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Figure 1

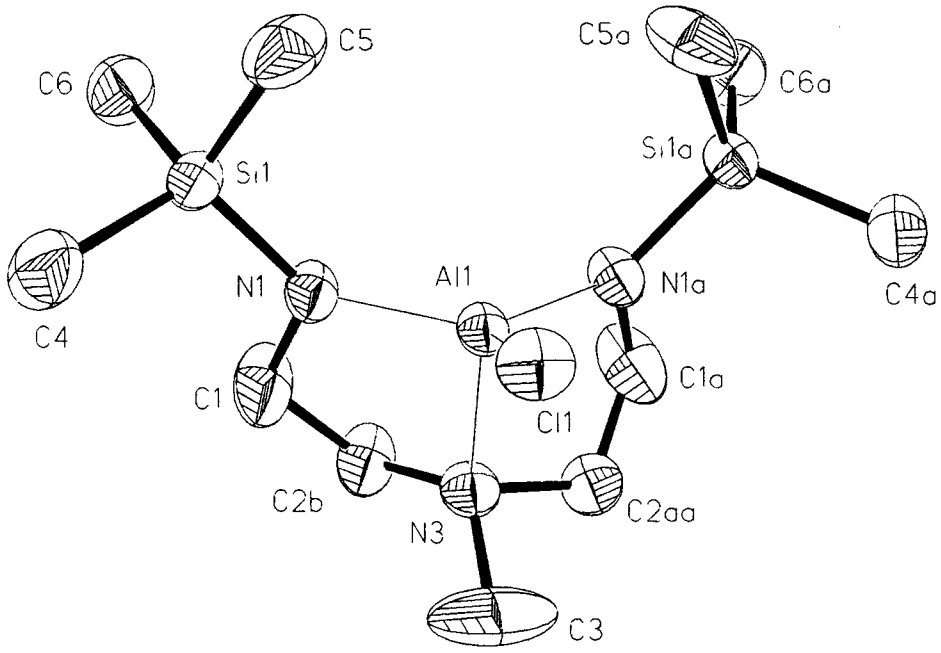


Figure 2

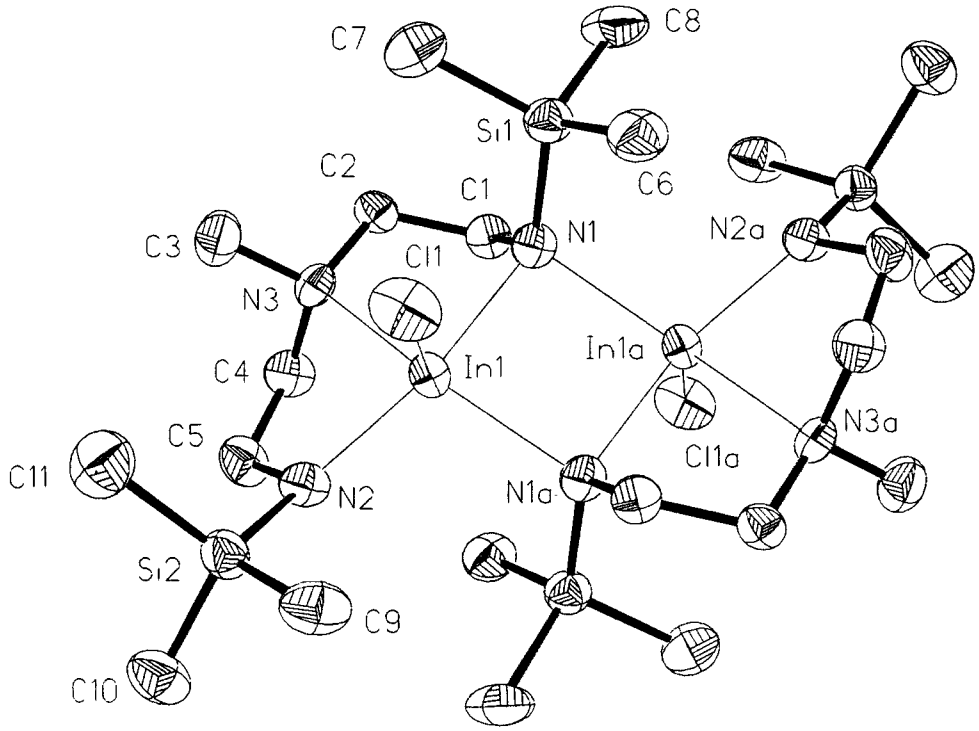

C7
C8
Si1
C6
C2
C1
N1
N2a
C3
Cl1
N3
In1
In1a
C4
C5
N3a
Cl1a
C11
N2
N1a
Si2
C9
C10

