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Electronic Supplementary Information for

Influence of the anchoring number in carbazole-based photosensitizer on the photovoltaic performance of p-type NiO dye sensitized solar cells

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Figure S1. Molecular structure of C343

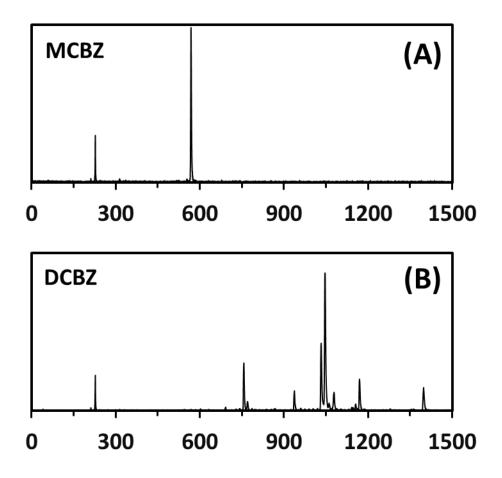


Figure S2. Mass spectra of (A) MCBZ and (B) DCBZ

Table S1. Electrochemical parameters of MCBZ and DCBZ. Their E_g (band gap) is determined from the intersection of the absorption and emission spectra in the DMF solution. The oxidation potential (E_{OX}) of the dyes are measured by cyclic voltammetry in a DMF solution.

| Dye | E _g (eV) | E _{ox} (V) | E _{HOMO} (eV) | E _{LUMO} (eV) |
|------|---------------------|---------------------|------------------------|------------------------|
| MCBZ | 2.18 | 0.39 | -4.69 | -2.51 |
| DCBZ | 2.16 | 0.42 | -4.72 | -2.56 |