

**Table S1.** Interactions between the two factors influencing the total N uptake (mg N pot<sup>-1</sup>).

Factor		The water salinity (A) (‰)				Mean
		0	2	3	4	
The bacteria (B) (1.812 x 10 <sup>5</sup> CFU g <sup>-1</sup> dry soil)	NAB	536.2±33.9 <sup>de</sup>	526.9±16.7 <sup>e</sup>	446.3±33.3 <sup>f</sup>	375.1±42.0 <sup>g</sup>	471.1±31.5 <sup>C</sup>
	W01	626.2±32.7 <sup>bc</sup>	657.5±31.8 <sup>ab</sup>	590.4±48.7 <sup>cd</sup>	618.0±28.6 <sup>bc</sup>	623.0±35.4 <sup>A</sup>
	W14	709.3±44.1 <sup>a</sup>	615.5±22.0 <sup>bc</sup>	668.1±19.4 <sup>ab</sup>	534.9±21.5 <sup>de</sup>	631.9±26.7 <sup>A</sup>
	W22	517.0±43.4 <sup>e</sup>	560.8±25.3 <sup>de</sup>	552.4±39.4 <sup>de</sup>	527.4±28.0 <sup>e</sup>	539.4±34.0 <sup>B</sup>
	MTB	642.8±31.7 <sup>bc</sup>	657.5±61.6 <sup>ab</sup>	627.5±35.8 <sup>bc</sup>	657.9±41.8 <sup>ab</sup>	646.4±42.7 <sup>A</sup>
Mean		606.3±37.2 <sup>A</sup>	603.6±31.5 <sup>A</sup>	576.9±35.3 <sup>B</sup>	543.7±32.4 <sup>C</sup>	
F (A)						*
F (B)						*
F (A*B)						*
C.V. (%)						6.01

Note: 0: the water at 0‰ salinity; 2: the water at 2‰ salinity; 3: the water at 3‰ salinity; 4: the water at 4‰ salinity; NAB: no applied bacteria; W01: applying the single strains of ALA producing *Luteovulum sphaeroides* W01; W14: applying the single strains of ALA producing *L. sphaeroides* W14; W22: applying the single strains of ALA producing *L. sphaeroides* W22; MTB: the mixture of the three bacteria, i.e applying the three strains of ALA producing *L. sphaeroides* W01, W14 and W22. The identical lowercase letters indicate insignificant differences between numbers in the same pool, while the identical uppercase letters indicate insignificant differences between numbers in the same column or row ( $P < 0.05$ ).

**Table S2.** Interactions between the two factors influencing the total P uptake (mg P pot<sup>-1</sup>).

Factor		The water salinity (A) (‰)				Mean
		0	2	3	4	
The bacteria (B) (1.812 x 10 <sup>5</sup> CFU g <sup>-1</sup> dry soil)	NAB	97.3±6.4 <sup>efg</sup>	81.1±4.0 <sup>ijk</sup>	73.2±2.5 <sup>k</sup>	52.3±2.2 <sup>l</sup>	76.0±3.8 <sup>D</sup>
	W01	106.7±11.3 <sup>b-e</sup>	102.6±1.5 <sup>c-f</sup>	98.2±5.2 <sup>efg</sup>	79.6±5.7 <sup>jk</sup>	96.8±5.9 <sup>B</sup>
	W14	116.2±5.8 <sup>a</sup>	101.2±8.2 <sup>def</sup>	102.9±5.4 <sup>c-f</sup>	86.0±2.9 <sup>hij</sup>	101.6±5.6 <sup>A</sup>
	W22	112.0±3.9 <sup>abc</sup>	94.9±5.6 <sup>igh</sup>	89.8±5.8 <sup>ghi</sup>	72.1±6.3 <sup>k</sup>	92.2±5.4 <sup>C</sup>
	MTB	115.8±5.4 <sup>ab</sup>	109.9±8.3 <sup>a-d</sup>	102.4±9.5 <sup>c-f</sup>	89.3±3.3 <sup>ghi</sup>	104.4±6.6 <sup>A</sup>
Mean		109.6±6.6 <sup>A</sup>	97.9±5.5 <sup>B</sup>	93.3±5.7 <sup>C</sup>	75.9±4.1 <sup>D</sup>	
F (A)						*
F (B)						*
F (A*B)						*
C.V. (%)						6.42