Figure 3

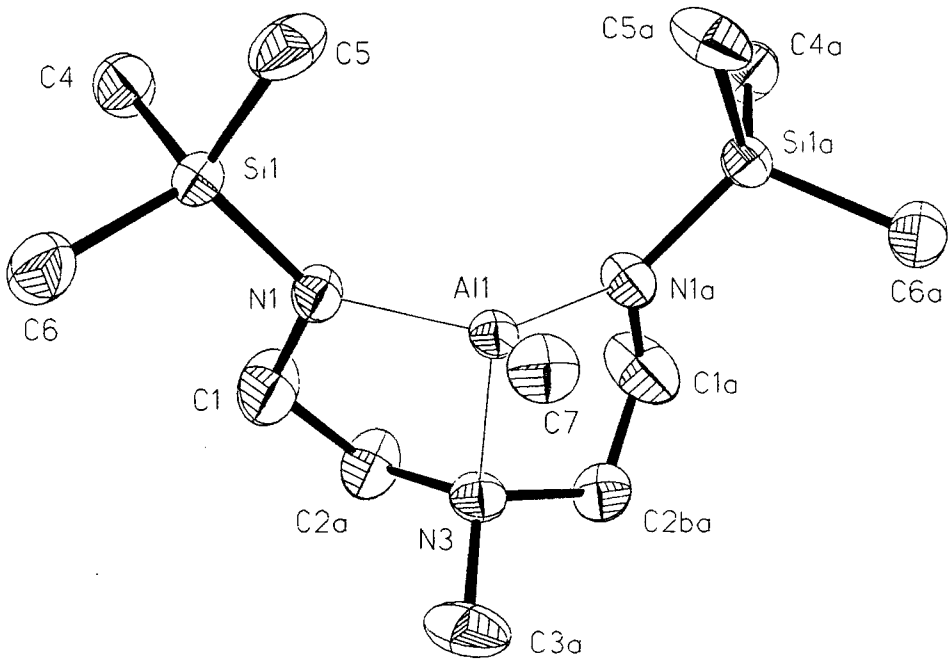


Figure 4

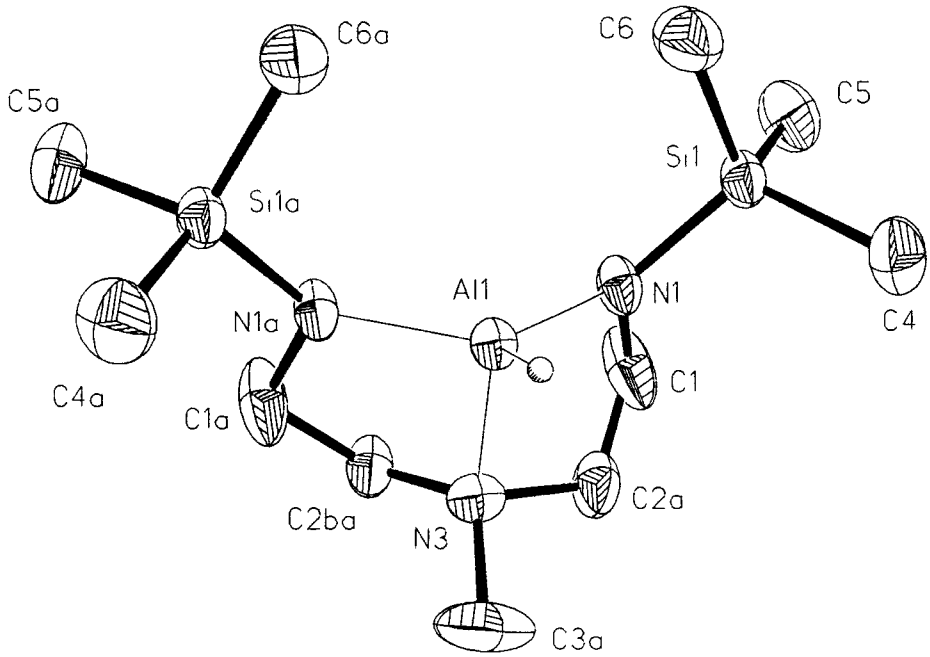


Figure 5

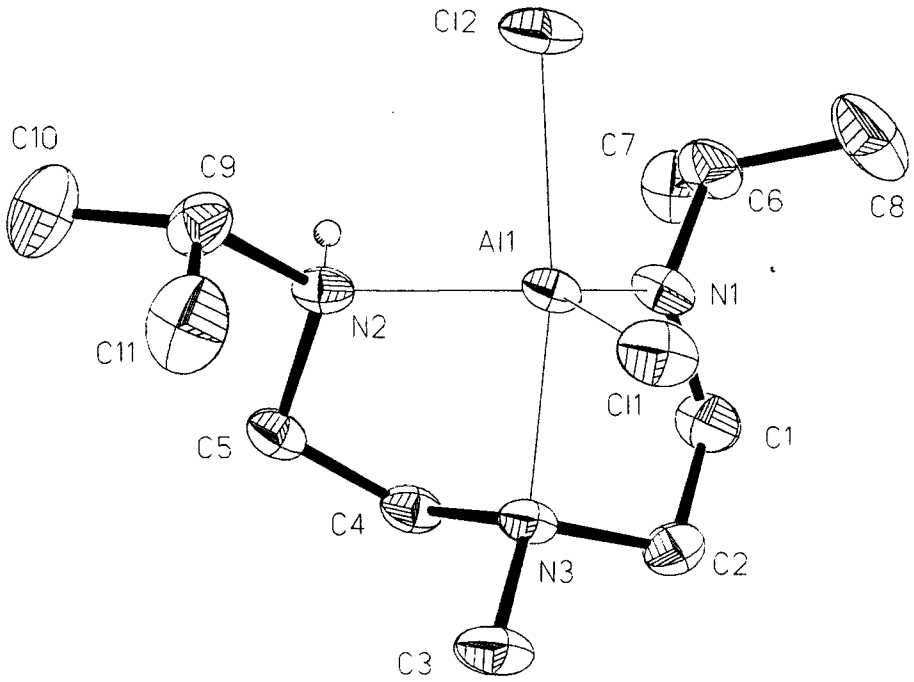


Table 1. Crystal data and structure refinement for 5.

Identification code	5
Empirical formula	C11 H29 Al Cl N3 Si2
Formula weight	321.98
Temperature	293(2) K
Wavelength	0.71073 A
Crystal system	monoclinic
Space group	P2(1)/m
Unit cell dimensions	a = 6.5260(10) A alpha = 90 deg. b = 18.664(4) A beta = 96.81(3) deg c = 7.744(2) A gamma = 90 deg.
Volume	936.6(3) A^3
Z	2
Density (calculated)	1.142 Mg/m^3
Absorption coefficient	0.370 mm^-1
F(000)	348
Crystal size	0.40 x 0.30 x 0.20 mm
Theta range for data collection	2.18 to 27.95 deg.
Index ranges	-8<=h<=5, -24<=k<=24, -10<=l<=10
Reflections collected	5035
Independent reflections	2320 [R(int) = 0.0156]
Refinement method	Full-matrix least-squares on F^2
Data / restraints / parameters	2319 / 0 / 103
Goodness-of-fit on F^2	1.039
Final R indices [I>2sigma(I)]	R1 = 0.0340, wR2 = 0.1001
R indices (all data)	R1 = 0.0409, wR2 = 0.1073
Largest diff. peak and hole	0.323 and -0.415 e.A^-3

Table 2. Atomic coordinates (x 10^4) and equivalent isotropic displacement parameters (A^2 x 10^3) for 5. U(eq) is defined as one third of the trace of the orthogonalized Uij tensor.

	x	y	z	U(eq)
Cl(1)	884(1)	2500	1237(1)	45(1)
Al(1)	-1099(1)	2500	3268(1)	30(1)
N(1)	-2224(2)	3369(1)	3634(2)	39(1)
C(1)	-1659(5)	3592(1)	5449(2)	68(1)
C(2A)	197(8)	3287(3)	6244(5)	45(1)
C(2B)	-753(12)	2986(3)	6579(5)	53(2)
N(3)	466(3)	2500	5639(2)	39(1)
C(3)	2716(6)	2500	5792(5)	101(2)
Si(1)	-3449(1)	3993(1)	2245(1)	37(1)
C(4)	-1810(3)	4809(1)	2126(4)	70(1)
C(5)	-4039(4)	3577(1)	49(2)	63(1)
C(6)	-5933(3)	4297(1)	2990(3)	56(1)

Table 3. Bond lengths [A] and angles [deg] for 5.

Cl(1)-Al(1)	2.1516(10)
Al(1)-N(1)#1	1.8162(14)
Al(1)-N(1)	1.8162(14)
Al(1)-N(3)	1.993(2)
N(1)-C(1)	1.470(2)
N(1)-Si(1)	1.7178(14)
C(1)-C(2A)	1.413(4)
C(1)-C(2B)	1.507(5)
C(2A)-N(3)	1.557(4)
C(2B)-N(3)	1.457(4)
N(3)-C(2B)#1	1.457(4)
N(3)-C(3)	1.459(4)
N(3)-C(2A)#1	1.557(4)
Si(1)-C(5)	1.868(2)
Si(1)-C(4)	1.869(2)
Si(1)-C(6)	1.871(2)
N(1)#1-Al(1)-N(1)	126.48(10)
N(1)#1-Al(1)-N(3)	91.62(5)
N(1)-Al(1)-N(3)	91.62(5)
N(1)#1-Al(1)-Cl(1)	113.80(5)
N(1)-Al(1)-Cl(1)	113.80(5)
N(3)-Al(1)-Cl(1)	112.73(7)
C(1)-N(1)-Si(1)	116.84(12)
C(1)-N(1)-Al(1)	110.02(12)
Si(1)-N(1)-Al(1)	132.43(8)
C(2A)-C(1)-N(1)	114.0(2)
N(1)-C(1)-C(2B)	112.3(2)
C(1)-C(2A)-N(3)	111.8(3)
N(3)-C(2B)-C(1)	112.2(3)
C(2B)#1-N(3)-C(2B)	77.1(7)
C(2B)#1-N(3)-C(3)	124.3(3)
C(2B)-N(3)-C(3)	124.3(3)
C(3)-N(3)-C(2A)	97.1(2)
C(3)-N(3)-C(2A)#1	97.1(2)
C(2A)-N(3)-C(2A)#1	141.0(4)
C(2B)#1-N(3)-Al(1)	102.1(2)
C(2B)-N(3)-Al(1)	102.1(2)
C(3)-N(3)-Al(1)	118.4(2)
C(2A)-N(3)-Al(1)	102.3(2)
C(2A)#1-N(3)-Al(1)	102.3(2)
N(1)-Si(1)-C(5)	108.56(8)
N(1)-Si(1)-C(4)	110.91(9)
C(5)-Si(1)-C(4)	110.55(13)
N(1)-Si(1)-C(6)	111.62(9)
C(5)-Si(1)-C(6)	108.30(11)
C(4)-Si(1)-C(6)	106.87(11)

