

- Introduction -----88

### **Small molecules for solution-processed OLEDs**

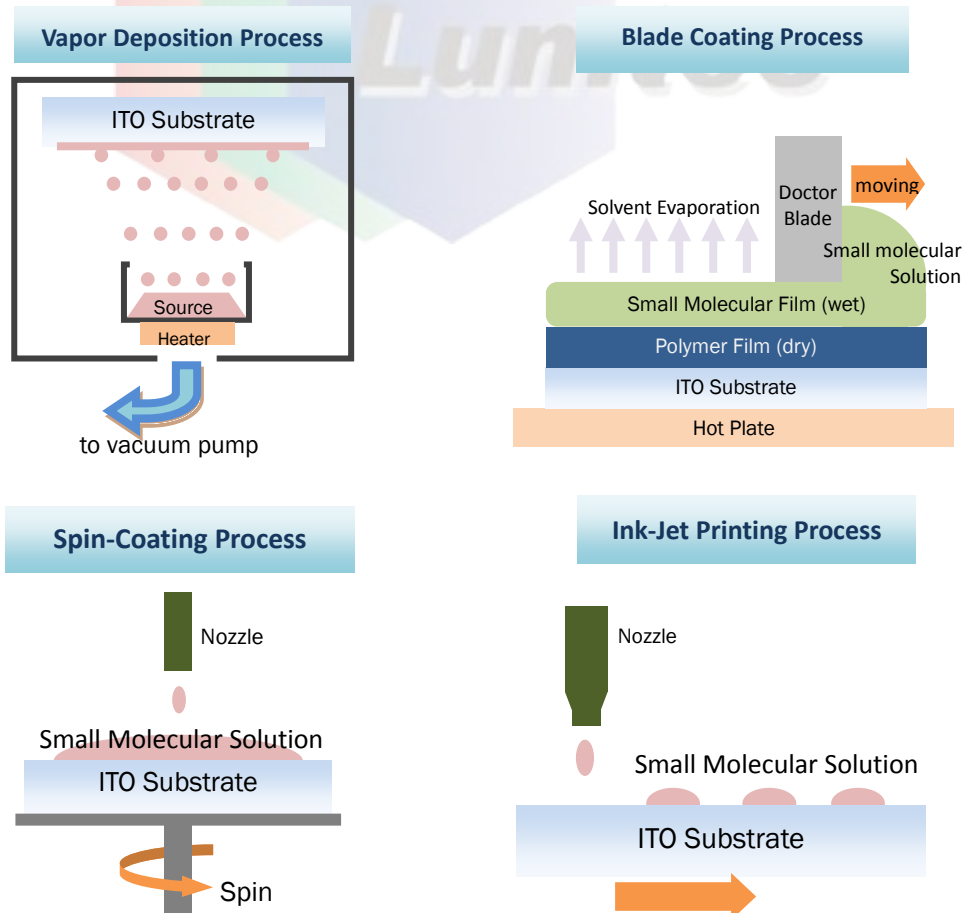
- Hole Transport Layer/Hole Injection Layer (HTL/HIL) Materials (14) -----90
- Phosphorescent Host Materials (17) -----93
- Phosphorescent Dopant Materials (9)-----96
- Fluorescent Host Materials (4)-----98
- Fluorescent Dopant Materials (4) -----99
- Electron Transport Layer / Hole Blocking Layer (ETL/HBL) Materials (11)---- 100

### **Polymers for solution-processed OLEDs**

- Hole Transport Layer (9)-----102
- Emitting layer (46) -----104
- Electron Transport Layer (2) -----112

The earliest multilayered organic light-emitting diodes (OLEDs) were reported by Tang and Van Slyke in 1987 and were based on a bilayer architecture<sup>1</sup>. Since then, OLEDs have drawn tremendous attention during the past decades because of their potential applications in solid-state lightings and flat-panel displays.

OLEDs are characterized by low driving voltage, high brightness, full-color emission, rapid response, and easy fabrication of potentially large-area, flexible thin-film devices. Recently, organic light-emitting diodes (OLEDs) have been successfully developed and have now entered the commercial marketplace; however the general method for fabricating organic light-emitting diodes (OLEDs) is vapor deposition under vacuum, which has critical drawbacks most notably the pixilation using evaporation masks limit its scalability and resolution. Other limitations include low use of the expensive OLED materials (~20%), and high manufacturing costs. Despite these limitations OLEDs do have some advantages over thermal evaporation processing because of its low-cost and large area manufacturability<sup>2,3</sup> and have attractive use in solution processing, such as spin-coating, inkjet-printing, blade coating and screen printing.



In the past decades, numerous efforts have been focused on the synthesis of new materials which have been developed for solution-processed OLEDs. Among them are light-emitting polymer and dendrimers. Light-emitting polymers are considered to be suitable for solution-processed, although their performances are lower than vacuum deposited small molecules, and there are some intrinsic difficulties such as the control of batch-to-batch variations and the purification of the polymeric materials. Furthermore, dendrimers are another important class of macromolecule since they were also successfully developed and used in solution-processed OLEDs<sup>5,6</sup>.

One of the most challenging tasks in fabricating multilayer solution-processed OLEDs is to avoid the interfacial mixing between different layers because most of the emissive and charge-transporting materials are soluble in common organic solvents. Extensive efforts have been invested in developing novel crosslinkable materials, after thermo- or photo-crosslinking, all these crosslinked layers possess very good solvent resistance which greatly facilitates the subsequent processing of the emitting layer. By taking advantage of these materials, high efficiency OLEDs have been realized<sup>7</sup>.

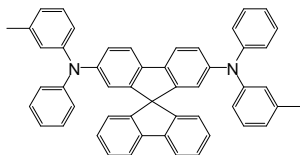
Recently, by adopting novel molecule structure design or processing strategies, solution-processed small molecule OLEDs are also successfully demonstrated and showed comparable performance to those vacuum evaporated processed counterparts<sup>8,9</sup>.

1. Tang, C. W.; Van Slyke, S. A. *Appl. Phys. Lett.* 1987, 51, 913.
2. M. C. Gather, A. Köhnen, K. Meerholz, *Adv. Mater.* 2011, 23, 2.
3. J. Huang, G. Li, E. Wu, Q. Xu, Y. Yang, *Adv. Mater.* 2006, 18, 114.
4. Grimsdale, A. C.; Chan, K. L.; Martin, R. E.; Jokisz, P. G.; Holmes, A. B. *Chem. Rev.* 2009, 109, 897–1091 and the references therein.
5. Li, J.; Liu, D. *J. Mater. Chem.* 2009, 19, 7584–7591 and the references therein.
6. Lo, S.; Burn, P. L. *Chem. Rev.* 2007, 107, 1097–1116 and the references therein.
7. Carlos A. Zuniga, Stephen Barlow, and Seth R. Marder, *Chem. Mater.* 2011, 23, 658–681.
8. Rehmann, N.; Hertel, D.; Meerholz, K.; Becker, H.; Heun, S. *Appl. Phys. Lett.* 2007, 91, 103507.
9. Hou, L. D.; Duan, L.; Qiao, J.; Li, W.; Zhang, D. Q.; Qiu, Y. *Appl. Phys. Lett.* 2008, 92, 263301.

### LT-E105 | Spiro-TPD

*N,N'*-Bis(3-methylphenyl)-*N,N'*-bis(phenyl)-2,7-diamino-9,9-spirofluorene

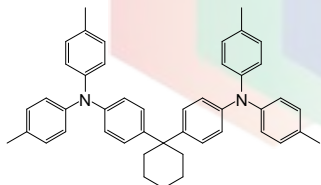
CAS No. : 1033035-83-4  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{51}H_{38}N_2$   
 M.W. : 678.86 g/mole  
 UV : 379 nm (in THF)  
 PL : 416 nm (in THF)  
 TGA : > 280 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform



### LT-N137 | TAPC

Di-[4-(*N,N*-di-*p*-tolyl-amino)-phenyl]cyclohexane

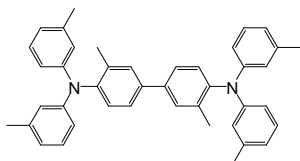
CAS No. : 58473-78-2  
 Grade : Sublimed, > 99.5% (HPLC)  
 Formula :  $C_{46}H_{46}N_2$   
 M.W. : 626.87 g/mole  
 UV : 305 nm (in THF)  
 PL : 414 nm (in THF)  
 TGA : > 290 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Organic Electronics 13 (2012) 914-918*



### LT-N140 | HMTDP

*N,N,N',N'*-Tetra-(3-methylphenyl)-3,3'-dimethylbenzidine

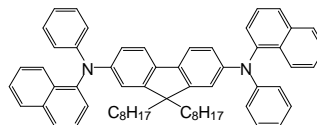
CAS No. : 105465-14-3  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{42}H_{40}N_2$   
 M.W. : 572.78 g/mole  
 UV : 302 nm (in THF)  
 PL : 399 nm (in THF)  
 TGA : > 240 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform



### LT-N154 | DOFL-NPB

*N',N'*-Di(naphthalen-1-yl)-9,9-dioctyl-*N',N'*-diphenyl-9H-fluorene-2,7-diamine

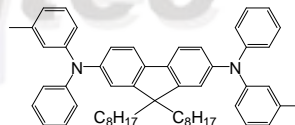
CAS No. : 870197-09-4  
 Grade : > 99% (HPLC)  
 Formula :  $C_{61}H_{64}N_2$   
 M.W. : 825.17 g/mole  
 UV : 382 nm (in THF)  
 PL : 460 nm (in THF)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform



