

Supplementary Material

Enhancement of toxic efficacy of alkylated polycyclic aromatic hydrocarbons transformed by *Sphingobium quisquiliarum*

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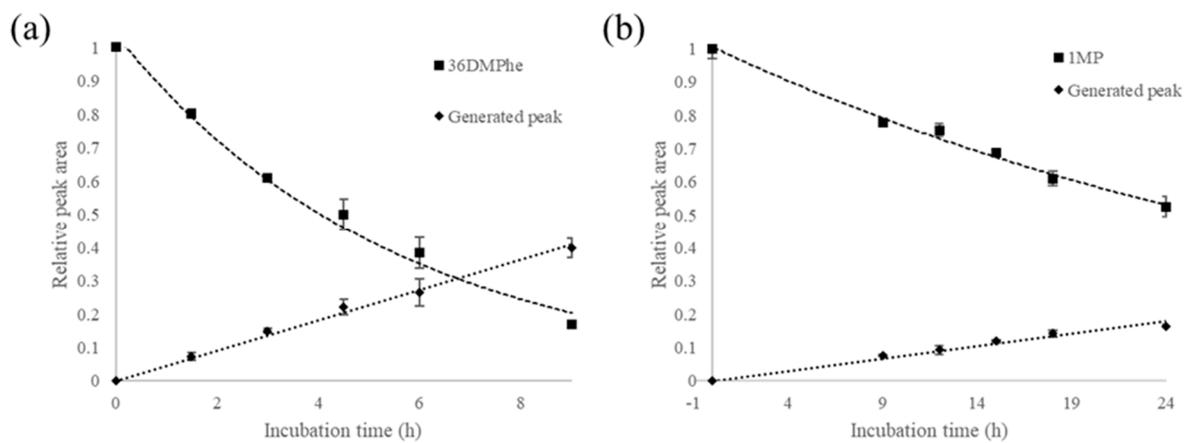


Figure S1. Relative peak areas of (a) 3,6-dimethylphenanthrene and generated peak and (b) 1-methylpyrene and generated peak during biodegradation tests.