Note: 0: the water at 0‰ salinity; 2: the water at 2‰ salinity; 3: the water at 3‰ salinity; 4: the water at 4‰ salinity; NAB: no applied bacteria; W01: applying the single strains of ALA producing *Luteovulum sphaeroides* W01; W14: applying the single strains of ALA producing *L. sphaeroides* W14; W22: applying the single strains of ALA producing *L. sphaeroides* W22; MTB: the mixture of the three bacteria, i.e applying the three strains of ALA producing *L. sphaeroides* W01, W14 and W22. The identical lowercase letters indicate insignificant differences between numbers in the same pool, while the identical uppercase letters indicate insignificant differences between numbers in the same column or row ( $P < 0.05$ ).

**Table S3.** Interactions between the two factors influencing the total K uptake (mg K pot<sup>-1</sup>).

Factor		The water salinity (A) (‰)				Mean
		0	2	3	4	
The bacteria (B) (1.812 x 10 <sup>5</sup> CFU g <sup>-1</sup> dry soil)	NAB	197.8±18.3 <sup>fgh</sup>	157.2±11.1 <sup>jk</sup>	135.4±8.7 <sup>k</sup>	111.7±7.4 <sup>l</sup>	150.5±11.4 <sup>C</sup>
	W01	257.7±16.0 <sup>bc</sup>	234.8±9.1 <sup>cd</sup>	210.2±7.8 <sup>def</sup>	175.5±6.0 <sup>hij</sup>	219.5±9.7 <sup>B</sup>
	W14	269.0±23.5 <sup>ab</sup>	218.4±8.8 <sup>def</sup>	209.8±7.5 <sup>def</sup>	173.8±8.3 <sup>ij</sup>	217.8±12.0 <sup>B</sup>
	W22	245.9±22.0 <sup>bc</sup>	263.8±16.6 <sup>ab</sup>	193.6±12.6 <sup>ghi</sup>	153.1±11.3 <sup>jk</sup>	214.1±15.6 <sup>B</sup>
	MTB	286.5±35.6 <sup>a</sup>	247.2±22.1 <sup>bc</sup>	233.8±6.9 <sup>cde</sup>	212.0±10.5 <sup>def</sup>	244.8±18.8 <sup>A</sup>
Mean		251.4±23.1 <sup>A</sup>	224.3±13.5 <sup>B</sup>	196.5±8.7 <sup>C</sup>	165.2±8.7 <sup>D</sup>	
		F (A)				*
		F (B)				*
		F (A*B)				*
		C.V. (%)				7.53

Note: 0: the water at 0‰ salinity; 2: the water at 2‰ salinity; 3: the water at 3‰ salinity; 4: the water at 4‰ salinity; NAB: no applied bacteria; W01: applying the single strains of ALA producing *Luteovulum sphaeroides* W01; W14: applying the single strains of ALA producing *L. sphaeroides* W14; W22: applying the single strains of ALA producing *L. sphaeroides* W22; MTB: the mixture of the three bacteria, i.e applying the three strains of ALA producing *L. sphaeroides* W01, W14 and W22. The identical lowercase letters indicate insignificant differences between numbers in the same pool, while the identical uppercase letters indicate insignificant differences between numbers in the same column or row ( $P < 0.05$ ).