Symmetry transformations used to generate equivalent atoms:
#1 x,-y+1/2,z

Table 4. Anisotropic displacement parameters (A^2 x 10^3) for 5. The anisotropic displacement factor exponent takes the form: -2 pi^2 [h^2 a*^2 U11 + ... + 2 h k a* b* U12]

	U11	U22	U33	U23	U13	U12
Cl(1)	46(1)	58(1)	34(1)	0	11(1)	0
Al(1)	38(1)	29(1)	22(1)	0	1(1)	0
N(1)	55(1)	33(1)	27(1)	-3(1)	1(1)	6(1)
C(1)	121(2)	47(1)	33(1)	-11(1)	-9(1)	21(1)
C(2A)	58(2)	44(2)	31(2)	-10(2)	-2(2)	-2(2)
C(2B)	87(4)	48(3)	22(2)	-6(2)	-1(2)	16(3)
N(3)	47(1)	42(1)	27(1)	0	-2(1)	0
C(3)	54(2)	194(5)	50(2)	0	-19(2)	0
Si(1)	38(1)	33(1)	39(1)	2(1)	4(1)	5(1)
C(4)	51(1)	52(1)	104(2)	27(1)	2(1)	-4(1)
C(5)	76(1)	74(1)	38(1)	0(1)	-6(1)	28(1)
C(6)	46(1)	54(1)	70(1)	-6(1)	11(1)	6(1)

Table 5. Hydrogen coordinates (x 10^4) and isotropic displacement parameters (A^2 x 10^3) for 5.

	x	y	z	U(eq)
H(1A)	-1529(5)	4110(1)	5485(2)	82
H(1B)	-2769(5)	3462(1)	6118(2)	82
H(2A1)	201(8)	3296(3)	7497(5)	54
H(2A2)	1354(8)	3572(3)	5960(5)	54
H(2B1)	115(12)	3183(3)	7570(5)	63
H(2B2)	-1860(12)	2720(3)	7015(5)	63
H(3A)	3203(6)	2982(3)	5688(58)	152
H(3B)	3166(6)	2210(19)	4885(36)	152
H(3C)	3259(6)	2308(22)	6903(24)	152
H(4A)	-2559(12)	5163(4)	1405(21)	104
H(4B)	-572(14)	4683(2)	1639(23)	104
H(4C)	-1456(25)	5000(6)	3274(5)	104
H(5A)	-4693(26)	3924(3)	-749(6)	95
H(5B)	-4946(23)	3176(6)	121(5)	95
H(5C)	-2780(5)	3417(9)	-353(11)	95
H(6A)	-6947(8)	3925(4)	2779(21)	84
H(6B)	-6410(14)	4720(5)	2361(16)	84
H(6C)	-5716(7)	4402(9)	4211(6)	84

Table 1. Crystal data and structure refinement for 8.

Identification code	8
Empirical formula	C22 H58 Cl2 In2 N6 Si4
Formula weight	819.64
Temperature	200(2) K
Wavelength	0.71069 A
Crystal system	monoclinic
Space group	P2(1)/n
Unit cell dimensions	a = 8.0494(7) A alpha = 90 deg. b = 13.3165(10) A beta = 95.673(7) c = 16.4108(14) A gamma = 90 deg.
Volume	1750.5(3) A^3
Z	2
Density (calculated)	1.555 Mg/m^3
Absorption coefficient	1.630 mm^-1
F(000)	840
Crystal size	0.15 x 0.04 x 0.03 mm
Theta range for data collection	2.93 to 26.07 deg.
Index ranges	-9<=h<=9, -8<=k<=16, -20<=l<=19
Reflections collected	6315
Independent reflections	2907 [R(int) = 0.0464]
Refinement method	Full-matrix least-squares on F^2
Data / restraints / parameters	2906 / 0 / 170
Goodness-of-fit on F^2	1.026
Final R indices [I>2sigma(I)]	R1 = 0.0415, wR2 = 0.1028
R indices (all data)	R1 = 0.0616, wR2 = 0.1114
Largest diff. peak and hole	1.202 and -0.678 e.A^-3

Table 2. Atomic coordinates (x 10^4) and equivalent isotropic displacement parameters (A^2 x 10^3) for 8. U(eq) is defined as one third of the trace of the orthogonalized Uij tensor.

	x	y	z	U(eq)
In(1)	5667(1)	3809(1)	5164(1)	27(1)
Cl(1)	8525(2)	3805(2)	5754(1)	53(1)
N(1)	4586(5)	5073(4)	5894(3)	32(1)
N(2)	5353(5)	2408(4)	4589(3)	34(1)
N(3)	3893(5)	2931(4)	6007(2)	31(1)
C(1)	2887(6)	4684(5)	6026(3)	33(1)
C(2)	2935(6)	3670(5)	6448(3)	32(1)
C(3)	4747(8)	2198(6)	6561(4)	47(2)
C(4)	2814(7)	2413(6)	5354(3)	40(2)
C(5)	3887(7)	1824(6)	4809(4)	42(2)
Si(1)	5791(2)	5485(1)	6802(1)	36(1)
C(6)	7686(8)	6155(6)	6528(4)	48(2)
C(7)	6517(8)	4471(7)	7544(4)	55(2)
C(8)	4587(9)	6370(7)	7387(4)	57(2)
Si(2)	6973(2)	1660(2)	4331(1)	37(1)
C(9)	8672(7)	2409(6)	3926(4)	49(2)
C(10)	6177(8)	731(6)	3533(4)	52(2)
C(11)	7953(9)	920(7)	5227(5)	62(2)

Table 3. Bond lengths [A] and angles [deg] for 8.

