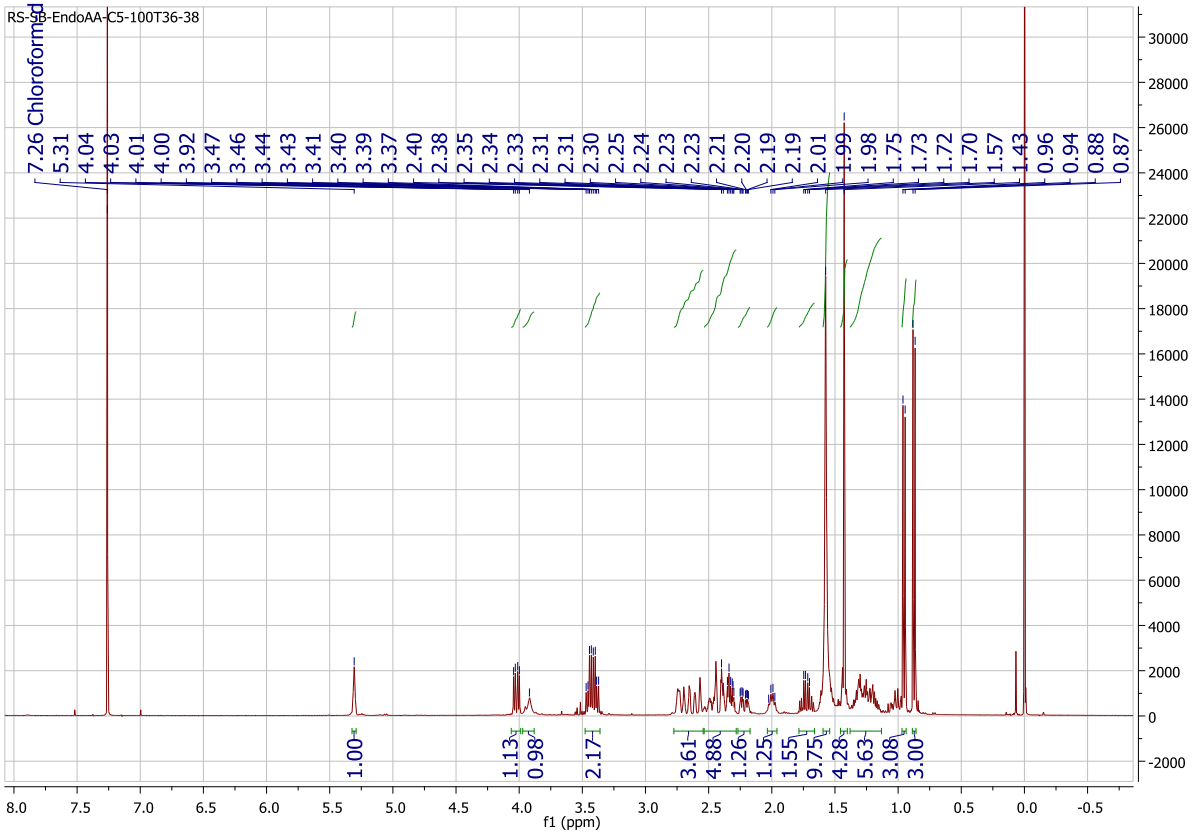

Figure S37: ^{1}H-NMR spectrum of compound **6,** Tricycloalternarene 1b, in $CDCl_3$ (400 MHz)

