

SUPPLEMENTARY MATERIAL

The acceptor side of photosystem II is the initial target of nitrite stress in *Synechocystis* sp. PCC 6803

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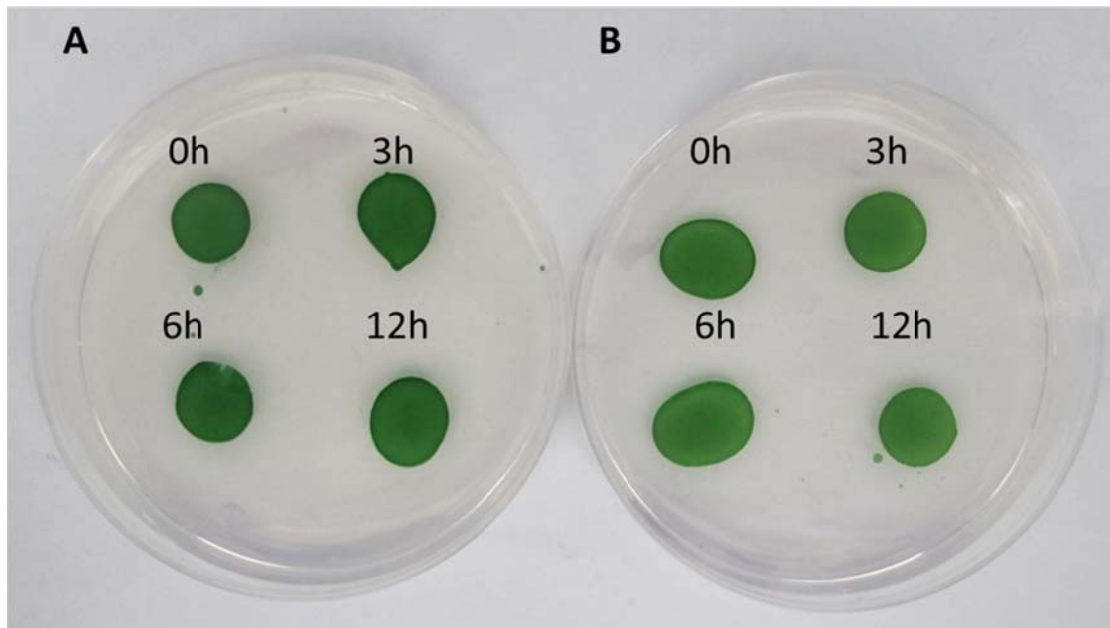


Figure S1. Effect of NO₂⁻ on the viability of *Synechocystis* cells. Cells were incubated with BG11 (A) and 70.4mM (4×) NO₂⁻ (B) and at various times aliquots were taken and centrifuged; then the cultures were concentrated to OD730 1.0 and equal volumes were loaded onto agar plates containing BG11 medium. The photo was taken after 4 days incubation under growth conditions.

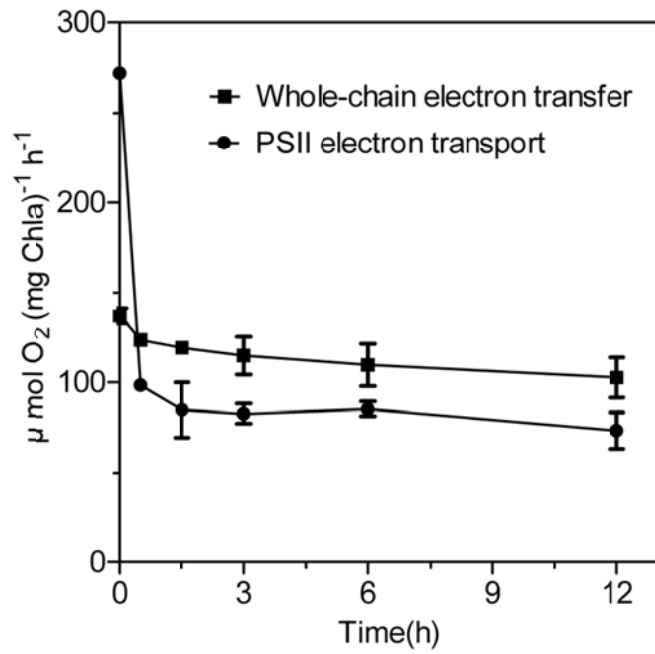


Figure S2. The absolute value changes of light-saturated whole-chain (intact square) and PSII-mediated (intact circle) electron transport rates in intact cells in response to 70.4 mM (4x) NO_2^- .

