

Benzimidazole–phosphine oxide hybrid electron transporters for unilateral homogeneous phosphorescent organic light-emitting diodes with enhanced power efficiency

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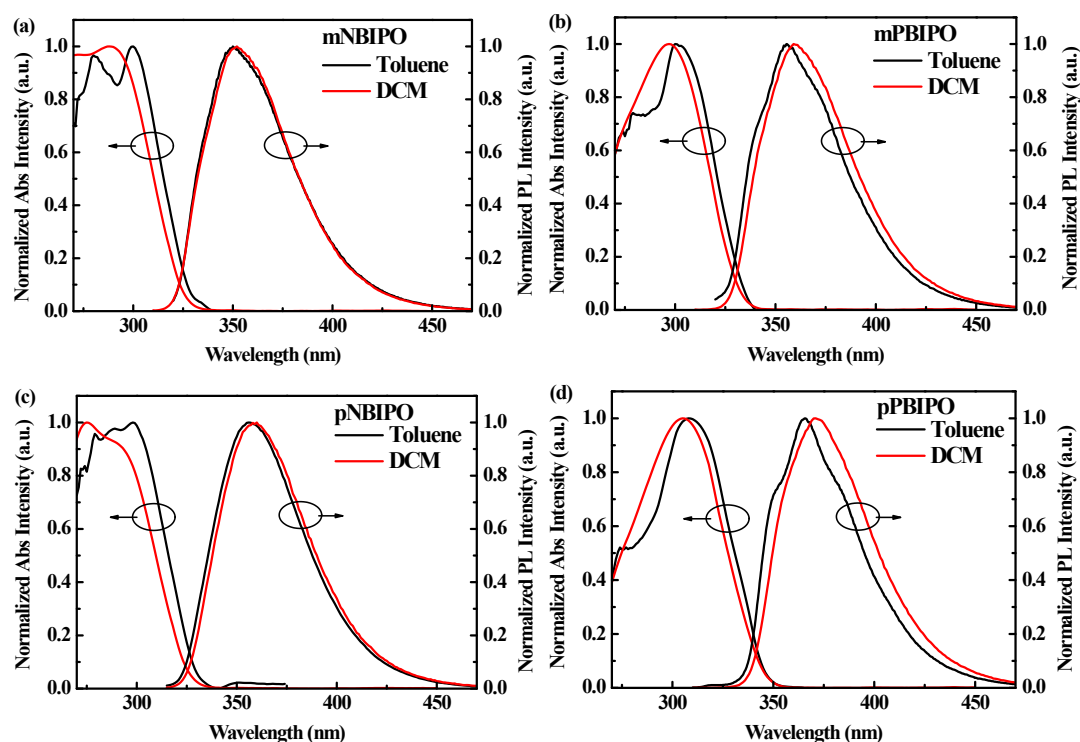


Fig. S1. (a)-(d) UV and PL spectra of **BIPO** derivatives measured in toluene and DCM dilute solution.

