Characterization data of 6a-r

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (**6a**): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr) 3355 (Amide NH stretch), 3055 (Aromatic -CH stretch), 1665 (Amide -C=O stretch), 1653, 1600 (Imine -C=N stretch), 1556 (-CH bending), 1541, 1484, 699; ^{1}H NMR (500 MHz, DMSO) δ 10.58 (s, 1H, D_2O exchangeable, Amide N**H**), 8.90 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.77 (s, 1H, Ar**H**), 8.56 (s, 1H, Ar**H**), 8.03 (d, *J* = 7.2 Hz, 2H, Ar**H**), 7.97 – 7.89 (m, 2H, Ar**H**), 7.79 (t, *J* = 9.6 Hz, 2H, Ar**H**), 7.63 (dd, *J* = 13.3, 6.0 Hz, 1H, Ar**H**), 7.60 – 7.55 (m, 3H, Ar**H**), 7.48 (t, *J* = 6.6 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 166.00 (Amide, -**C**=O), 145.27 (Ar**C**=N), 144.78 (Ar**C**), 140.10 (Ar**C**), 135.37 (Ar**C**), 134.80 (Ar**C**), 132.06 (Ar**C**), 129.42 (Ar**C**), 128.86 (Ar**C**), 128.15 (Ar**C**), 127.41 (Ar**C**), 125.45 (Ar**C**), 121.43 (Ar**C**), 120.15 (Ar**C**), 118.14 (Ar**C**), 117.09 (Ar**C**), 112.73 (Ar**C**), 109.60 (Ar**C**); LC/MS Calculated $C_{20}H_{15}N_3O$ $[M+1]^+$: m/z 313.36; observed, 314.00.

4-Fluoro-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (**6b**): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr) 3351 (Amide NH stretch), 3069 (Aromatic -CH stretch), 1658 (Amide -C=O stretch), 1604 (Imine -C=N stretch), 1559 (-CH bending), 755 (-CF stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.63 (s, 1H, Amide N**H**), 8.89 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.75 (s, 1H, Ar**H**), 8.54 (t, *J* = 1.7 Hz, 1H, Ar**H**), 8.13 (dd, *J* = 8.8, 5.5 Hz, 2H, Ar**H**), 7.95 (d, *J* = 9.0 Hz, 1H, Ar**H**), 7.91 – 7.85 (m, 1H, Ar**H**), 7.83 – 7.77 (m, 2H, Ar**H**), 7.58 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.46 – 7.37 (m, 3H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 166.82 (-**C**F), 165.09 (Amide, -**C**=O), 140.37 (Ar**C**=N), 132.61 (Ar**C**), 132.53 (Ar**C**), 131.52 (Ar**C**), 131.03 (Ar**C**), 130.96 (Ar**C**), 130.09 (Ar**C**), 128.88 (Ar**C**), 121.97 (Ar**C**), 118.45 (Ar**C**), 116.18 (Ar**C**), 115.96 (Ar**C**), 114.06 (Ar**C**), 111.03 (Ar**C**); LC/MS Calculated $C_{20}H_{14}FN_3O$ $[M+1]^+$: m/z 331.35, observed, 332.10.

4-Chloro-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (**6c**): Nature and colour: White crystalline solid; FT-IR (cm^{-1}) (KBr); 3353 (Amide NH stretch), 3069 (Aromatic -CH