### LT-N155 | DOFL-TPD

*N,N'*-Bis(3-methylphenyl)-*N,N'*-bis(phenyl)-9,9-dioctylfluorene

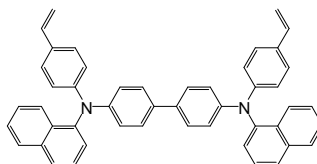
CAS No. : 439942-97-9  
 Grade : > 99% (HPLC)  
 Formula :  $C_{55}H_{64}N_2$   
 M.W. : 753.11 g/mole  
 UV : 376 nm (in THF)  
 PL : 401 nm (in THF)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform



### LT-N157 | VNPB

*N',N'*-Di(naphthalen-1-yl)-*N',N'*-bis(4-vinylphenyl)biphenyl-4,4'-diamine

CAS No. : 1010396-31-2  
 Grade : > 95% (HPLC)  
 Formula :  $C_{48}H_{36}N_2$   
 M.W. : 640.81 g/mole  
 UV : 339 nm (in THF)  
 PL : 450 nm (in THF)  
 Solvent : Toluene, Chloroform

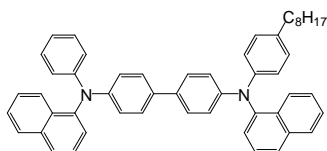


### LT-N158 | ONPB

*N,N'*-Di(naphthalen-1-yl)-*N,N'*-(4-octylphenyl)-*N,N'*-henylbiphenyl-4,4'-diamine

CAS No. : 1431521-16-2  
 Grade : > 99% (HPLC)  
 Formula :  $C_{52}H_{48}N_2$   
 M.W. : 700.95 g/mole  
 UV : 347 nm (film)  
 PL : 439 nm (film)  
 TGA : > 300 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Journal of Photopolymer Science and Technology*, Vol. 25, 3(2012) 335-339

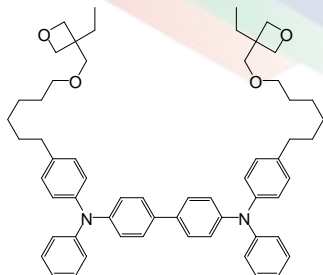


### LT-N159 | OTPD

*N,N'*-Bis(4-(6-((3-ethyloxetan-3-yl)methoxy)hexyl)phenyl)-*N,N'*-diphenylbiphenyl-4,4'-diamine

CAS No. : 746634-00-4  
 Grade : > 99% (HPLC)  
 Formula :  $C_{60}H_{72}N_2O_4$   
 M.W. : 885.22 g/mole  
 UV : 308,353 nm (in  $CH_2Cl_2$ )  
 PL : 410 nm (in  $CH_2Cl_2$ )  
 Solvent : Toluene, Chloroform

Reference : 1. *Adv. Mater.* 2006, 18, 948-954  
 2. *Appl. Phys. Lett.* 91, 103507(2007)

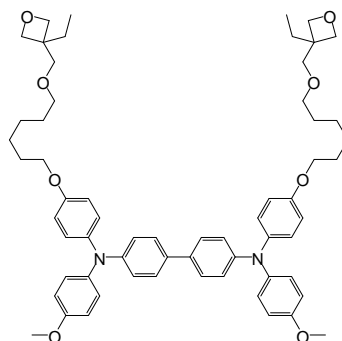


### LT-N160 | QUPD

*N,N'*-Bis(4-(6-((3-ethyloxetan-3-yl)methoxy)hexyloxy)phenyl)-*N,N'*-bis(4-methoxyphenyl)biphenyl-4,4'-diamine

CAS No. : 864130-79-0  
 Grade : > 99% (HPLC)  
 Formula :  $C_{62}H_{76}N_2O_8$   
 M.W. : 945.28 g/mole  
 UV : 353 nm (in  $CH_2Cl_2$ )  
 PL : 439 nm (in  $CH_2Cl_2$ )  
 Solvent : Toluene, Chloroform

Reference : 1. *Adv. Mater.* 2006, 18, 948-954  
 2. *Appl. Phys. Lett.* 91, 103507(2007)

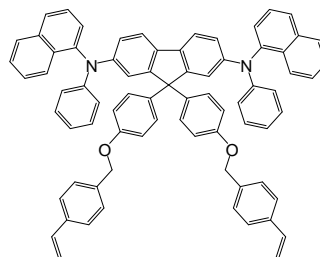


### LT-N164 | VB-FNPD

9,9-Bis[4-[(4-ethenylphenyl)methoxy]phenyl]-*N,N'*-di-1-naphthalenyl-*N,N'*-diphenyl-9H-fluorene-2,7-diamine

CAS No. : 1173170-48-3  
 Grade : > 95% (HPLC)  
 Formula :  $C_{75}H_{56}N_2O_2$   
 M.W. : 1017.26 g/mole  
 UV : 356 nm (in  $CH_2Cl_2$ )  
 PL : 467 nm (in  $CH_2Cl_2$ )  
 Solvent : Toluene, Chloroform

Reference : 1. *Organic Electronics* 14 (2013) 1204-1210  
 2. *J. Mater. Chem.*, 2009, 19, 3618-3623



### LT-N165 | X-F6-TAPC

*N,N'*-(4,4'-(Cyclohexane-1,1-diyl)bis(4,1-phenylene))bis(*N*-(4-(6-(2-ethyloxytan-2-yloxy)hexyl)phenyl)-3,4,5-trifluoroaniline)

Grade : > 99% (HPLC)

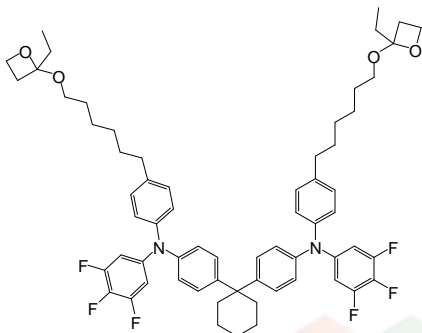
Formula :  $C_{64}H_{72}F_6N_2O_4$

M.W. : 1047.26 g/mole

UV : 300 nm (in  $CH_2Cl_2$ )

Solvent : Toluene, Chloroform

Reference : *Adv. Funct. Mater.* 2013, 23, 359–365

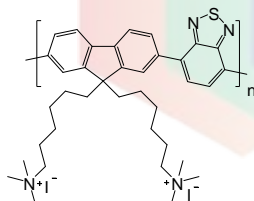


### LT-N181 | PFNIBT

Poly(9,9-bis(6-trimethyl ammoniumiodide)-hexyl-fluorene-2,7-diyl-*alt*(benzo[2,1,3]thiadiazol-4,7-diyl))

CAS No. :  $M_w > 20,000$  (GPC)

Grade :  $(C_{37}H_{50}N_4S)_n$



### LT-N221 | HAT-CN

Dipyrazino[2,3-*f*:2',3'-*h'*]quinoxaline-2,3,6,7,10,11-hexacarbonitrile

CAS No. : 105598-27-4

Grade : Sublimed, > 99% (HPLC)

Formula :  $C_{18}N_{12}$

M.W. : 384.27 g/mole

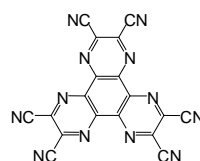
UV : 282, 321 nm (in  $CH_2Cl_2$ )

PL : 422 nm (in  $CH_2Cl_2$ )

TGA : > 400 °C (0.5% weight loss)

Solvent : 2-Propanone

Reference : *Organic Electronics* 14 (2013) 1204–1210



### LT-N260 | 3FTPD-C8

*N,N'*-(9,9-Dioctyl-9H-fluorene-2,7-diyl)bis(9,9-dimethyl-*N,N',N'*-triphenyl-9H-fluorene-2,7-diamine)

Grade : > 97% (HPLC)

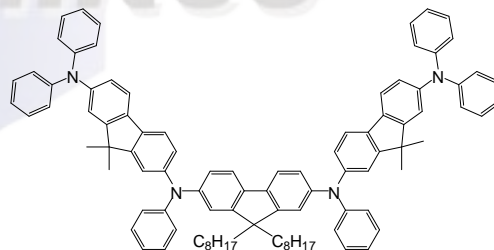
Formula :  $C_{95}H_{94}N_4$

M.W. : 1291.79 g/mole

UV : 378 nm (in  $CH_2Cl_2$ )

PL : 426 nm (in  $CH_2Cl_2$ )

Solvent : Toluene, Chloroform

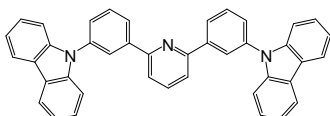


### LT-N491 | 26DCzPPy

2,6-Bis(3-(9H-carbazol-9-yl)phenyl)pyridine

CAS No. : 1013405-24-7  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{41}H_{27}N_3$   
 M.W. : 561.67 g/mole  
 UV : 239, 292 nm (in  $CH_2Cl_2$ )  
 PL : 410 nm (in  $CH_2Cl_2$ )  
 TGA : > 370 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : 1. *Organic Electronics* 13 (2012) 586-592  
 2. *Organic Electronics* 13 (2012) 914-918

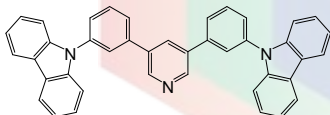


### LT-N494 | 35DCzPPy

3,5-Bis(3-(9H-carbazol-9-yl)phenyl)pyridine

CAS No. : 1013405-25-8  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{41}H_{27}N_3$   
 M.W. : 561.67 g/mole  
 UV : 307, 317 nm (in  $CH_2Cl_2$ )  
 PL : 347 nm (in  $CH_2Cl_2$ )  
 TGA : > 290 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Chem. Mater.* 2008, 20, 1691-1693

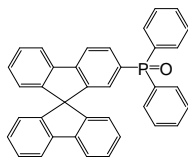


### LT-N496 | SPPO1

9,9-Spirobifluoren-2-yl-diphenyl-phosphine oxide

CAS No. : 1125547-88-7  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{37}H_{25}OP$   
 M.W. : 516.57 g/mole  
 UV : 307, 317 nm (in  $CH_2Cl_2$ )  
 PL : 346 nm (in  $CH_2Cl_2$ )  
 TGA : > 290 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Appl. Phys. Lett.* 94, 013301 2009