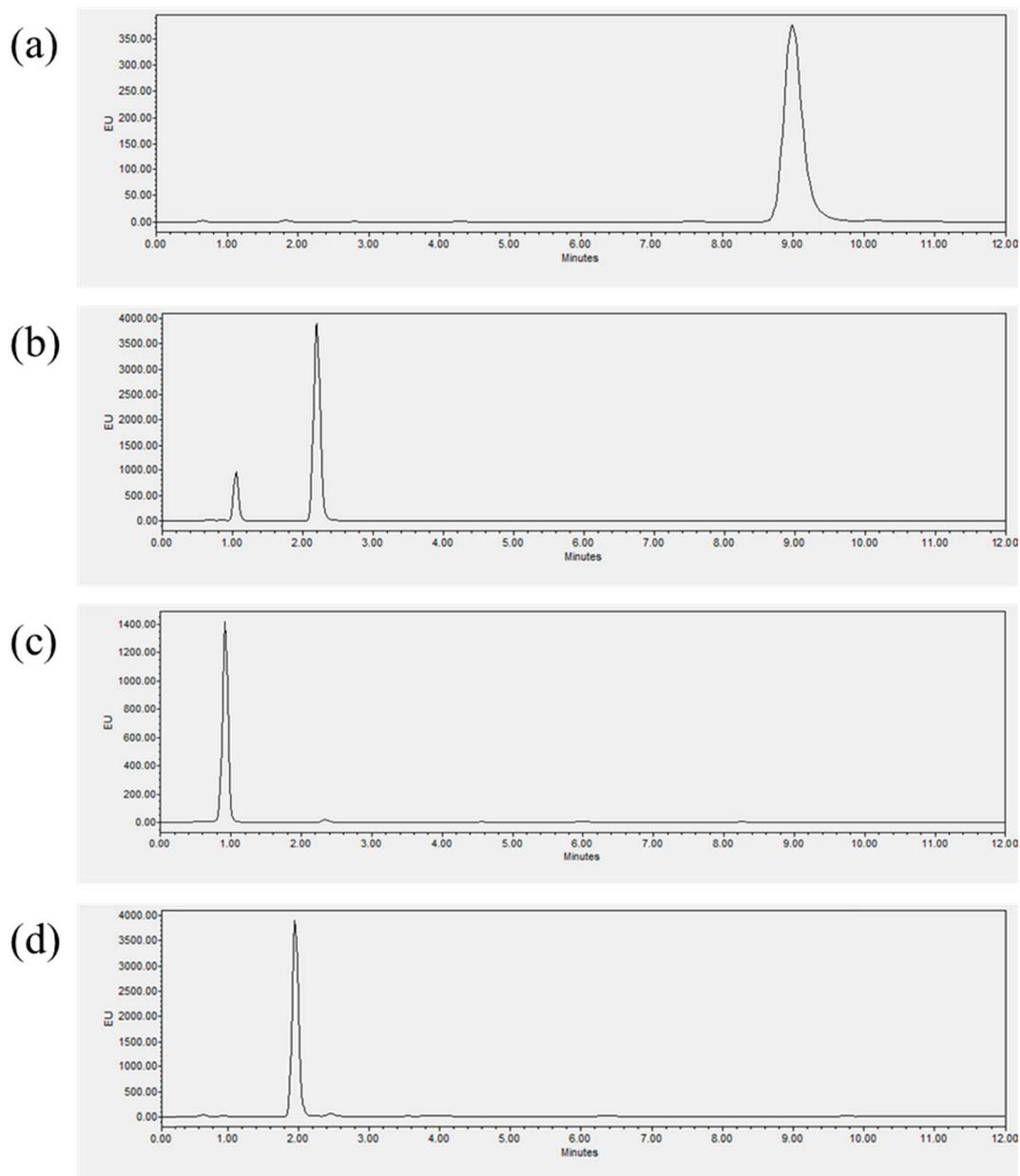
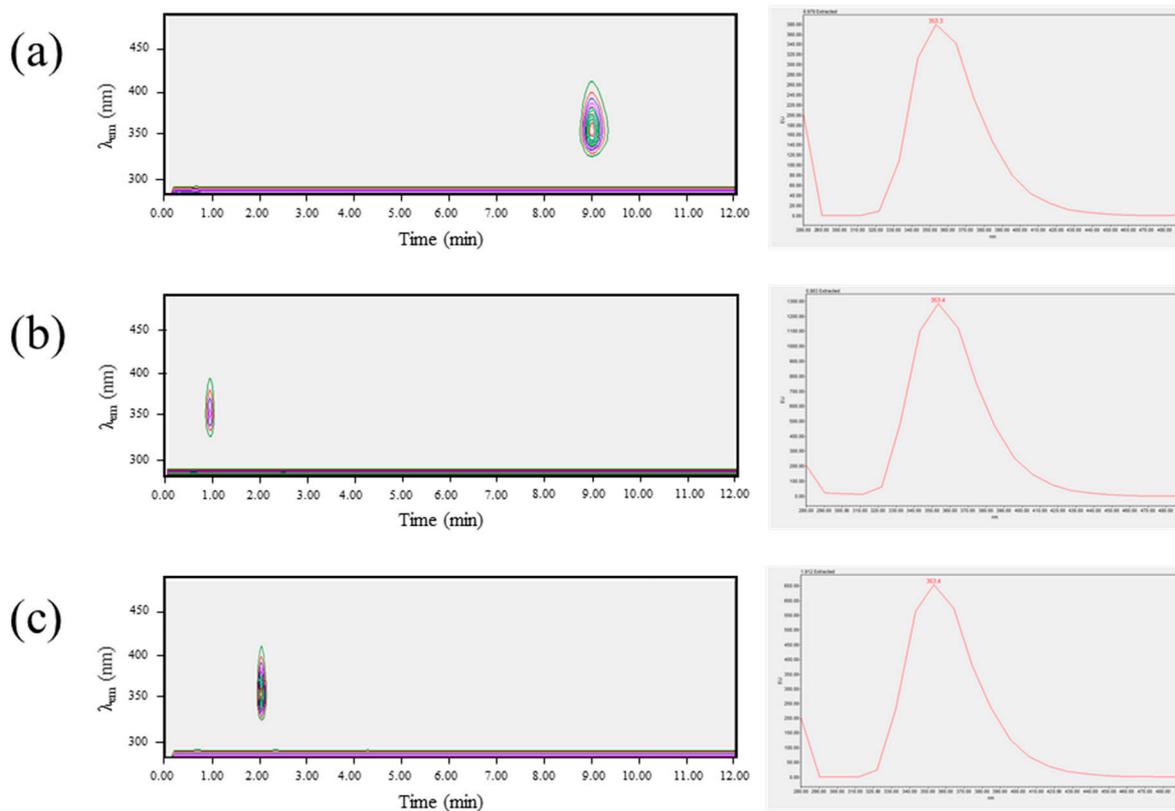


Figure S2. HPLC Chromatograms of (a) 3,6-dimethylphenanthrene, (b) products of biodegradation, (c) the first fractionated metabolic product (36DMPhe_F1) and (d) the second fractionated metabolic product (36DMPhe_F2).