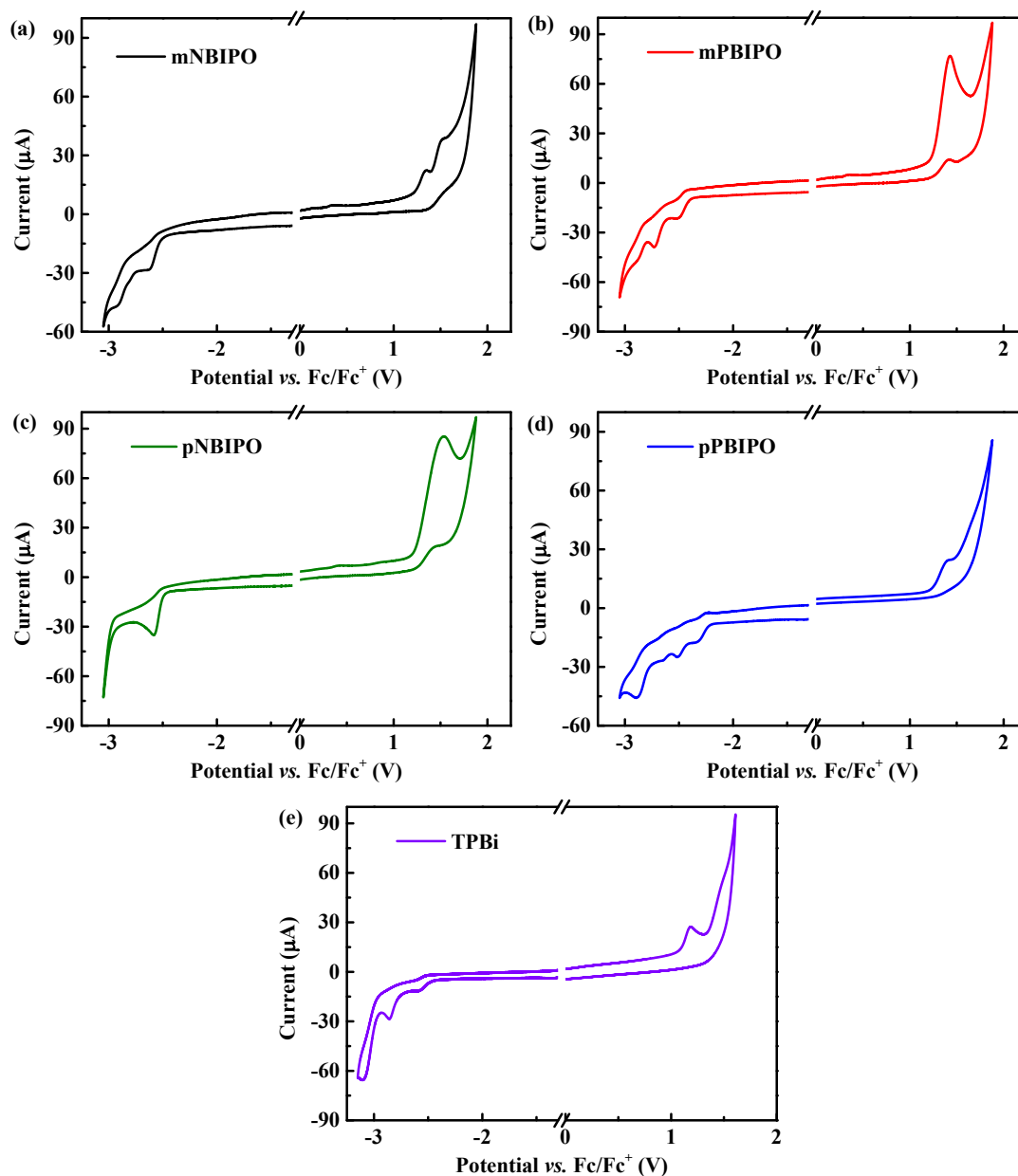


Fig. S2. (a)-(e) Cyclic voltammograms of **BIPO** derivatives and TPBi. The measurement was performed in acetonitrile and dichloromethane, respectively, with $n\text{-Bu}_4\text{NPF}_6$ as supporting electrolyte at a scan rate of 100 mV/s.

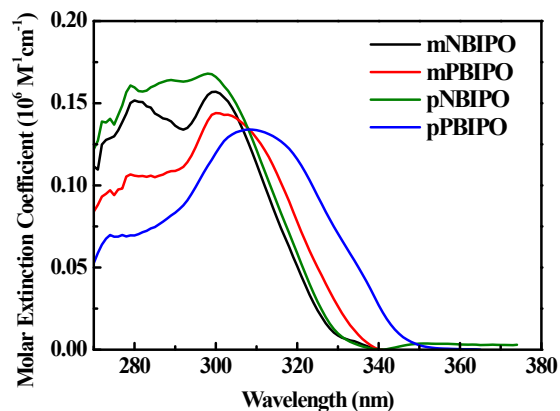


Fig. S3 Absorption spectra of the **BIPO** derivatives recorded in toluene.

