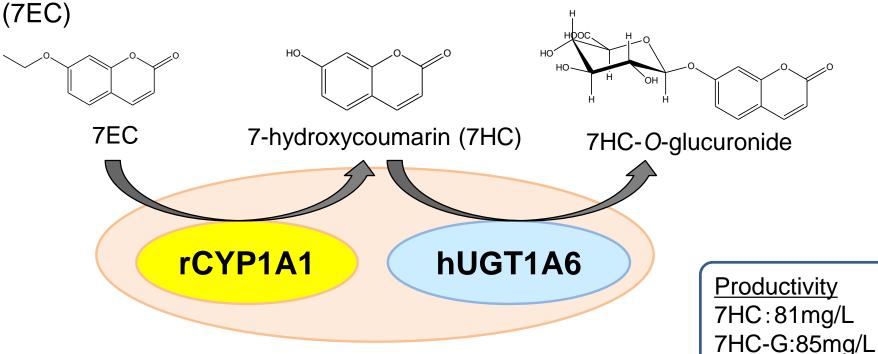
Case studies for metabolite preparation (1)

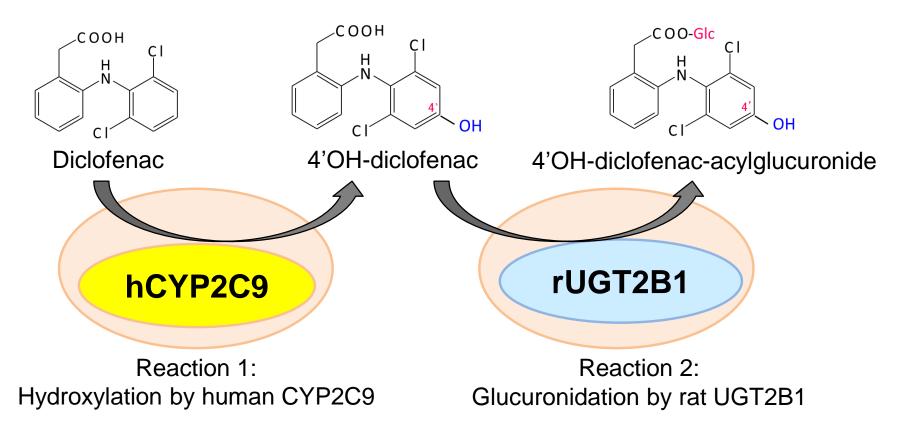
Sequential /simultaneous production of P450 and UGT metabolites

One step preparation of P450 and UGT metabolites from 7-ethoxycoumarin



Co-expression system of rat CYP1A1 and humanUGT1A6

■ Two step preparation of multiple metabolites from diclofenac



Productivity

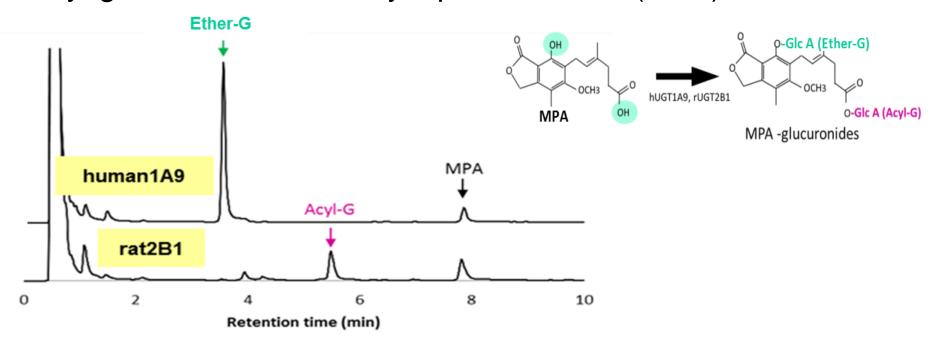
4'OH-diclofenac: 166mg/L

4'OH-diclofenac-acylG:97mg/L

Case studies for metabolite preparation (2)

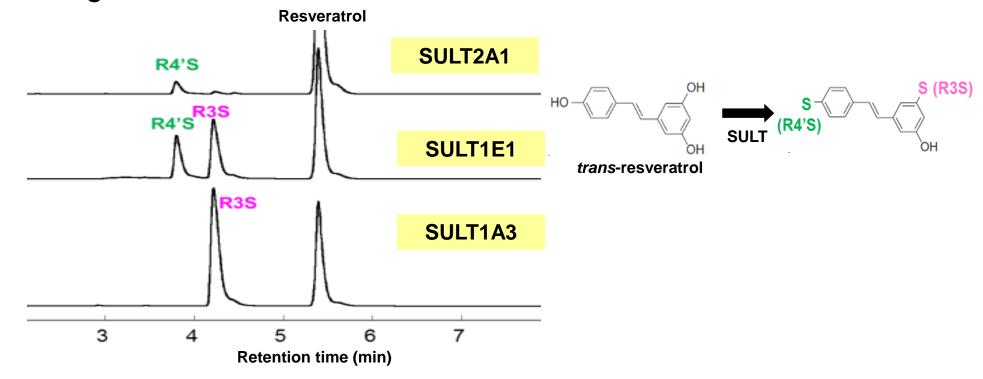
Regio-selective production of metabolites

Acyl glucuronidation of mycophenolic acid (MPA)



Rat UGT2B1 is the most effective enzyme for the preparation of mycophenolic acid.

■ Regio-selective sulfation of resveratrol



SULT2A1 predominantly produced 4'-sulfo-conjugate and SULT1A3 selectively produced 3-sulfo-conjugate respectively, whereas SULT1E1 produced both metabolites at same preference.

We prepare the target metabolite by selecting the most suitable enzyme.