stretch), 1661 (Amide -C=O stretch), 1599 (Imine -C=N stretch), 1550 (-CH bending), 750 (-CCl stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.42 (s, 1H, Amide N**H**), 8.56 (dt, *J* = 6.8, 1.1 Hz, 1H, Ar**H**), 8.47 (s, 1H, Ar**H**), 8.38 (s, 1H, Ar**H**), 8.05 (d, *J* = 8.6 Hz, 2H, Ar**H**), 7.77 (dd, *J* = 8.5, 1.6 Hz, 1H, Ar**H**), 7.72 – 7.68 (m, 1H, Ar**H**), 7.64 (d, *J* = 8.6 Hz, 2H, Ar**H**), 7.59 (d, *J* = 9.1 Hz, 1H, Ar**H**), 7.43 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.26 (ddd, *J* = 9.0, 6.7, 1.2 Hz, 1H, Ar**H**), 6.91 (td, *J* = 6.7, 1.1 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.89 (Amide, -**C**=O), 145.28 (Ar**C**=N), 144.73, 139.91 (-**C**Cl), 136.92 (Ar**C**), 134.85 (Ar**C**), 134.06 (Ar**C**), 130.13 (Ar**C**), 129.47 (Ar**C**), 128.95 (Ar**C**), 127.42 (Ar**C**), 125.48 (Ar**C**), 121.59 (Ar**C**), 120.18 (Ar**C**), 118.18 (Ar**C**), 117.10 (Ar**C**), 112.75 (Ar**C**), 109.63 (Ar**C**); LC/MS Calculated $C_{20}H_{14}ClN_3O$ $[M+1]^+$: m/z 347.80, observed, 348.00.

4-Bromo-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (6d): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr) 3376 (Amide NH stretch), 3134 (Aromatic -CH stretch), 1656 (Amide -C=O stretch), 1614 (Imine -C=N stretch), 1558 (-CH bending), 739 (-CBr stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.60 (s, 1H, Amide N**H**), 8.81 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.67 (s, 1H, Ar**H**), 8.52 (t, *J* = 1.8 Hz, 1H, Ar**H**), 8.01 – 7.94 (m, 2H, Ar**H**), 7.86 (d, *J* = 9.0 Hz, 1H, Ar**H**), 7.82 – 7.71 (m, 5H, Ar**H**), 7.55 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.33 (t, *J* = 6.5 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 165.12 (Amide, -**C**=O), 143.89 (Ar**C**=N), 140.06 (Ar**C**), 134.29 (Ar**C**), 131.91 (Ar**C**), 130.34 (Ar**C**), 129.74 (Ar**C**), 128.08 (Ar**C**), 125.95 (-**C**Br), 121.81 (Ar**C**), 118.32 (Ar**C**), 115.71 (Ar**C**), 114.28 (Ar**C**), 110.29 (Ar**C**); LC/MS Calculated $C_{20}H_{14}BrN_3O$ $[M+1]^+$: m/z 392.26, observed, 393.90;

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-4-(trifluoromethyl)benzamide (**6e**): Nature and colour: White crystalline solid;FT-IR (cm^{-1}) (KBr); 3269 (Amide NH stretch), 3061 (Aromatic -CH stretch), 1666 (Amide -C=O stretch), 1615 (Imine -C=N stretch), 1557 (-CH bending), 750; ^{1}H NMR (500 MHz, DMSO) δ 10.57 (s, 1H, Amide N**H**), 8.57 (d, *J* = 6.8 Hz, 1H, Ar**H**), 8.48 (s, 1H, Ar**H**), 8.40 (s, 1H, Ar**H**), 8.21 (d, *J* = 8.1 Hz, 2H, Ar**H**), 7.94 (d, *J* = 8.2 Hz, 2H,