**Table S4.** Interactions between the two factors influencing the total Na uptake (mg Na pot<sup>-1</sup>).

Factor		The water salinity (A) (‰)				Mean
		0	2	3	4	
The bacteria (B) (1.812 x 10 <sup>5</sup> CFU g <sup>-1</sup> dry soil)	NAB	55.2±3.8 <sup>b</sup>	54.8±6.0 <sup>b</sup>	57.1±3.2 <sup>b</sup>	52.8±2.1 <sup>bc</sup>	54.9±3.8 <sup>AB</sup>
	W01	51.3±2.6 <sup>bc</sup>	50.7±3.5 <sup>bc</sup>	53.1±2.0 <sup>b</sup>	53.0±3.8 <sup>b</sup>	52.0±3.0 <sup>B</sup>
	W14	50.3±3.7 <sup>bc</sup>	52.9±4.7 <sup>b</sup>	54.8±6.0 <sup>b</sup>	54.3±5.1 <sup>b</sup>	53.1±4.9 <sup>AB</sup>
	W22	50.1±5.5 <sup>bc</sup>	51.1±5.5 <sup>bc</sup>	55.0±4.8 <sup>b</sup>	66.2±4.7 <sup>a</sup>	55.6±5.1 <sup>A</sup>
	MTB	32.0±1.6 <sup>d</sup>	46.0±6.2 <sup>c</sup>	50.0±1.3 <sup>bc</sup>	53.8±1.4 <sup>b</sup>	45.4±2.6 <sup>C</sup>
Mean		47.8±3.4 <sup>C</sup>	51.1±5.2 <sup>B</sup>	54.0±3.5 <sup>A</sup>	56.0±3.4 <sup>A</sup>	
		F (A)				*
		F (B)				*
		F (A*B)				*
		C.V. (%)				8.08

Note: 0: the water at 0‰ salinity; 2: the water at 2‰ salinity; 3: the water at 3‰ salinity; 4: the water at 4‰ salinity; NAB: no applied bacteria; W01: applying the single strains of ALA producing *Luteovulum sphaeroides* W01; W14: applying the single strains of ALA producing *L. sphaeroides* W14; W22: applying the single strains of ALA producing *L. sphaeroides* W22; MTB: the mixture of the three bacteria, i.e applying the three strains of ALA producing *L. sphaeroides* W01, W14 and W22. The identical lowercase letters indicate insignificant differences between numbers in the same pool, while the identical uppercase letters indicate insignificant differences between numbers in the same column or row ( $P < 0.05$ ).

**Table S5.** Interactions between the two factors influencing the rice grain yield (g pot<sup>-1</sup>)

Factor		The water salinity (A) (‰)				Mean
		0	2	3	4	
The bacteria (B) (1.812 x 10 <sup>5</sup> CFU g <sup>-1</sup> dry soil)	NAB	20.8±0.2 <sup>cd</sup>	20.9±0.7 <sup>cd</sup>	16.2±0.1 <sup>f</sup>	15.4±0.3 <sup>f</sup>	18.3±0.3 <sup>C</sup>
	W01	24.1±0.8 <sup>abc</sup>	25.2±0.1 <sup>a</sup>	22.8±1.5 <sup>a-d</sup>	17.3±2.8 <sup>ef</sup>	22.3±1.3 <sup>AB</sup>
	W14	23.9±4.7 <sup>abc</sup>	22.5±3.2 <sup>a-d</sup>	22.3±1.1 <sup>a-d</sup>	15.3±1.0 <sup>f</sup>	21.0±2.5 <sup>B</sup>
	W22	24.4±2.6 <sup>abc</sup>	23.8±2.4 <sup>abc</sup>	24.2±1.4 <sup>abc</sup>	19.9±1.2 <sup>de</sup>	23.1±1.9 <sup>A</sup>
	MTB	25.5±1.6 <sup>a</sup>	25.0±2.2 <sup>ab</sup>	21.4±2.9 <sup>bcd</sup>	19.6±4.1 <sup>de</sup>	22.9±2.7 <sup>A</sup>
Mean		23.7±2.0 <sup>A</sup>	23.5±1.7 <sup>A</sup>	21.4±1.4 <sup>B</sup>	17.5±1.9 <sup>C</sup>	
F (A)						*
F (B)						*
F (A*B)						*
C.V. (%)						10.0

Note: 0: the water at 0‰ salinity; 2: the water at 2‰ salinity; 3: the water at 3‰ salinity; 4: the water at 4‰ salinity; NAB: no applied bacteria; W01: applying the single strains of ALA producing *Luteovulum sphaeroides* W01; W14: applying the single strains of ALA producing *L. sphaeroides* W14; W22: applying the single strains of ALA producing *L. sphaeroides* W22; MTB: the mixture of the three bacteria, i.e applying the three strains of ALA producing *L. sphaeroides* W01, W14 and W22. The identical lowercase letters indicate insignificant differences between numbers in the same pool, while the identical uppercase letters indicate insignificant differences between numbers in the same column or row ( $P < 0.05$ ).