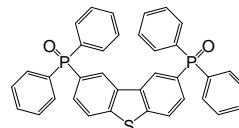


### LT-N4006 | PPT

2,8-Bis(diphenylphosphoryl)dibenzo[b,d]thiophene

CAS No. : 1019842-99-9  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{36}H_{26}O_2P_2S$   
 M.W. : 584.60 g/mole  
 UV : 315, 328 nm (in  $CH_2Cl_2$ )  
 PL : 351 nm (in  $CH_2Cl_2$ )  
 TGA : > 320 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *J. Mater. Chem.*, 2011, 21, 14604-14609

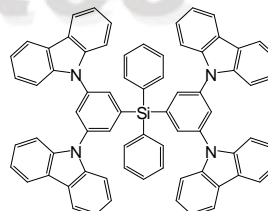


### LT-N4009 | SiMCP2

Bis[3,5-di(9H-carbazol-9-yl)phenyl]diphenylsilane

CAS No. : 944465-42-3  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{72}H_{48}N_4Si$   
 M.W. : 977.26 g/mole  
 UV : 324, 338 nm (in  $CH_2Cl_2$ )  
 PL : 362 nm (in  $CH_2Cl_2$ )  
 TGA : > 380 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *J. Mater. Chem.*, 2010, 20, 8411-8416

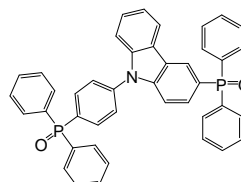


### LT-N4011 | PPO21

3-(Diphenylphosphoryl)-9-(4-(diphenylphosphoryl)phenyl)-9H-carbazole

CAS No. : 1226860-68-9  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{42}H_{31}NO_2P_2$   
 M.W. : 643.65 g/mole  
 UV : 294, 338 nm (in  $CH_2Cl_2$ )  
 PL : 361 nm (in THF)  
 TGA : > 300 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

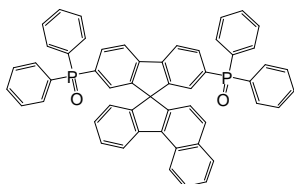
Reference : *Adv. Mater.*, 2011, 23, 4956-4959



### LT-N4029 | SPPO21

2,7-Bis(diphenylphosphoryl)spiro[fluorene-7,11'-benzofluorene]

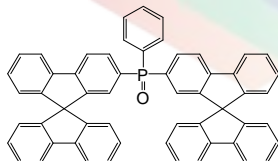
CAS No. : 1270960-64-9  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{53}H_{36}O_2P_2$   
 M.W. : 766.8 g/mole  
 UV : 287 nm (in  $CH_2Cl_2$ )  
 PL : 419 nm (in  $CH_2Cl_2$ )  
 TGA : > 350 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Thin Solid Films* 519 (2011) 4342-4346



### LT-N4034 | Dspiro-PO

Di(9,9-spirofluorene-2-yl)-phenyl-phosphine oxide

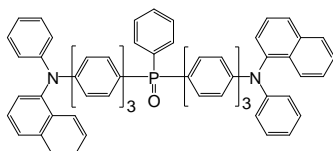
CAS No. : 824426-27-9  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{56}H_{35}OP$   
 M.W. : 754.85 g/mole  
 UV : 275 nm (film)  
 PL : 365 nm (film)  
 TGA : > 350 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Appl. Phys. Lett.* 91, 103507(2007)



### LT-N4035 | NP3PPO

4''',4''''-(Phenylphosphoryl)bis(N-1-naphthyl-N-phenyl-1,1':4',1''-terphenyl-4-amine)

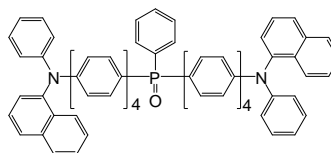
CAS No. : 1415633-86-1  
 Grade : > 98% (HPLC)  
 Formula :  $C_{74}H_{53}N_2OP$   
 M.W. : 1017.20 g/mole  
 UV : 349 nm (in  $CH_2Cl_2$ )  
 PL : 466 nm (in  $CH_2Cl_2$ )  
 TGA : > 320 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Chem. Eur. J.* 2012, 18, 13828-13835



### LT-N4036 | NP4PPO

4''',4''''-(Phenylphosphoryl)bis(N-1-naphthyl-N-phenyl-1,1':4',1''-quaterphenyl-4-amine)

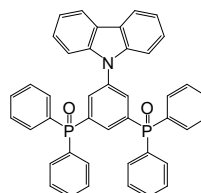
CAS No. : 1415633-87-2  
 Grade : > 98% (HPLC)  
 Formula :  $C_{86}H_{61}N_2OP$   
 M.W. : 1169.39 g/mole  
 UV : 347 nm (in  $CH_2Cl_2$ )  
 PL : 471 nm (in  $CH_2Cl_2$ )  
 TGA : > 450 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Chem. Eur. J.* 2012, 18, 13828-13835



### LT-N4039 | CzPO2

9-(3,5-Bis(diphenylphosphoryl)phenyl)-9H-carbazole

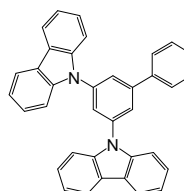
CAS No. : 1256573-07-5  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{42}H_{31}NO_2P_2$   
 M.W. : 643.65 g/mole  
 UV : 291 nm (in  $CH_2Cl_2$ )  
 PL : 426 nm (in  $CH_2Cl_2$ )  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Org. Lett.* , 2011, 13, 3146-3149



### LT-N4042 | Ph-MCP

3,5-Di(9H-carbazol-9-yl)biphenyl

CAS No. : 750573-28-5  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{36}H_{24}N_2$   
 M.W. : 484.59 g/mole  
 UV : 241, 292 nm (in  $CH_2Cl_2$ )  
 PL : 363 nm (in  $CH_2Cl_2$ )  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Chloroform

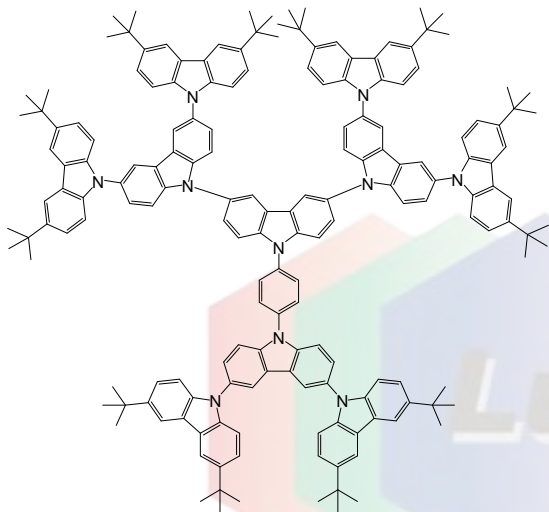




### LT-N4041 | G3-tCbz

6-(3',6'-Di-*tert*-butyl-6-(3,6-di-*tert*-butyl-9*H*-carbazol-9-yl)-9*H*-3,9'-bicarbazol-9-yl)-9-(4-(3',6'-di-*tert*-butyl-6-(3,6-di-*tert*-butyl-9*H*-carbazol-9-yl)-9*H*-3,9'-bicarbazol-9-yl)phenyl)-3',6'-bis(3,6-di-*tert*-butyl-9*H*-carbazol-9-yl)-9*H*-3,9'-bicarbazole

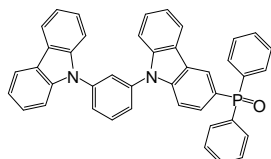
CAS No. : 1025079-68-8  
 Grade : > 98% (NMR)  
 Formula : C<sub>174</sub>H<sub>172</sub>N<sub>10</sub>  
 M.W. : 2403.29 g/mole  
 UV : 244, 349 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 402 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 Solvent : Toluene, Chloroform  
 Reference : *Adv. Mater.*, 2012, 24, 1873-1877



### LT-N4047 | mCPPO1

9-(3-(9*H*-Carbazol-9-yl)phenyl)-3-(diphenylphosphoryl)-9*H*-carbazole

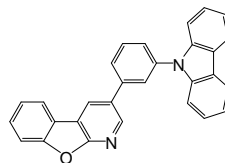
CAS No. : 1296229-26-9  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>42</sub>H<sub>29</sub>N<sub>2</sub>OP  
 M.W. : 608.67 g/mole  
 UV : 324, 338 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 361 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Organic Electronics* 12 (2011) 1711-1715



### LT-N4057 | PCz-BFP

3-(3-(9*H*-Carbazol-9-yl)phenyl)benzofuro[2,3-*b*]pyridine

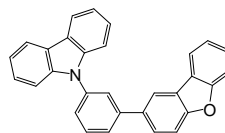
CAS No. : 1424369-36-7  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>29</sub>H<sub>18</sub>N<sub>2</sub>O  
 M.W. : 410.47 g/mole  
 UV : 241, 293 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 364 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Adv. Mater.* 2013, 25, 596-600



### LT-N4061 | CzDBF

9-(3-(Dibenzo[*b,d*]furan-2-yl)phenyl)-9*H*-carbazole

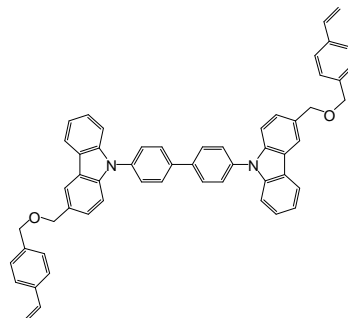
CAS No. : 1338446-77-7  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>30</sub>H<sub>19</sub>NO  
 M.W. : 409.48 g/mole  
 UV : 242, 291 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 350 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Organic Electronics* 14 (2013) 1009-1014



