

Table S3. Primers used in this work

Primer	Sequence (5`-3`) ^a	Location ^b	PCR product size (bp)	Use	Reference or source
ACrnaF	GGGCTGGCCTCGAAAGAGGAC	208 to 228	246	Quantification of <i>ampC</i> mRNA	Juan <i>et al</i> (2006)
ACrnaR	GCACCGAGTCGGGAACTGCA	434 to 454			
ADrnaF	CGCGCATTCCTCATCGAACGC	225 to 246	251	Quantification of <i>ampD</i> mRNA	Juan <i>et al</i> (2006)
ADrnaR	TCGCAGTGGCCCTGGATGCG	457 to 476			
AErnaF	CCGCTGCACCTCTGGTGGTG	245 to 265	246	Quantification of <i>ampE</i> mRNA	This work
AErnaR	GCCACCGGGCCGAGCAAGGCA	488 to 508			
creDrnaF	CGGCGTGTGCAGGATATCGC	114 to 134	251	Quantification of <i>creD</i> mRNA	This work
creDrnaR	TGTGACGTGGTACAGGCGCG	344 to 364			
ADF	GTACGCCCTGCTGGACGATG	-233 to -253	916	<i>ampD</i> amplification and sequencing	Juan <i>et al</i> (2005)
ADR	GAGGGCAGATCCTCGACCAG	707 to 726			
ADH2F	GGGCAGCGCGGTCAAGGC	-19 to -39	815	<i>ampDh2</i> amplification	Juan <i>et al</i> (2006)
ADH2R	TCAGGAAGTCGGCACCGCC	762 to 780		sequencing	
ADH3F	TTGGCCGGCCCCTGAAC	-81 to -97	960	<i>ampDh3</i> amplification	Juan <i>et al</i> (2006)
ADH3R	GCGACGACCTGAGCGACG	845 to 862		sequencing	
AEF	GCCTGGACCCGAACGAAC	-93 to -111	1231	<i>ampE</i> amplification and sequencing	This work
AER	TCAGAGGAACAGCGCGCAG	1013 to 1032			
ARF	GTCGACCCAGTGCCTTCAGG	1138 to 1156	1391	<i>ampR</i> and <i>ampC-ampR</i> intergenic region amplification and sequencing	Juan <i>et al</i> (2005)

ARR	CTCGAGAGCGGAGATCGTTGC	-239 to -220			
CreBF	CACCAAGGGCTTGCAGA	-147 to -166	1066	<i>creB</i> amplification and sequencing	This work
CreBR	TCGAGCATCTCCGGCAGG	887 to 903			
CreBIR	CTGGAACGGCCCCGCTC	393 to 408		<i>creB</i> sequencing	This work
CreCF	CAGCCCGGACCACGCCGTG	-18 to -1	1560	<i>creC</i> amplification and sequencing	This work
CreCR	CCAGCGTGCCTTCATG	1526 to 1542			
CreCIF	CCTGCCGGAGATGCTCG	198 to 214		<i>creC</i> sequencing	This Work
CreDF	GGCTGCCGCGCGGCTGA	-118 to -102	1477	<i>creD</i> amplification and sequencing	This work
CreDR	TCAGGCCCTGGCGGGTAC	1342 to 1359			
CreDIF2	GTCGACAACAAGGTTGCCGG	358 to 377		<i>creD</i> sequencing	This work
CreDIR	GATGCCATAGTGCAGGC	389 to 408			
CreDIF	GCGACGGCTTCCAGGGC	842 to 859			
DACB-F	CGACCATTGGCGATATGAC	-178 to -159	1721	<i>dacB</i> amplification and sequencing	This work
DACB-R	CGCGTAATCCGAAGATCCATC	1526 to 1546			
DACB-I-R	GTCGCGCATCAGCAGCCAG	378 to 396		<i>dacB</i> sequencing	This work
DACB-I-F	GCCAGGGCAGCGTACCGC	854 to 871			
DACB-I-F2	GTGCTAACGGCAACCTCTAC	316 to 336			
AD-F0ERI	TCGAATTGTCCTGACTTCGCCGGAC	-478 to -496	523	AmpD inactivation	Juan <i>et al</i> (2006)
AD-R3HDIII	TCAAGCTTCACGGACCCAGCCGGTAAC	16 to 34			
AD-F2HDIII	TCAAGCTTGCCTGGACCCGAACGAAC	170 to 187	512		
AD-RBHI	TCGGATCCGAGGGCAGATCCTCGACAG	663 to 682			
DACB-F-ERI	TCGAATTCCGACCATTGGCGATATGAC	-175 to -156	571	DacB inactivation	This work
DACB-I-R-HD3	TCAAGCTTGTGCGCATCAGCAGCCAG	378 to 396			
DACB-I-F-HD3	TCAAGCTTGCAGGGCAGCGTACCGC	854 to 871	693		
DACB-R-BHI	TCGGATCCCAGGTGGCATCGACGAAG	1526 to 1546			
AmpC-F-ERI	TCGAATTGCGCGCAGGGCTTCAG	-186 to -169	415	AmpC inactivation	Moya <i>et al</i> (2008)
AmpC-I-R-HDIII	TCAAGCTTCGTCCTCTTACGAGGCCAG	210 to 229			
AmpC-I-F-HDIII	TCAAGCTTCAGGGCAGCCGCTTCGAC	366 to 384	432		
AmpC-R-BHI	TCGGATCCCAGGTGGCATCGACGAAG	779 to 798			
AEXBI-F1	GCTCTAGACGCATCCAGGGCCACTGCG	-93 to -111	488	AmpE inactivation	This work
AEHDIII-R1	TCAAGCTTCGTTGGCGACATGGAAGGC	358 to 377			
AEHDIII-F2	TCAAGCTTGCACGGCCATCTGCTCTGGC	430 to 449	606		
AEERI-R2	TCGAATTCTTGACGCACGGAGTCCGCTC	1016 to 1035			

