In silico characterization and molecular modeling of GntR family regulators in Xanthomonas axonopodis pv. citri: Implications for primary metabolism or virulence

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upplementary Table S1. Details of GntR regulators used as representatives from all subfamilies.							
Subfamily	Protein ID	Organism	Length (amino acids)	Swiss-Prot ID			
AraR	AraR	Bacillus stearothermophilus	364	Q9S470			
	P96711	Bacillus subtilis	362	P96711			
	Q9KBQ0	Bacillus halodurans	375	Q9KBQ0			
FadR	EmoR	EDTA-degrading bacterium BNC1	207	Q9F9T1			
	FadR	Escherichia coli	238	P0A8V6			
	GlcC	Escherichia coli	254	P0ACL5			
	LldR	Escherichia coli	258	P33233			
	MatR	Rhizobium leguminosarum	222	Q9JP74			
	MdcY	Acinetobacter calcoaceticus	224	Q9F0Q8			
	NtaR	Chelatobacter heintzii	210	P54988			
	PdhR	Escherichia coli	254	P0ACM1			
	VanR	Acinetobacter sp. ADP1	251	O24839			
HutC	DasR	Streptomyces coelicolor	254	Q9K492			
	FarR	Escherichia coli	240	P13669			
	HutC	Pseudomonas nutida	248	P22773			

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	PhnF	Escherichia coli	241	P16684
	PhnR	Salmonella typhimurium	239	P96061
	Q82IW0	Streptomyces avermitilis	254	Q82IW0
	Q8VV01	Streptomyces griseus	253	Q8VV01
	TreR	Bacillus subtilis	238	P39796
	YvoA	Bacillus subtilis	243	O34817
MocR	MocR	Rhizobium meliloti	493	P49309
	YcnF	Bacillus subtilis	479	P94426
	YcxD	Bacillus subtilis	444	Q08792
	YhdI	Bacillus subtilis	469	O07578
	YjiR	Escherichia coli	470	P39389
	YrdX	Rhodobacter sphaeroides	456	Q01856
PlmA	All1076	Anabaena sp. strain PCC 7120	328	Q8YXY0
	Sll1961	Synechocystis sp. strain PCC 6803	388	P73804
	Tll2117	Synechococcus elongatus	367	Q8DH43

YtrA	BH0651	Bacillus halodurans	123	Q9KF35
	BH2647	Bacillus halodurans	123	Q9K9J9
	SAV1934	Staphylococcus aureus	126	Q99SV4
	YhcF	Bacillus subtilis	121	P54590
	YtrA	Bacillus subtilis	130	O34712



Supplementary Fig S1. ProSA-web results for template protein and modeled *Xac* GntR-like regulators. Z-plot graphs (*upper panel*) show spots of Z score's values of proteins determined by NMR (represented in dark blue colour) and by X ray (represented in light blue colour). The black dots represent Z-Scores of our models and their coresponding templates, and e-plot graphs (*lower panel*) show local model quality by plotting energies as a function of amino acid sequence position *i*. In general, positive values correspond to problematic or erroneous parts of the input structure. The plots are smoothed by calculating the average energy over each 40-residue fragment s(i,i+39), which is then assigned to the 'central' residue of the fragment at position *i*+19 (thick line). A second line with a smaller window size of 10 residues is shown in the background of the plot (thin line). (a) Left, 3C7J (A chain); middle, XAC0568; right, XAC0877. (b) Left, 3BY6 (E chain); right, XAC1548. (c) From left to right. 2WV0 (D chain), XAC0711, XAC1640 and XAC3532. (d) Left, 1WST (A chain); right, XAC0737.