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(54) **PROTEIN GLYCOSYLATION
MODIFICATION IN *PICCHIA PASTORIS***

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C12N 15/00; C12N 15/74

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(57) **ABSTRACT**

The present invention provides genetically engineered strains of *Pichia* capable of producing proteins with reduced glycosylation. In particular, the genetically engineered strains of the present invention are capable of expressing either or both of an α (1,2)-mannosidase and glucosidase II. The genetically engineered strains of the present invention can be further modified such that the OCH1 gene is disrupted. Methods of producing glycoproteins with reduced glycosylation using such genetically engineered strains of *Pichia* are also provided.

28 Claims, 23 Drawing Sheets