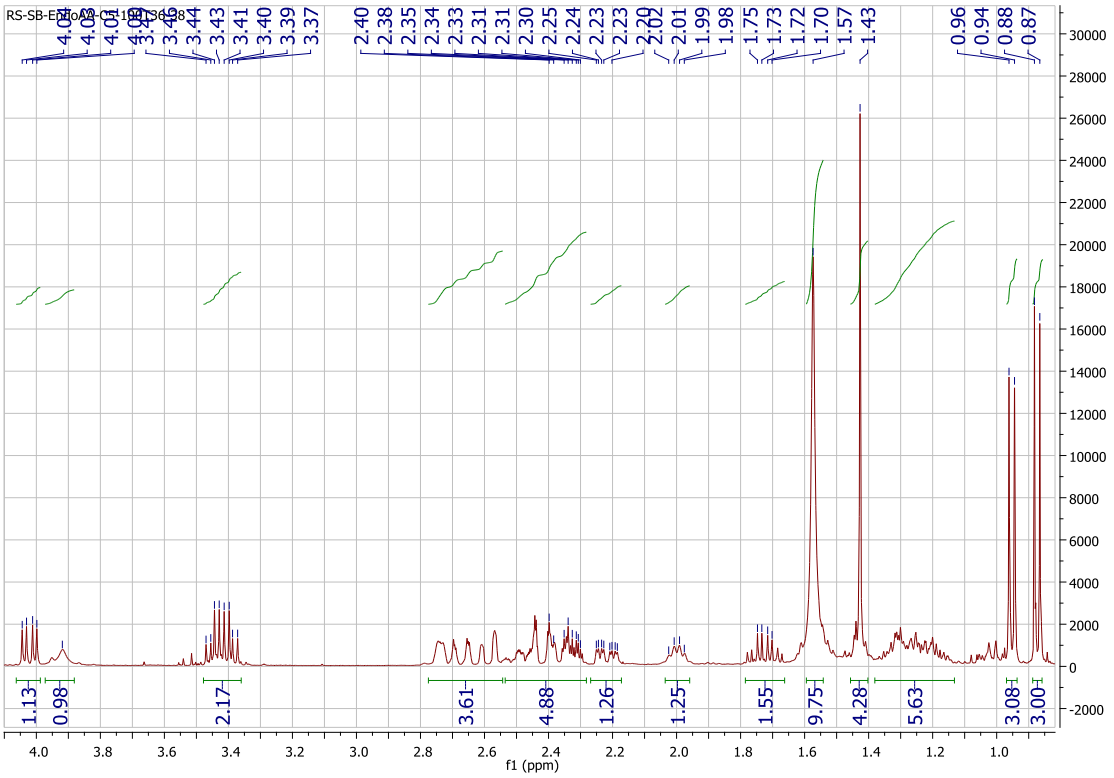

Figure S38: Zoom ^{1}H-NMR spectrum of compound **6,** Tricycloalternarene 1b, in $CDCl_3$ (400 MHz)

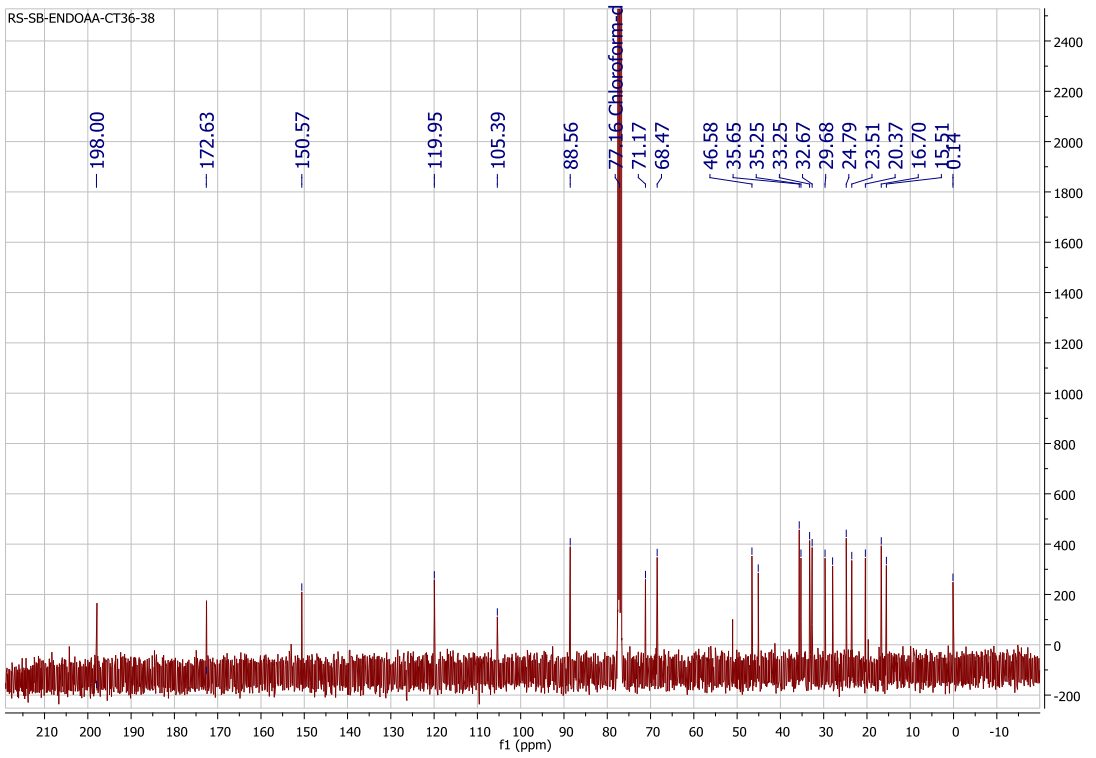

Figure S39: ^{13}C-NMR spectrum of compound **6,** Tricycloalternarene 1b, in $CDCl_3$ (100 MHz)