### LT-N4063 | DV-CBP

4,4'-Bis(3-((4-vinylphenoxy)methyl)-9*H*-carbazol-9-yl)biphenyl

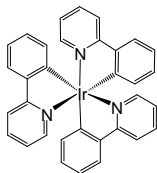
CAS No. : 1428901-78-3  
 Grade : > 99% (HPLC)  
 Formula : C<sub>54</sub>H<sub>40</sub>N<sub>2</sub>O<sub>2</sub>  
 M.W. : 748.91 g/mole  
 UV : 246, 295 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 381 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 Solvent : 1,2-dichloroethane, CHCl<sub>3</sub>  
 Reference : *Organic Electronics*, 14, 2013, 1614-1620



### LT-E504 | *fac*-Ir(ppy)<sub>3</sub>

*fac*-Tris(2-phenylpyridine)iridium(III)

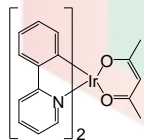
CAS No. : 94928-86-6  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>24</sub>H<sub>16</sub>IrN<sub>3</sub>  
 M.W. : 654.78 g/mole  
 UV : 282, 377 nm (in THF)  
 PL : 513 nm (in THF)  
 TGA : > 300 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Appl. Phys. Lett.* 91, 103507(2007)



### LT-E505 | Ir(ppy)<sub>2</sub>(acac)

Bis(2-phenylpyridine)(acetylacetonate)iridium(III)

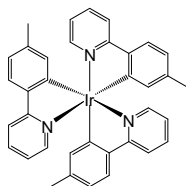
CAS No. : 337526-85-9  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>27</sub>H<sub>23</sub>IrN<sub>2</sub>O<sub>2</sub>  
 M.W. : 599.70 g/mole  
 UV : 259 nm (in THF)  
 PL : 524 nm (in THF)  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform



### LT-N506 | Ir(mppy)<sub>3</sub>

Tris[2-(*p*-tolyl)pyridine]iridium(III)

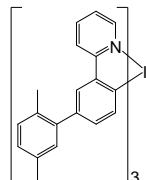
CAS No. : 149005-33-4  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>36</sub>H<sub>30</sub>IrN<sub>3</sub>  
 M.W. : 696.86 g/mole  
 UV : 287, 373 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 514 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 330 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Organic Electronics* 13 (2012) 388-393



### LT-N522 | TEG

*fac*-Tris(2-(3-*p*-xylyl)phenyl)pyridine iridium(III)

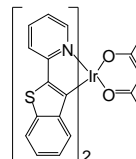
CAS No. : 1338784-40-9  
 Grade : > 99% (HPLC)  
 Formula : C<sub>37</sub>H<sub>48</sub>IrN<sub>3</sub>  
 M.W. : 967.3 g/mole  
 UV : 400 nm (in film)  
 PL : 539 nm (in film)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Chloroform  
 Reference : *Appl. Phys. Lett.* 91, 103507(2007)



### LT-E709 | Ir(btp)<sub>2</sub>(acac)

Bis(2-benzo[*b*]thiophen-2-yl-pyridine)(acetylacetonate)iridium(III)

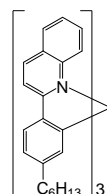
CAS No. : 343978-79-0  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>31</sub>H<sub>23</sub>IrN<sub>2</sub>O<sub>2</sub>S<sub>2</sub>  
 M.W. : 711.87 g/mole  
 UV : 283 nm (in THF)  
 PL : 615 nm (in THF)  
 TGA : > 310 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *J. Mater. Chem.*, 2011, 21, 4918-4926



### LT-N741 | Hex-Ir(phq)<sub>3</sub>

Tris[2-(4-*n*-hexylphenyl)quinoline]iridium(III)

CAS No. : 1268460-37-2  
 Grade : > 99% (HPLC)  
 Formula : C<sub>63</sub>H<sub>66</sub>IrN<sub>3</sub>  
 M.W. : 1057.43 g/mole  
 UV : 323 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 583 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Synthetic Metals* 161 (2011) 148-152

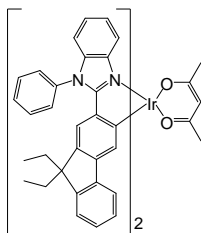


### LT-N744 | Ir(fbi)<sub>2</sub>(acac)

Bis(2-(9,9-diethyl-fluoren-2-yl)-1-phenyl-1*H*-benzo[*d*]imidazolato)(actylacetonate)iridium(III)

CAS No. : 725251-24-1  
 Grade : > 99% (HPLC)  
 Formula : C<sub>65</sub>H<sub>57</sub>IrN<sub>4</sub>O<sub>2</sub>  
 M.W. : 1118.40 g/mole  
 UV : 421 nm (in THF)  
 PL : 538 nm (in THF)  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Synthetic Metals* 160 (2010) 2393-2396

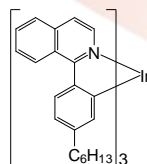


### LT-N754 | Hex-Ir(piq)<sub>3</sub>

Tris[2-(4-*n*-hexylphenyl)quinoline]iridium(III)

CAS No. : 1240249-29-9  
 Grade : > 99% (HPLC)  
 Formula : C<sub>63</sub>H<sub>66</sub>IrN<sub>3</sub>  
 M.W. : 1057.43 g/mole  
 UV : 325 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 617 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Synthetic Metals* 161 (2011) 148-152



### LT-N758 | PO-01-TB

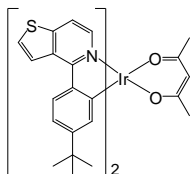
Iridium(III) bis(4-(4-*tert*-butylphenyl) thieno[3,2-*c*]pyridinato-*N,C2'*) acetylacetonate

CAS No. : 1267497-10-8  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>39</sub>H<sub>39</sub>IrN<sub>2</sub>O<sub>2</sub>S<sub>2</sub>  
 M.W. : 824.21 g/mole  
 UV : 448 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 562 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 250 °C (0.5% weight loss)

Reference : 1. *TW* 1395804, *US* 8,722,207 ;

2. *Organic Electronics*, 2012, 13, 2149-2155 ;

3. *Mater. Chem. C*, 2013, 1, 5008-5014

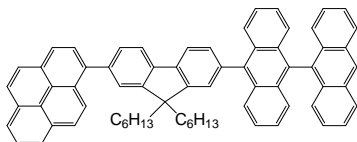


### LT-N4005 | DAnF6Pye

1-(7-(9,9'-Bianthracen-10-yl)-9,9-dihexyl-9H-fluoren-2-yl)pyrene

CAS No. : 1705571-71-6  
 Grade : > 99% (HPLC)  
 Formula : C<sub>69</sub>H<sub>58</sub>  
 M.W. : 877.20 g/mole  
 UV : 358 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 437 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 Solvent : Toluene, Chloroform

Reference : TW. I402243

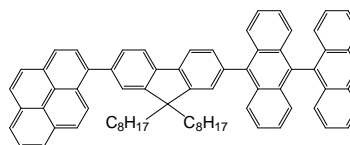


### LT-N4040 | BAnF8Pye

1-(7-(9,9'-bianthracen-10-yl)-9,9-dioctyl-9H-fluoren-2-yl)pyrene

CAS No. : 1258522-34-7  
 Grade : > 99% (HPLC)  
 Formula : C<sub>73</sub>H<sub>66</sub>  
 M.W. : 943.31 g/mole  
 UV : 257, 356 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 PL : 440 nm (in CH<sub>2</sub>Cl<sub>2</sub>)  
 TGA : > 330 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : TW. I402243



### LT-E408 | TDAF

2,7-Bis[9,9-di(4-methylphenyl)-fluoren-2-yl]-9,9-di(4-methylphenyl)fluorene

CAS No. : 474918-42-8  
 Grade : Sublimed, > 98% (HPLC)  
 Formula : C<sub>81</sub>H<sub>62</sub>  
 M.W. : 1035.36 g/mole  
 UV : 353 nm (in THF)  
 PL : 397, 419 nm (in THF)  
 TGA : > 370 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : J. Phys. Chem. C 2007, 111, 108-115

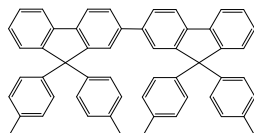


### LT-E413 | BDAF

2-[9,9-Di(4-methylphenyl)-fluoren-2-yl]-9,9-di(4-methylphenyl)fluorene

CAS No. : 854046-47-2  
 Grade : Sublimed, > 97% (HPLC)  
 Formula : C<sub>54</sub>H<sub>42</sub>  
 M.W. : 690.91 g/mole  
 UV : 333 nm (in THF)  
 PL : 386 nm (in THF)  
 TGA : > 310 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : Org. Lett., Vol. 7, No. 23, 2005

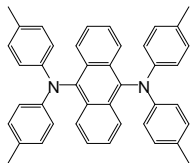


### LT-N507 | TTPA

9,10-Bis[*N,N*-di-(*p*-tolyl)-amino]anthracene

CAS No. : 177799-16-5  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{42}H_{36}N_2$   
 M.W. : 568.75 g/mole  
 UV : 294, 471 nm (in  $CH_2Cl_2$ )  
 PL : 554 nm (in  $CH_2Cl_2$ )  
 TGA : > 280 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Chem. Mater.*, 2002, 14, 3958~3963.

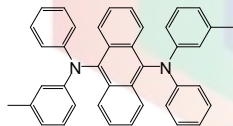


### LT-N508 | TPA

9,10-Bis[phenyl(*m*-tolyl)-amino]anthracene

CAS No. : 189263-81-8  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{40}H_{32}N_2$   
 M.W. : 540.70 g/mole  
 UV : 292, 458 nm (in  $CH_2Cl_2$ )  
 PL : 532 nm (in  $CH_2Cl_2$ )  
 TGA : > 270 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Chem. Mater.*, 2002, 14, 3958~3963.