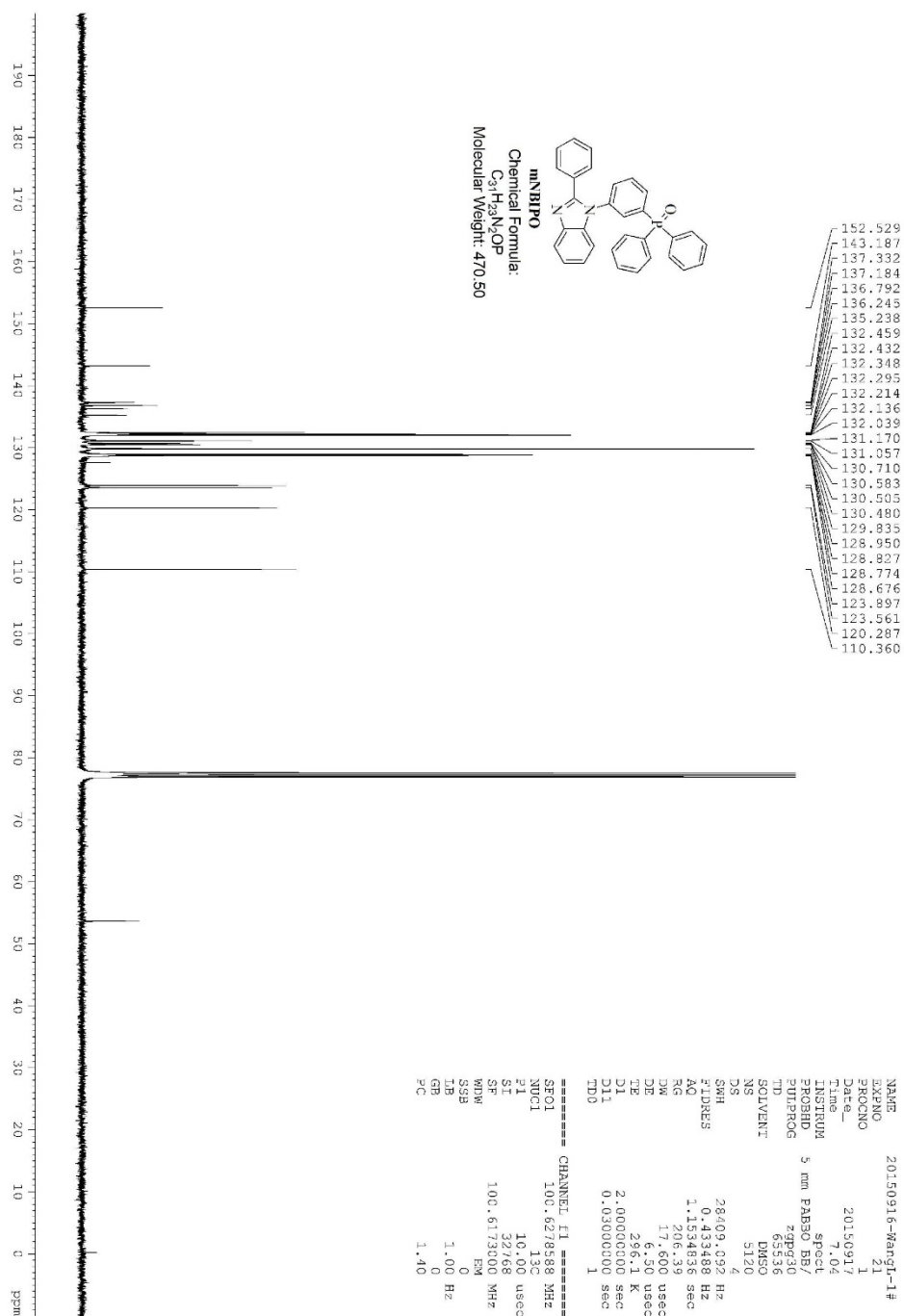


Fig. S4. ^{13}C -NMR of compound **mNBIPO**.