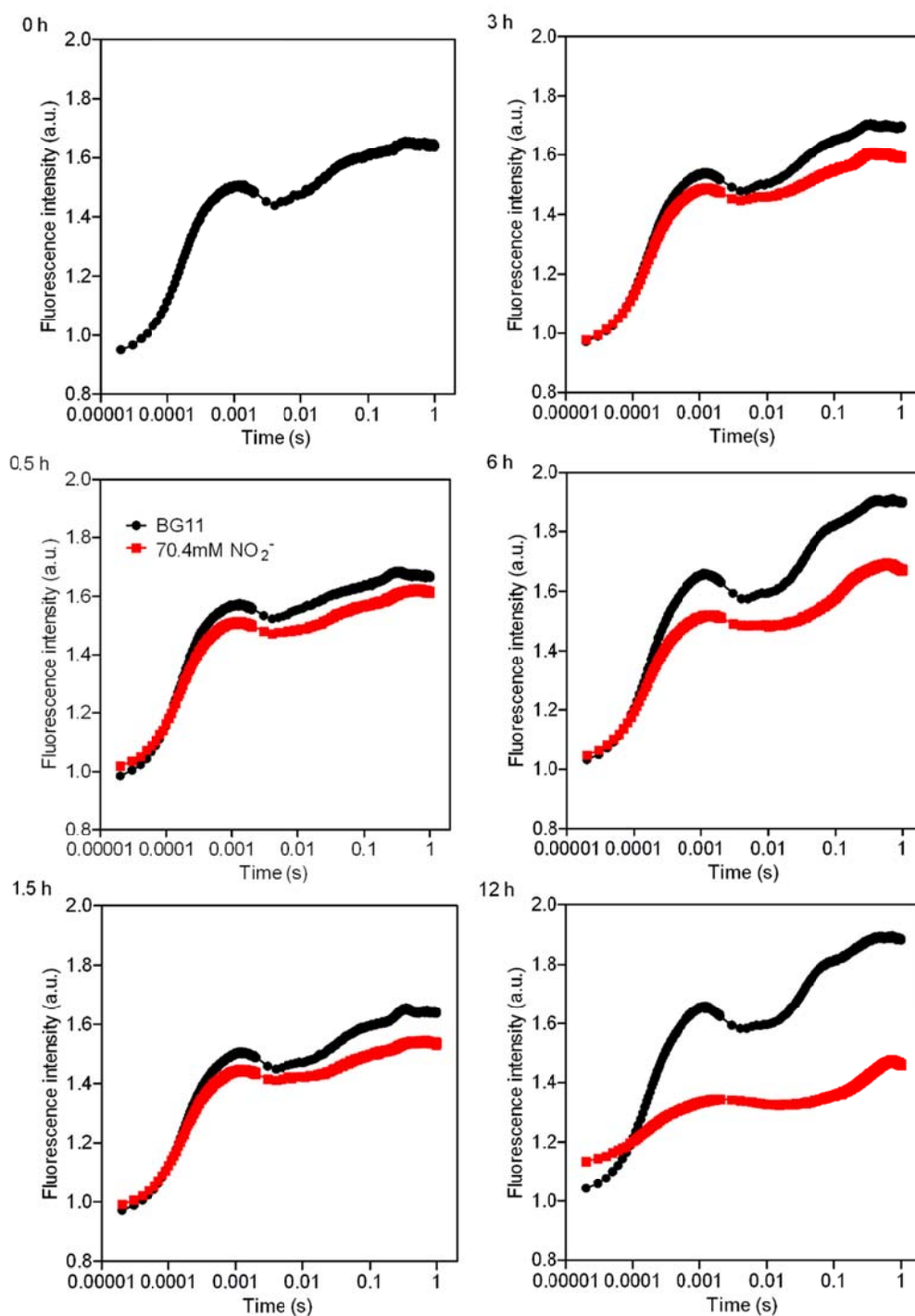


Figure S3. Polyphasic chlorophyll a fluorescence induction kinetics (FI) in *Synechocystis* cells exposed to 70.4mM (4×) NO_2^- for various periods of time. The FI transients of different samples plotted on a logarithmic time scale (0.01 ms to 1 s). Values are means of three measurements.