AmpR-F-ERI	<u>TCGAATTCCACCAGGTGAAGAGGCCTCG</u>	123 to 141	424	AmpR inactivation	This work
AmpR-I-R-HDIII	TCAAGCTTGA <u>CTGTGCAACTGGGCGG</u>	552 to 572			
AmpR-I-F-HDIII	TCAAG <u>CTTCAGGGTGT</u> CGGCGTGGC	728 to 744	409		
AmpR-R-BHI	TCGGATCCGC <u>CTATGCCGCCAGCCTG</u>	1140 to 1157			
CreB-F-ERI	TCGAATT <u>CCACCAAGGGCTTGCGCA</u>	-147 to -166	571	CreBC inactivation	This work
CreB-I-R-HD3	TCAAGCTT <u>CTGGAACGGCCCGCTC</u>	393 to 408			
CreC-I-F-HD3	TCAAG <u>CTTCCTGCCGGAGATGCTCG</u>	198 to 214	466		
CreC-Rb-BHI	TCGGATCCG <u>CTGACCGCCTGGCG</u>	1337 to 1352			
creD-F-BHI	TCGGATCCGG <u>GCTGCCCGCGCGCTGA</u>	-118 to -102	526	CreD inactivation	This work
creD-I-R-HD3	TCAAG <u>CTTGATGCCATAGTGCGCAGGC</u>	390 to 408			
creD-I-F-HD3	TCAAGCTT <u>GATCACCGCCCAGGGCTTC</u>	747 to 765	613		
creD-R-ERI	TCGAATT <u>CTCAGGCCCTGGGGGTAC</u>	1342 to 1359			

^aSites for restriction endonucleases are underlined.

^bLocation of the primers respect to the start codon of the corresponding genes.

References

- Juan C, Macia MD, Gutierrez O, Vidal C, Perez JL, et al. (2005) Molecular mechanisms of β -lactam resistance mediated by AmpC hyperproduction in *Pseudomonas aeruginosa* clinical strains. *Antimicrob Agents Chemother* 49: 4733-4738.
- Juan C, Moya B, Perez JL, Oliver A (2006) Stepwise upregulation of the *Pseudomonas aeruginosa* chromosomal cephalosporinase conferring high level beta-lactam resistance involves three AmpD homologues. *Antimicrob Agents Chemother* 50: 1780-1787.
- Moya B, Juan C, Alberti S, Perez JL, Oliver A (2008) Benefit of having multiple *ampD* genes for acquiring β -lactam resistance without losing fitness and virulence in *Pseudomonas aeruginosa*. *Antimicrob Agents Chemother* 52: 3694-3700.