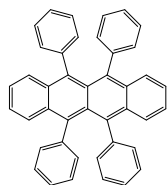


### LT-E707 | Rubrene

5,6,11,12-Tetraphenylnaphthacene

CAS No. : 517-51-1  
 Grade : Sublimed, > 99%  
 Formula :  $C_{42}H_{28}$   
 M.W. : 532.67 g/mole  
 UV : 299 nm (in THF)  
 PL : 553 nm (in THF)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : 1. *Organic Electronics* 11 (2010) 641-648;  
 2. *Appl. Mater. Interfaces*, 2011, 3(7), 2496-2503

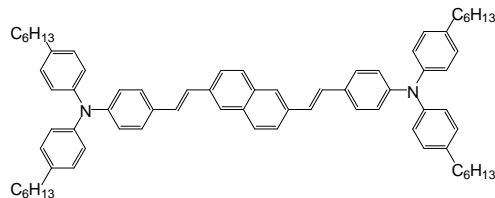


### LT-N663 | N-BDAVBI-C6

4,4'-(1*E*,1'*E*)-2,2'-(Naphthalene-2,6-diyl)bis(ethene-2,1-diyl)bis(*N,N*-bis(4-hexylphenyl)aniline)

CAS No. : 1258522-36-9  
 Grade : > 99% (HPLC)  
 Formula :  $C_{74}H_{86}N_2$   
 M.W. : 1003.49 g/mole  
 UV : 303, 418 nm (in  $CH_2Cl_2$ )  
 PL : 502 nm (in  $CH_2Cl_2$ )  
 Solvent : Toluene, Chloroform

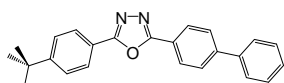
Reference : *Organic Electronics* 10 (2009) 1610-1614



### LT-E303 | PBD

2-(4-Biphenyl)-5-(4-*tert*-butylphenyl)-1,3,4-oxadiazole

CAS No. : 15082-28-7  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>24</sub>H<sub>22</sub>N<sub>2</sub>O  
 M.W. : 354.44 g/mole  
 UV : 305 nm (in THF)  
 PL : 380 nm (in THF)  
 TGA : > 210 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Australian Journal of Chemistry* 2012, 65(9), 1244-1251



### LT-E304 | BCP

2,9-Dimethyl-4,7-diphenyl-1,10-phenanthroline

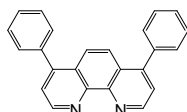
CAS No. : 4733-39-5  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>26</sub>H<sub>20</sub>N<sub>2</sub>  
 M.W. : 360.45 g/mole  
 UV : 277 nm (in THF)  
 PL : 386 nm (in THF)  
 TGA : > 240 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *J. Mater. Chem.*, 2012, 22, 4660-4668



### LT-E305 | Bphen

4,7-Diphenyl-1,10-phenanthroline

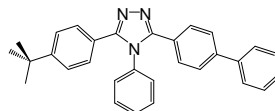
CAS No. : 1662-01-7  
 Grade : Sublimed, > 99.5% (HPLC)  
 Formula : C<sub>24</sub>H<sub>16</sub>N<sub>2</sub>  
 M.W. : 332.4 g/mole  
 UV : 272 nm (in THF)  
 PL : 379 nm (in THF)  
 TGA : > 240 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *J. Mater. Chem.*, 2012, 22, 4660-4668



### LT-N836 | TAZ

3-(4-Biphenyl)-4-phenyl-5-*tert*-butylphenyl-1,2,4-triazole

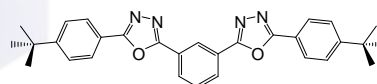
CAS No. : 150405-69-9  
 Grade : Sublimed, > 98% (HPLC)  
 Formula : C<sub>30</sub>H<sub>27</sub>N<sub>3</sub>  
 M.W. : 429.56 g/mole  
 UV : 290 nm (in THF)  
 PL : 370 nm (in THF)  
 TGA : > 250 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Chemistry Letters*. Vol. 36, No. 2, P262, 2007.



### LT-N855 | OXD-7

1,3-Bis[2-(4-*tert*-butylphenyl)-1,3,4-oxadiazol-5-yl]benzene

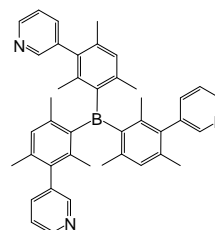
CAS No. : 138372-67-5  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>30</sub>H<sub>30</sub>N<sub>4</sub>O<sub>2</sub>  
 M.W. : 478.58 g/mole  
 UV : 292 nm (in THF)  
 PL : 347 nm (in THF)  
 TGA : > 290 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Journal of the Society for Information Display*, Volume 19, Issue 4, pages 346-352, April 2011



### LT-N856 | 3TPYMB

Tris(2,4,6-trimethyl-3-(pyridin-3-yl)phenyl)borane

CAS No. : 929203-02-1  
 Grade : Sublimed, > 99% (HPLC)  
 Formula : C<sub>42</sub>H<sub>42</sub>BN<sub>3</sub>  
 M.W. : 599.61 g/mole  
 UV : 331 nm (in THF)  
 PL : 382 nm (in THF)  
 TGA : > 230 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform  
 Reference : *Chemistry Letters*. Vol. 36, No. 2, P262, 2007.

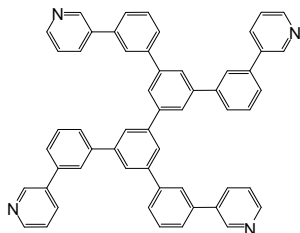


### LT-N862 | BP4mPy

3,3',5,5'-Tetra(*m*-pyridyl)-phen-3-yl)biphenyl

CAS No. : 1009033-94-6  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{26}H_{18}N_4$   
 M.W. : 366.34 g/mole  
 UV : 253 nm (in THF)  
 PL : 352 nm (in THF)  
 TGA : > 370 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Org. Lett.*, 2008, 10(5), p941-944.

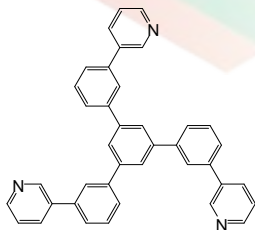


### LT-N863 | TmPyPB

1,3,5-Tri(3-pyridyl)-phen-3-yl)benzene

CAS No. : 921205-03-0  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{39}H_{27}N_3$   
 M.W. : 537.65 g/mole  
 UV : 254 nm (in  $CH_2Cl_2$ )  
 PL : 353 nm (in  $CH_2Cl_2$ )  
 TGA : > 310 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *J. Mater. Chem.*, 2012, 22, 4660-4668

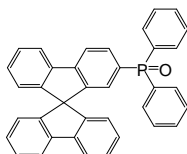


### LT-N496 | SPPO1

9,9-Spirobifluoren-2-yl-diphenyl-phosphine oxide

CAS No. : 1125547-88-7  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{37}H_{25}OP$   
 M.W. : 516.57 g/mole  
 UV : 307, 317 nm (in  $CH_2Cl_2$ )  
 PL : 346 nm (in  $CH_2Cl_2$ )  
 TGA : > 290 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Electrochem. Solid-State Lett.* 2011, Volume 14, Issue 1, Pages H33-H35.

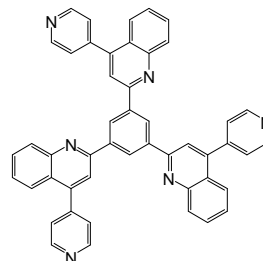


### LT-N879 | TPyQB

1,3,5-Tris(4-(pyridin-4-yl)quinolin-2-yl)benzene

CAS No. : 1350742-68-5  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{48}H_{30}N_6$   
 M.W. : 690.79 g/mole  
 PL : 381 nm (in  $CH_2Cl_2$ )  
 TGA : > 400 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

Reference : *Adv. Funct. Mater.* 2011, 21, 3889-3899

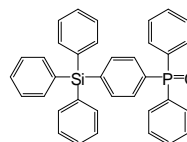


### LT-N4048 | TSPO1

Diphenyl-4-triphenylsilylphenyl-phosphine oxide

CAS No. : 1286708-86-8  
 Grade : Sublimed, > 99% (HPLC)  
 Formula :  $C_{36}H_{29}OPSi$   
 M.W. : 536.67 g/mole  
 UV : 266 nm (in  $CH_2Cl_2$ )  
 PL : 298 nm (in  $CH_2Cl_2$ )  
 TGA : > 420 °C (0.5% weight loss)  
 Solvent : Toluene, Chloroform

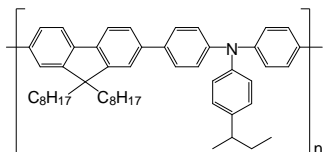
Reference : *Organic Electronics* 12 (2011) 1711-1715



### LT-N148 | TFB

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-co-(4,4'-(N-(4-sec-butylphenyl) diphenylamine)]

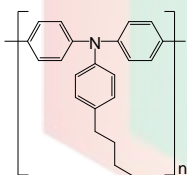
CAS No. : 220797-16-0  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{51}H_{61}N)_n$   
 UV : 389 nm (in  $CH_2Cl_2$ )  
 PL : 443 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CH_2Cl_2$ , Toluene,  $CHCl_3$   
 Reference : *Synthetic Metals* 160 (2010) 2393-2396



### LT-N149 | Poly-TPD

Poly[N,N'-bis(4-butylphenyl)-N,N'-bis(phenyl)-benzidine]