Ar**H**), 7.77 (dd, *J*= 8.1, 1.2 Hz, 1H, Ar**H**), 7.71 (d, *J* = 7.9 Hz, 1H, Ar**H**), 7.59 (d, *J* = 9.1 Hz, 1H, Ar**H**), 7.45 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.27 (ddd, *J* = 9.0, 6.7, 1.1 Hz, 1H, Ar**H**), 6.92 (td, *J* = 6.8, 1.0 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.86 (Amide, -**C**=O), 145.23 (Ar**C**=N), 144.55 (Ar**C**), 139.77 (Ar**C**), 134.79 (Ar**C**), 131.99 (Ar**C**), 129.54 (Ar**C**), 127.45 (Ar**C**), 125.89 (-**C**F_3), 121.79 (Ar**C**), 120.26 (Ar**C**), 118.22 (Ar**C**), 117.04 (Ar**C**), 112.83 (Ar**C**), 109.69 (Ar**C**); LC/MS Calculated $C_{21}H_{14}F_3N_3O$ $[M+1]^+$: m/z 381.36, observed, 382.10.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-4-methylbenzamide (**6f**): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr); 3268 (Amide NH stretch), 3066 (Aromatic -CH stretch), 2985 (Aliphatic CH stretch), 1669 (Amide -C=O stretch), 1618 (Imine -C=N stretch), 1559 (-CH bending), 756; ^{1}H NMR (500 MHz, DMSO) δ 10.26 (s, 1H, Amide N**H**), 8.56 (d, *J* = 8.8 Hz, 1H, Ar**H**), 8.48 (s, 1H, Ar**H**), 8.38 (s, 1H, Ar**H**), 7.94 (d, *J* = 8.2 Hz, 2H, Ar**H**), 7.80 – 7.76 (m, 1H, Ar**H**), 7.70 – 7.67 (m, 1H, Ar**H**), 7.59 (d, *J* = 9.1 Hz, 1H, Ar**H**), 7.42 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.36 (d, *J* = 7.9 Hz, 2H, Ar**H**), 7.26 (ddd, *J* = 9.0, 6.7, 1.2 Hz, 1H, Ar**H**), 6.91 (t, *J* = 7.3 Hz, 1H, Ar**H**), 2.41 (s, 3H, C**H$_3$**); ^{13}C NMR (500 MHz, DMSO) δ 166.39 (Amide, -**C**=O), 140.91 (Ar**C**=N), 138.23 (Ar**C**CH_3), 135.01 (Ar**C**), 132.85 (Ar**C**), 130.23 (Ar**C**), 129.51 (Ar**C**), 128.83 (Ar**C**), 125.43 (Ar**C**), 122.84 (Ar**C**), 118.53 (Ar**C**), 117.55 (Ar**C**), 112.68 (Ar**C**), 111.52 (Ar**C**), 21.46 (**C**H_3); LC/MS Calculated $C_{21}H_{17}N_3O$ $[M+1]^+$: m/z 327.39, observed, 328.10.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-4-methoxybenzamide (**6g**): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr); 3270 (Amide NH stretch), 3069 (Aromatic -CH stretch), 2965 (Aliphatic CH stretch), 1664 (Amide -C=O stretch), 1619 (Imine -C=N stretch), 1600 (-CH bending), 759; ^{1}H NMR (500 MHz, DMSO) δ 10.44 (s, 1H, Amide N**H**), 8.92 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.78 (s, 1H, Ar**H**), 8.56 (s, 1H, Ar**H**), 8.05 (d, *J* = 8.9 Hz, 2H, Ar**H**), 7.94 (dt, *J* = 19.1, 6.1 Hz, 2H, Ar**H**), 7.82 – 7.76 (m, 2H, Ar**H**), 7.58 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.50 (t, *J* = 7.2 Hz, 1H, Ar**H**), 7.10 (d, *J* = 8.9 Hz, 2H, Ar**H**), 3.86 (s, 3H, O**CH_3**); ^{13}C

NMR (500 MHz, DMSO) δ 165.63 (Amide, -**C**=O), 162.25 (Ar**C**OCH$_3$), 140.80 (Ar**C**=N), 136.42 (Ar**C**), 133.47 (Ar**C**), 130.22 (Ar**C**), 129.48 (Ar**C**), 127.01 (Ar**C**), 122.76 (Ar**C**), 121.85 (Ar**C**), 118.49 (Ar**C**), 117.48 (Ar**C**), 114.16 (Ar**C**), 112.81 (Ar**C**), 111.56 (Ar**C**), 55.96 (O**C**H$_3$); LC/MS Calculated $C_{21}H_{17}N_3O_2$ $[M+1]^+$: m/z 343.39, observed 344.10.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-4-nitrobenzamide (**6h**): Nature and colour: Bright yellow crystalline solid;FT-IR (cm^{-1}) (KBr); 3313 (Amide NH stretch), 3076 (Aromatic -CH stretch), 1645 (Amide -C=O stretch), 1602 (Imine -C=N stretch), 1515 (Nitro –NO_2 symmetric stretch), 1346 (Nitro –NO_2 asymmetric stretch), 764; ^{1}H NMR (500 MHz, DMSO) δ 10.67 (s, 1H, Amide N**H**), 8.56 (d, *J* = 6.8 Hz, 1H, Ar**H**), 8.48 (s, 1H, Ar**H**), 8.42 – 8.37 (m, 3H, Ar**H**), 8.28 – 8.22 (m, 2H, Ar**H**), 7.78 (dd, *J* = 8.0, 1.2 Hz, 1H, Ar**H**), 7.74 – 7.70 (m, 1H, Ar**H**), 7.59 (d, *J* = 9.6 Hz, 1H, Ar**H**), 7.45 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.27 (ddd, *J* = 9.0, 6.7, 1.2 Hz, 1H, Ar**H**), 6.92 (td, *J* = 6.7, 1.1 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.26 (Amide, -**C**=O), 149.66 (Ar**C**NO$_2$), 145.30 (Ar**C**=N), 144.50 (Ar**C**), 141.02 (Ar**C**), 139.66 (Ar**C**), 136.86 (Ar**C**), 134.85 (Ar**C**), 131.17 (Ar**C**), 129.72 (Ar**C**), 127.45 (Ar**C**), 125.60 (Ar**C**), 124.21 (Ar**C**), 121.92 (Ar**C**), 120.24 (Ar**C**), 118.23 (Ar**C**), 117.06 (Ar**C**), 112.82 (Ar**C**), 109.70 (Ar**C**); LC/MS Calculated $C_{20}H_{14}N_4O_3$ $[M+1]^+$: m/z 358.36, observed, 359.10.