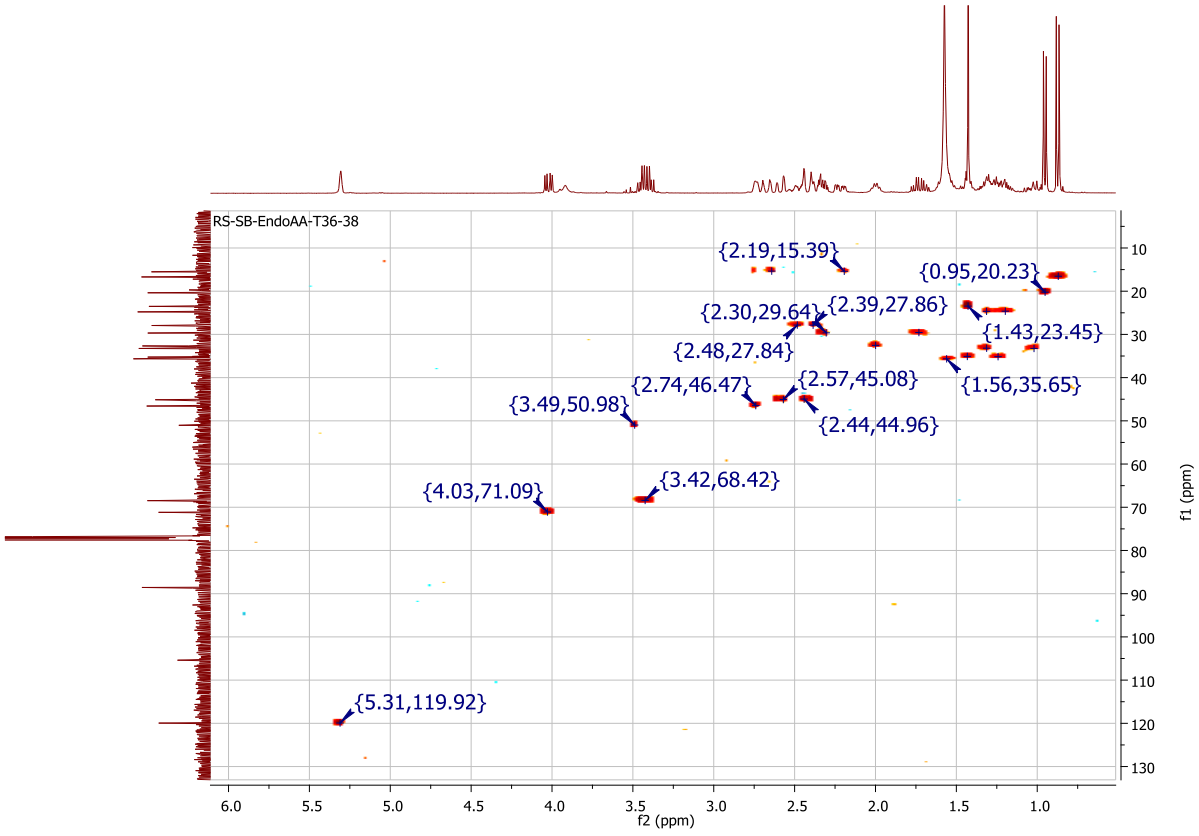

Figure S40: HSQC spectrum of compound **6,** Tricycloalternarene 1b, in $CDCl_3$

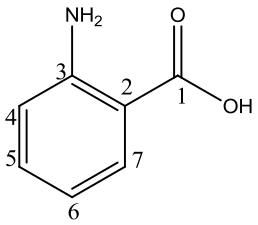

Figure S41: Chemical structure of compound **7,** Anthranilic acid