In(1)-N(2)	2.095(5)
In(1)-N(1)#1	2.280(5)
In(1)-N(1)	2.287(5)
In(1)-N(3)	2.390(4)
In(1)-Cl(1)	2.4064(14)
In(1)-In(1)#1	3.3738(9)
N(1)-C(1)	1.498(6)
N(1)-Si(1)	1.781(5)
N(1)-In(1)#1	2.280(5)
N(2)-C(5)	1.487(7)
N(2)-Si(2)	1.727(5)
N(3)-C(3)	1.459(8)
N(3)-C(2)	1.482(7)
N(3)-C(4)	1.482(7)
C(1)-C(2)	1.516(9)
C(4)-C(5)	1.521(8)
Si(1)-C(8)	1.854(7)
Si(1)-C(6)	1.861(7)
Si(1)-C(7)	1.873(7)
Si(2)-C(9)	1.867(6)
Si(2)-C(10)	1.867(7)
Si(2)-C(11)	1.877(7)

N(2)-In(1)-N(1)#1	103.9(2)
N(2)-In(1)-N(1)	148.9(2)
N(1)#1-In(1)-N(1)	84.8(2)
N(2)-In(1)-N(3)	76.9(2)
N(1)#1-In(1)-N(3)	138.31(14)
N(1)-In(1)-N(3)	77.1(2)
N(2)-In(1)-Cl(1)	104.28(13)
N(1)#1-In(1)-Cl(1)	108.54(11)
N(1)-In(1)-Cl(1)	100.89(11)
N(3)-In(1)-Cl(1)	111.57(11)
N(2)-In(1)-In(1)#1	138.02(13)
N(1)#1-In(1)-In(1)#1	42.47(12)
N(1)-In(1)-In(1)#1	42.30(12)
N(3)-In(1)-In(1)#1	110.69(12)
Cl(1)-In(1)-In(1)#1	110.06(5)
C(1)-N(1)-Si(1)	114.5(3)
C(1)-N(1)-In(1)#1	108.8(3)
Si(1)-N(1)-In(1)#1	115.8(3)
C(1)-N(1)-In(1)	102.8(4)
Si(1)-N(1)-In(1)	117.4(2)
In(1)#1-N(1)-In(1)	95.2(2)
C(5)-N(2)-Si(2)	113.3(4)
C(5)-N(2)-In(1)	114.8(3)
Si(2)-N(2)-In(1)	124.3(2)
C(3)-N(3)-C(2)	112.1(4)
C(3)-N(3)-C(4)	110.3(6)
C(2)-N(3)-C(4)	111.5(4)
C(3)-N(3)-In(1)	114.6(3)
C(2)-N(3)-In(1)	109.1(4)
C(4)-N(3)-In(1)	98.6(3)
N(1)-C(1)-C(2)	113.1(4)
N(3)-C(2)-C(1)	111.1(4)
N(3)-C(4)-C(5)	109.8(4)
N(2)-C(5)-C(4)	112.6(5)
N(1)-Si(1)-C(8)	111.1(3)
N(1)-Si(1)-C(6)	109.7(2)
C(8)-Si(1)-C(6)	107.6(4)

N(1)-Si(1)-C(7)	115.6(3)
C(8)-Si(1)-C(7)	105.4(3)
C(6)-Si(1)-C(7)	107.0(3)
N(2)-Si(2)-C(9)	112.1(3)
N(2)-Si(2)-C(10)	109.8(3)
C(9)-Si(2)-C(10)	108.5(3)
N(2)-Si(2)-C(11)	112.3(3)
C(9)-Si(2)-C(11)	107.1(3)
C(10)-Si(2)-C(11)	106.9(4)

Symmetry transformations used to generate equivalent atoms:
#1 -x+1,-y+1,-z+1

Table 4. Anisotropic displacement parameters (A^2 x 10^3) for 8. The anisotropic displacement factor exponent takes the form: -2 pi^2 [h^2 a*^2 U11 + ... + 2 h k a* b* U12]

	U11	U22	U33	U23	U13	U12
In(1)	20(1)	26(1)	35(1)	-1(1)	7(1)	-2(1)
Cl(1)	29(1)	67(1)	61(1)	-13(1)	-5(1)	2(1)
N(1)	26(2)	36(3)	36(2)	2(2)	8(2)	-6(2)
N(2)	29(2)	40(4)	35(2)	-4(2)	11(2)	-12(2)
N(3)	32(2)	32(3)	30(2)	7(2)	7(2)	-2(2)
C(1)	26(2)	38(4)	38(3)	0(2)	13(2)	0(2)
C(2)	28(2)	33(4)	36(3)	-4(2)	9(2)	1(2)
C(3)	51(4)	42(5)	49(3)	11(3)	13(3)	9(3)
C(4)	35(3)	45(5)	43(3)	-3(3)	10(2)	-13(3)
C(5)	38(3)	36(4)	51(3)	-6(3)	8(3)	-13(3)
Si(1)	36(1)	39(1)	33(1)	-1(1)	2(1)	-3(1)
C(6)	45(3)	55(5)	40(3)	-2(3)	-6(3)	-11(3)
C(7)	54(4)	64(6)	43(3)	6(3)	-5(3)	3(4)
C(8)	67(4)	76(7)	29(3)	-8(3)	7(3)	14(4)
Si(2)	38(1)	33(1)	40(1)	-2(1)	12(1)	0(1)
C(9)	39(3)	65(6)	45(3)	-10(3)	15(3)	-8(3)
C(10)	51(4)	51(5)	58(4)	-14(3)	22(3)	-7(3)
C(11)	54(4)	68(7)	64(4)	8(4)	11(3)	17(4)

Table 5. Hydrogen coordinates (x 10^4) and isotropic displacement parameters (A^2 x 10^3) for 8.

	x	y	z	U(eq)
H(1A)	2213(6)	4627(5)	5490(3)	40
H(1B)	2327(6)	5173(5)	6362(3)	40
H(2A)	3457(6)	3743(5)	7017(3)	38
H(2B)	1781(6)	3422(5)	6470(3)	38
H(3A)	5521(42)	1803(23)	6265(8)	70
H(3B)	3923(9)	1750(22)	6772(22)	70
H(3C)	5371(44)	2549(6)	7019(14)	70
H(4A)	2136(7)	2914(6)	5021(3)	48
H(4B)	2044(7)	1951(6)	5602(3)	48
H(5A)	4283(7)	1202(6)	5095(4)	50
H(5B)	3197(7)	1628(6)	4301(4)	50
H(6A)	7414(17)	6862(9)	6415(28)	71
H(6B)	8078(34)	5845(22)	6040(18)	71
H(6C)	8564(21)	6111(32)	6985(12)	71
H(7A)	7380(43)	4739(11)	7949(18)	82
H(7B)	6978(55)	3913(16)	7249(5)	82
H(7C)	5571(15)	4230(26)	7823(21)	82
H(8A)	3662(39)	6012(10)	7604(26)	86
H(8B)	4143(54)	6913(20)	7026(9)	86
H(8C)	5321(18)	6653(31)	7842(19)	86
H(9A)	8385(27)	2540(31)	3342(8)	74
H(9B)	9722(14)	2032(15)	4003(25)	74
H(9C)	8801(39)	3048(15)	4222(20)	74
H(10A)	7088(17)	285(24)	3411(22)	78
H(10B)	5744(54)	1088(6)	3035(11)	78
H(10C)	5281(42)	333(25)	3737(12)	78
H(11A)	8766(51)	447(29)	5039(7)	93
H(11B)	7085(13)	549(33)	5478(21)	93
H(11C)	8518(57)	1380(7)	5630(15)	93

Table 1. Crystal data and structure refinement for 10.

