

Title (en)
NUCLEIC ACID-BINDING CHIPS FOR DETECTING GLUCOSE DEFICIENCY CONDITIONS WITHIN THE SCOPE OF BIOPROCESS CONTROL

Title (de)
NUKLEINSÄURE-BINDENDE CHIPS ZUR DETEKTION VON GLUCOSEMANGELZUSTÄNDEN IM RAHMEN DER BIOPROZESSKONTROLLE

Title (fr)
PUCES LIANT L'ACIDE NUCLEIQUE POUR LA DETECTION D'ETATS DE DEFICIENCE EN GLUCOSE DANS LE CADRE D'UNE SURVEILLANCE DE BIOPROCEDES

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Application
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Abstract (en)
[origin: DE102005022145A1] Nucleic acid-binding chip (A) that carries probes for at least 3 of 85 specified genes, where the total number of different glucose deficiency-specific probes is not over 100. Nucleic acid-binding chip (A) that carries probes for at least 3 of 85 specified genes, where the total number of different glucose deficiency-specific probes is not over 100. The genes are: yxeI; dppE; a gene for close homolog of Ald [L-alanine dehydrogenase] (homolog of seq. 157); fruK; ybdN; gene for a putative transcription regulator (homolog of seq. 390); gene for putative methylmalonate-semialdehyde dehydrogenase (acylating) (EC 1.2.1.27; homolog of seq. 159); yvdE; rbsK; hklA; gene for a hypothetical protein (homolog of seq. 103); yvdH; ywfl; ispA; yvyD; gene for glucan-1,4alpha -maltohydrolase (EC 3.2.1.133; homolog of seq. 151); licA; rocD; ycgO; yqiQ; sigX; iolC; licH; iolE; putative gene for a putative ABC-transporter-ATP-binding protein (homolog of seq. 125); rsiX; gene for a hypothetical protein (homolog of seq.123); mmgE; gene for a putative pectin methylesterase (homolog of seq. 63); gene for a putative formate dehydrogeanse alpha -chain (EC1.2.1.2, homolog of seq. 9); iolD; gene for a putative hydroxybenzoate-hydroxylase (homolog of seq. 49); yvql; glpF; gene for a putative enoyl (3-hydroxyisobutryl)-CoA-hydratase protein; EC 4.2.1.17; homolog of seq. 93); ysbA; yvqH; bpr; acdA; yvoA; gene for a putative serine protease (homolog of seq. 35); aprE; yusK; acuA; acsA; acoR; ysiA; pgcM; mmgB; gene for a putative transketolase (EC 2.2.1.1, homolog of seq. 13); mmgD; tdh; mmgC; gene for a putative isocitrate lyase (EC 4.1.3.1; homolog of seq. 105); gene for a putative transcription regulator (homolog of seq. 17); male; mmgA; gene for a putative membrane protein (homolog of seq. 15); yusJ; malA; gene for a putative enoyl-CoA hydratase (EC 4.2.1.17; homolog of seq. 95); glpD; etfB; etfA; ywjF; yvdG; yusL; gene for a putative 2-hydroxy-3-oxopropionate reductase (EC 1.1.1.60 homolog of seq. 99); yvdI; acoC; acoL; ycgM; mmsA; ycgN; yoeB; kbl; yvdJ; yvdK; yfiA; malL; acoA; gene for a putative butyryl-CoA dehydrogenase (homolog of seq. 101); gene for a putative malate synthase (EC 4.1.3.2; homolog of seq. 107); aocB; and gene for a putative transketolase (EC 2.2.1.1; homolog of seq. 11). The sequences are not defined in the specification. Sequences for the genes and probes can be downloaded from the German Patent Office website. An independent claim is also included for a method for determining the physiological status of an organism in which a biological process is occurring.

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