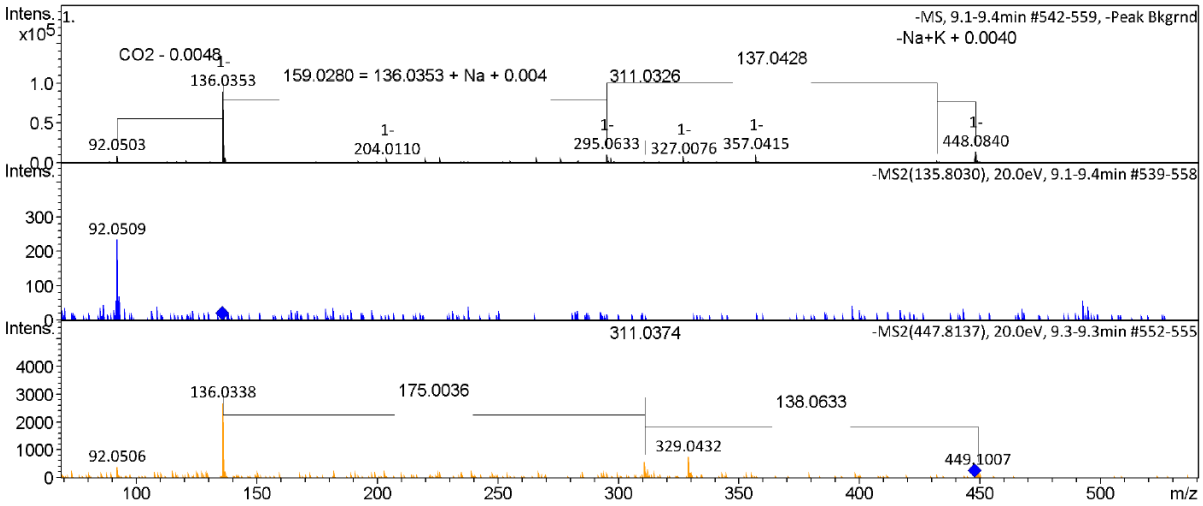

Figure S42: HR-ESI-MS spectrum of compound **7**, Anthranilic acid

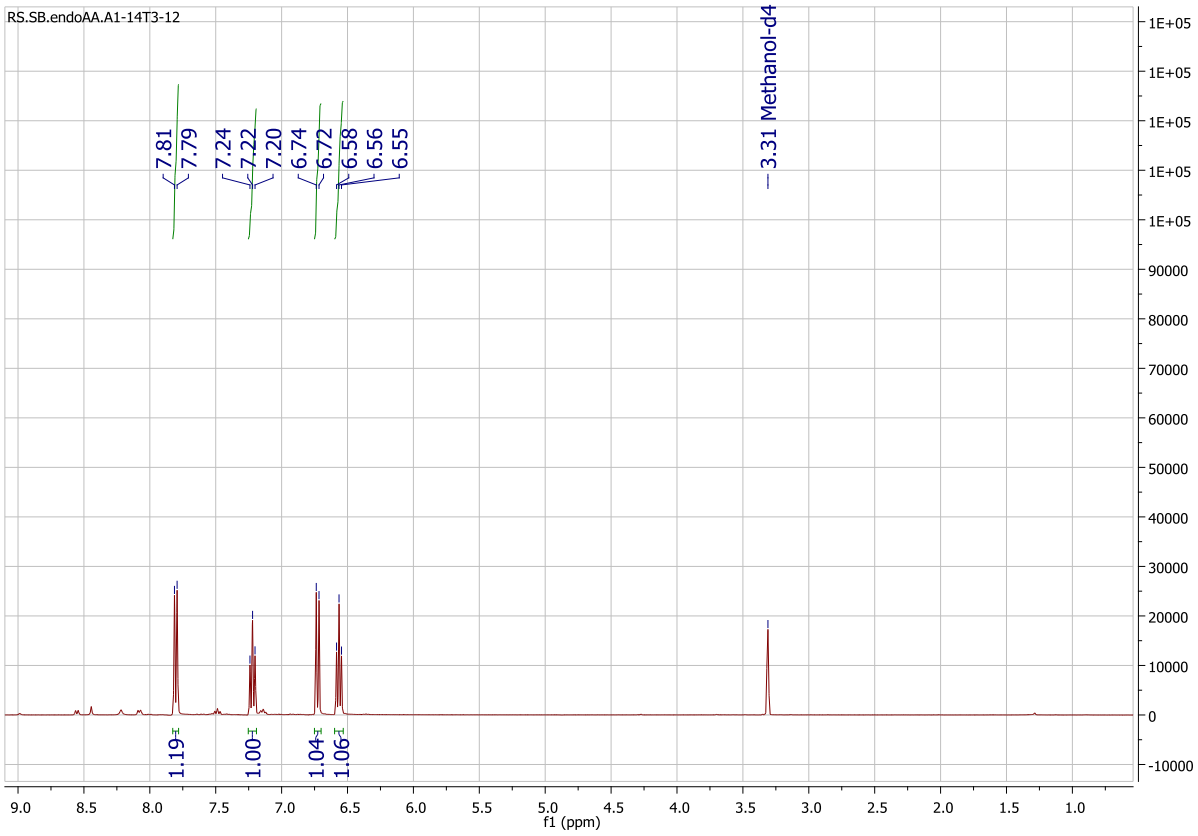

Figure S43: ^{1}H-NMR spectrum of compound **7,** Anthranilic acid, in CD_3OD (400 MHz)