3-Fluoro-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (**6i**): Nature and colour: Off-white crystalline solid;FT-IR (cm^{-1}) (KBr); 3372 (Amide NH stretch), 3074 (Aromatic -CH stretch), 1667 (Amide -C=O stretch), 1618 (Imine -C=N stretch), 1591 (-CH bending), 750 (-CF stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.64 (s, 1H, Amide N**H**), 8.88 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.75 (s, 1H, Ar**H**), 8.54 (s, 1H, Ar**H**), 7.96 – 7.83 (m, 4H, Ar**H**), 7.78 (dd, *J* = 9.2, 8.1 Hz, 2H, Ar**H**), 7.62 (dt, *J* = 21.6, 8.0 Hz, 2H, Ar**H**), 7.52 – 7.42 (m, 2H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 163.38 (Amide, -**C**=O), 161.44 (-**C**F), 140.90 (Ar**C**=N), 140.31 (Ar**C**), 137.28 (Ar**C**), 136.17 (Ar**C**), 133.50 (Ar**C**), 131.16 (Ar**C**), 130.26 (Ar**C**), 129.49 (Ar**C**), 127.63 (Ar**C**),

124.53 (Ar**C**), 122.94 (Ar**C**), 118.65 (Ar**C**), 117.94 (Ar**C**), 115.20 (Ar**C**), 112.74 (Ar**C**), 111.59 (Ar**C**); LC/MS Calculated $C_{20}H_{14}FN_3O$ $[M+1]^+$: m/z 331.35, observed 332.10.

3-Chloro-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (**6j**): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr); 3362 (Amide NH stretch), 3075 (Aromatic -CH stretch), 1666 (Amide -C=O stretch), 1617 (Imine -C=N stretch), 1596 (-CH bending), 746 (-CCl stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.69 (s, 1H, Amide N**H**), 8.90 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.77 (s, 1H, Ar**H**), 8.53 (s, 1H, Ar**H**), 8.08 (t, *J* = 1.8 Hz, 1H, Ar**H**), 8.02 – 7.98 (m, 1H, Ar**H**), 7.95 (d, *J* = 8.9 Hz, 1H, Ar**H**), 7.93 – 7.88 (m, 1H, Ar**H**), 7.79 (dd, *J* = 7.9 Hz, 2H, Ar**H**), 7.71 (ddd, *J* = 8.0 Hz, 1H, Ar**H**), 7.61 (td, *J* = 7.9, 4.3 Hz, 2H, Ar**H**), 7.47 (t, *J* = 6.6 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.80 (Amide, -**C**=O), 140.96 (Ar**C**=N), 140.30 (Ar**C**), 136.94 (Ar**C**), 133.74 (Ar**C**Cl), 132.11 (Ar**C**), 130.95 (Ar**C**), 129.50 (Ar**C**), 128.01 (Ar**C**), 127.11 (Ar**C**), 122.94 (Ar**C**), 122.37 (Ar**C**), 118.64 (Ar**C**), 117.52 (Ar**C**), 112.74 (Ar**C**), 111.61 (Ar**C**); LC/MS Calculated $C_{20}H_{14}ClN_3O$ $[M+1]^+$: m/z 347.80; observed, 346.99 (deconvolated).

