



基本信息

平台编号:	bio-82425
产品名称:	pGAPZ α A
启动子:	GAP
复制子:	pUC ori
终止子:	AOX1 TT
质粒分类:	酵母系列, 毕赤酵母表达载体
质粒大小:	3147bp
质粒标签:	C-Myc, C-6 $\times$ His
原核抗性:	Zeo
筛选标记:	HIS4
克隆菌株:	DH5 α
培养条件:	37°C, 有氧 LB
表达宿主:	酵母细胞
5'测序引物:	pGAP-F:GTCCCTATTTCAATCAATTGAA
3'测序引物:	AOX3:GGCAAATGGCATTCTGACAT

质粒简介

甘油醛-3-磷酸脱氢酶 (GAPDH) 的酶在许多生物细胞中包括毕赤酵母, 稳定高水平表达。最近 GAPDH 蛋白编码基因启动子 (GAP) 被深入研究, 并在毕赤酵母中能够高水平表达重组蛋白, 这取决于使用的碳源 (Waterham 等人, 1997)。GAP 启动子 (PGAP) 的重组蛋白表达水平略高于 AOX1 启动子。

pGAPZ A, B, 和 C 载体 (2.9 KB) 和 pGAPZ α B 和 C (3.1 KB) 载体使用 GAP 启动子在毕赤酵母中稳定表达重组蛋白。重组蛋白表达为带有 C-末端 myc 抗原表位和 C 端 His 标签的融合蛋白。此外, pGAPZ α 表达的融合蛋白在 N-端带有酿酒酵母 (*Saccharomyces cerevisiae*) 的 α -因子分泌信号肽。这两个系列的载体都提供三个不同读码框的载体, 以方便克隆的带有 C-端标签和/或 N-末端分泌信号肽的载体中。

pGAPZ α MCS

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361 GATTATTGGA AACCACCAGA ATCGAATATA AAAGGCGAAC ACCTTTCCCA ATTTTGGTTT
                                     pGAP forward priming site
421 CTCCTGACCC AAAGACTTTA AATTTAATTT ATTTGTCCCT ATTTCAATCA ATTGAACAAC
                                     |
481 TATTTTGAAA CG ATG AGA TTT CCT TCA ATT TTT ACT GCT GTT TTA TTC GCA
                                     Met Arg Phe Pro Ser Ile Phe Thr Ala Val Leu Phe Ala

532 GCA TCC TCC GCA TTA GCT GCT CCA GTC AAC ACT ACA ACA GAA GAT GAA ACG
    Ala Ser Ser Ala Leu Ala Ala Pro Val Asn Thr Thr Thr Glu Asp Glu Thr
                                      $\alpha$ -factor signal sequence
583 GCA CAA ATT CCG GCT GAA GCT GTC ATC GGT TAC TCA GAT TTA GAA GGG GAT
    Ala Gln Ile Pro Ala Glu Ala Val Ile Gly Tyr Ser Asp Leu Glu Gly Asp

634 TTC GAT GTT GCT GTT TTG CCA TTT TCC AAC AGC ACA AAT AAC GGG TTA TTG
    Phe Asp Val Ala Val Leu Pro Phe Ser Asn Ser Thr Asn Asn Gly Leu Leu

685 TTT ATA AAT ACT ACT ATT GCC AGC ATT GCT GCT AAA GAA GAA GGG GTA TCT
    Phe Ile Asn Thr Thr Ile Ala Ser Ile Ala Ala Lys Glu Glu Gly Val Ser

Xho I*      Kex2 signal cleavage      EcoR I      Pml I      Sfi I
736 CTC GAG AAA AGA GAG GCT GAA GCT GAATTCAC GTGGCCCA GCCGGCCGTC TCGGATC
    Leu Glu Lys Arg Glu Ala Glu Ala

                                     Ste13 signal cleavage
Asp718 I Kpn I Xho I      Sac II Not I      Xba I      myc epitope
793 GGTACCTCGA GCCGCGGCGG CCGCCAGCTT TCTA GAA CAA AAA CTC ATC TCA GAA GAG
    Glu Gln Lys Leu Ile Ser Glu Glu

                                     polyhistidine tag
851 GAT CTG AAT AGC GCC GTC GAC CAT CAT CAT CAT CAT CAT TGA GTTTTAGC CTTA
    Asp Leu Asn Ser Ala Val Asp His His His His His His ***

905 GACATGACTG TTCCTCAGTT CAAGTTGGGC ACTTACGAGA AGACCGGTCT TGCTAGATTC TAAT

                                     3' AOX1 priming site
969 CAAGAGGATG TCAGAATGCC ATTTGCCTGA GAGATGCAGG CTTCATTTT GATACTTTT TATT

1033 TGTAACCTAT ATAGTATAGG ATTTTTTTTG TCATTTTGTT TCTTCTCG
  
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质粒图谱

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微生物菌种查询网

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