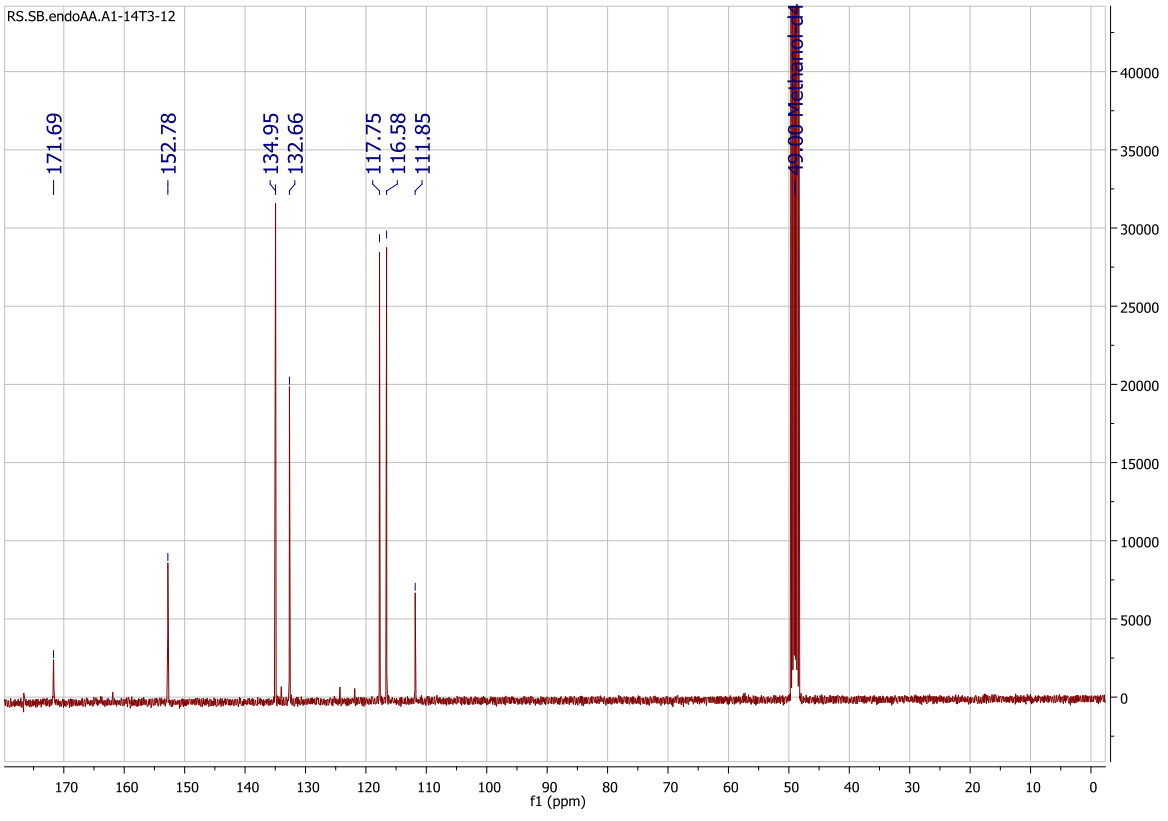

Figure S44: ^{13}C-NMR spectrum of compound **7,** Anthranilic acid, in CD_3OD (100 MHz)