3-Bromo-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (6k): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr) 3258 (Amide NH stretch), 3125 (Heteroaromatic -CH stretch), 3038 (Aromatic -CH stretch), 1640 (Amide -C=O stretch), 1613 (Imine -C=N stretch), 1554 (-CH bending); ^{1}H NMR (500 MHz, DMSO) δ 10.49 (s, 1H, Amide N**H**), 8.62 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.46 (d, *J* = 10.2 Hz, 2H, Ar**H**), 8.22 (t, *J* = 1.8 Hz, 1H, Ar**H**), 8.05 – 7.98 (m, 1H, Ar**H**), 7.82 (ddd, *J* = 8.0, 1.8, 0.8 Hz, 1H, Ar**H**), 7.78 (dd, *J* = 8.1, 1.2 Hz, 1H, Ar**H**), 7.71 (d, *J* = 7.8 Hz, 1H, Ar**H**), 7.65 (d, *J* = 9.0 Hz, 1H, Ar**H**), 7.53 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.46 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.41 – 7.36 (m, 1H, Ar**H**), 7.02 (t, *J* = 6.7 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.47 (Amide, -**C**=O), 144.52 (Ar**C**=N), 139.92 (Ar**C**), 137.84 (Ar**C**), 134.84 (Ar**C**), 131.15 (-**C**Br), 130.77 (Ar**C**), 129.63 (Ar**C**), 127.79

(Ar**C**), 122.19 (Ar**C**), 121.78 (Ar**C**), 120.65 (Ar**C**), 118.26 (Ar**C**), 116.33 (Ar**C**), 113.59 (Ar**C**), 110.01 (Ar**C**); LC/MS Calculated $C_{20}H_{14}BrN_3O$ $[M+1]^+$: m/z 392.26, observed, 392.00.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-3-(trifluoromethyl)benzamide (6l): Nature and colour: White crystalline solid; FT-IR (cm^{-1}) (KBr); 3267 (Amide NH stretch), 3064 (Aromatic -CH stretch), 1667 (Amide -C=O stretch), 1614 (Imine -C=N stretch), 1537 (-CH bending), 773 (-CF stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.57 (s, 1H, Amide N**H**), 8.56 (d, *J* = 7.9 Hz, 1H, Ar**H**), 8.46 (s, 1H, Ar**H**), 8.38 (d, *J* = 10.2 Hz, 2H, Ar**H**), 8.32 (d, *J* = 7.8 Hz, 1H, Ar**H**), 7.99 (d, *J* = 7.8 Hz, 1H, Ar**H**), 7.81 (t, *J* = 7.8 Hz, 2H, Ar**H**), 7.71 (d, *J* = 7.9 Hz, 1H, Ar**H**), 7.58 (d, *J* = 9.7 Hz, 1H, Ar**H**), 7.45 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.27 (dd, *J* = 6.7, 1.2 Hz, 1H, Ar**H**), 6.91 (td, *J* = 6.7, 1.1 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.47 (Amide, -**C**=O), 145.29 (Ar**C**=N), 144.66 (Ar**C**), 139.76 (Ar**C**), 136.19 (Ar**C**), 134.89 (Ar**C**), 132.38 (Ar**C**), 130.22 (Ar**C**CF_3), 129.79 (Ar**C**), 127.43 (Ar**C**), 125.57 (Ar**C**), 124.73 (Ar**C**), 123.40 (-**C**F), 121.75 (Ar**C**), 120.24 (Ar**C**), 118.28 (Ar**C**), 117.09 (Ar**C**), 112.77 (Ar**C**), 109.66 (Ar**C**); LC/MS Calculated $C_{20}H_{14}ClN_3O$ $[M+1]^+$: m/z 381.36; observed 381.09 (deconvolated).