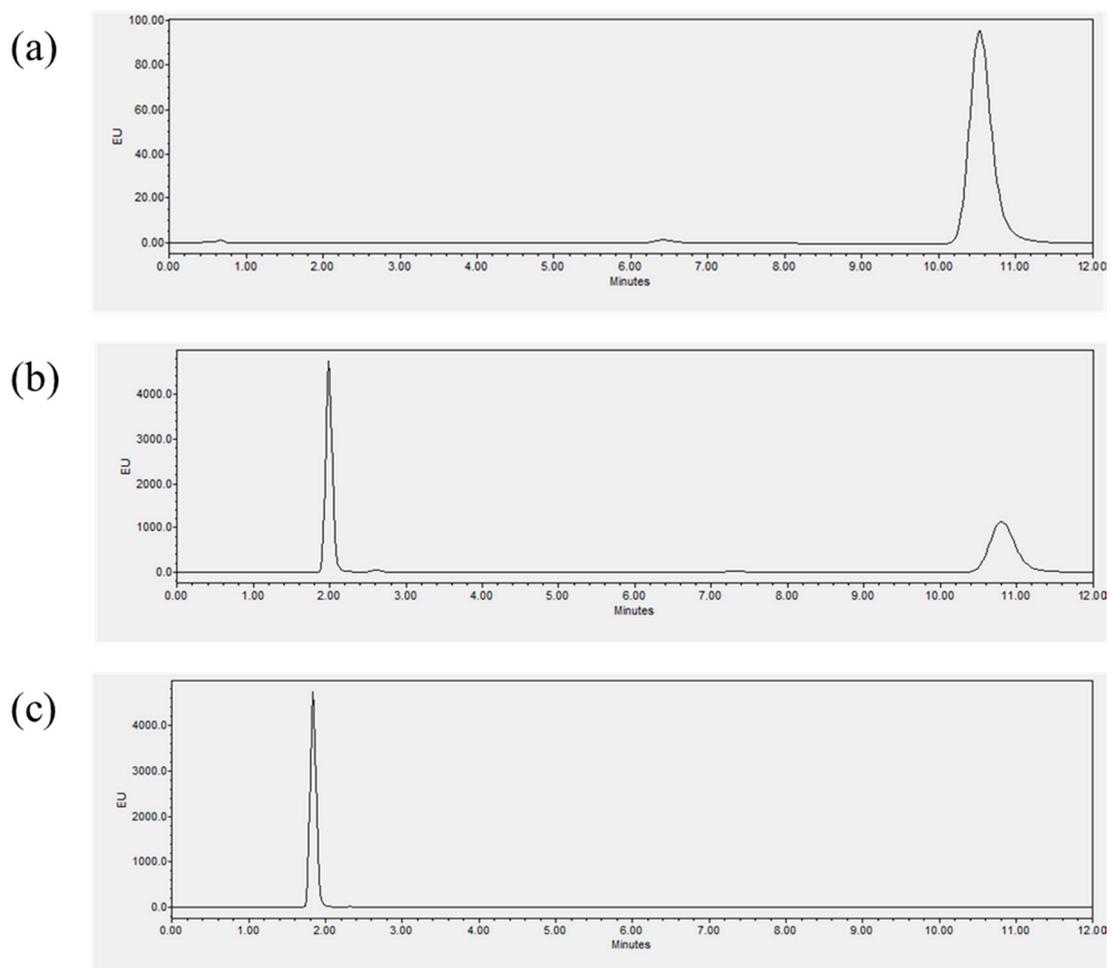


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2 **Figure S3.** Three-dimensional scanning of λ_{em} with fixed λ_{ex} of 260 nm (left) and the optimum
 3 λ_{em} (right) for (a) 3,6-dimethylphenanthrene and (b) the first fractionated metabolic product
 4 (36DMPhe_F1) and (c) the second fractionated metabolic product (36DMPhe_F2).