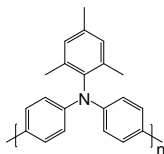
CAS No. : 472960-35-3  
 Grade :  $M_w > 10000$  (GPC)  
 Formula :  $(C_{22}H_{21}N)_n$   
 UV : 371,388 nm (in  $CH_2Cl_2$ )  
 PL : 424 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ , Chlorobenzene  
 Reference : *J. Mater. Chem.*, 2012, 22, 22769-22773



### LT-N168 | PTAA

Poly[bis(4-phenyl)(2,4,6-trimethylphenyl)amine]

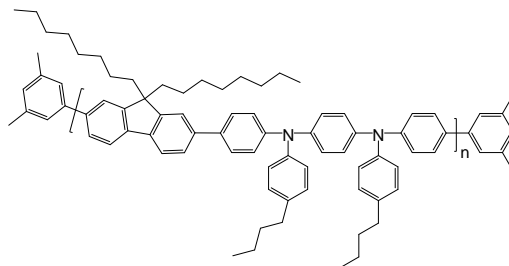
CAS No. : 1333317-99-9  
 Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{21}H_{19}N)_n$   
 UV : 371,388 nm (in  $CH_2Cl_2$ )  
 PL : 424 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ , Chlorobenzene, Dichlorobenzene



### LT-N169

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-co-(N,N'-diphenyl)-N,N'-di(p-butylphenyl)-1,4-diamino-benzene] end capped with dimethylphenyl

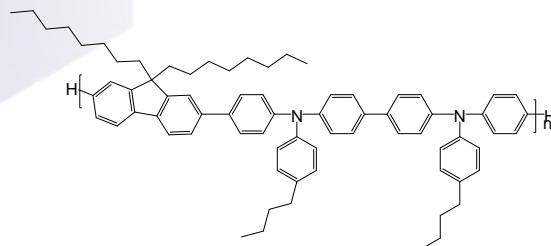
Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{67}H_{78}N_2)$   
 UV : 380 nm (in THF)  
 PL : 494 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ , Chlorobenzene, Dichlorobenzene



### LT-N170

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-alt-co-(N,N'-bis(4-butylphenyl)-benzidine-N,N'-(1,4-diphenylene)]

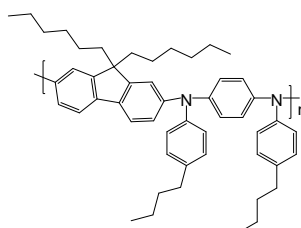
Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $C_{73}H_{82}N_2$   
 UV : 380 nm (in THF)  
 PL : 435 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ , Chlorobenzene, Dichlorobenzene



### LT-N171

Poly[(9,9-dihexylfluorenyl-2,7-diyl)-alt-(N,N'-bis(p-butylphenyl)-1,4-diaminophenylene)]

CAS No. : 870517-32-1  
 Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{51}H_{62}N_2)_n$   
 UV : 398 nm (in THF)  
 PL : 425 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ , Chlorobenzene, Dichlorobenzene

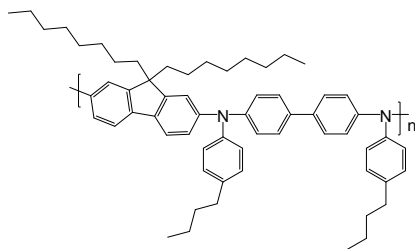




### LT-N172

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*alt*-(*N,N'*-bis(*p*-butylphenyl)-1,1'-biphenylene-4,4'-diamine)]

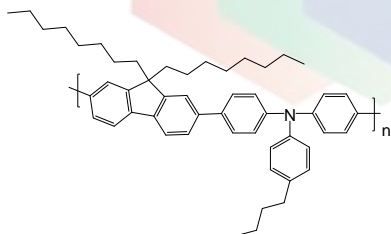
CAS No. : 1115424-53-7  
 Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{61}H_{74}N_2)_n$   
 UV : 397 nm (in THF)  
 PL : 420 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-N174

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*co*-(4,4'-(*N*-(*p*-butylphenyl))diphenylamine)]

CAS No. : 223569-31-1  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{51}H_{61}N)_n$   
 UV : 385 nm (in THF)  
 PL : 434 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-PS001 PEDOT:PSS

Poly(3,4-ethylenedioxythiophene)-poly(styrenesulfonate)

Specification

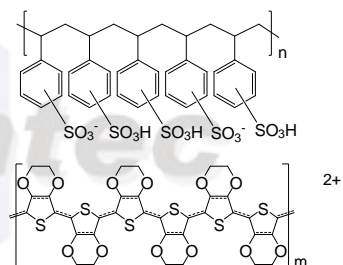
Description : Aqueous dispersion, blue liquid.  
 Sodium : Max. 400 ppm  
 Sulfate : Max. 40 ppm  
 Solid content : 1.3 - 1.7 wt%  
 PSD  $d_{50}$  : 80 nm  
 PSD  $d_{90}$  : 100 nm  
 Resistivity : 500-5000  $\Omega$ cm  
 Viscosity : 5-12 mPas

Technical Data (guide values, not a specification)

Form : liquid  
 Odour : odourless  
 Colour : dark blue  
 PEDOT:PSS ratio : 1:6 (by weight)  
 PEDOT work function : approx 5.2 eV  
 pH : 1.2 - 2.2 at 20°C  
 Boiling Point : approx 100°C

Storage : The product is sensitive to frost and should therefore not be stored at temperatures below 5°C.

Avoid freezing!

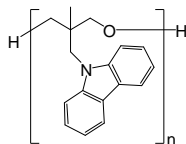


### LT-N4037 | PCMO

Poly[3-(carbazol-9-ylmethyl)-3-methyloxetane]

Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{17}H_{17}NO)_n$   
 UV : 237, 263 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *J. Mater. Chem.*, 2011, 21, 9546-9552

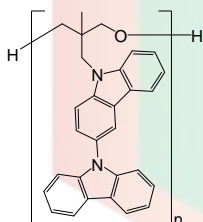


### LT-N4038 | PCOC

Poly[3-(carbazol-9-yl)-9-(3-methyloxetan-3-ylmethyl)carbazole]

Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{29}H_{24}N_2O)_n$   
 UV : 238, 265 nm (in  $CH_2Cl_2$ )  
 PL : 382 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *J. Mater. Chem.*, 2011, 21, 9546-9552

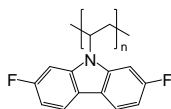


### LT-N4062 | 2,7-F-PVF

Poly[9-sec-butyl-2,7-difluoro-9H-carbazole]

Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{14}H_9F_2N)_n$   
 UV : 261, 294 nm (in  $CH_2Cl_2$ )  
 PL : 397 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *J. Phys. Chem. C* 2012, 116, 20681-20687

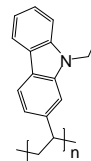


### LT-N4075 |

Poly(N-ethyl-2-vinylcarbazole)

CAS No. : 41008-78-0  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{16}H_{15}N)_n$   
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

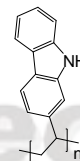
Reference : *Adv. Funct. Mater.* 2009, 21, 3350-3356



### LT-N4076 |

Poly(2-vinylcarbazole)

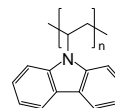
CAS No. : 55447-28-4  
 Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{14}H_{11}N)_n$   
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-N4077 | PVK

Poly(9-vinylcarbazole)

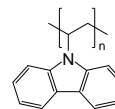
CAS No. : 25067-59-8  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{14}H_{11}N)_n$   
 UV : 261, 294 nm (in  $CH_2Cl_2$ )  
 PL : 380 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-N4078 | PVK

Poly(9-vinylcarbazole)

CAS No. : 25067-59-8  
 Grade :  $M_w > 100,000$  (GPC)  
 Formula :  $(C_{14}H_{11}N)_n$   
 UV : 261, 294 nm (in  $CH_2Cl_2$ )  
 PL : 380 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

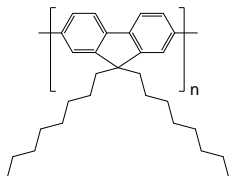


### LT-S933 | PFO

Poly(9,9-dioctylfluorenyl-2,7-diyl)

CAS No. : 123864-00-6  
 Grade :  $M_w = 50,000 \sim 150,000$  (GPC)  
 Formula :  $(C_{29}H_{40})_n$   
 UV : 376 nm (in THF)  
 PL : 426 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Appl. Phys. Lett.*, 2004, 85, 4576-4578

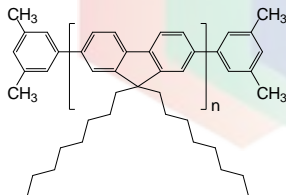


### LT-S934 | PFO-DMP

Poly(9,9-dioctylfluorenyl-2,7-diyl) end capped with dimethylphenyl

CAS No. : 874816-14-5  
 Grade :  $M_w = 50,000 \sim 150,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{29}H_{40})_n$   
 UV : 368 nm (in THF)  
 PL : 421 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Appl. Phys. Lett.*, 2004, 85, 4576-4578

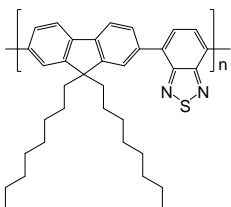


### LT-S957 | F8BT

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*alt*-(benzo[2,1,3]thiadiazol-4,7-diyl)]

CAS No. : 210347-52-7  
 Grade :  $M_w > 20,000$   
 Formula :  $(C_{35}H_{42}N_2S)_n$   
 UV : 453 nm (in THF)  
 PL : 645 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ , Chlorobenzene,  
 Dichlorobenzene

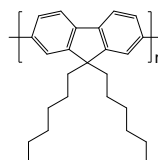
Reference : *Synthetic Metals*, 152, 105, 2005



### LT-S958 | PHF

Poly(9,9-dihexylfluorenyl-2,7-diyl)