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-3-methylbenzamide (**6m**): Nature and colour: Off-white crystalline solid;FT-IR (cm^{-1}) (KBr); 3375 (Amide NH stretch), 3050 (Aromatic -CH stretch), 2922 (Aliphatic CH stretch), 1667 (Amide -C=O stretch), 1618 (Imine -C=N stretch), 1591 (-CH bending), 742; ^{1}H NMR (500 MHz, DMSO) δ 10.55 (s, 1H, Amide N**H**), 8.92 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.78 (s, 1H, Ar**H**), 8.54 (d, *J* = 1.6 Hz, 1H, Ar**H**), 7.99 – 7.90 (m, 2H, Ar**H**), 7.85 (s, 1H, Ar**H**), 7.84 – 7.77 (m, 3H, Ar**H**), 7.59 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.49 (dd, *J* = 11.6, 5.7 Hz, 1H, Ar**H**), 7.45 (dd, *J* = 4.5, 2.0 Hz, 2H, Ar**H**), 2.44 – 2.41 (m, 3H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 166.39 (Amide, -**C**=O), 140.91 (Ar**C**=N), 138.23 (Ar**C**CH_3), 135.01 (Ar**C**), 132.85 (Ar**C**), 130.23 (Ar**C**), 129.51 (Ar**C**), 128.83 (Ar**C**), 125.43 (Ar**C**), 122.84 (Ar**C**), 118.53 (Ar**C**), 117.55 (Ar**C**), 112.68 (Ar**C**), 111.52 (Ar**C**), 21.46 (**C**H_3); LC/MS Calculated $C_{21}H_{17}N_3O$ $[M+1]^+$: m/z 327.39, observed, 328.10.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-3-methoxybenzamide (6n): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr); 3319 (Amide NH stretch), 3074 (Aromatic -CH stretch), 2967 (Aliphatic CH stretch), 1666 (Amide -C=O stretch), 1617 (Imine -C=N stretch), 1586 (-CH bending), 743; ^{1}H NMR (500 MHz, DMSO) δ 10.59 (s, 1H, Amide N**H**), 8.92 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.78 (s, 1H, Ar**H**), 8.55 (s, 1H, Ar**H**), 7.97 (d, *J* = 8.9 Hz, 1H, Ar**H**), 7.95 – 7.90 (m, 1H, Ar**H**), 7.81 (t, *J* = 6.9 Hz, 2H, Ar**H**), 7.65 – 7.60 (m, 1H, Ar**H**), 7.58 (dd, *J* = 5.0, 2.7 Hz, 2H, Ar**H**), 7.52 – 7.45 (m, 2H, Ar**H**), 7.20 (dd, *J* = 8.1, 2.3 Hz, 1H, Ar**H**), 3.87 (s, 3H, OC**H$_3$**); ^{13}C NMR (500 MHz, DMSO) δ 165.98 (Amide, -**C**=O), 159.68 (Ar**C**OCH_3), 140.98 (Ar**C**=N), 140.53 (Ar**C**), 136.36 (Ar**C**), 133.55 (Ar**C**), 130.22 (Ar**C**), 129.50 (Ar**C**), 122.96 (Ar**C**), 122.15 (Ar**C**), 120.49 (Ar**C**), 118.66 (Ar**C**), 117.53 (Ar**C**), 113.51 (Ar**C**), 112.71 (Ar**C**), 111.58 (Ar**C**), 55.89 (O**C**H_3); LC/MS Calculated $C_{21}H_{17}N_3O_2$ $[M+1]^+$: m/z 343.39, observed, 344.10.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-3-nitrobenzamide (**6o**): Light yellow crystalline solid; FT-IR (cm^{-1}) (KBr); 3241 (Amide NH stretch), 3084 (Aromatic -CH stretch), 1668 (Amide -C=O stretch), 1615 (Imine -C=N stretch), 1552 (Nitro –NO_2 symmetric stretch), 1346 (Nitro –NO_2 asymmetric stretch), 752; ^{1}H NMR (500 MHz, DMSO) δ 10.73 (s, 1H, Amide N**H**), 8.87 (s, 1H, Ar**H**), 8.61 (d, *J* = 6.8 Hz, 2H, Ar**H**), 8.49-8.44 (m, 2H, Ar**H**), 8.36 (d, *J* = 10.3 Hz, 1H, Ar**H**), 7.87 (t, *J* = 8.0 Hz, 1H, Ar**H**), 7.82 (t, *J* = 8.0 Hz, 1H, Ar**H**), 7.73 (d, *J* = 7.8 Hz, 1H, Ar**H**), 7.64 (d, *J* = 9.0 Hz, 1H, Ar**H**), 7.48 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.39 – 7.33 (m, 1H, Ar**H**), 7.00 (t, *J* = 6.6 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 163.83 (Amide, -**C**=O), 148.25 (Ar**C**NO_2), 144.68 (Ar**C**=N), 139.73 (Ar**C**), 134.70 (Ar**C**), 131.01 (Ar**C**), 130.68 (Ar**C**), 129.66 (Ar**C**), 127.81 (Ar**C**), 122.94 (Ar**C**), 121.95 (Ar**C**), 120.65 (Ar**C**), 113.45 (Ar**C**), 109.98 (Ar**C**); LC/MS Calculated $C_{20}H_{14}N_4O_3$ $[M+1]^+$: m/z 358.36, observed, 359.00.