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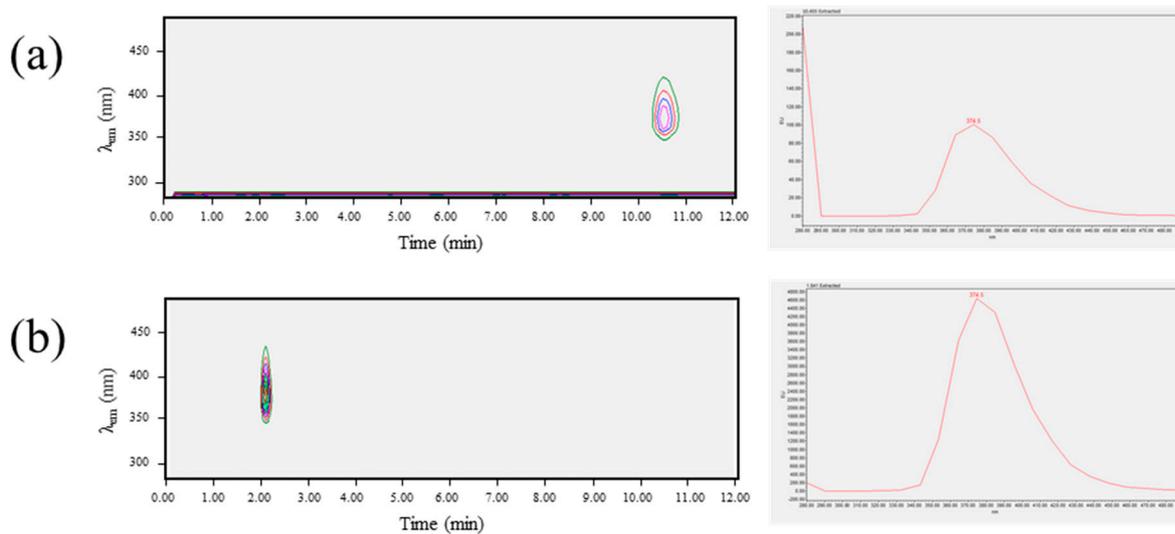
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8 **Figure S4.** HPLC chromatograms of (a) 1-methylpyrene, (b) products of biodegradation, (c)
9 the fractionated metabolic product (1MP_F).

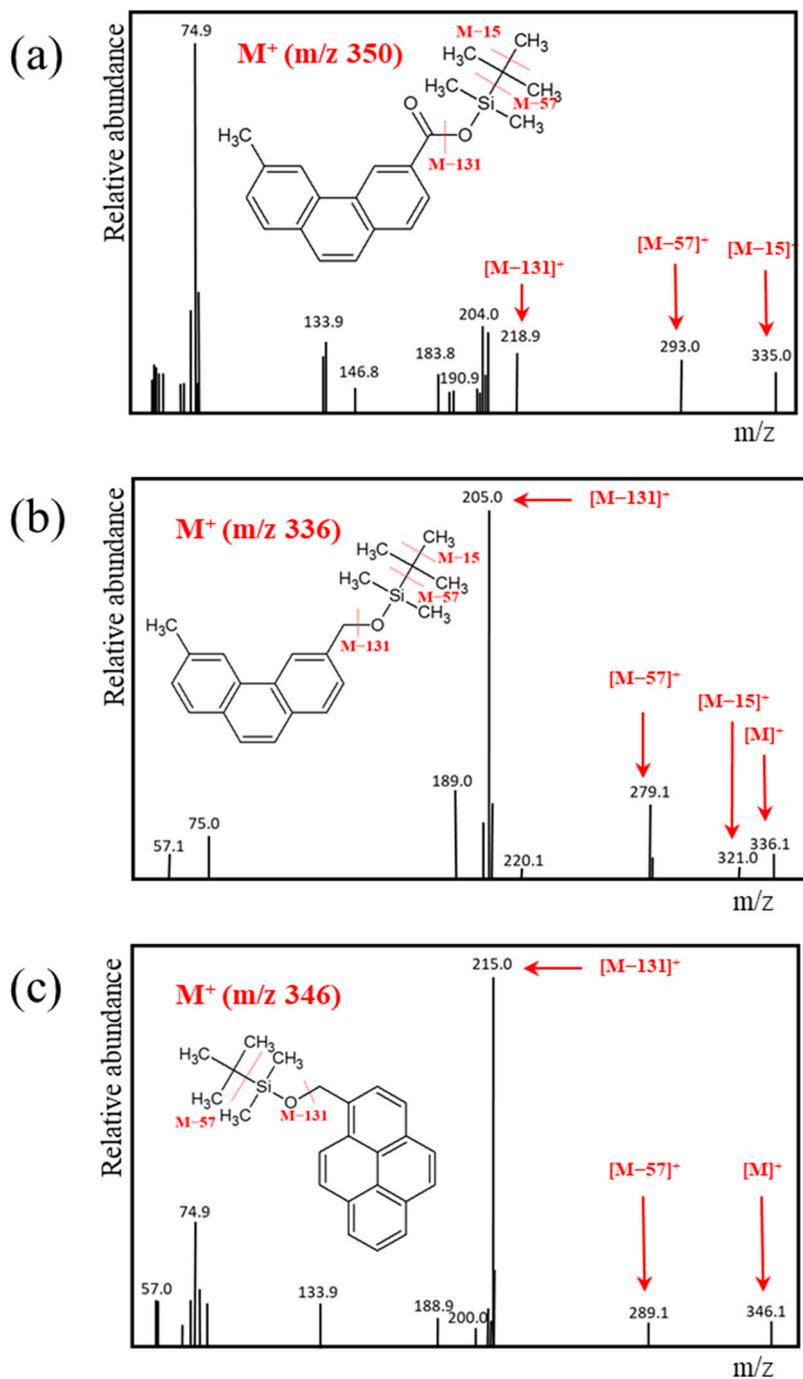
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12 **Figure S5.** Three-dimensional scanning of λ_{em} with fixed λ_{ex} of 260 nm (left panel) and the
 13 optimum λ_{em} (right panel) for (a) 1-methylpyrene, (b) the fractionated metabolic product
 14 (1MP_F).

