

Supplementary data for the article

Targeting Superoxide dismutase confers enhanced Reactive Oxygen Species mediated eradication of Polymyxin B induced *Acinetobacter baumannii* persisters

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Table S1: MICs (in $\mu\text{g/ml}$) of different antibiotics against clinical isolates of *A. baumannii*.

Strains	MIC ($\mu\text{g/ml}$)			
	Meropenem	Tigecycline	Rifampicin	Amikacin
RPTC1	32	0.25	1	256
RPTC2	64	0.25	16	512
RPTC3	32	0.25	1	512
RPTC5	32	0.25	16	512
RPTC6	32	0.25	0.5	512
RPTC7	32	0.25	0.5	512
RPTC9	64	0.25	2	512
RPTC10	64	0.5	2	128
RPTC11	32	0.25	2	32
RPTC12	128	0.25	16	512
RPTC14	32	0.5	1	256
RPTC15	8	0.125	0.25	256
RPTC16	8	0.25	0.5	256
RPTC17	16	0.5	0.5	128
RPTC19	32	0.25	0.5	64
RPTC20	32	0.25	0.5	64
RPTC21	64	0.25	16	512
RPTC22	32	0.5	2	32
RPTC23	128	0.5	2	512
RPTC24	128	0.5	16	512
AB5075	4	0.5	1	256

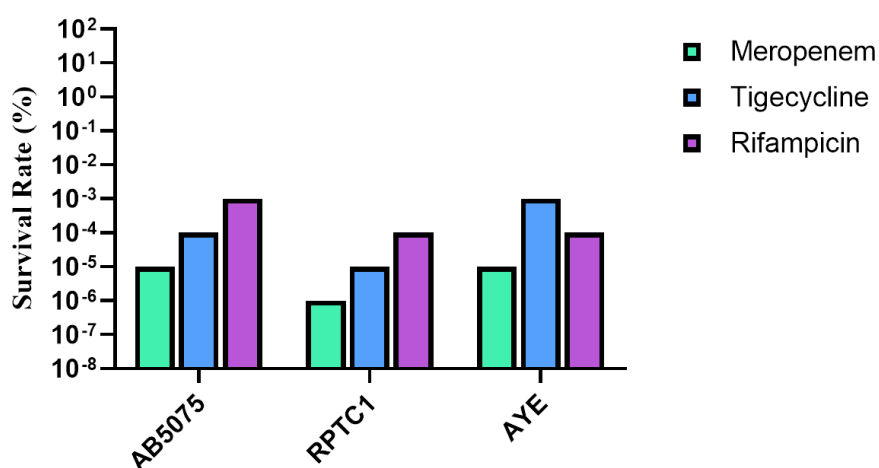


Figure S1: Survival rate percent of *A. baumannii* AB5075, RPTC-1 and AYE against meropenem, tigecycline and rifampicin.

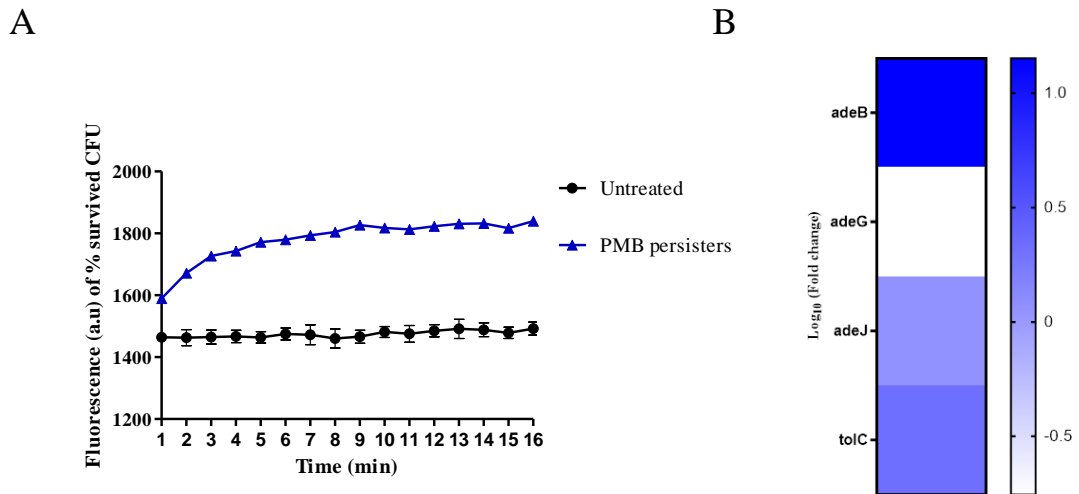


Figure S2: (A). EtBr accumulation assay of wild type *A. baumannii* AB5075 verses polymyxin B induced persister. (B). qRT-PCR analysis RND efflux genes expression in WT verses polymyxin B persister.