2-Fluoro-N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)benzamide (**6p**): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr); 3287 (Amide NH stretch), 3072 (Aromatic -CH stretch), 1656 (Amide -C=O stretch), 1612 (Imine -C=N stretch), 1591 (-CH bending), 745 (-CF stretch); ^{1}H NMR (500 MHz, DMSO) δ 10.70 (s, 1H, Amide N**H**), 8.87 (d, *J* = 6.7 Hz, 1H, Ar**H**), 8.75 (s, 1H, Ar**H**), 8.49 (s, 1H, Ar**H**), 7.93 (d, *J* = 8.9 Hz, 1H, Ar**H**), 7.86 (t, *J* = 7.8 Hz, 1H, Ar**H**), 7.78 (d, *J* = 7.8 Hz, 1H, Ar**H**), 7.75-7.67 (m, 2H, Ar**H**), 7.65 -7.55 (m, 2H, Ar**H**), 7.40 (ddd, *J* = 16.0, 10.9, 3.8 Hz, 3H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 164.89 (-**C**F), 162.34 (Amide, -**C**=O), 145.28 (Ar**C**=N), 144.75 (Ar**C**), 140.01 (Ar**C**), 134.82 (Ar**C**), 131.80 (Ar**C**), 130.94 (Ar**C**), 129.45 (Ar**C**), 127.41 (Ar**C**), 125.48 (Ar**C**), 121.50 (Ar**C**), 120.18 (Ar**C**), 118.17 (Ar**C**), 117.09 (Ar**C**), 115.90 (Ar**C**), 112.74 (Ar**C**), 109.62 (Ar**C**); LC/MS Calculated $C_{20}H_{14}FN_3O$ $[M+1]^+$: m/z 331.35; observed 330.89 (deconvolated).

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)-1-naphthamide (6q): Nature and colour: Off-white crystalline solid; FT-IR (cm^{-1}) (KBr); 3239 (Amide NH stretch), 3063 (Aromatic -CH stretch), 1651 (Amide -C=O stretch), 1615 (Imine -C=N stretch), 1593 (-CH bending), 740; ^{1}H NMR (500 MHz, DMSO) δ 10.67 (s, 1H, Amide N**H**), 8.57 (d, *J* = 7.0 Hz, 2H, Ar**H**), 8.40 (s, 1H, Ar**H**), 8.28 – 8.23 (m, 1H, Ar**H**), 8.10 (d, *J* = 8.3 Hz, 1H, Ar**H**), 8.05 (dd, *J* = 6.7, 2.7 Hz, 1H, Ar**H**), 7.81 (dd, *J* = 6.9, 0.7 Hz, 1H, Ar**H**), 7.73 (dd, *J* = 7.7, 1.2 Hz, 2H, Ar**H**), 7.67 – 7.58 (m, 4H, Ar**H**), 7.45 (t, *J* = 7.9 Hz, 1H, Ar**H**), 7.26 (ddd, *J* = 9.1, 6.7, 1.2 Hz, 1H, Ar**H**), 6.91 (td, *J* = 6.7, 1.1 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ 167.85 (Amide, -**C**=O), 145.29 (Ar**C**=N), 144.80 (Ar**C**), 140.24 (Ar**C**), 133.66 (Ar**C**), 130.61 (Ar**C**), 129.55 (Ar**C**), 128.82 (Ar**C**), 127.49 (Ar**C**), 127.42 (Ar**C**), 126.84 (Ar**C**), 125.99 (Ar**C**), 125.64 (Ar**C**), 125.54 (Ar**C**), 125.46 (Ar**C**), 117.13 (Ar**C**), 112.74 (Ar**C**), 109.66 (Ar**C**); LC/MS Calculated $C_{24}H_{17}N_3O$ $[M+1]^+$: m/z 363.42; observed, 364.10.