CAS No. : 201807-75-2  
 Grade :  $M_w = 50,000 \sim 150,000$  (GPC)  
 Formula :  $(C_{25}H_{32})_n$   
 UV : 389 nm (in THF)  
 PL : 418 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

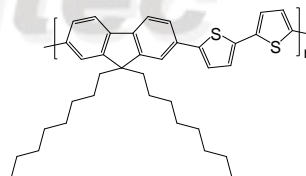


### LT-S979 | P8T2

Poly[(9,9-di-*n*-octylfluorenyl-2,7-diyl)-*alt*-2,2'-bithiophene-5,5'-diyl]

CAS No. : 210347-56-1  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{37}H_{44}S_2)_n$   
 UV : 454 nm (in THF)  
 PL : 500 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

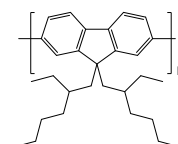
Reference : *Appl. Phys. Lett.* 87, 153511 (2005)



### LT-S9004

Poly[9,9-bis(2-ethylhexyl)fluorenyl-2,7-diyl]

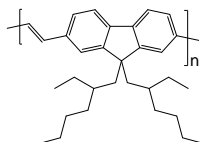
CAS No. : 188201-16-3  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{29}H_{40})_n$   
 UV : 389 nm (in THF)  
 PL : 418 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1007

Poly(9,9-di-(2-ethylhexyl)-9H-fluorene-2,7-vinylene)

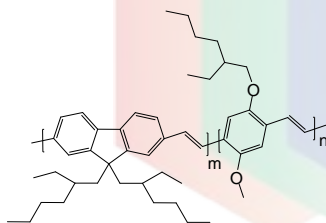
CAS No. : 1019638-19-7  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{31}H_{42})_n$   
 UV : 280 nm (in  $CH_2Cl_2$ )  
 PL : 454 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1008

Poly[(9,9-di-(2-ethylhexyl)-9H-fluorene-2,7-vinylene)-co-(2-methoxy-5-(2-ethylhexyloxy)-1,4-phenylenevinylene)] (m:n=95:5 mole ratio)

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{29}H_{38})_m(C_{17}H_{24}O_2)_n$   
 UV : 280 nm (in  $CH_2Cl_2$ )  
 PL : 510 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

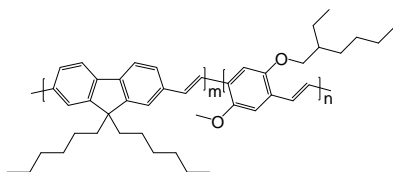


### LT-A1009 Poly(FV-CO-MEHPV)

Poly[(9,9-dihexyl-9H-fluorene-2,7-vinylene)-co-(1-methoxy-4-(2-ethylhexyloxy)-2,5-phenylenevinylene)] (m:n=95:5 mole ratio)

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{27}H_{34})_m(C_{17}H_{24}O_2)_n$   
 UV : 280 nm (in  $CH_2Cl_2$ )  
 PL : 500 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

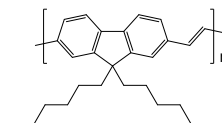
Reference : *Macromolecules*, 2003, 36 (11), pp 3841-3847



### LT-A1010

Poly(9,9-di-n-hexylfluorenyl-2,7-vinylene)

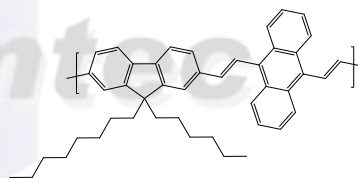
CAS No. : 203927-82-6  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{27}H_{34})_n$   
 UV : 373 nm (in  $CH_2Cl_2$ )  
 PL : 454 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1011

Poly[(9,9-dioctyl-2,7-divinylfluorenylene)-alt-(9,10-anthracene)]

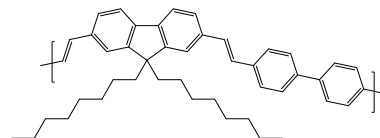
CAS No. : 474975-19-4  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{47}H_{52})_n$   
 UV : 445 nm (in THF)  
 PL : 556 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1012

Poly[(9,9-dioctyl-2,7-divinylfluorenylene)-alt-(4,4'-biphenylene)]

CAS No. : 474975-20-7  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{45}H_{52})_n$   
 UV : 430 nm (in THF)  
 PL : 448 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

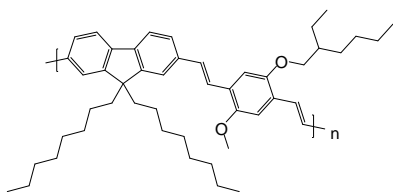


### LT-A1013 | PEPV

Poly[(9,9-dioctyl-2,7-divinylfluorenylene)-*alt*-(2-methoxy-5-(2-ethylhexyloxy)-1,4-phenylene)]

CAS No. : 475101-36-1  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{48}H_{66}O_2)_n$   
 UV : 480 nm (in THF)  
 PL : 539 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

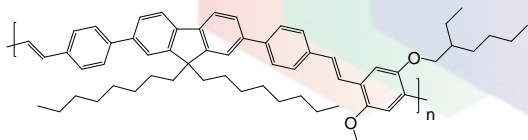
Reference : *J. Am. Chem. Soc.*, 2007, 129 (43), pp 12904-12905



### LT-A1014

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*co*-(1,4-diphenylenevinylene-2-methoxy-5-(2-ethylhexyloxy)-benzene)]

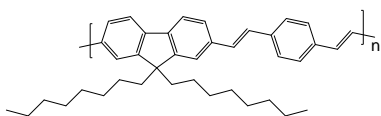
CAS No. : 577705-37-4  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{60}H_{74}O_2)_n$   
 UV : 426 nm (in THF)  
 PL : 466 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1015

Poly[(9,9-dioctyl-2,7-divinylfluorenylene)-*alt*-(1,4-phenylene)]

CAS No. : 579505-60-5  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{39}H_{48})_n$   
 UV : 456 nm (in THF)  
 PL : 495 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

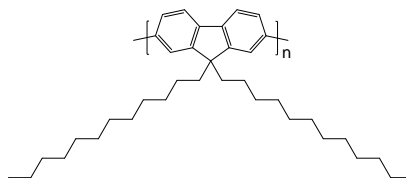


### LT-A1016 | PFD

Poly(9,9-di-*n*-dodecylfluorenyl-2,7-diyl)

CAS No. : 248256-53-3  
 Grade :  $M_w > 40,000$  (GPC)  
 Formula :  $(C_{37}H_{56})_n$   
 UV : 369 nm (in  $CH_2Cl_2$ )  
 PL : 421 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Sensors*, 2010 IEEE, 2603-2606

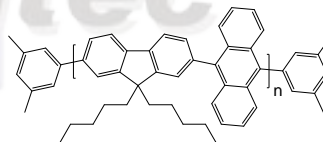


### LT-A1017 | PFH-A-DMP

Poly[(9,9-dihexylfluorene-2,7-diyl)-*co*-(anthracene-9,10-diyl)] end capped with dimethylphenyl

Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{39}H_{40})_n$   
 UV : 375 nm (in  $CH_2Cl_2$ )  
 PL : 440 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Nano Lett.*, 2007, 7 (10), pp 3013-3017

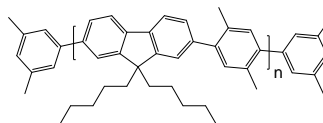


### LT-A1018 | PF-DMB

Poly[(9,9-dihexylfluorene-2,7-diyl)-*alt*-(2,5-dimethyl-1,4-phenylene)] end capped with dimethylphenyl

CAS No. : 579505-48-9  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{33}H_{48})_n$   
 UV : 330 nm (in  $CH_2Cl_2$ )  
 PL : 378 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Nanotechnology*. 2012, 23(7), 075701

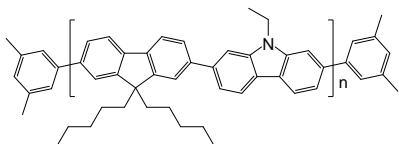


### LT-A1019 | PFH-EC

Poly[(9,9-dihexylfluorene-2,7-diyl)-*co*-(9-ethylcarbazol-2,7-diyl)] end capped with dimethylphenyl

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{39}H_{43}N)_n$   
 UV : 374 nm (in  $CH_2Cl_2$ )  
 PL : 417 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

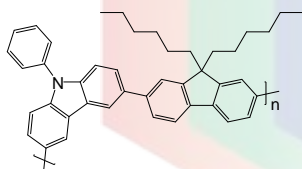
Reference : *Journal of Power Sources* 246, 2014, 184-191



### LT-A1020

Poly(9,9-*n*-dihexyl-2,7-fluorene-*alt*-9-phenyl-3,6-carbazole)

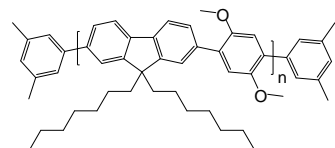
CAS No. : 856893-75-9  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{42}H_{43}N)_n$   
 UV : 333 nm (in  $CH_2Cl_2$ )  
 PL : 398 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1021

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*co*-(1,4-(2,5-dimethoxy)benzene)] end capped with dimethylphenyl

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{37}H_{48}O_2)_n$   
 UV : 369 nm (in THF)  
 PL : 410 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

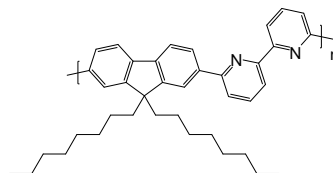


### LT-A1023 | PFO-BPy

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*alt*-(6,6'-(2,2'-bipyridine))]

CAS No. : 1423043-97-3  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{39}H_{46}N_2)_n$   
 UV : 360 nm (in THF)  
 PL : 410 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

