c m No. 5 *c* 1 *m* 1

Generators selected (1); $t(1,0)$; $t(0,1)$; $t(\frac{1}{2},\frac{1}{2})$; (2)

General position

Multiplicity, Wyckoff letter, Site symmetry	Coordinates $(0,0)+$	$(\frac{1}{2},\frac{1}{2})+$
4 *b* 1	(1) x,y	(2) $\bar{x},y$

I Maximal *translationengleiche* subgroups

[2] *c*1 (1, *p*1)	1+	$1/2(\mathbf{a}-\mathbf{b}), 1/2(\mathbf{a}+\mathbf{b})$

II Maximal *klassengleiche* subgroups

- **Loss of centring translations**

[2] *pg* (4)	1; $2+(\frac{1}{2},\frac{1}{2})$		$1/4,0$
[2] *pm* (3)	1; 2		

- **Enlarged unit cell**

[3] $\mathbf{a}' = 3\mathbf{a}$

cm (5)	$\langle 2 \rangle$	$3\mathbf{a}, \mathbf{b}$	
cm (5)	$\langle 2+(2,0) \rangle$	$3\mathbf{a}, \mathbf{b}$	$1,0$
cm (5)	$\langle 2+(4,0) \rangle$	$3\mathbf{a}, \mathbf{b}$	$2,0$

[3] $\mathbf{b}' = 3\mathbf{b}$

cm (5)	$\langle 2 \rangle$	$\mathbf{a}, 3\mathbf{b}$	

- **Series of maximal isomorphic subgroups**

[*p*] $\mathbf{a}' = p\mathbf{a}$

cm (5)	$\langle 2+(2u,0) \rangle$ $p > 2$; $0 \le u < p$ *p* conjugate subgroups for the prime *p*	$p\mathbf{a}, \mathbf{b}$	$u,0$

[*p*] $\mathbf{b}' = p\mathbf{b}$

cm (5)	$\langle 2 \rangle$ $p > 2$ no conjugate subgroups	$\mathbf{a}, p\mathbf{b}$	

I Minimal *translationengleiche* supergroups

[2] *c*2*mm* (9); [3] *p*3*m*1 (14); [3] *p*31*m* (15)

II Minimal non-isomorphic *klassengleiche* supergroups

- **Additional centring translations** none
- **Decreased unit cell**

[2] $\mathbf{a}' = \frac{1}{2}\mathbf{a}$, $\mathbf{b}' = \frac{1}{2}\mathbf{b}$ *pm* (3)