Figure S3: Schematic representation of dual fluorescent module and verification of knock-in strain. P indicates strong constitutive promoter.

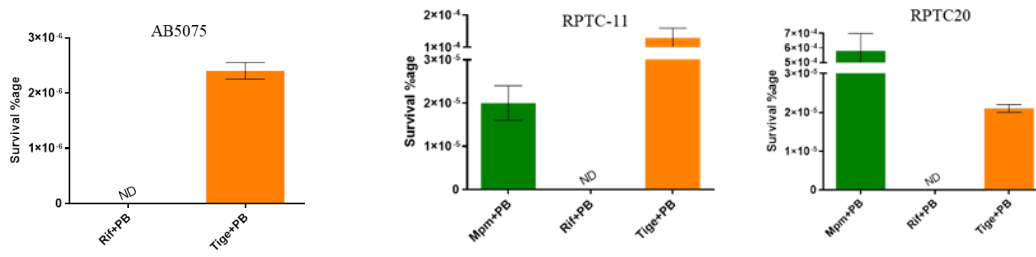


Figure S4: Tolerance assay to assess the log fold reduction in CFU/ml of polymyxin B and rifampicin treatment in different clinical strains.

Table S2. Primers used in this study		
Gene	Direction	Sequence 5' → 3'
FPUSCysI500SalI	Forward	AAAGTCGACGAAAAACGTATTGGTACAA
RPUSCysI500BamHI	Reverse	AAAGGATCCACATGGCGTATGGCTAGTA
FPDSCysI500KpnI	Forward	AAAGGTACCATACAGCTCTACCTGTGCTT
RPDSCysI500EcoRI	Reverse	AAAGAATTCAGCCTTTTCACTTAGAAGCTA
Up150CysIFP	Forward	AAGCCCGGATTTATCTGGGCTTTTTTTATG
Ds150CysIRP	Reverse	TACAAAGCTTTTTTACCTTGAATGTTAGCC
Fpsfbamh1	Forward	AAAGGATCCAATTGACGGCTAGCTCAGTCCTAGGTACAGTGCTAGCACCCGTTTTTTTGGGCTAGAAATAATT
Rpsfxma1	Reverse	AAACCCGGGTTACTTGTACAGCTCGTCCATGCCCGTG
Fptdtxma1	Forward	AAACCCGGGACCCGTTTTTTTTGGGCTAGAAATA
Fptdtkrnp1	Reverse	AAAGGTACCATTTGTCCTACTCAGGAGAGC
FaraCpBADRBS	Forward	AAAGGATCCGTTACCAATTATGACAACCTTGACGGCT
RaraCpBADRBS	Reverse	AAACCCGGGTGTATATCTCCTTCTTAAAGTTAAAC
fpSodBComp	Forward	AAACCCGGGTGAGCTTATTTCTCTACACCAGCTGG
rpSodBComp	Reverse	GGGGGTACCAGGAACCTGATTTCCAAAAAAT
16S	Forward	TGTGAAATCCCCGAGCTTAAC
16S	Reverse	TATTAGGCCAGATGGCTGC
sodB	Forward	GTTGTTGCAGCAGCAGTAAAT
sodB	Reverse	GGAACAGCATGAAGCCAAAC
sodC	Forward	CGTACCATGATGTGGGGCTT
sodC	Reverse	GGGCTTAATCATTACCCCTGCT
katE	Forward	TCCTTCATCCGCCACTAAAC
katE	Reverse	GGTAGCTCGCCATTACTTACTC
katG	Forward	GCTCTAATCCGCTCGGTAAAG
katG	Reverse	CCAGTCTTGGGAATCGGTTAAT
dnaK	Forward	GATGCTGGTCTTTCGACTTCT
dnaK	Reverse	CGTCTTTACGTGGTTCTCTACC
recA	Forward	CCTAGTTGGTTAGTACCTTTACCGT
recA	Reverse	TCTACGCTTCAGTTCGTTTAGA
groEL	Forward	CCAACCGAACAGGCTTATGT
groEL	Reverse	AGCACCTTGCCGTAGAAGAA
aceA	Forward	TACCGCCACGGATTTCTTTAC
aceA	Reverse	CACACTGCTGCTCTTTCTACTC
adeB	Forward	CCGCATCACCTTGAACATAAAC
adeB	Reverse	GGTGCTATGGGCGTTAGTATT
adeJ	Forward	TCCATTGCTTTCATGGCATCACCAGA
adeJ	Reverse	AGCCGTATGATGCCTGAAGACTTA
adeG	Forward	CCGGTCGTTTAGAAGCAATG
adeG	Reverse	TGCGGTATATGTTACCTGTGC
tolC	Forward	CTCGCTACTGCATCTATCTGTG
tolC	Reverse	GCTCGATGAGTGGTTAGGATTAG
umuC	Forward	CTTTATATAAAACATCAATTTGCTGCA
umuC	Reverse	TCACCTTAACCGGGCACAT
umuD	Forward	CAGTCAAATCATTATCGATAAGTGC
umuD	Reverse	GCAAGCACTCGATTTAAATGAA