Identification code	10
Empirical formula	C6 H16.50 Al0.50 N1.50 Si
Formula weight	151.29
Temperature	160(2) K
Wavelength	0.71073 A
Crystal system	monoclinic
Space group	P2(1)/m
Unit cell dimensions	a = 6.4750(10) A alpha = 90 deg. b = 18.359(4) A beta = 95.58(3) deg c = 7.870(2) A gamma = 90 deg.
Volume	931.1(3) A^3
Z	4
Density (calculated)	1.079 Mg/m^3
Absorption coefficient	0.229 mm^-1
F(000)	334
Crystal size	0.20 x 0.20 x 0.20 mm
Theta range for data collection	3.16 to 24.05 deg.
Index ranges	-7<=h<=7, -20<=k<=20, -9<=l<=9
Reflections collected	6226
Independent reflections	1503 [R(int) = 0.0359]
Refinement method	Full-matrix least-squares on F^2
Data / restraints / parameters	1377 / 0 / 147
Goodness-of-fit on F^2	1.060
Final R indices [I>2sigma(I)]	R1 = 0.0339, wR2 = 0.0934
R indices (all data)	R1 = 0.0383, wR2 = 0.0985
Largest diff. peak and hole	0.385 and -0.344 e.A^-3

Table 2. Atomic coordinates (x 10^4) and equivalent isotropic displacement parameters (A^2 x 10^3) for 10. U(eq) is defined as one third of the trace of the orthogonalized Uij tensor.

	x	y	z	U(eq)
Al(1)	4043(1)	2500	8126(1)	24(1)
N(1)	2826(3)	3376(1)	8551(2)	33(1)
Si(1)	1627(1)	4011(1)	7207(1)	30(1)
C(4)	-905(4)	4315(1)	7930(3)	45(1)
C(5)	1117(5)	3604(2)	5032(3)	48(1)
C(6)	3247(4)	4848(2)	7105(5)	57(1)
C(1)	3316(5)	3596(1)	10337(3)	62(1)
C(2A)	4208(11)	2999(3)	11414(6)	50(1)
C(2B)	5195(8)	3291(3)	11113(6)	37(1)
N(3)	5474(4)	2500	10522(3)	32(1)
C(7)	5928(5)	2500	6319(4)	38(1)
C(3A)	7701(7)	2674(3)	10741(6)	55(2)

Table 3. Bond lengths [A] and angles [deg] for 10.

Al(1)-N(1)#1	1.836(2)
Al(1)-N(1)	1.836(2)
Al(1)-C(7)	1.962(3)
Al(1)-N(3)	2.019(2)
N(1)-C(1)	1.467(3)
N(1)-Si(1)	1.709(2)
Si(1)-C(6)	1.866(3)
Si(1)-C(5)	1.867(2)
Si(1)-C(4)	1.872(2)
C(1)-C(2B)	1.422(5)
C(1)-C(2A)	1.469(5)
C(2A)-N(3)	1.454(5)
C(2A)-C(2A)#1	1.831(11)
C(2B)-N(3)	1.541(5)
N(3)-C(2A)#1	1.454(5)
N(3)-C(3A)	1.471(5)
N(3)-C(3A)#1	1.471(5)
N(3)-C(2B)#1	1.541(5)
N(1)#1-Al(1)-N(1)	122.35(11)
N(1)#1-Al(1)-C(7)	116.13(6)
N(1)-Al(1)-C(7)	116.13(6)
N(1)#1-Al(1)-N(3)	89.76(6)
N(1)-Al(1)-N(3)	89.76(6)
C(7)-Al(1)-N(3)	114.54(13)
C(1)-N(1)-Si(1)	116.64(14)
C(1)-N(1)-Al(1)	111.04(14)
Si(1)-N(1)-Al(1)	131.43(9)
N(1)-Si(1)-C(6)	111.39(11)
N(1)-Si(1)-C(5)	108.88(10)
C(6)-Si(1)-C(5)	109.9(2)
N(1)-Si(1)-C(4)	111.93(11)
C(6)-Si(1)-C(4)	106.25(13)
C(5)-Si(1)-C(4)	108.41(13)
C(2B)-C(1)-N(1)	113.6(3)
N(1)-C(1)-C(2A)	112.6(2)
N(3)-C(2A)-C(1)	113.6(3)
N(3)-C(2A)-C(2A)#1	51.0(3)
C(1)-C(2A)-C(2A)#1	138.3(2)
C(1)-C(2B)-N(3)	111.2(3)
C(2A)-N(3)-C(2A)#1	78.0(6)
C(2A)-N(3)-C(3A)	113.5(4)
C(2A)#1-N(3)-C(3A)	132.3(3)
C(2A)-N(3)-C(3A)#1	132.3(3)
C(2A)#1-N(3)-C(3A)#1	113.5(4)
C(3A)-N(3)-C(3A)#1	25.1(5)
C(2B)#1-N(3)-C(2B)	141.0(4)
C(2A)-N(3)-Al(1)	102.8(2)
C(2A)#1-N(3)-Al(1)	102.8(2)
C(3A)-N(3)-Al(1)	117.7(2)
C(3A)#1-N(3)-Al(1)	117.7(2)
C(2B)#1-N(3)-Al(1)	103.0(2)
C(2B)-N(3)-Al(1)	103.0(2)

Symmetry transformations used to generate equivalent atoms:
#1 x,-y+1/2,z

Table 4. Anisotropic displacement parameters (A^2 x 10^3) for 10. The anisotropic displacement factor exponent takes the form: -2 pi^2 [h^2 a*^2 U11 + ... + 2 h k a* b* U12]

	U11	U22	U33	U23	U13	U12
Al(1)	30(1)	25(1)	16(1)	0	0(1)	0
N(1)	46(1)	29(1)	23(1)	-4(1)	-1(1)	7(1)
Si(1)	29(1)	27(1)	33(1)	1(1)	1(1)	4(1)
C(4)	37(1)	42(1)	55(2)	-6(1)	7(1)	3(1)
C(5)	55(2)	58(2)	30(1)	3(1)	-3(1)	21(1)
C(6)	38(1)	42(1)	90(2)	17(2)	-2(1)	-2(1)
C(1)	100(2)	50(1)	32(1)	-15(1)	-15(1)	25(1)
C(2A)	82(4)	49(4)	17(2)	-8(2)	-6(2)	23(3)
C(2B)	48(3)	38(3)	22(2)	-9(2)	0(2)	-3(2)
N(3)	36(1)	36(1)	21(1)	0	-3(1)	0
C(7)	40(2)	45(2)	29(2)	0	8(1)	0
C(3A)	50(2)	73(7)	37(2)	7(2)	-17(2)	-16(3)

Table 5. Hydrogen coordinates (x 10^4) and isotropic displacement parameters (A^2 x 10^3) for 10.

	x	y	z	U(eq)
H(4A)	-1365(47)	4728(18)	7246(39)	76(9)
H(4B)	-1866(44)	3933(17)	7807(34)	62(8)
H(4C)	-781(43)	4452(15)	9064(41)	67(8)
H(5A)	2324(53)	3520(16)	4651(40)	75(9)
H(5B)	521(56)	3919(20)	4296(46)	91(11)
H(5C)	218(58)	3174(23)	4956(49)	103(12)
H(6A)	4502(53)	4738(16)	6632(39)	74(9)
H(6B)	2604(52)	5181(19)	6402(43)	83(10)
H(6C)	3560(60)	5051(22)	8209(53)	107(13)
H(1A)	2059(5)	3766(1)	10786(3)	75
H(1B)	4291(5)	3998(1)	10386(3)	75
H(2A1)	5052(11)	3204(3)	12383(6)	60
H(2A2)	3089(11)	2727(3)	11851(6)	60
H(2B1)	5183(8)	3302(3)	12344(6)	44
H(2B2)	6357(8)	3583(3)	10819(6)	44
H(7A)	5353(217)	2500	5638(180)	277(77)
H(7B)	6049(56)	2941(23)	5797(54)	92(12)
H(7C)	7466(84)	2500	6881(65)	95(15)
H(3A1)	7903(8)	3172(7)	10429(44)	82
H(3A2)	8430(9)	2361(14)	10025(37)	82
H(3A3)	8225(15)	2602(19)	11913(12)	82

Table 1. Crystal data and structure refinement for 11.

