

1/6

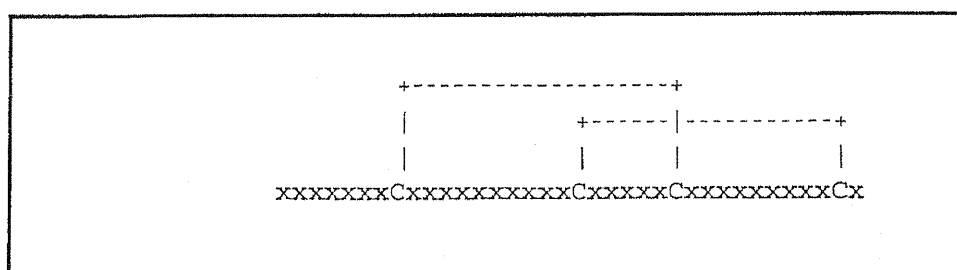


Fig. 1

2/6

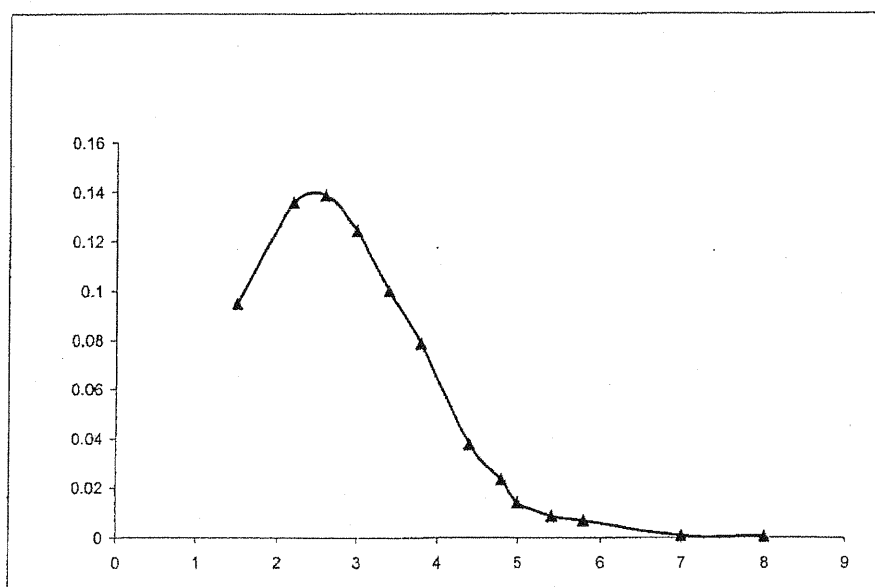


Fig. 2

3/6

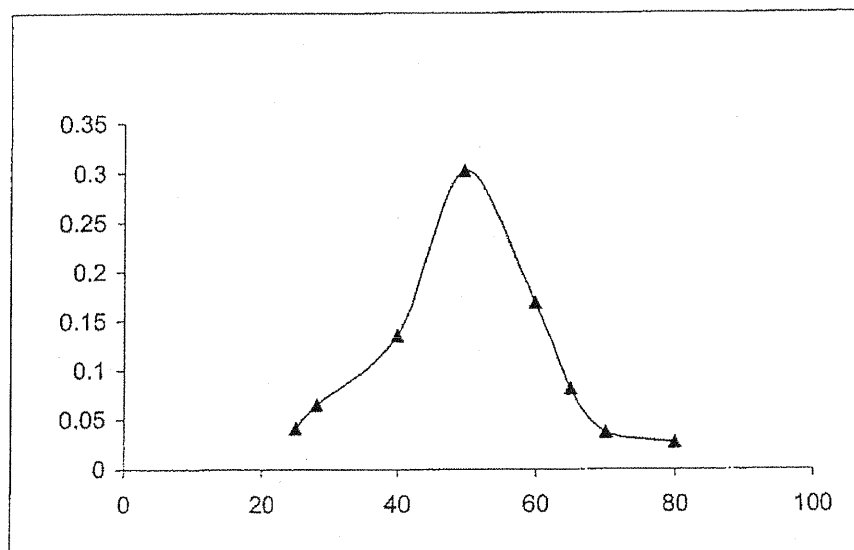


Fig. 3

4/6

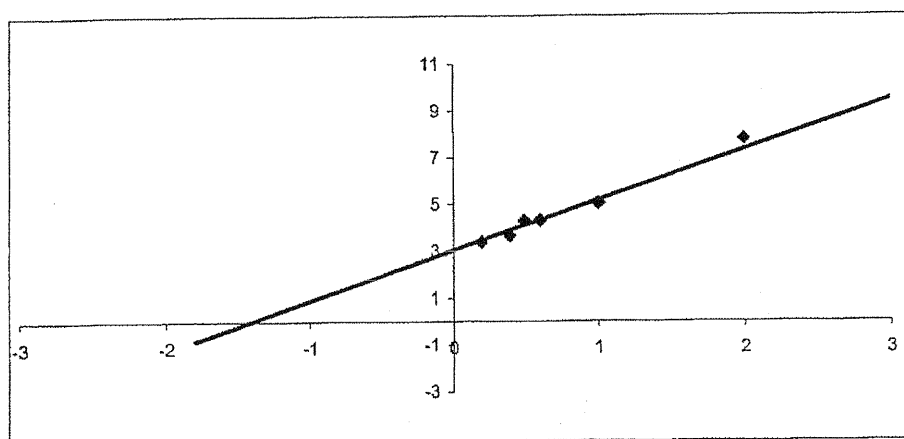


Fig. 4

5/6

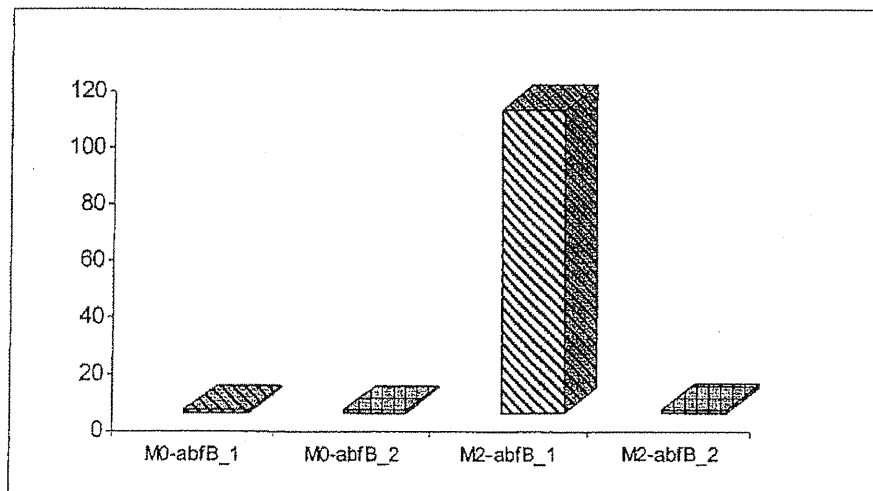


Fig. 5

6/6

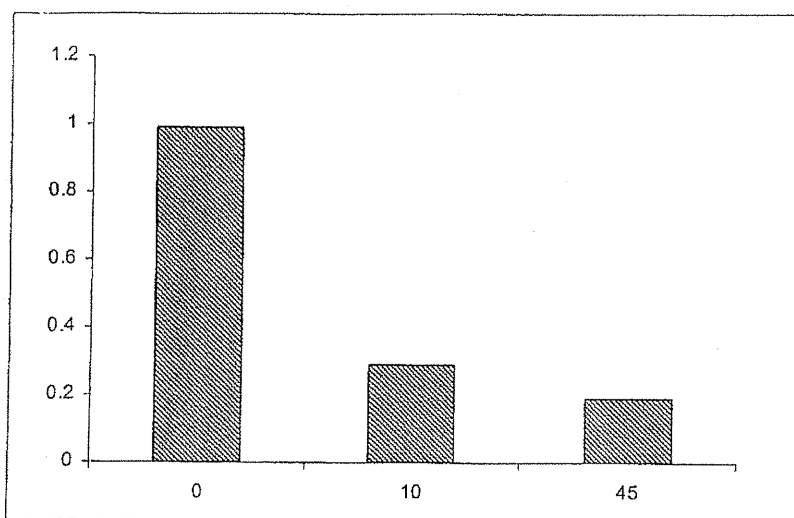


Fig. 6

Sequence listing

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aattatcoga ttttaaagac tccttcatag tgtgcgttag aagcagtata aagcccgctt 180

caatagctag cagttgaatc gataccact cgaacaacat ttttgaaacg caattgatac 240

ttgtatagtc tcacaaaacg attcaac atg acg tcc aaa cat agt ttc gaa cga 294
 Met Thr Ser Lys His Ser Phe Glu Arg
 1 5

gcc ggc ata ctt gca ttg ggc ctt att gct acg agc tct ctt gtt gcc 342
 Ala Gly Ile Leu Ala Leu Gly Leu Ile Ala Thr Ser Ser Leu Val Ala
 10 15 20 25

gcc ggc cct tgt gac atc tac tct tca ggt ggc aca cca tgc gtt gcc 390
 Ala Gly Pro Cys Asp Ile Tyr Ser Ser Gly Gly Thr Pro Cys Val Ala
 30 35 40