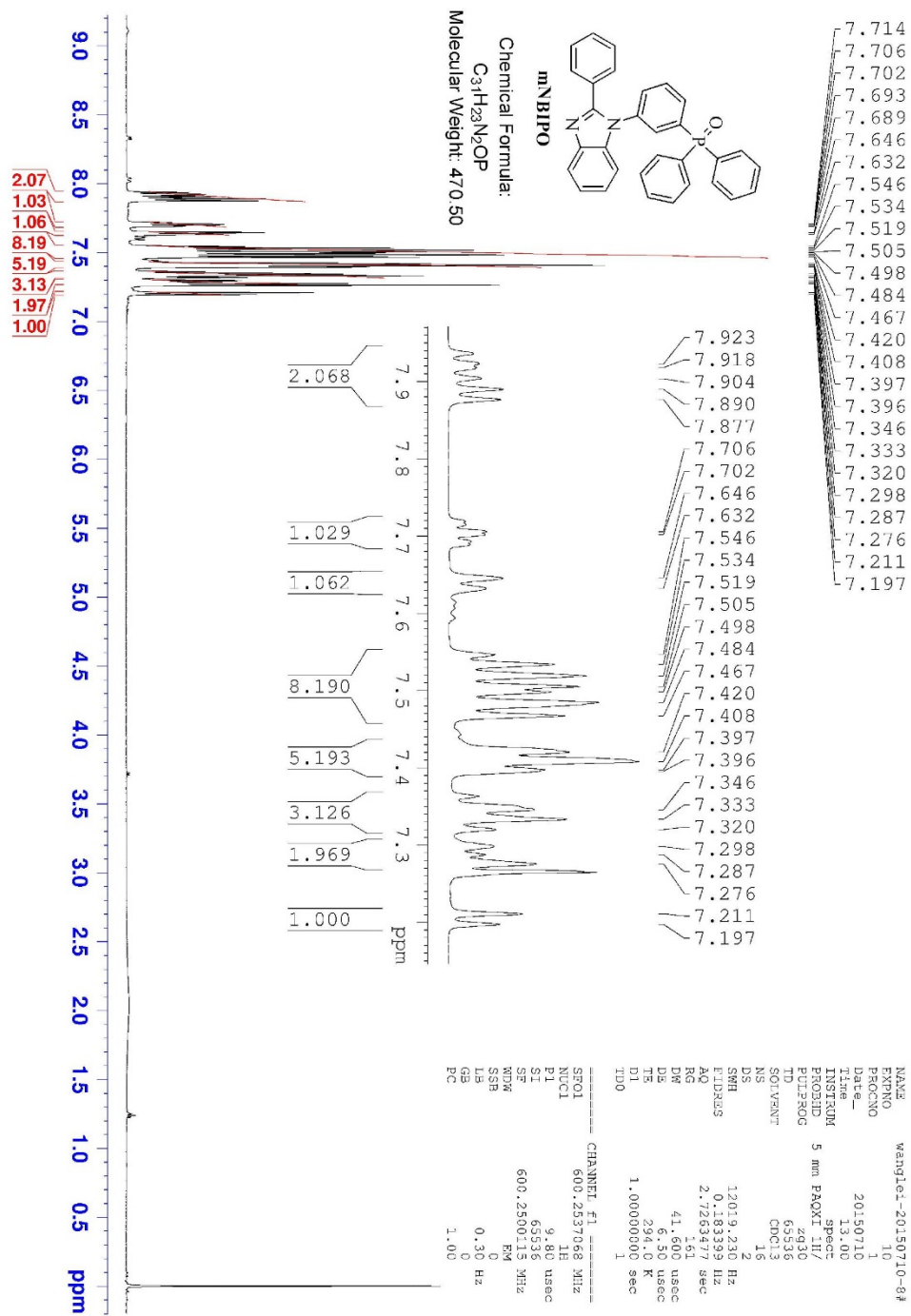


Fig. S5. 1H -NMR of compound **mNBIPPO**.

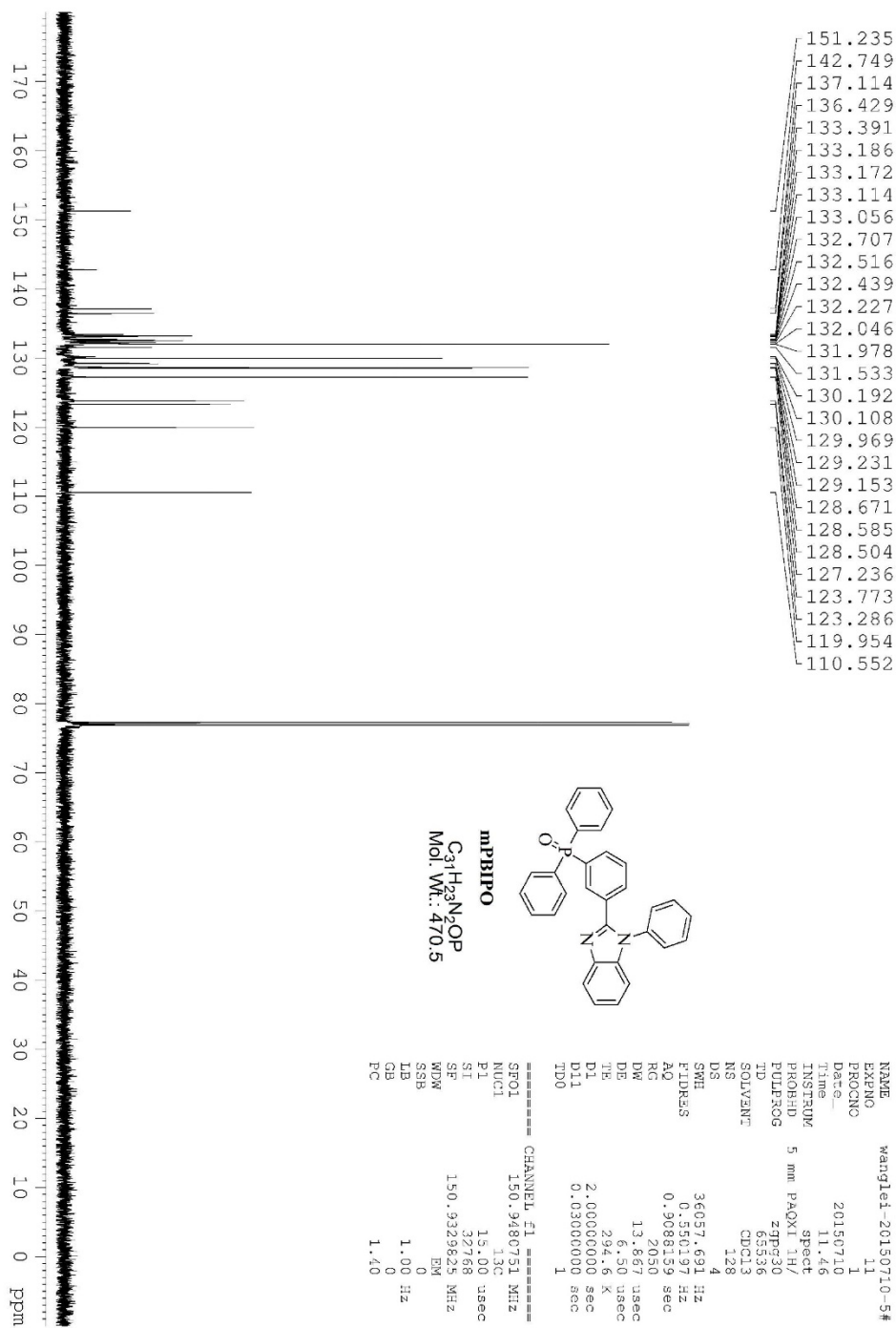


Fig. 6. ¹³C-NMR of compound **mPBIPO**.