Identification code	11
Empirical formula	C44 H120 Al4 N12 Si8
Formula weight	1150.16
Temperature	190(2) K
Wavelength	0.71069 A
Crystal system, space group	Orthorhombic, P n m a
Unit cell dimensions	a = 28.8700(7) A alpha = 90 deg. b = 19.8930(10) A beta = 90.000(7) d c = 6.2260(14) A gamma = 90 deg.
Volume	3575.7(8) A^3
Z, Calculated density	2, 1.068 Mg/m^3
Absorption coefficient	0.236 mm^-1
F(000)	1264
Crystal size	0.12 x 0.10 x 0.08 mm
Theta range for data collection	2.49 to 25.00 deg.
Index ranges	-35<=h<=30, -24<=k<=24, -7<=l<=7
Reflections collected / unique	14629 / 3251 [R(int) = 0.0747]
Absorption correction	None
Refinement method	Full-matrix least-squares on F^2
Data / restraints / parameters	2895 / 0 / 191
Goodness-of-fit on F^2	0.933
Final R indices [I>2sigma(I)]	R1 = 0.0404, wR2 = 0.1017
R indices (all data)	R1 = 0.0736, wR2 = 0.1176
Largest diff. peak and hole	0.295 and -0.275 e.A^-3

Table 2. Atomic coordinates (x 10^4) and equivalent isotropic displacement parameters (A^2 x 10^3) for 11.
U(eq) is defined as one third of the trace of the orthogonalized Uij tensor.

	x	y	z	U(eq)
Al(1)	2938(1)	2500	6397(1)	25(1)
N(1)	2785(1)	1680(1)	5247(3)	31(1)
C(1)	2321(1)	1471(2)	5934(6)	57(1)
C(2A)	2171(2)	1738(3)	7805(10)	45(2)
C(2B)	2043(2)	2071(3)	6843(10)	38(1)
N(3)	2341(1)	2500	8072(4)	34(1)
C(3)	2362(2)	2352(3)	10350(7)	47(2)
Si(1)	3153(1)	1080(1)	4247(1)	32(1)
C(4)	3414(1)	546(2)	6384(5)	58(1)
C(5)	2842(1)	499(2)	2395(5)	56(1)
C(6)	3633(1)	1506(2)	2799(5)	53(1)
Al(2)	442(1)	2500	5956(1)	25(1)
N(4)	290(1)	1680(1)	4816(3)	32(1)
C(7)	-174(1)	1467(2)	5515(6)	62(1)
C(8A)	-326(2)	1746(4)	7359(11)	44(2)
C(8B)	-451(2)	2064(3)	6436(10)	39(1)
N(5)	-154(1)	2500	7636(4)	34(1)
C(9)	-122(2)	2354(3)	9918(7)	47(2)
Si(2)	659(1)	1077(1)	3838(1)	30(1)
C(10)	931(1)	562(2)	6009(4)	50(1)
C(11)	1133(1)	1504(2)	2330(4)	45(1)
C(12)	347(1)	481(2)	2024(5)	50(1)

Table 3. Bond lengths [A] and angles [deg] for 11.

Al(1)-N(1)	1.835(2)
Al(1)-N(1)#1	1.835(2)
Al(1)-N(3)	2.014(3)
N(1)-C(1)	1.469(3)
N(1)-Si(1)	1.714(2)
C(1)-C(2A)	1.352(7)
C(1)-C(2B)	1.545(6)
C(2A)-N(3)	1.603(7)
C(2B)-N(3)	1.432(6)
N(3)-C(2B)#1	1.432(6)
N(3)-C(3)#1	1.450(5)
N(3)-C(3)	1.450(5)
N(3)-C(2A)#1	1.603(7)
Si(1)-C(6)	1.857(3)
Si(1)-C(4)	1.862(3)
Si(1)-C(5)	1.862(3)
Al(2)-N(4)	1.833(2)
Al(2)-N(4)#1	1.833(2)
Al(2)-N(5)	2.012(3)
N(4)-C(7)	1.468(4)
N(4)-Si(2)	1.717(2)
C(7)-C(8A)	1.349(7)
C(7)-C(8B)	1.544(7)
C(8A)-N(5)	1.589(7)
C(8B)-N(5)	1.431(6)
N(5)-C(8B)#1	1.431(6)
N(5)-C(9)#1	1.453(5)
N(5)-C(9)	1.453(5)
N(5)-C(8A)#1	1.589(7)
Si(2)-C(11)	1.864(3)
Si(2)-C(10)	1.868(3)
Si(2)-C(12)	1.869(3)

N(1)-Al(1)-N(1)#1	125.43(14)
N(1)-Al(1)-N(3)	89.81(8)
N(1)#1-Al(1)-N(3)	89.81(8)
C(1)-N(1)-Si(1)	118.2(2)
C(1)-N(1)-Al(1)	111.0(2)
Si(1)-N(1)-Al(1)	127.75(12)
C(2A)-C(1)-N(1)	115.6(4)
N(1)-C(1)-C(2B)	111.1(3)
C(1)-C(2A)-N(3)	111.3(4)
N(3)-C(2B)-C(1)	110.2(4)
C(2B)-N(3)-C(2B)#1	73.2(6)
C(2B)-N(3)-C(3)#1	132.0(4)
C(2B)#1-N(3)-C(3)#1	115.3(4)
C(2B)-N(3)-C(3)	115.3(4)
C(2B)#1-N(3)-C(3)	132.0(4)
C(3)#1-N(3)-C(3)	23.4(5)
C(3)#1-N(3)-C(2A)	107.8(4)
C(3)-N(3)-C(2A)	85.6(4)
C(3)#1-N(3)-C(2A)#1	85.6(4)
C(3)-N(3)-C(2A)#1	107.8(4)
C(2A)-N(3)-C(2A)#1	142.2(6)
C(2B)-N(3)-Al(1)	103.7(3)
C(2B)#1-N(3)-Al(1)	103.7(3)
C(3)#1-N(3)-Al(1)	118.0(3)
C(3)-N(3)-Al(1)	118.0(3)
C(2A)-N(3)-Al(1)	102.1(3)
C(2A)#1-N(3)-Al(1)	102.1(3)

N(1)-Si(1)-C(6)	108.68(13)
N(1)-Si(1)-C(4)	112.88(13)
C(6)-Si(1)-C(4)	107.7(2)
N(1)-Si(1)-C(5)	111.03(14)
C(6)-Si(1)-C(5)	110.0(2)
C(4)-Si(1)-C(5)	106.5(2)
N(4)-Al(2)-N(4)#1	125.84(14)
N(4)-Al(2)-N(5)	89.81(8)
N(4)#1-Al(2)-N(5)	89.81(8)
C(7)-N(4)-Si(2)	118.0(2)
C(7)-N(4)-Al(2)	111.1(2)
Si(2)-N(4)-Al(2)	127.62(13)
C(8A)-C(7)-N(4)	115.5(4)
N(4)-C(7)-C(8B)	111.2(3)
C(7)-C(8A)-N(5)	112.3(4)
N(5)-C(8B)-C(7)	110.4(4)
C(8B)-N(5)-C(8B)#1	74.6(6)
C(8B)-N(5)-C(9)#1	132.0(4)
C(8B)#1-N(5)-C(9)#1	115.2(4)
C(8B)-N(5)-C(9)	115.2(4)
C(8B)#1-N(5)-C(9)	132.0(4)
C(9)#1-N(5)-C(9)	23.1(5)
C(9)#1-N(5)-C(8A)	108.3(4)
C(9)-N(5)-C(8A)	86.4(4)
C(9)#1-N(5)-C(8A)#1	86.4(4)
C(9)-N(5)-C(8A)#1	108.3(4)
C(8A)-N(5)-C(8A)#1	141.4(6)
C(8B)-N(5)-Al(2)	104.0(3)
C(8B)#1-N(5)-Al(2)	104.0(3)
C(9)#1-N(5)-Al(2)	117.1(3)
C(9)-N(5)-Al(2)	117.1(3)
C(8A)-N(5)-Al(2)	102.2(3)
C(8A)#1-N(5)-Al(2)	102.2(3)
N(4)-Si(2)-C(11)	108.39(12)
N(4)-Si(2)-C(10)	112.79(12)
C(11)-Si(2)-C(10)	107.83(15)
N(4)-Si(2)-C(12)	110.90(13)
C(11)-Si(2)-C(12)	109.81(14)
C(10)-Si(2)-C(12)	107.06(15)

