SHORT COMMUNICATIONS

Contributions intended for publication under this heading should be expressly so marked; they should not exceed about 1000 words; they should be forwarded in the usual way to the appropriate Co-editor; they will be published as speedily as possible. Publication will be quicker if the contributions are without illustrations.

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The crystal structure of 2,4,7-trinitro-9-fluorenone. A correction.
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In Table 3 of *Acta Cryst.* (1972). **B28**, 3122–3127 the following corrections should be noted: for C(4a), $U_{23} = -3$; for C(4b), $X = 1034$; for N(1), $U_{22} = 36$.

Three errors have been discovered in the parameters listed in Table 3 in our paper on the structure of 2,4,7-trinitro-9-fluorenone (Dorset, Hybl & Ammon, 1972). The corrections are: for C(4a), $U_{23} = -3$; for C(4b), $X = 1034$; for N(1), $U_{22} = 36$. I am grateful to Dr N. Yasuoka of Osaka University for bringing the C(4b) error to my attention.

References

DORSET, D. L., HYBL, A. & AMMON, H. L. (1972). *Acta Cryst.* B**28**, 3122–3127.

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A monoclinic form of $K_{0.27}WO_3$.
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Crystals of $K_{0.27}WO_3$ grown at high temperature are found to exhibit long-range ordering, unlike the well known low-temperature form. Comparative use of X-ray and electron diffraction has indicated the nature of the ordering.

A hexagonal structure of the composition K_xWO_3 where $x = 0·27$ belonging to the group of tungsten bronzes was described by Magnéli & Blomberg (1951) and later by Magnéli (1953). These bronzes are usually electronic conductors of a dark bluish colour. In this note, data are presented for monoclinic crystals of the same composition which are formed by vapour-phase reaction above 1300°C. They have a clear yellow colour and are similar in appearance to WO_3 crystals. They are therefore assumed to be semi-conducting like WO_3 rather than electronically conducting like the Magnéli bronzes.

The crystals present two distinct morphologies of needles and plates. The needles are too small for detailed observation by optical microscopy, but optical goniometry indicates a sixfold needle axis. However, scanning electron micrographs show how the needles are formed by multiple twinning of platelets (see Fig. 1) and diffraction studies show in fact that both morphologies are structurally identical. Evidence for a high electrical conductivity comes from the lack of charging up experienced in the scanning electron microscope and probe analyser.

The needle crystals were most suitable for mounting on an X-ray goniometer. An oscillation photograph about the needle axis gave a repeat of 3·83 Å, suggesting a single-layer structure of corner-sharing octahedra. Zero and first layer Weissenberg photographs about this axis gave sub-lattice intensities consistent with the hexagonal packing of tungsten octahedra described by Magnéli (see Table 1).

Table 1. *A summary of unit-cell data*

Symbols in parentheses indicate the multiplicity of the super-cells.

Type of cell	System	Parameters
WO_3 subcell	Hexagonal	$a = 7·3$, $c = 3·8$ Å
X-ray supercell	Monoclinic	$a = 29·24 \pm 0·04$ (4a), $b = 7·36 \pm 0·01$ (b), $c = 7·7 \pm 1$ Å (2c), $\gamma = 60 \pm 2°$
Electron supercell	Monoclinic	$a = 29·2$ (4a), $b = 14·6$ (2b), $c = 7·6$ (2c), $\frac{3}{4} = 60°$