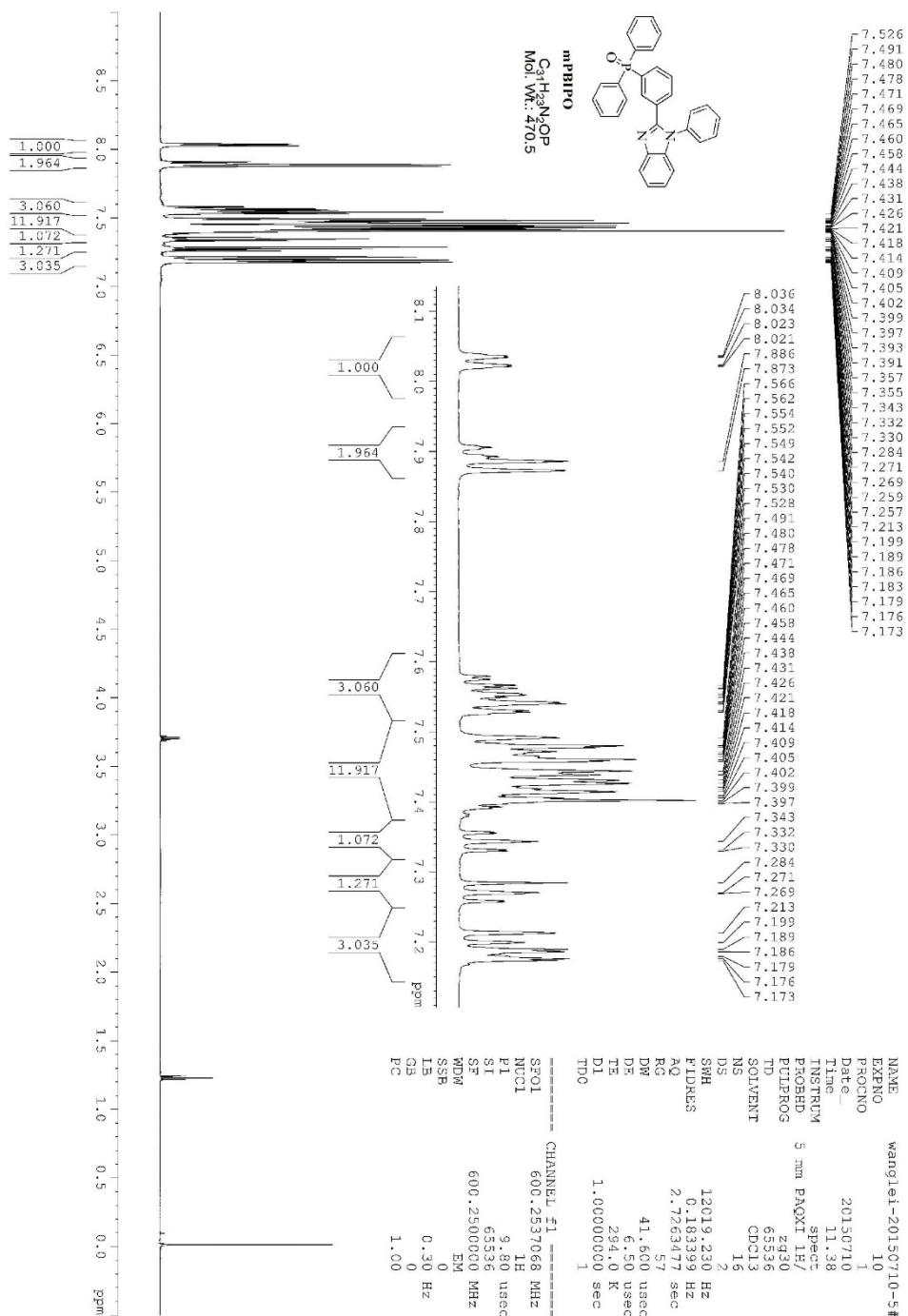


Fig. S7. 1H -NMR of compound **mPBIPO**.