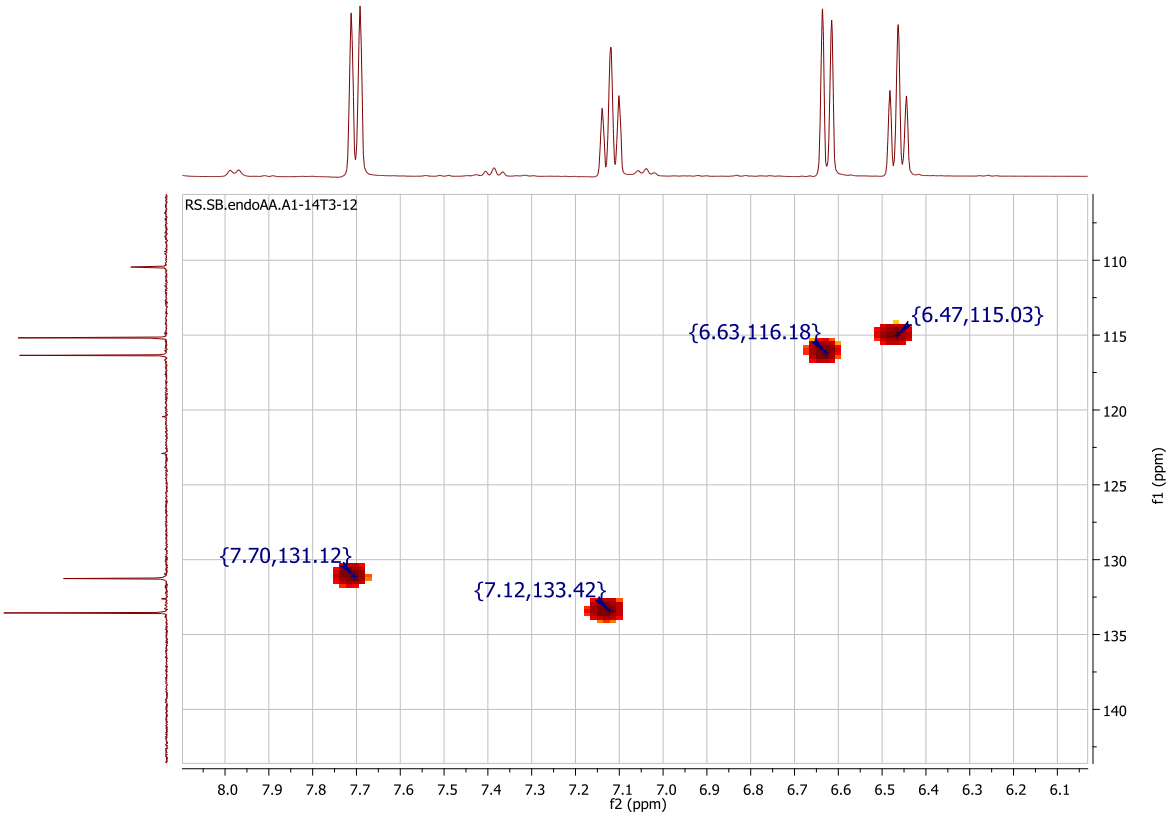

Figure S45: HSQC spectrum of compound **7,** Anthranilic acid, in CD_3OD

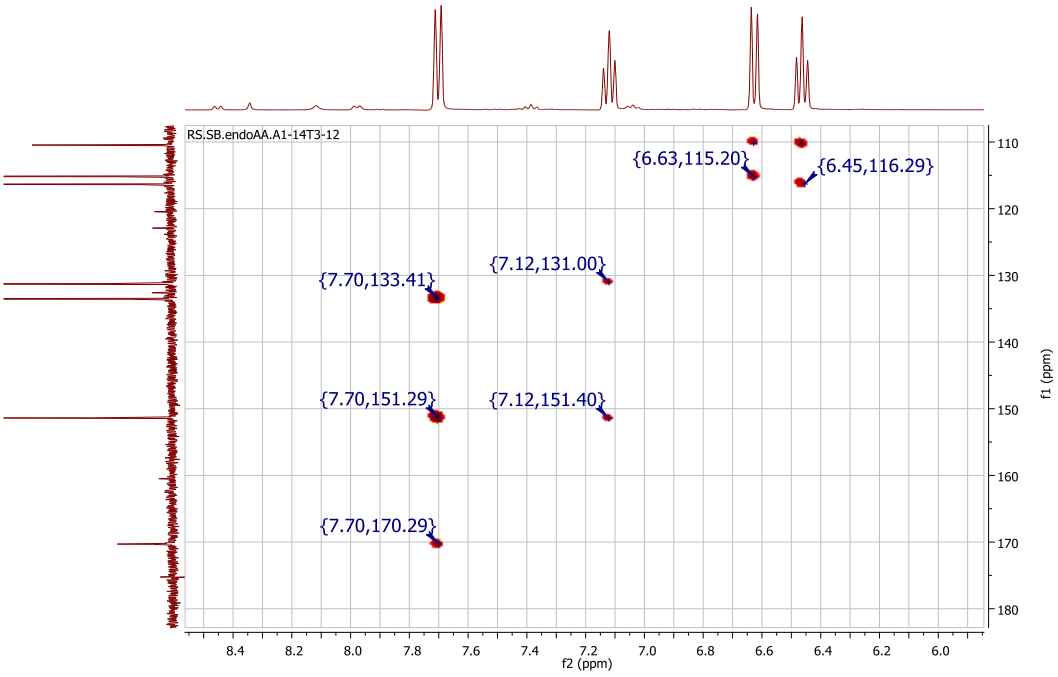

Figure S46: HMBC spectrum of compound **7,** Anthranilic acid, in $CDCl_3$

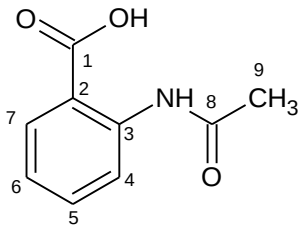

Figure S47: Chemical structure of compound **8,** *o*-acetamidobenzoic acid

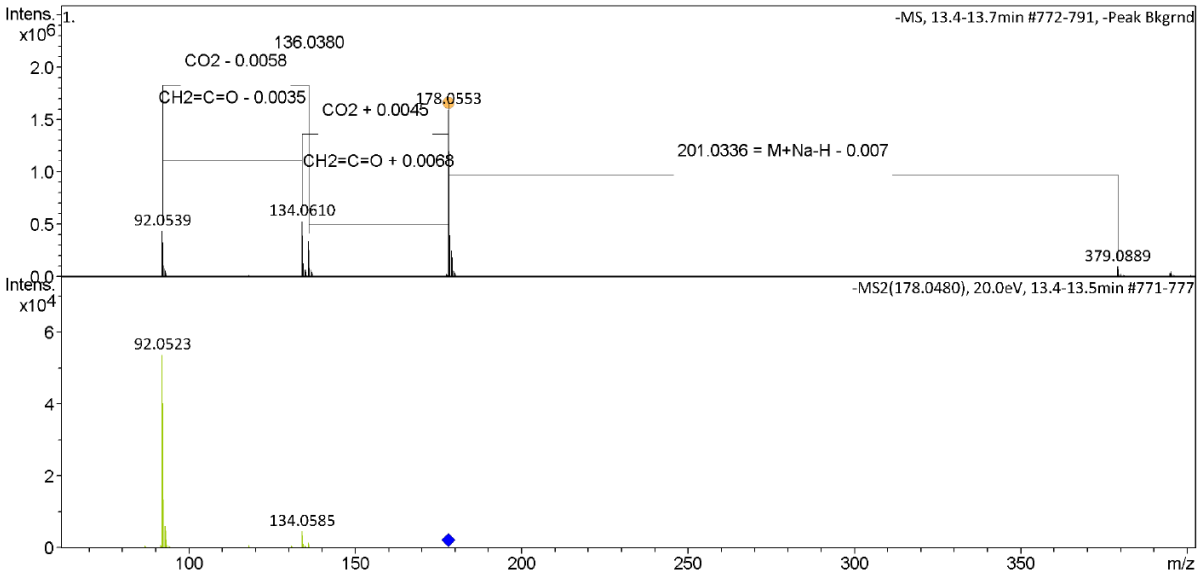