Symmetry transformations used to generate equivalent atoms:
#1 x,-y+1/2,z

Table 4. Anisotropic displacement parameters (A^2 x 10^3) for 11. The anisotropic displacement factor exponent takes the form: -2 pi^2 [h^2 a*^2 U11 + ... + 2 h k a* b* U12]

	U11	U22	U33	U23	U13	U12
Al(1)	23(1)	23(1)	30(1)	0	-2(1)	0
N(1)	26(1)	20(1)	47(1)	-1(1)	1(1)	-1(1)
C(1)	30(2)	27(2)	116(3)	-7(2)	16(2)	-2(1)
C(2A)	42(4)	29(4)	65(4)	14(3)	13(3)	0(3)
C(2B)	29(3)	28(4)	55(3)	-7(3)	7(3)	-2(3)
N(3)	32(2)	42(2)	28(1)	0	1(1)	0
Si(1)	34(1)	22(1)	40(1)	0(1)	1(1)	2(1)
C(4)	59(2)	49(2)	67(2)	12(2)	1(2)	18(2)
C(5)	65(3)	36(2)	65(2)	-14(1)	-1(2)	-1(2)
C(6)	53(2)	43(2)	62(2)	-3(1)	19(2)	-2(2)
Al(2)	22(1)	23(1)	30(1)	0	-2(1)	0
N(4)	26(1)	24(1)	48(1)	-3(1)	1(1)	-3(1)
C(7)	32(2)	30(2)	125(3)	-15(2)	16(2)	-8(1)
C(8A)	34(4)	32(4)	66(4)	7(3)	13(3)	-4(3)
C(8B)	23(3)	40(4)	54(3)	-9(3)	4(3)	-4(3)
N(5)	31(2)	41(2)	29(1)	0	2(1)	0
Si(2)	33(1)	22(1)	36(1)	-1(1)	-1(1)	1(1)
C(10)	57(2)	45(2)	49(2)	4(1)	0(1)	15(2)
C(11)	41(2)	40(2)	54(2)	-2(1)	8(1)	0(2)
C(12)	56(2)	36(2)	59(2)	-11(1)	-6(2)	-3(2)

Table 5. Hydrogen coordinates (x 10^4) and isotropic displacement parameters (A^2 x 10^3) for 11.

	x	y	z	U(eq)
H(1)	3360(14)	2500	7652(54)	45(11)
H(1A)	2097(1)	1592(2)	4790(6)	69
H(1B)	2318(1)	975(2)	6070(6)	69
H(2A)	2289(2)	1466(3)	9018(10)	54
H(2B)	1828(2)	1723(3)	7848(10)	54
H(2C)	1904(2)	2329(3)	5647(10)	45
H(2D)	1789(2)	1903(3)	7766(10)	45
H(3A)	2593(11)	2644(16)	11032(14)	70
H(3B)	2450(15)	1881(7)	10557(7)	70
H(3C)	2058(5)	2433(21)	11001(15)	70
H(4A)	3604(7)	826(3)	7332(23)	87
H(4B)	3608(7)	199(8)	5722(5)	87
H(4C)	3167(1)	332(10)	7221(25)	87
H(5A)	3061(2)	167(7)	1825(29)	83
H(5B)	2708(7)	757(2)	1207(20)	83
H(5C)	2595(5)	268(9)	3180(10)	83
H(6A)	3853(4)	1168(2)	2277(30)	79
H(6B)	3791(5)	1815(8)	3777(11)	79
H(6C)	3507(1)	1757(9)	1578(22)	79
H(2)	892(14)	2500	7047(55)	44(11)
H(7A)	-397(1)	1575(2)	4361(6)	75
H(7B)	-172(1)	972(2)	5693(6)	75
H(8A)	-214(2)	1475(4)	8589(11)	53
H(8B)	-668(2)	1737(4)	7377(11)	53
H(8C)	-596(2)	2318(3)	5247(10)	47
H(8D)	-701(2)	1894(3)	7380(10)	47
H(9A)	-427(4)	2417(20)	10585(14)	71
H(9B)	102(11)	2658(14)	10587(14)	71
H(9C)	-21(14)	1888(7)	10119(7)	71
H(10A)	1120(6)	853(3)	6929(21)	75
H(10B)	1128(6)	215(7)	5365(4)	75
H(10C)	689(1)	349(9)	6872(22)	75
H(11A)	1369(3)	1174(2)	1929(27)	67
H(11B)	1273(5)	1852(7)	3238(12)	67
H(11C)	1005(2)	1712(8)	1030(17)	67
H(12A)	562(2)	136(6)	1511(27)	76
H(12B)	220(6)	729(2)	795(18)	76
H(12C)	93(5)	267(8)	2814(11)	76

Table 1. Crystal data and structure refinement for 15.

Identification code	15
Empirical formula	C22 H52 Al2 Cl4 N6
Formula weight	596.46
Temperature	190(2) K
Wavelength	0.71069 A
Crystal system	monoclinic
Space group	P2(1)/c
Unit cell dimensions	a = 11.0100(8) A alpha = 90 deg. b = 13.860(2) A beta = 114.200(10) c = 11.4500(8) A gamma = 90 deg.
Volume	1593.7(3) A^3
Z	2
Density (calculated)	1.243 Mg/m^3
Absorption coefficient	0.448 mm^-1
F(000)	640
Crystal size	0.30 x 0.04 x 0.04 mm
Theta range for data collection	2.50 to 24.00 deg.
Index ranges	-13<=h<=13, -12<=k<=17, -11<=l<=14
Reflections collected	6024
Independent reflections	2327 [R(int) = 0.1245]
Refinement method	Full-matrix least-squares on F^2
Data / restraints / parameters	2316 / 0 / 164
Goodness-of-fit on F^2	0.924
Final R indices [I>2sigma(I)]	R1 = 0.0457, wR2 = 0.1062
R indices (all data)	R1 = 0.0742, wR2 = 0.1167
Extinction coefficient	0.010(2)
Largest diff. peak and hole	0.412 and -0.321 e.A^-3

Table 2. Atomic coordinates (x 10^4) and equivalent isotropic displacement parameters (A^2 x 10^3) for 15. U(eq) is defined as one third of the trace of the orthogonalized Uij tensor.