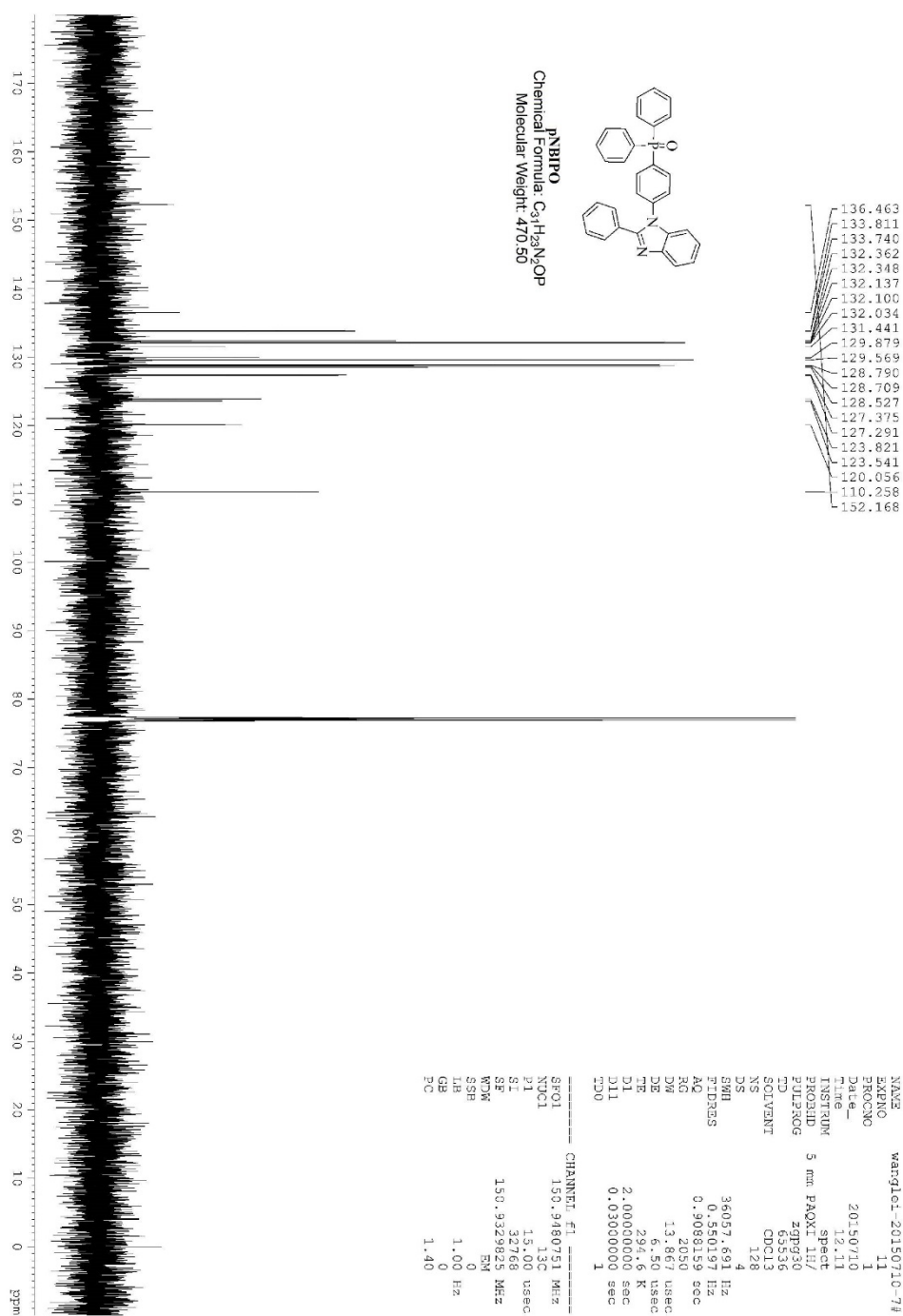


Fig. S8. ^{13}C -NMR of compound **pNBIPO**.