gcg cac agt acc act cgc gca ctc tat gat gct tat act ggc ccg cta 438
 Ala His Ser Thr Thr Arg Ala Leu Tyr Asp Ala Tyr Thr Gly Pro Leu
 45 50 55

tac caa gtg aca cgg agt tct gat agc agc aag aaa gat atc gcg cca 486
 Tyr Gln Val Thr Arg Ser Ser Asp Ser Ser Lys Lys Asp Ile Ala Pro
 60 65 70

ttg gcc gcc ggc ggc gtt gct aat gct gcc acg caa gac tcc ttt tgt 534
 Leu Ala Ala Gly Gly Val Ala Asn Ala Ala Thr Gln Asp Ser Phe Cys
 75 80 85

tca gga aca acc tgc ctc ata tct atc atc tac gac caa tct gga aag 582
 Ser Gly Thr Thr Cys Leu Ile Ser Ile Ile Tyr Asp Gln Ser Gly Lys
 90 95 100 105

ggg aac sat ctc acc caa gct ccg aaa ggt ggc tgg agt gga cct gga 630
 Gly Asn His Leu Thr Gln Ala Pro Lys Gly Gly Trp Ser Gly Pro Gly
 110 115 120

cca aat ggt tca gat aat tta tcc agt gcg acc gcc gcc cca atc tat 678
 Pro Asn Gly Ser Asp Asn Leu Ser Ser Ala Thr Ala Ala Pro Ile Tyr
 125 130 135

ctg aac gga caa aag gcg tac ggc gtg ttt att gca cct ggt gac gcc 726
 Leu Asn Gly Gln Lys Ala Tyr Gly Val Phe Ile Ala Pro Gly Asp Gly
 140 145 150

tac cgt aat gat aag act tct ggt ata gcc aca ggc gat caa ccc gag 774
 Tyr Arg Asn Asp Lys Thr Ser Gly Ile Ala Thr Gly Asp Gln Pro Glu
 155 160 165

gga atg tac gcc atc ttt gac gga acg cac tac aac ggc ggc tgc tgc 822
 Gly Met Tyr Ala Ile Phe Asp Gly Thr His Tyr Asn Gly Gly Cys Cys
 170 175 180 185

ttc gac tac ggt aat gct gaa acc agt ggt acc gat aca ggc gct gcc 870
 Phe Asp Tyr Gly Asn Ala Glu Thr Ser Gly Thr Asp Thr Gly Ala Gly
 190 195 200

cac atg gag gct atc tac ttc ggt aac tgt aat gtc tgg ggt tct ggt 918
 His Met Glu Ala Ile Tyr Phe Gly Asn Cys Asn Val Trp Gly Ser Gly
 205 210 215

tct gga tca ggc cct tgg att atg gct gat ttg gag aat ggt ctc ttc 966
 Ser Gly Ser Gly Pro Trp Ile Met Ala Asp Leu Glu Asn Gly Leu Phe
 220 225 230

tcc ggt tat aac gcc aaa caa aac acc gcc gat gca tcc atc aac tgg 1014
 Ser Gly Tyr Asn Ala Lys Gln Asn Thr Ala Asp Ala Ser Ile Asn Trp
 235 240 245

cga ttc gtc act gca att gtg aag ggc gag cca aac aat tgg gca atc 1062
 Arg Phe Val Thr Ala Ile Val Lys Gly Glu Pro Asn Asn Trp Ala Ile
 250 255 260 265

 cgt ggt ggc aat gcc caa tct ggt tct ctc tcg aca tac tat aat ggc 1110
 Arg Gly Gly Asn Ala Gln Ser Gly Ser Leu Ser Thr Tyr Tyr Asn Gly
 270 275 280

 ata cgc cca tca ggc tac aat ccg atg cac aaa gaa ggc gcc att atc 1158
 Ile Arg Pro Ser Gly Tyr Asn Pro Met His Lys Glu Gly Ala Ile Ile
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 ctc ggc acg ggt ggt gac aac agt aac ggt gct caa ggc act ttt tac 1206
 Leu Gly Thr Gly Gly Asp Asn Ser Asn Gly Ala Gln Gly Thr Phe Tyr
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 gag ggt gtg atg act tct ggg tac cct tct gac tca act gag aat tcc 1254
 Glu Gly Val Met Thr Ser Gly Tyr Pro Ser Asp Ser Thr Glu Asn Ser
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 Val Gln Ala Asn Ile Val Ala Ala Gly Tyr Ser Thr Ser Pro Gly Ser
 330 335 340 345

 cac acc act tcc acc acc ctt acc acc atc act agt acc aca gca gta 1350
 His Thr Thr Ser Thr Thr Leu Thr Thr Ile Thr Ser Thr Thr Ala Val
 350 355 360