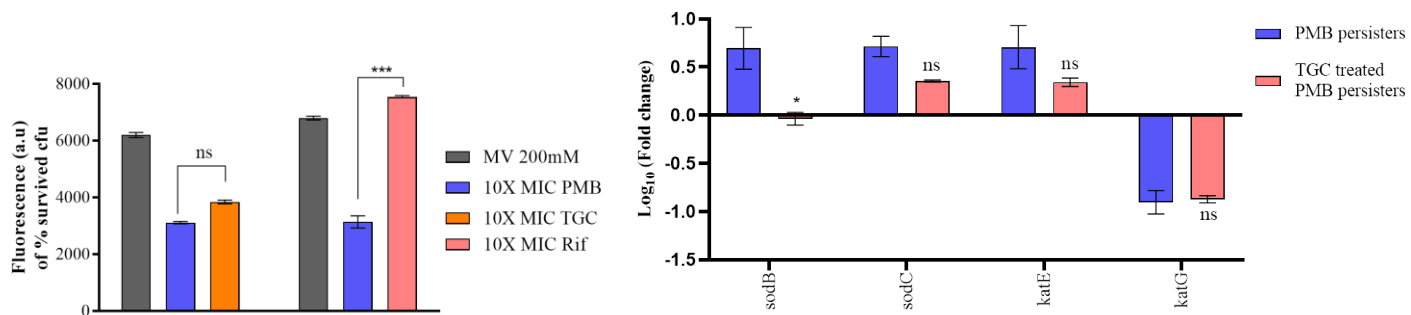


Figure S5: Treatment of tigecycline leads to lower production of ROS as compared to rifampicin treatment in Polymyxin B induced *A. baumannii* persister.

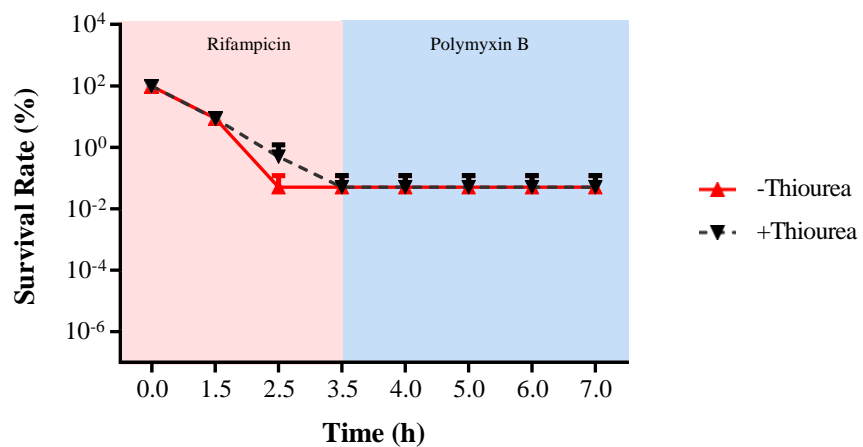


Figure S6: Polymyxin B treatment does not eradicate rifampicin persister of *A. baumannii*.

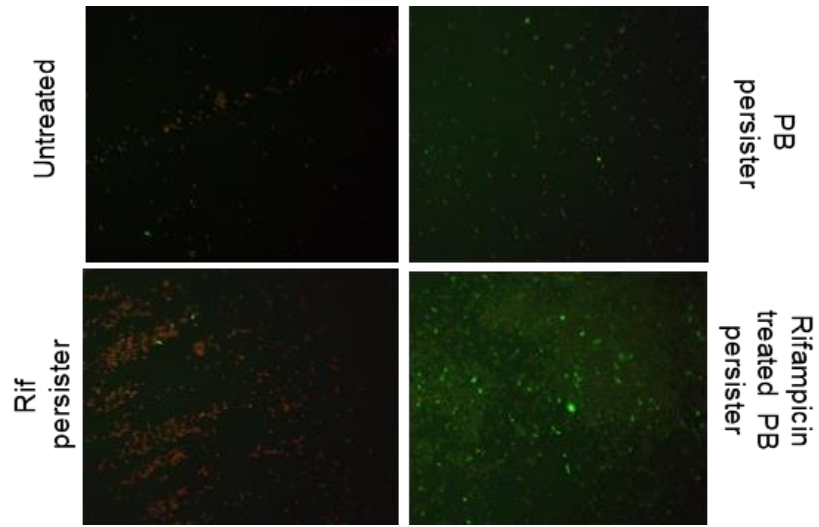


Figure S7: Fluorescence microscopy to assess DNA damage in cells treated with different antibiotics both alone and in combination. Scale bar for all images are 100 μ m