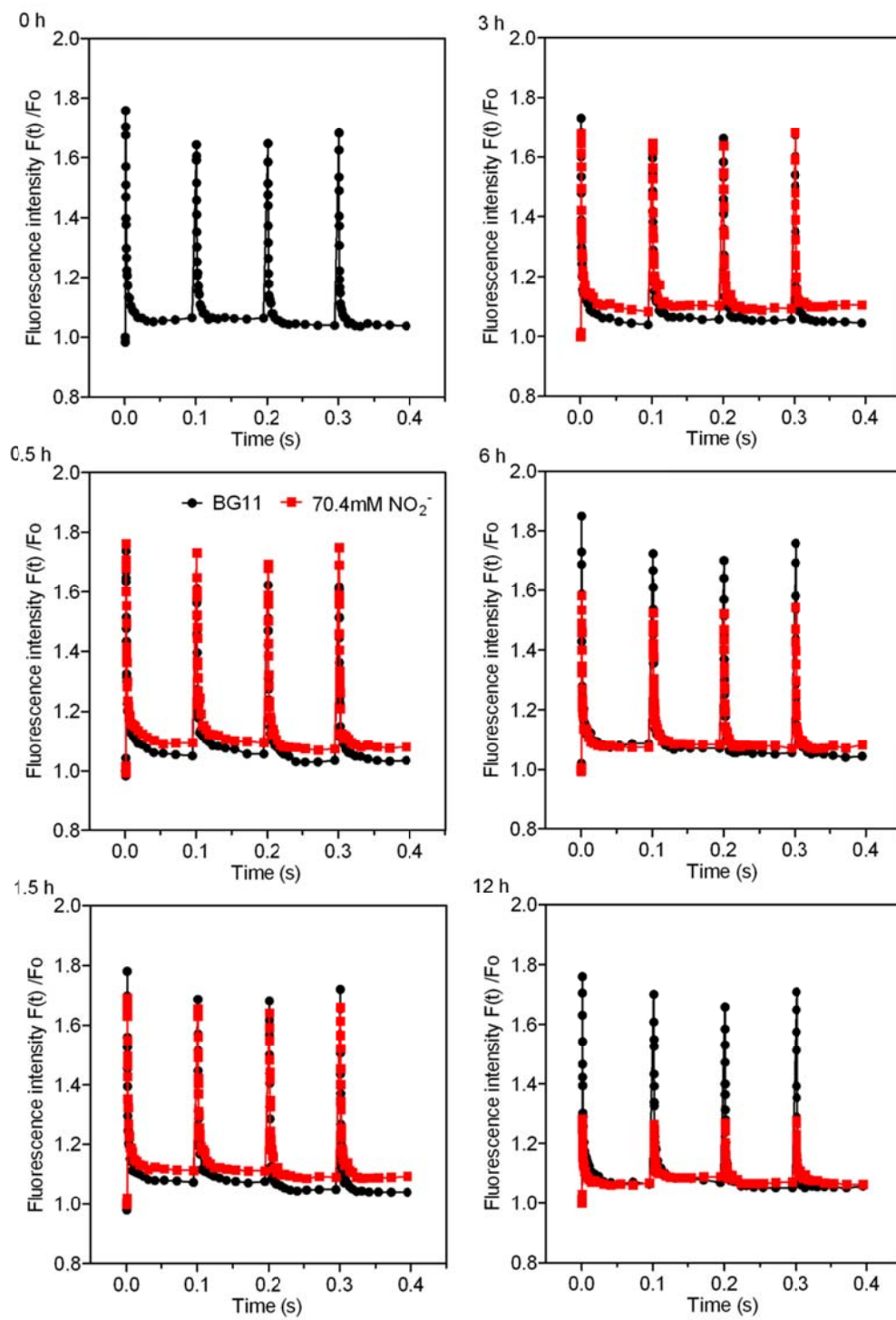


Figure S4. Fluorescence decay curves induced in *Synechocystis* treated with 70.4mM (4×) NO_2^- for various periods of time. Each value represents the mean of three replicates.