 tct gga gct ggc cag aca cac tgg ggt cag tgt gga ggt agc gga tac 1398
 Ser Gly Ala Gly Gln Thr His Trp Gly Gln Cys Gly Gly Ser Gly Tyr
 365 370 375

 tcc ggt cca acg agc tgt gtt gca ccc tac gct tgt aca acc gct aac 1446
 Ser Gly Pro Thr Ser Cys Val Ala Pro Tyr Ala Cys Thr Thr Ala Asn
 380 385 390

 cct tac tac gct caa tgt ctc tag aatataggcg ctcattcggt ctatgactga 1500
 Pro Tyr Tyr Ala Gln Cys Leu
 395 400

 agttggacaa gtatcaaaag ctctctggag gcagggagtg tatttttgat gattataccg 1560
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<213> *Penicillium funiculosum*

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 20 25 30
 Ser Ser Gly Gly Thr Pro Cys Val Ala Ala His Ser Thr Thr Arg Ala
 35 40 45
 Leu Tyr Asp Ala Tyr Thr Gly Pro Leu Tyr Gln Val Thr Arg Ser Ser
 50 55 60
 Asp Ser Ser Lys Lys Asp Ile Ala Pro Leu Ala Ala Gly Gly Val Ala

65					70					75				80
Asn	Ala	Ala	Thr	Gln	Asp	Ser	Phe	Cys	Ser	Gly	Thr	Thr	Cys	Leu
				85						90				95
Ser	Ile	Ile	Tyr	Asp	Gln	Ser	Gly	Lys	Gly	Asn	His	Leu	Thr	Gln
			100					105					110	
Pro	Lys	Gly	Gly	Trp	Ser	Gly	Pro	Gly	Pro	Asn	Gly	Ser	Asp	Asn
		115					120					125		
Ser	Ser	Ala	Thr	Ala	Ala	Pro	Ile	Tyr	Leu	Asn	Gly	Gln	Lys	Ala
		130					135				140			
Gly	Val	Phe	Ile	Ala	Pro	Gly	Asp	Gly	Tyr	Arg	Asn	Asp	Lys	Thr
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Gly	Ile	Ala	Thr	Gly	Asp	Gln	Pro	Glu	Gly	Met	Tyr	Ala	Ile	Phe
				165						170			175	
Gly	Thr	His	Tyr	Asn	Gly	Gly	Cys	Cys	Phe	Asp	Tyr	Gly	Asn	Ala
			180					185					190	
Thr	Ser	Gly	Thr	Asp	Thr	Gly	Ala	Gly	His	Met	Glu	Ala	Ile	Tyr
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Gly	Asn	Cys	Asn	Val	Trp	Gly	Ser	Gly	Ser	Gly	Ser	Gly	Pro	Trp
	210					215					220			
Met	Ala	Asp	Leu	Glu	Asn	Gly	Leu	Phe	Ser	Gly	Tyr	Asn	Ala	Lys
225					230					235				240
Asn	Thr	Ala	Asp	Ala	Ser	Ile	Asn	Trp	Arg	Phe	Val	Thr	Ala	Ile
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Lys	Gly	Glu	Pro	Asn	Asn	Trp	Ala	Ile	Arg	Gly	Gly	Asn	Ala	Gln
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Gly	Ser	Leu	Ser	Thr	Tyr	Tyr	Asn	Gly	Ile	Arg	Pro	Ser	Gly	Tyr
		275					280					285		
Pro	Met	His	Lys	Glu	Gly	Ala	Ile	Ile	Leu	Gly	Thr	Gly	Gly	Asp
	290					295					300			
Ser	Asn	Gly	Ala	Gln	Gly	Thr	Phe	Tyr	Glu	Gly	Val	Met	Thr	Ser
305					310					315				320
Tyr	Pro	Ser	Asp	Ser	Thr	Glu	Asn	Ser	Val	Gln	Ala	Asn	Ile	Val
				325					330				335	
Ala	Gly	Tyr	Ser	Thr	Ser	Pro	Gly	Ser	His	Thr	Thr	Ser	Thr	Thr
			340					345				350		
Thr	Thr	Ile	Thr	Ser	Thr	Thr	Ala	Val	Ser	Gly	Ala	Gly	Gln	Thr
		355					360					365		
Trp	Gly	Gln	Cys	Gly	Gly	Ser	Gly	Tyr	Ser	Gly	Pro	Thr	Ser	Cys
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Cys	Val	Ala	Pro	Tyr	Ala	Cys	Thr	Thr	Ala	Asn	Pro	Tyr	Tyr	Ala	Gln
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Cys Leu

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Cys Leu

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<213> Penicillium funiculosum

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Cys Leu

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Cys Leu

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XbaI-abfB-2 primer

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