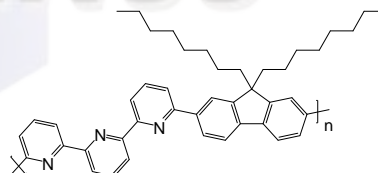
Reference : *ACS Nano*, 2013, 7(3), pp 2231-2239



### LT-A1024

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*alt*-(6,6'-(2,2':6',2''-terpyridine))]

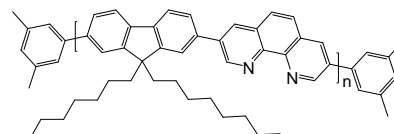
CAS No. : 934690-41-2  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{44}H_{49}N_3)_n$   
 UV : 347 nm (in THF)  
 PL : 368 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1025

Poly[(9,9-dioctyl-2,7-fluorenylene)-*co*-(3,8-phenanthroline)] end capped with dimethylphenyl

Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{41}H_{46}N_2)_n$   
 UV : 388 nm (in THF)  
 PL : 410 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

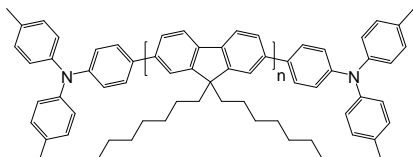


### LT-A1026

Poly[9,9-dioctylfluorenyl-2,7-diyl] end capped with *N,N*-Bis(4-methylphenyl)-aniline

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{40}H_{36}N_2(C_{30}H_{42})_n$   
 UV : 393 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

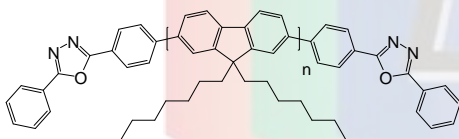
Reference : *New J. Phys.* 2004, 6, 185



### LT-A1027

Poly[9,9-dioctylfluorenyl-2,7-diyl] end capped with 2,5-diphenyl-1,2,4-oxadiazole

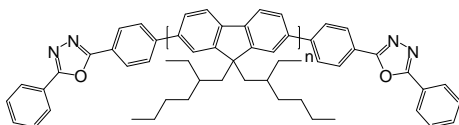
Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{28}H_{18}N_4O_2(C_{30}H_{42})_n$   
 UV : 393 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1028

Poly[9,9-di-(2-ethylhexyl)-fluorenyl-2,7-diyl] end capped with 2,5-diphenyl-1,2,4-oxadiazole

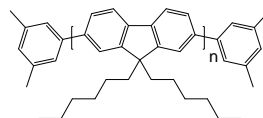
Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{28}H_{18}N_4O_2(C_{30}H_{42})_n$   
 UV : 393 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1029

Poly[9,9-dihexylfluorenyl-2,7-diyl] end capped with dimethylphenyl

CAS No. : 1010129-39-1  
 Grade :  $M_w = 50,000 \sim 150,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{25}H_{32})_n$   
 UV : 393 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

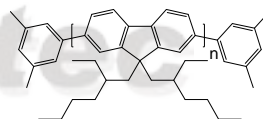


### LT-A1030

Poly[9,9-di-(2-ethylhexyl)-fluorenyl-2,7-diyl] end capped with dimethylphenyl

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{29}H_{40})_n$   
 UV : 393 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Chin. J. Chem.* 2010, 28, 1482-1486

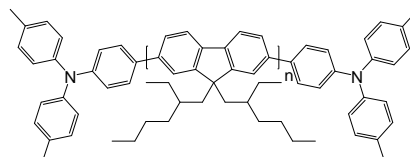


### LT-A1031

Poly[9,9-di-(2-ethylhexyl)-fluorenyl-2,7-diyl] end capped with *N,N*-Bis(4-methylphenyl)-aniline

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $C_{40}H_{36}N_2(C_{30}H_{42})_n$   
 UV : 393 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Chin. J. Chem.* 2010, 28, 1482-1486

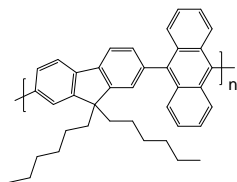


### LT-A1032 | PFH-A

Poly[(9,9-dihexylfluorenyl-2,7-diyl)-co-(9,10-anthracene)]

CAS No. : 474975-22-9  
 Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{39}H_{40})_n$   
 UV : 375 nm (in THF)  
 PL : 440 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *Nano Lett.*, 2007, 7 (10), pp 3013-3017

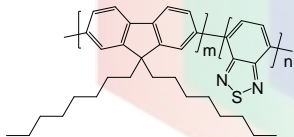


### LT-A1033

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-co-(1,4-benzo-[2,1',3]-thiadiazole)] (m:n=95:5 mole ratio)

Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{29}H_{40})_m(C_6H_4N_2S)_n$   
 UV : 386 nm (in THF)  
 PL : 535 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

Reference : *ACS Nano*, 2011, 5(2), pp 1468-1475

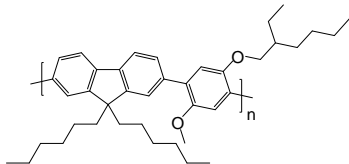


### LT-A1034

Poly[(9,9-dihexylfluorenyl-2,7-diyl)-alt-(2-methoxy-5-(2-ethylhexyloxy)-1,4-phenylene)]

CAS No. : 475102-99-9  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $(C_{40}H_{54}O_2)_n$   
 UV : 366 nm (in THF)  
 PL : 410 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

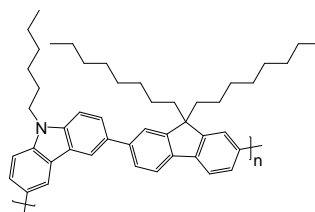
Reference : *Journal of Nanoscience and Nanotechnology*, 2012, Vol.12, pp 5407-5411



### LT-A1035

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-alt-(9-hexyl-3,6-carbazole)]

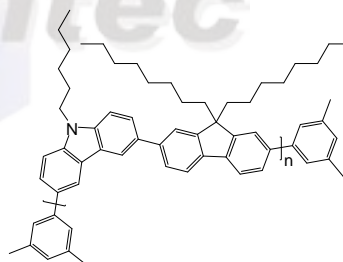
Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{47}H_{60}N)_n$   
 UV : 360 nm (in THF)  
 PL : 410 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1036

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-co-(9-hexyl-3,6-carbazole)] end capped with dimethylphenyl

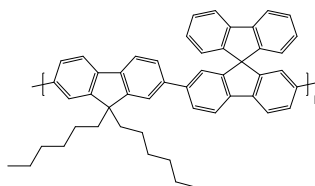
Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{47}H_{60}N)_n$   
 UV : 364 nm (in THF)  
 PL : 412 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1037

Poly[(9,9-dihexylfluorenyl-2,7-diyl)-alt-(9,9'-spiro-bifluorene-2,7-diyl)]

CAS No. : 474975-24-1  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{50}H_{46})_n$   
 UV : 380 nm (in THF)  
 PL : 410 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene

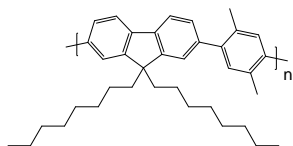




### LT-A1038

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*co*-(2,5-p-xylylene)]

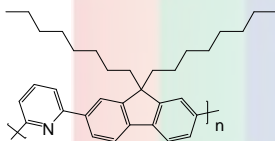
CAS No. : 1687752-52-8  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{37}H_{48})_n$   
 UV : 335 nm (in THF)  
 PL : 400 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1039

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*alt*-(2,6-pyridine)]

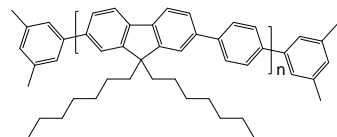
CAS No. : 773895-96-8  
 Grade :  $M_w > 20,000$  (GPC)  
 Formula :  $(C_{34}H_{43}N)_n$   
 UV : 364 nm (in THF)  
 PL : 406 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-A1040

Poly[(9,9-dioctylfluorenyl-2,7-diyl)-*co*-(1,4-phenylene)]  
 end capped with dimethylphenyl

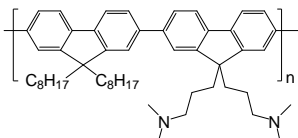
CAS No. : 1025775-95-4  
 Grade :  $M_w > 30,000$  (GPC)  
 Formula :  $C_{16}H_{18}(C_{35}H_{44})_n$   
 UV : 377 nm (in THF)  
 PL : 405 nm (in THF)  
 Solubility : Soluble in  $CHCl_3$ ,  
 Chlorobenzene, Dichlorobenzene



### LT-N4027 | PFN-DOF

Poly[(9,9-bis(3'-(*N,N*-dimethylamino)propyl)-2,7-fluorene)-*alt*-2,7-(9,9-dioctylfluorene)]

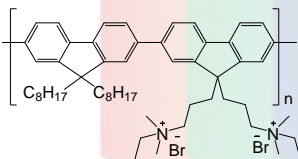
CAS No. : 673474-74-3  
 Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{52}H_{70}N_2)_n$   
 UV : 378 nm (in  $CH_2Cl_2$ )  
 PL : 414 nm (in  $CH_2Cl_2$ )  
 Solubility : Soluble in  $CH_2Cl_2$ ,  $CHCl_3$ , Toluene  
 Reference : *Chem. Mater.*, Vol. 16, No. 4, 2004



### LT-N878 | PFNBr

Poly[(9,9-bis(3'-(*N,N*-dimethyl)-*N*-ethylammonium)propyl)-2,7-fluorene)-*alt*-2,7-(9,9-dioctylfluorene)]

Grade :  $M_w > 10,000$  (GPC)  
 Formula :  $(C_{56}H_{80}N_2Br_2)_n$   
 UV : 375 nm (in MeOH)  
 PL : 440 nm (in MeOH)  
 Solubility : Soluble in MeOH  
 Reference : *Chem. Mater.*, 2004, 16, 708



Lumtec