



Figure S1 Sampling location: the same part was taken respectively, the outer green leaves, the middle yellow leaves and the inner core leaves

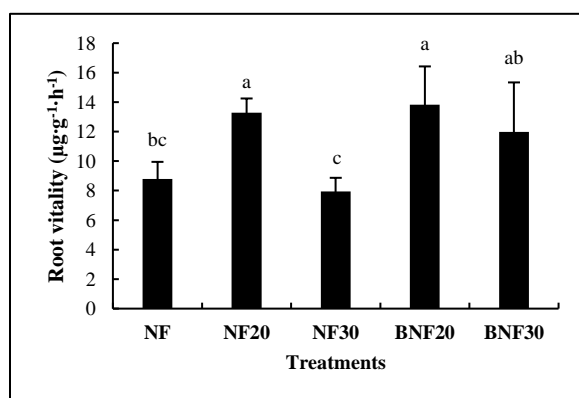


Figure.S2 Effects of different fertilization treatments on activity of 'yellow rose' cabbage root

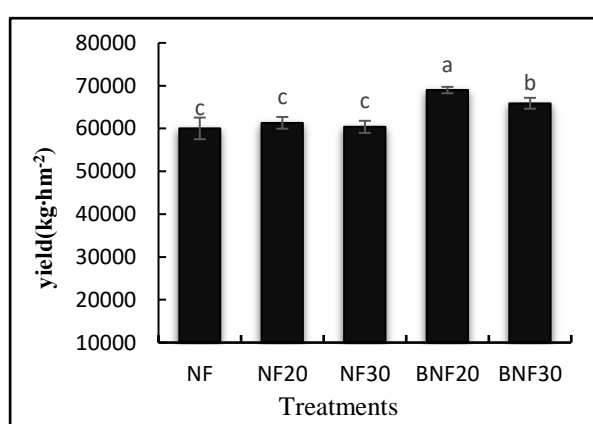


Figure.S3 The yield of next year plant

TableS1 Effects of different fertilization treatments on photosynthetic characteristics of 'yellow rose' cabbage (Harvest period)

Treatments	$P_n$ ( $\mu\text{mol}\cdot\text{m}^{-2}\cdot\text{s}^{-1}$ )	$G_s$ ( $\text{mmol}\cdot\text{m}^{-2}\cdot\text{s}^{-1}$ )	$C_i$ ( $\mu\text{mol}\cdot\text{mol}^{-1}$ )	$T_r$ ( $\text{mmol}\cdot\text{m}^{-2}\cdot\text{s}^{-1}$ )
NF	19.6±0.95b	0.5±0.11a	294.3±8.50a	2.7±0.26b
NF20	22.2±0.58a	0.6±0.07a	298.9±6.37a	3.9±0.19a
NF30	21.7±0.73ab	0.6±0.09a	308.5±6.16a	3.4±0.36ab
BNF20	23.0±0.62a	0.8±0.15a	307.3±5.60a	3.6±0.31ab
BNF30	22.1±0.84a	0.5±0.05a	297.1±8.50a	3.3±0.48ab