N-(3-(imidazo[1,2-*a*]pyridin-2-yl)phenyl)furan-2-carboxamide (**6r**): Nature and colour: Dark brown crystalline solid;FT-IR (cm^{-1}) (KBr); 3283 (Amide NH stretch), 3127

(heteroaromatic -CH stretch), 1650 (Amide -C=O stretch), 1613 (Imine -C=N stretch), 1579 (-CH bending), 751; ^{1}H NMR (500 MHz, DMSO) δ 10.26 (s, 1H, Amide N**H**), 8.56 (d, *J* = 8.9 Hz, 1H, Ar**H**), 8.42 (s, 1H, Ar**H**), 8.37 (s, 1H, Ar**H**), 7.96 (dd, *J* = 1.6, 0.7 Hz, 1H, Ar**H**), 7.75 (ddd, *J* = 8.1, 2.0, 0.8 Hz, 1H, Ar**H**), 7.71-7.66 (m, 1H, Ar**H**), 7.59 (d, *J* = 9.1 Hz, 1H, Ar**H**), 7.41 (dd, *J* = 10.1, 5.7 Hz, 2H, Ar**H**), 7.26 (ddd, *J* = 9.0, 6.7, 1.2 Hz, 1H, Ar**H**), 6.91 (td, *J* = 6.7, 1.1 Hz, 1H, Ar**H**), 6.73 (dd, *J* = 3.5, 1.7 Hz, 1H, Ar**H**); ^{13}C NMR (500 MHz, DMSO) δ156.76 (Amide, -**C**=O), 147.96 (Ar**C**=N), 146.27 (Ar**C**), 145.26 (Ar**C**), 144.69 (Ar**C**), 139.48 (Ar**C**), 134.82 (Ar**C**), 129.48 (Ar**C**), 127.42 (Ar**C**), 125.50 (Ar**C**), 121.50 (Ar**C**), 120.13 (Ar**C**), 118.09 (Ar**C**), 117.08 (Ar**C**), 115.14 (Ar**C**), 112.76 (Ar**C**), 112.59 (Ar**C**), 109.63 (Ar**C**); LC/MS Calculated $C_{18}H_{13}N_3O_2$ $[M+1]^+$: m/z 303.32; observed, 304.10.

Table S1: Physical properties of imidazopyridine amides **6a-r**

Molecule Id	R	Molecular weight	R*f*	% Yield
6a	-H	313.36	0.40	80.29
6b	-4F	331.35	0.41	85.23
6c	-4Cl	347.80	0.44	89.56
6d	-4Br	392.26	0.47	88.64
6e	$-4CF_3$	381.36	0.39	87.03
6f	$-4CH_3$	327.39	0.30	78.11
6g	$-4OCH_3$	343.39	0.29	72.36
6h	$-4NO_2$	358.36	0.38	76.25
6i	-3F	331.35	0.39	82.56
6j	-3Cl	347.80	0.45	88.44
6k	-3Br	392.26	0.36	78.66
6l	$-3CF_3$	381.36	0.34	85.77
6m	$-3CH_3$	327.39	0.38	75.96
6n	$-3OCH_3$	343.39	0.31	71.20
6o	$-3NO_2$	358.36	0.33	86.55
6p	-2F	331.35	0.42	84.65
6q	1-Napthyl	363.42	0.45	77.59
6r	2-Furyl	303.32	0.32	69.98