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(54) Title: RECOMBINANT POLYPEPTIDES FOR BIOSYNTHESIS OF THYMOHYDROQUINONE (THQ)

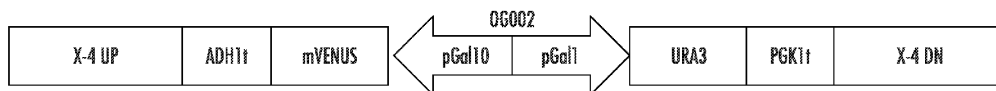


FIG. 1A

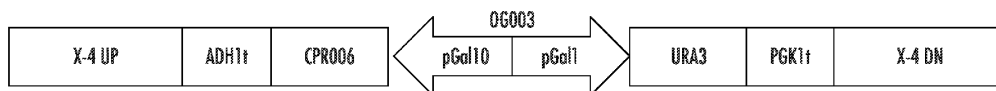


FIG. 1B

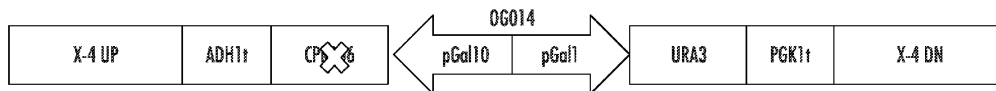


FIG. 1C

(57) Abstract: The present disclosure relates to recombinant polypeptides with cytochrome P450 (CYP) activity capable of selectively catalyzing the conversion of precursor compounds, carvacrol and/or thymol, to the product compound, thymohydroquinone (THQ), and recombinant host cells that heterologously express genes encoding these polypeptides (e.g., in yeast) and that can be used for enhanced fermentative bioproduction of the product compound THQ.

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- *as to applicant's entitlement to apply for and be granted a patent (Rule 4.17(ii))*
- *as to the applicant's entitlement to claim the priority of the earlier application (Rule 4.17(iii))*

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