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Action mechanism of bleaching herbicide cyclopyrimorate, a novel homogentisate solanesyltransferase inhibitor

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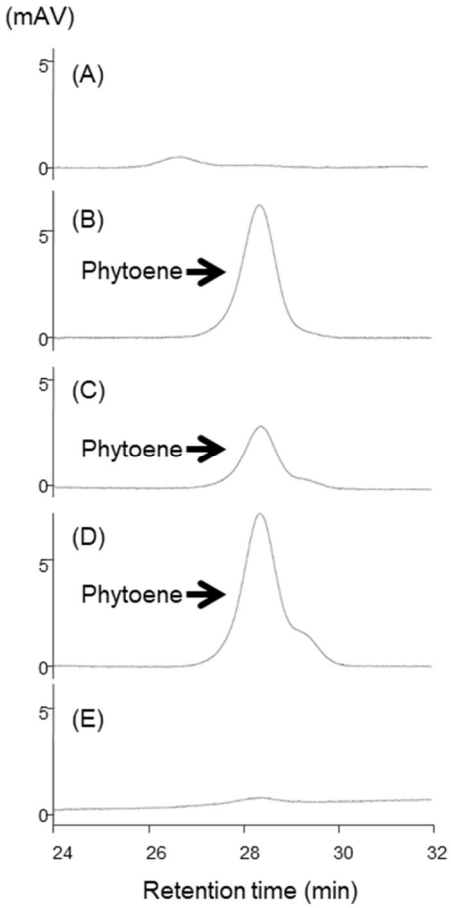
Supplemental Table S1. The amount of plastoquinone (PQ) and homogentisate (HGA) in *Arabidopsis* seedlings 5 days after herbicide treatment.

		Amount	
	Treatment concentration (ppm)	PQ (%)	HGA (ng/mg)
DMC	1000	0	1.31±0.144
	500	5.98±2.78	0.615±0.0463
	250	12.0±7.63	0.433±0.149
Haloxydine	1000	0	0.196±0.0175
Control	0	100±9.97	0.0358±0.0114

Data for PQ are normalized relative to the control, and data for HGA are expressed on a fresh weight basis. Values represent the mean ± SD (n = 3).

Supplemental Fig. S1. Effect of cyclopyrimorate treatment on *Arabidopsis* seedlings.

(A) 0 ppm (control), (B) 100 ppm, (C) 200 ppm, (D) 400 ppm, (E) 800 ppm, (F) 1600 ppm. The upper panel shows whole seedlings, whereas the lower panel shows the expanded leaves of each seedling. Images were taken 5 days after sowing. Scale bar = 1 mm.



Supplemental Fig. S2. HPLC analysis (at a wavelength of 286 nm) of acetone extracts from *Arabidopsis* leaves 7 days after treatment.

(A) control, (B) cyclopyrimorate (5 mM), (C) mesotrione (1 mM), (D) norflurazon (1 mM), (E) clomazone (5 mM). The method of HPLC analysis was almost the same as that for PQ. Only the column oven temperature was changed to 20°C. Phytoene was identified by LC-MS.