Figure S48: HR-ESI-MS spectrum of compound **8**, *o*-acetamidobenzoic acid

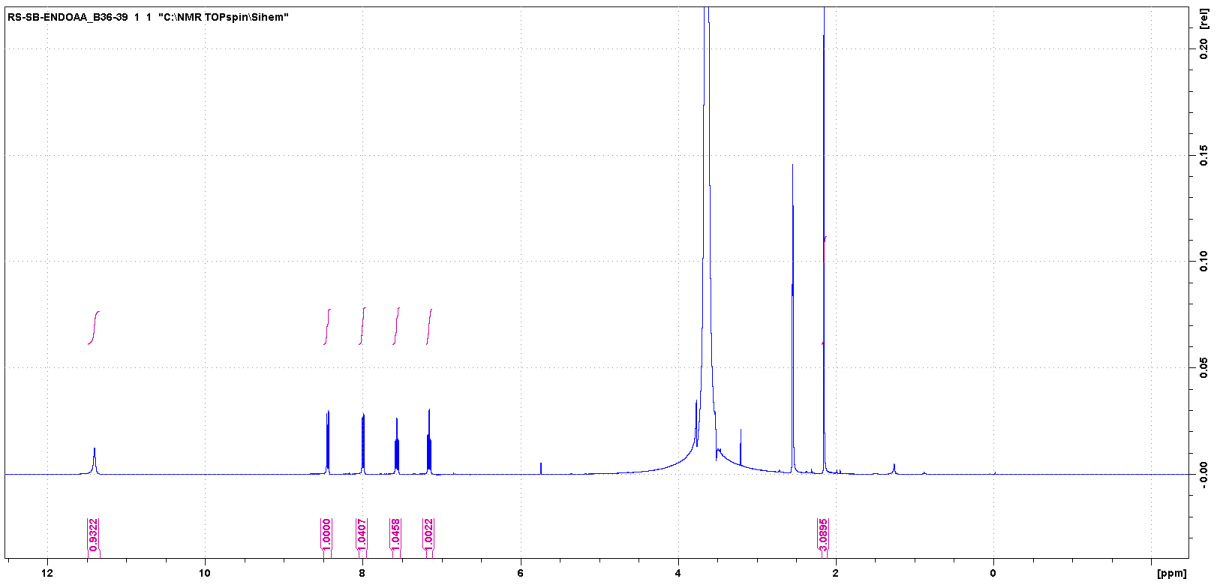

Figure S49: ^{1}H-NMR spectrum of compound **8,** *o*-acetamidobenzoic acid, in DMSO-d_6 (400 MHz)

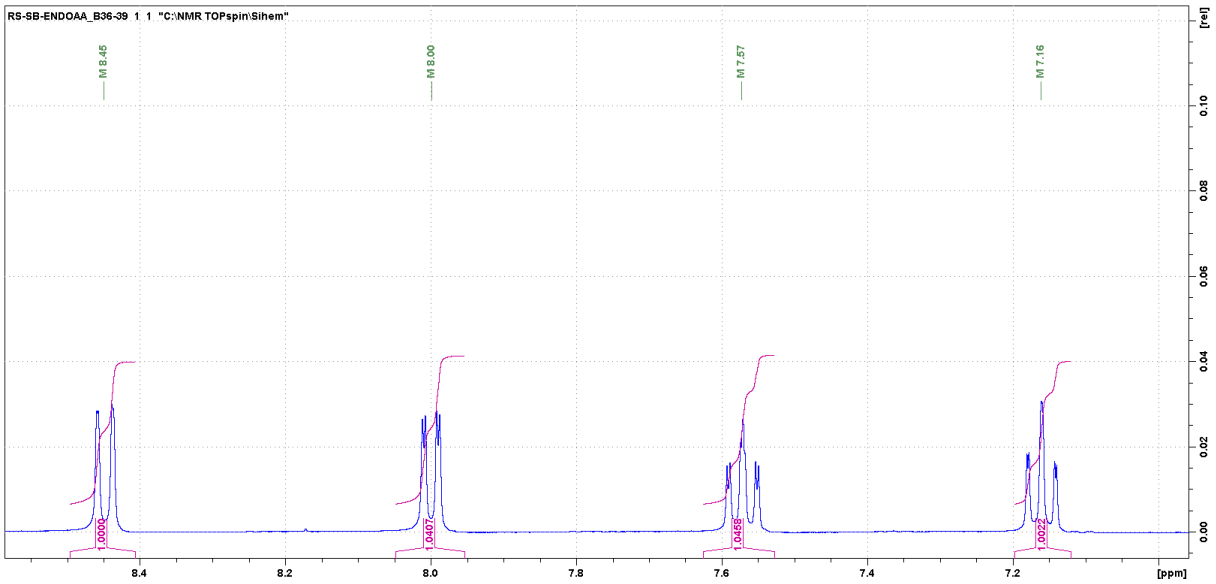

Figure S50: Zoom ^{1}H-NMR spectrum of compound **8,** *o*-acetamidobenzoic acid, in DMSO-d_6 (400 MHz)