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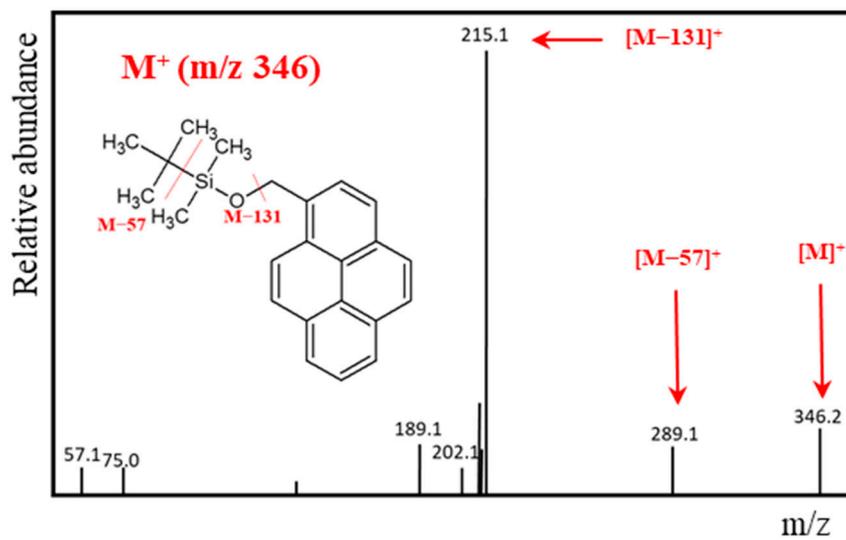


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17 **Figure S6.** The mass fragmentation spectrum of the identified metabolic products of (a)

18 3,6DMPhe_F1, (b) 3,6DMPhe_F2, and (c) 1MP_F with their derivatized structures.

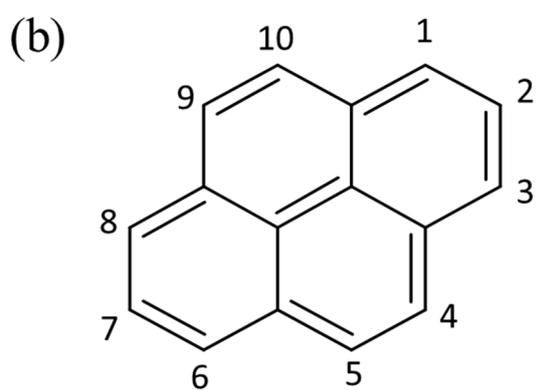
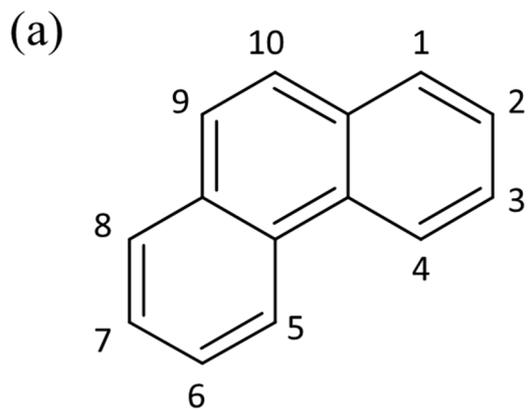
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