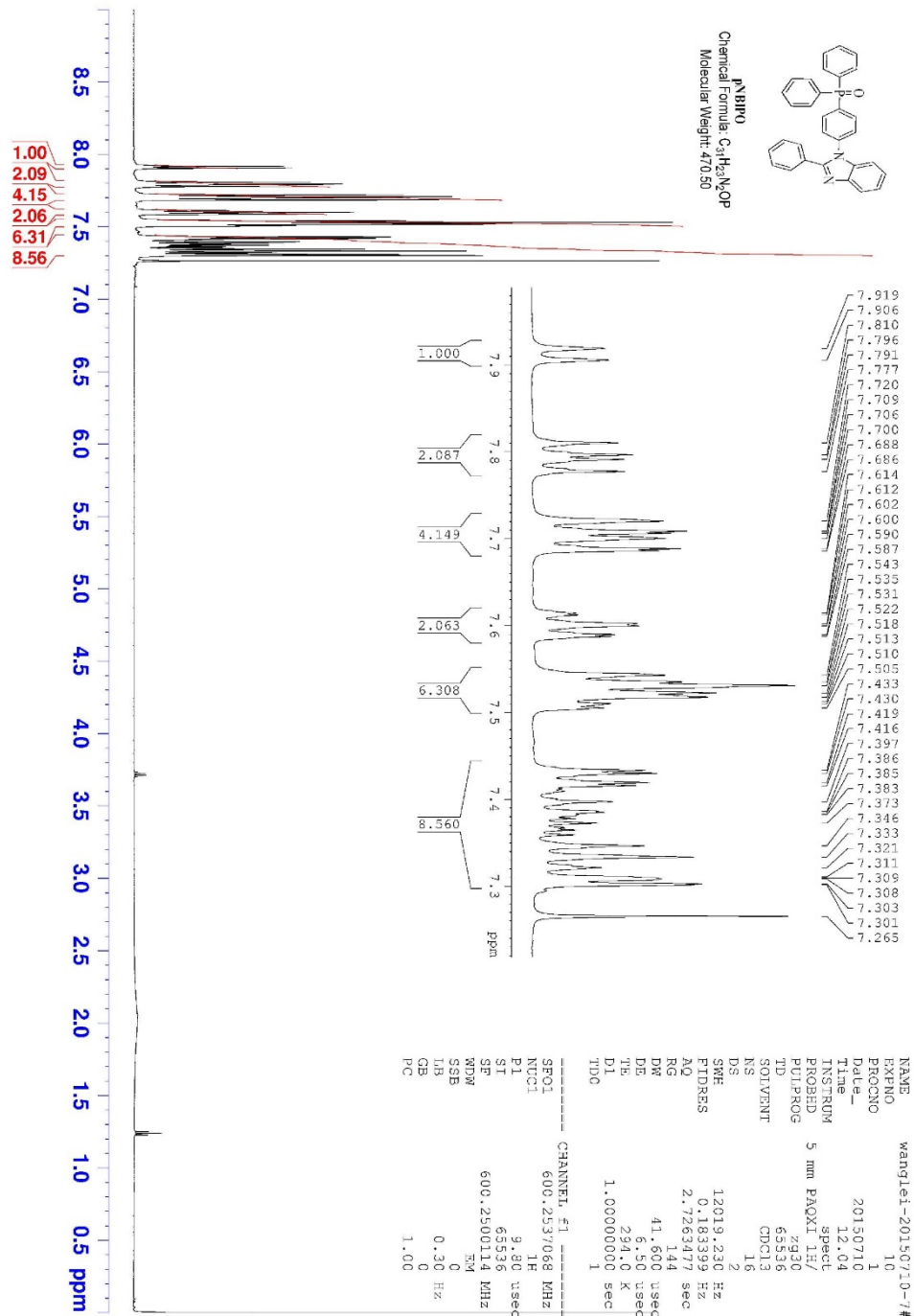


Fig. S9. ¹H-NMR of compound pNBIPPO.

