

Supporting materials:

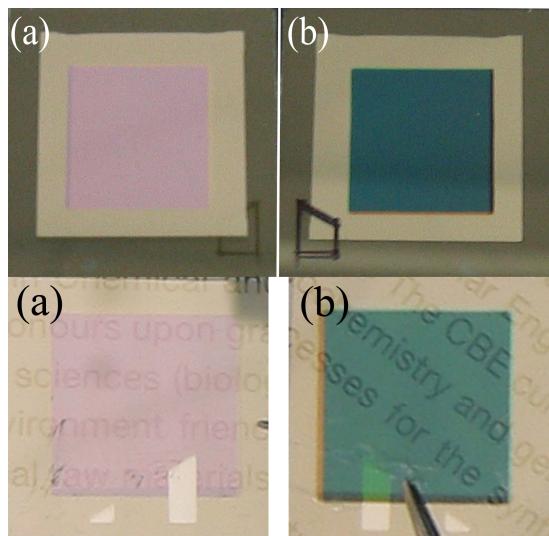


Figure S1, the digital photos of ITO\CuPc (130 Å)\C₆₀ (220 Å)\Alq₃ (35 Å)\Ag (150 Å) from a) Ag and b) ITO side on black surface (upper two) and on white paper (bottom two). The color difference shows the reflectivity difference from Ag and ITO side. The characters on the white paper can be seen clearly shows the good transmission ability of this structure.

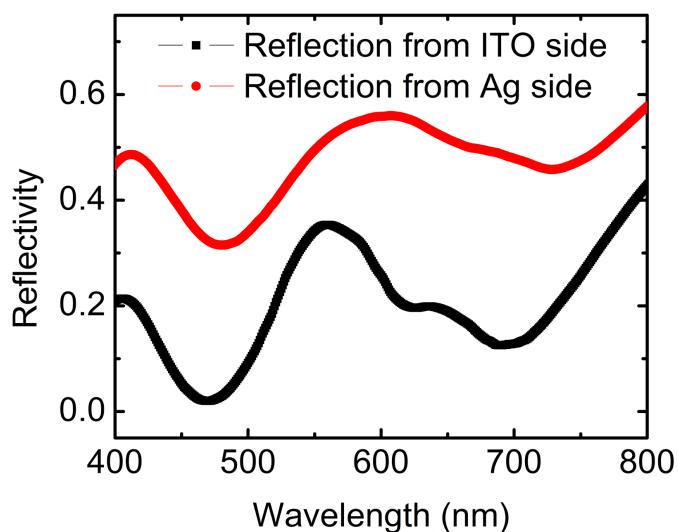


Figure S2, transfer matrix calculation of reflectivity of ITO\CuPc (130 Å)\C₆₀ (220 Å)\Alq₃ (35 Å)\Ag (150 Å) from Ag (red curve) and ITO side (black curve) respectively. The larger reflectivity from silver side means that more light will be back reflected into the back sub-cell on top of the 15 nm silver.

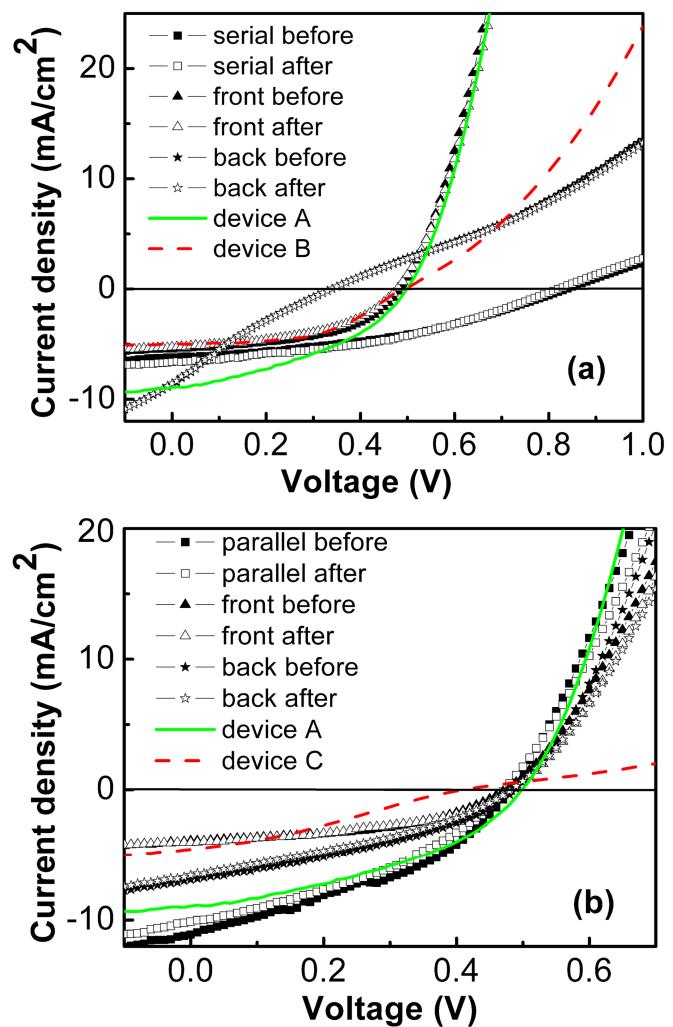


Figure S3, I-V curves before and after EQE measurements. The small decrease of current after EQE measurement compare to the one before EQE measurement indicates that the sample are relatively stable during our experiments.