	x	y	z	U(eq)
Al(1)	3238(1)	3097(1)	7637(1)	21(1)
Cl(1)	3759(1)	3491(1)	9651(1)	32(1)
Cl(2)	4195(1)	1625(1)	8133(1)	36(1)
N(1)	1553(2)	2754(2)	6563(3)	27(1)
N(2)	4470(2)	3432(2)	6766(3)	22(1)
N(3)	2515(2)	4515(2)	7020(3)	23(1)
C(1)	538(3)	3488(3)	6109(4)	35(1)
C(2)	1099(3)	4417(3)	6815(4)	33(1)
C(3)	3098(4)	5366(3)	7840(4)	35(1)
C(4)	2676(3)	4599(3)	5809(3)	26(1)
C(5)	4101(3)	4367(3)	6057(4)	27(1)
C(6)	1068(4)	1784(3)	6086(4)	36(1)
C(7)	279(4)	1753(4)	4633(4)	46(1)
C(8)	259(5)	1341(4)	6764(5)	62(1)
C(9)	5970(3)	3325(3)	7504(4)	31(1)
C(10)	6701(3)	3440(4)	6634(4)	49(1)
C(11)	6487(3)	4013(4)	8639(4)	45(1)

Table 3. Bond lengths [A] and angles [deg] for 15.

Al(1)-N(1)	1.819(3)
Al(1)-N(2)	2.040(3)
Al(1)-N(3)	2.130(3)
Al(1)-Cl(1)	2.2053(14)
Al(1)-Cl(2)	2.2583(14)
N(1)-C(1)	1.442(5)
N(1)-C(6)	1.467(5)
N(2)-C(5)	1.494(5)
N(2)-C(9)	1.523(4)
N(3)-C(4)	1.472(4)
N(3)-C(3)	1.480(5)
N(3)-C(2)	1.485(4)
C(1)-C(2)	1.510(6)
C(4)-C(5)	1.510(5)
C(6)-C(7)	1.530(6)
C(6)-C(8)	1.530(6)
C(9)-C(11)	1.522(6)
C(9)-C(10)	1.523(5)
N(1)-Al(1)-N(2)	115.28(14)
N(1)-Al(1)-N(3)	82.96(13)
N(2)-Al(1)-N(3)	81.97(12)
N(1)-Al(1)-Cl(1)	121.85(11)
N(2)-Al(1)-Cl(1)	121.01(10)
N(3)-Al(1)-Cl(1)	91.12(9)
N(1)-Al(1)-Cl(2)	100.11(12)
N(2)-Al(1)-Cl(2)	89.64(10)
N(3)-Al(1)-Cl(2)	171.58(9)
Cl(1)-Al(1)-Cl(2)	93.84(5)
C(1)-N(1)-C(6)	113.7(3)
C(1)-N(1)-Al(1)	119.0(3)
C(6)-N(1)-Al(1)	127.3(2)
C(5)-N(2)-C(9)	112.2(3)
C(5)-N(2)-Al(1)	112.1(2)
C(9)-N(2)-Al(1)	119.6(2)
C(4)-N(3)-C(3)	110.2(3)
C(4)-N(3)-C(2)	112.5(3)
C(3)-N(3)-C(2)	109.1(3)
C(4)-N(3)-Al(1)	102.3(2)
C(3)-N(3)-Al(1)	121.3(2)
C(2)-N(3)-Al(1)	101.2(2)
N(1)-C(1)-C(2)	108.8(3)
N(3)-C(2)-C(1)	109.6(3)
N(3)-C(4)-C(5)	108.8(3)
N(2)-C(5)-C(4)	108.5(3)
N(1)-C(6)-C(7)	112.8(4)
N(1)-C(6)-C(8)	112.2(4)
C(7)-C(6)-C(8)	110.6(3)
C(11)-C(9)-N(2)	110.7(3)
C(11)-C(9)-C(10)	112.3(3)
N(2)-C(9)-C(10)	111.7(3)

Symmetry transformations used to generate equivalent atoms:

Table 4. Anisotropic displacement parameters (A^2 x 10^3) for 15. The anisotropic displacement factor exponent takes the form: -2 pi^2 [h^2 a*^2 U11 + ... + 2 h k a* b* U12]

	U11	U22	U33	U23	U13	U12
Al(1)	26(1)	15(1)	19(1)	2(1)	6(1)	1(1)
Cl(1)	46(1)	28(1)	19(1)	1(1)	10(1)	2(1)
Cl(2)	50(1)	20(1)	33(1)	8(1)	12(1)	11(1)
N(1)	30(1)	20(2)	26(2)	2(2)	5(1)	-3(1)
N(2)	24(1)	17(2)	19(2)	-4(2)	3(1)	-1(1)
N(3)	31(1)	16(2)	22(2)	-1(1)	10(1)	0(1)
C(1)	26(2)	32(3)	40(2)	3(2)	6(2)	-1(2)
C(2)	28(2)	28(2)	43(2)	5(2)	15(2)	8(2)
C(3)	50(2)	19(2)	35(2)	-5(2)	17(2)	1(2)
C(4)	35(2)	20(2)	21(2)	3(2)	9(1)	2(2)
C(5)	35(2)	20(2)	26(2)	3(2)	13(2)	-2(2)
C(6)	42(2)	26(2)	39(2)	-9(2)	15(2)	-13(2)
C(7)	45(2)	50(3)	39(3)	-19(2)	14(2)	-17(2)
C(8)	91(3)	45(3)	54(3)	-7(3)	35(3)	-33(3)
C(9)	22(2)	35(3)	33(2)	1(2)	6(1)	4(2)
C(10)	30(2)	76(4)	38(2)	-3(3)	12(2)	4(2)
C(11)	31(2)	65(4)	31(2)	-14(2)	3(2)	-8(2)

Table 5. Hydrogen coordinates (x 10^4) and isotropic displacement parameters (A^2 x 10^3) for 15.

	x	y	z	U(eq)
H(2)	4247(32)	3013(31)	6241(38)	24(11)
H(1A)	-247(3)	3287(3)	6263(4)	42
H(1B)	251(3)	3585(3)	5177(4)	42
H(2A)	581(3)	4971(3)	6311(4)	40
H(2B)	1031(3)	4414(3)	7651(4)	40
H(3A)	2982(22)	5303(8)	8640(10)	52
H(3B)	2649(17)	5952(3)	7390(9)	52
H(3C)	4050(6)	5406(11)	8031(20)	52
H(4A)	2454(3)	5262(3)	5467(3)	31
H(4B)	2066(3)	4145(3)	5169(3)	31
H(5A)	4195(3)	4316(3)	5236(4)	32
H(5B)	4697(3)	4887(3)	6571(4)	32
H(6)	1870(4)	1367(3)	6290(4)	43
H(7A)	119(25)	1080(4)	4347(5)	69
H(7B)	787(14)	2077(19)	4216(4)	69
H(7C)	-576(13)	2083(19)	4403(5)	69
H(8A)	-82(30)	709(12)	6388(24)	93
H(8B)	-489(21)	1766(13)	6662(30)	93
H(8C)	829(11)	1263(24)	7677(8)	93
H(9)	6141(3)	2654(3)	7855(4)	38
H(10A)	6311(22)	3004(17)	5900(17)	73
H(10B)	7644(8)	3282(24)	7113(11)	73
H(10C)	6617(27)	4108(7)	6331(24)	73
H(11A)	5955(18)	3940(14)	9142(15)	68
H(11B)	6417(25)	4678(4)	8328(4)	68
H(11C)	7420(9)	3863(13)	9177(15)	68