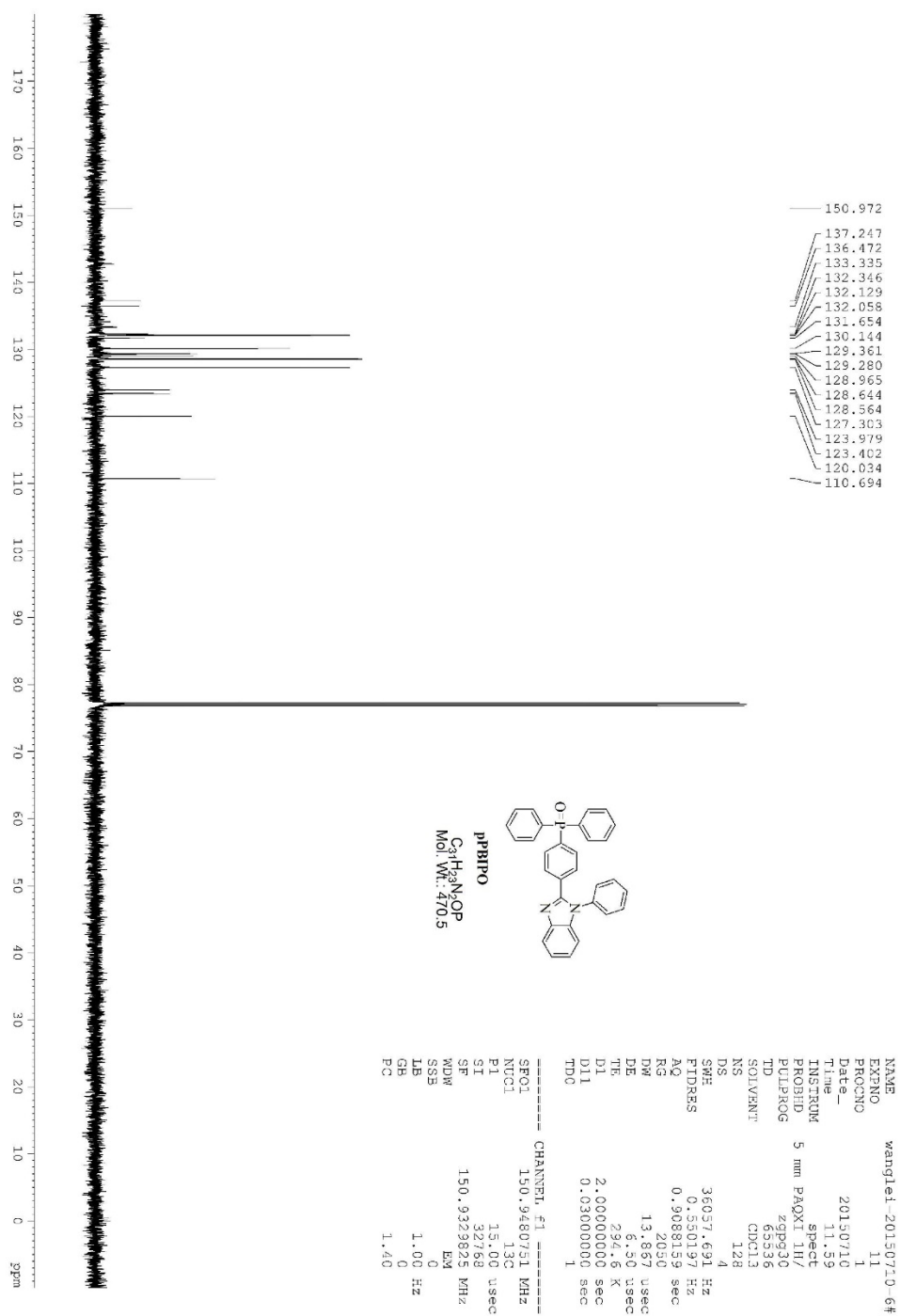


Fig. S10. ^{13}C -NMR of compound **pPBIPO**.

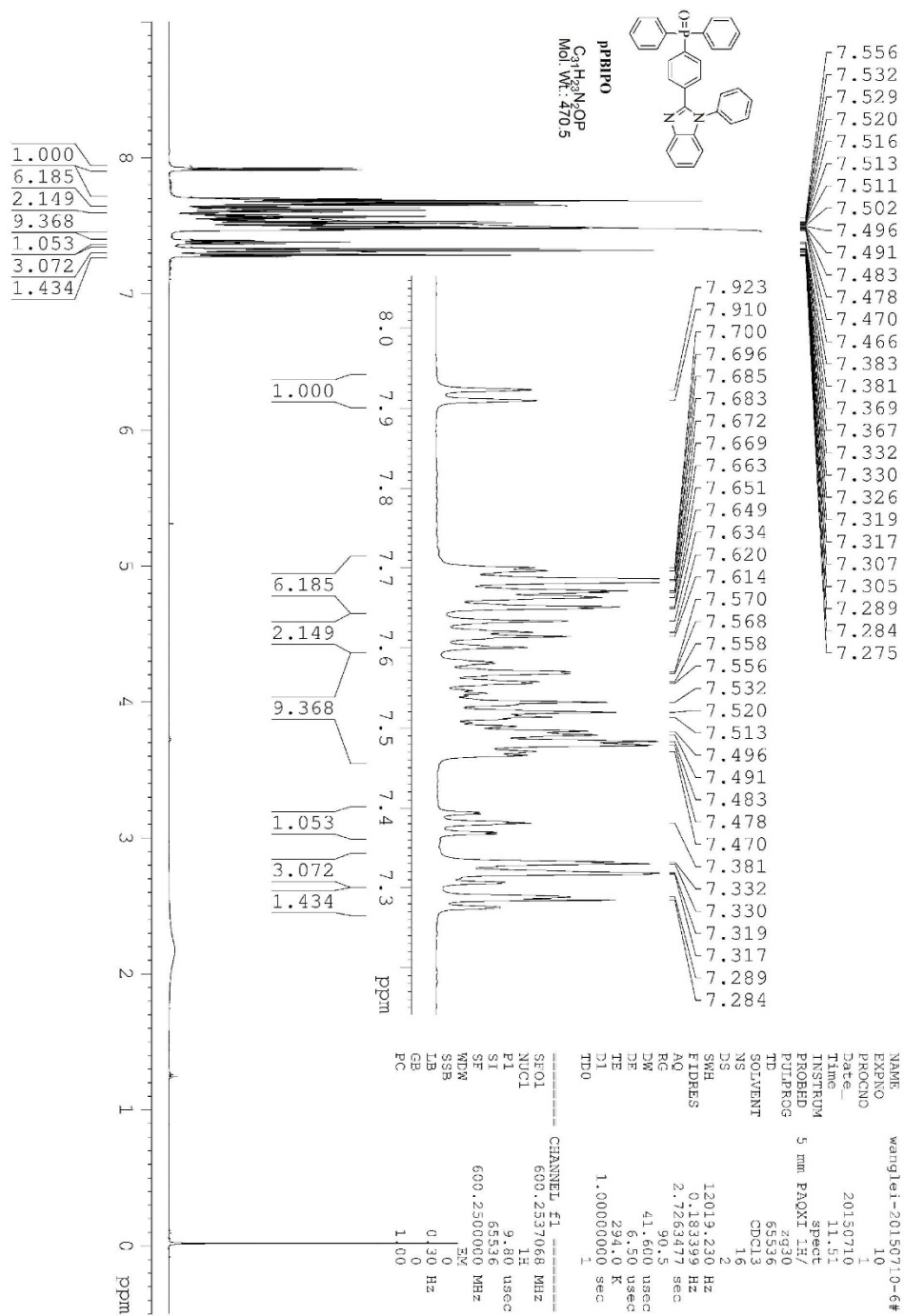


Fig. S11. 1H -NMR of compound **pPBIPO**.