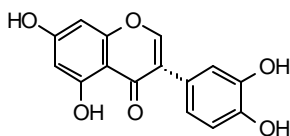


Plant Sciences 407b Plant Secondary Metabolism

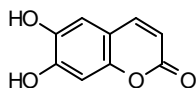
Assignment No. 5 Phenolic Biosynthesis

Due Monday March 29, 2004

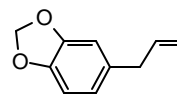
1. For each of the following compounds, state the class of phenolic it represents, and describe (point form) its biosynthesis from a hydroxycinnamic acid. [2 marks]



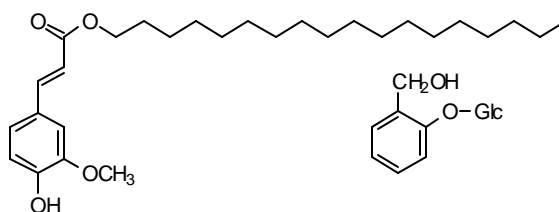
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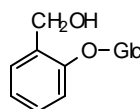
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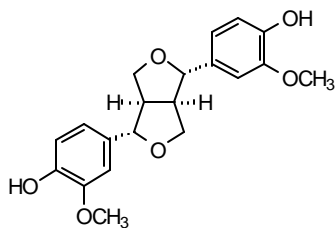
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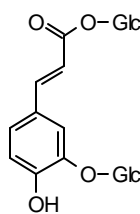
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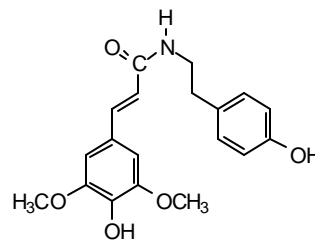
5



6



7



8

2. Describe the synthesis of *p*-coumaroyl-CoA from phenylalanine. Using examples, discuss why *p*-coumaroyl-CoA is considered to be a central intermediate in phenylpropanoid metabolism. [3 marks]