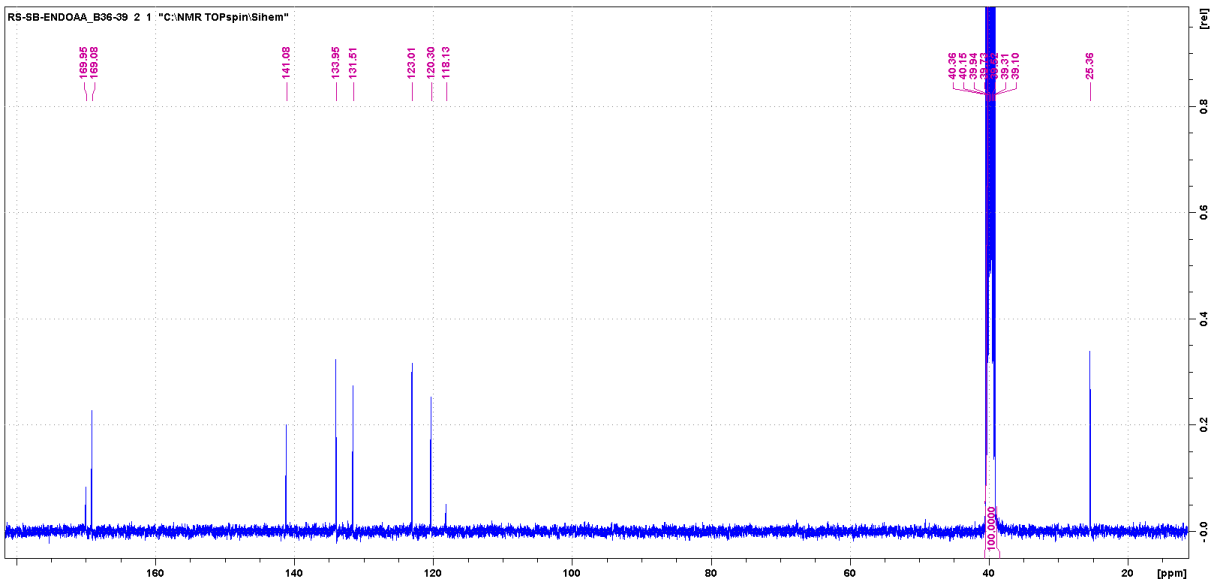

Figure S51: ^{13}C-NMR spectrum of compound **8,** *o*-acetamidobenzoic acid, in DMSO-d_6 (100 MHz)

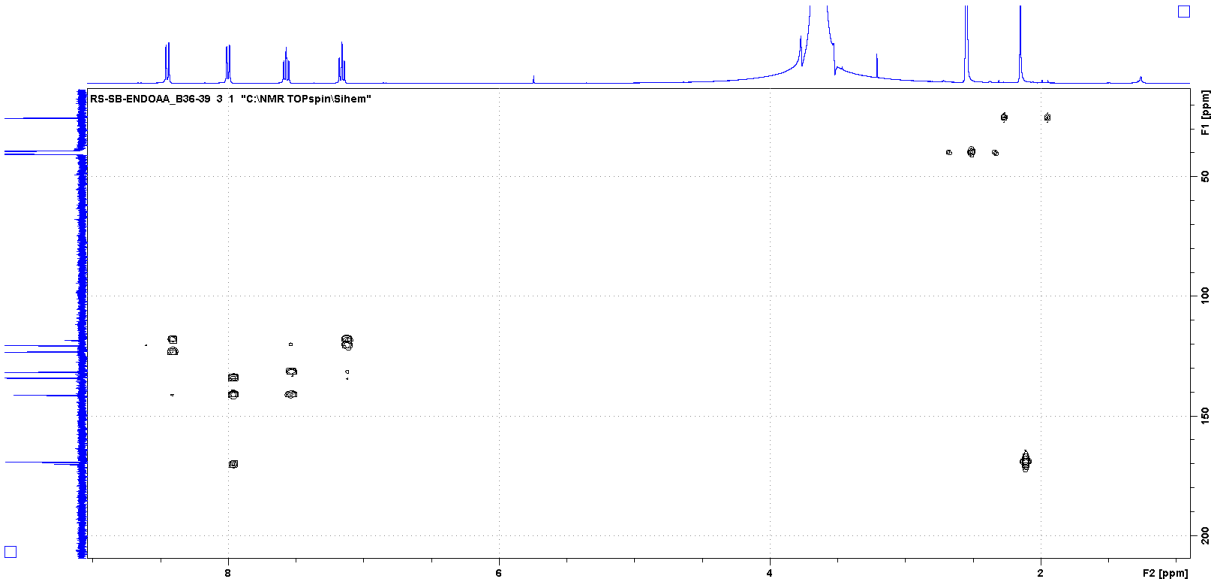

Figure S52: HMBC spectrum of compound **8,** *o*-acetamidobenzoic acid, in DMSO-d_6