

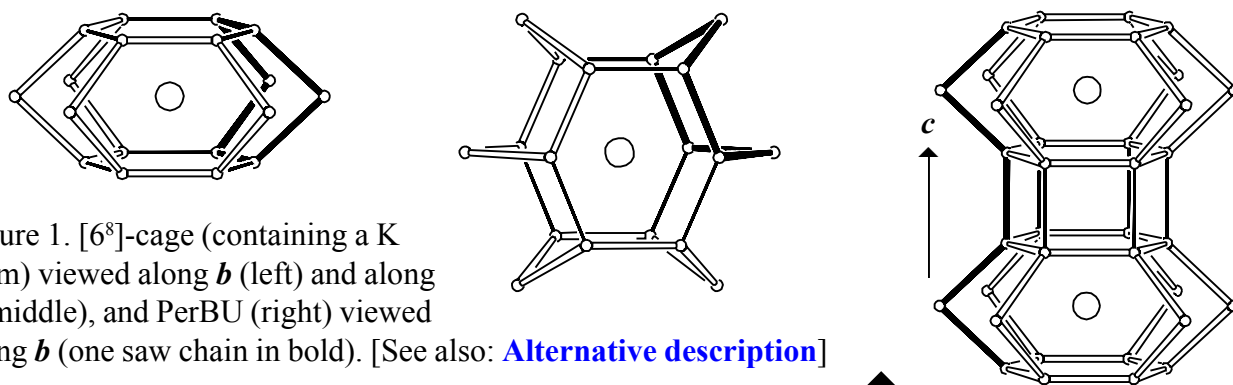
Building scheme for SZR



1. Periodic Building Unit – 2. Connection mode – 3. Projections of the unit cell content
4. Channels and/or cages – 5. Supplementary information

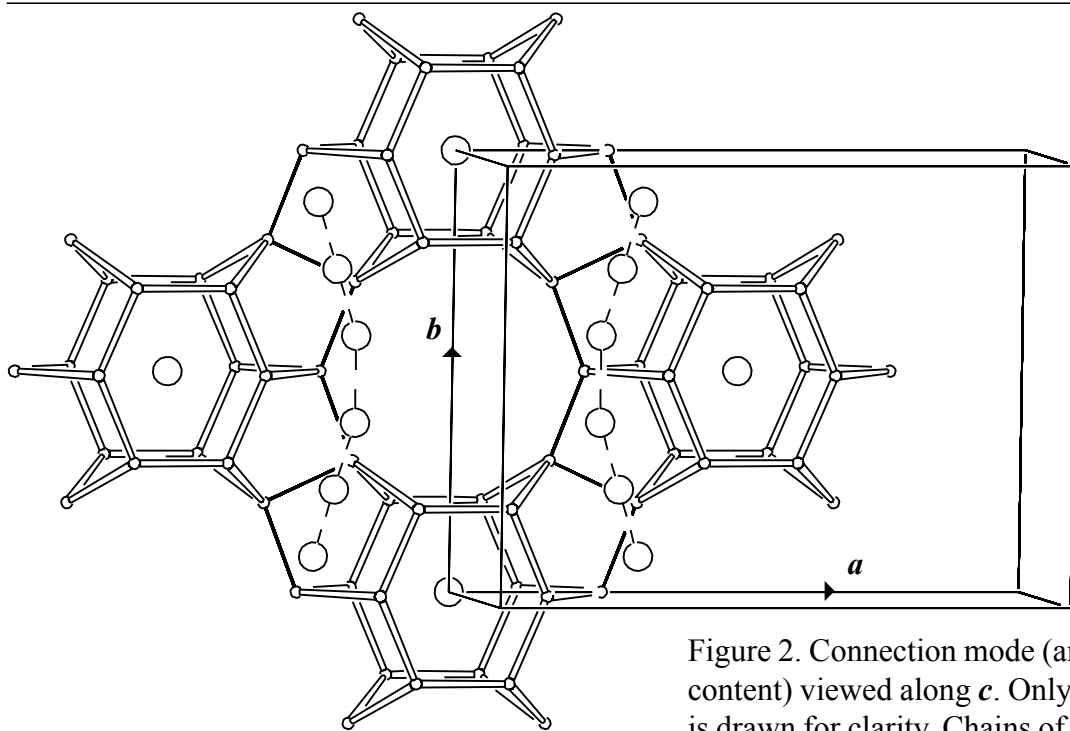
1. Periodic Building Unit:

SZR can be built using the $[6^8]$ -cage (Figure 1) built from three 6-ring boats (one in bold). The one-dimensional Periodic Building Unit (PerBU) is obtained when $[6^8]$ -cages, related by pure translations along c , are connected along c through double 6-rings as shown in Figure 1. Saw chains (one in bold) parallel to c are formed. The repeat distance along the saw chain is about 7.5 Å and the repeat unit consists of 3 T atoms. The $[6^8]$ -cage is also observed in **MSO**.



2. Connection mode:

Neighboring PerBUs, related by a shift of $\frac{1}{2}(a + b)$, are connected through 5-rings (Figure 2).



3. Projections of the unit cell content:

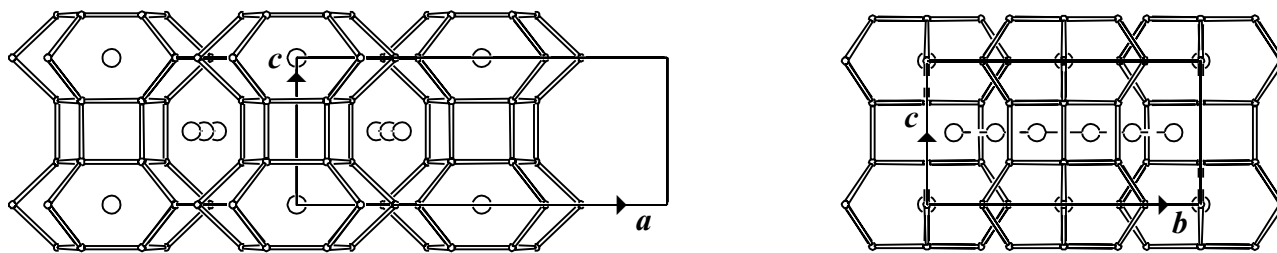


Figure 3. Parallel projections of the unit cell content along b (left) and a (right). ▲

4. Channels and/or cages:

One-dimensional 10-ring channels are parallel to c . Transport of matter between the 10-ring channels is impossible because the 8-ring windows are blocked by unremovable Potassium-chains in 8-ring channels parallel to b . The channels are shown in Figure 4. The **pore descriptors** are added.

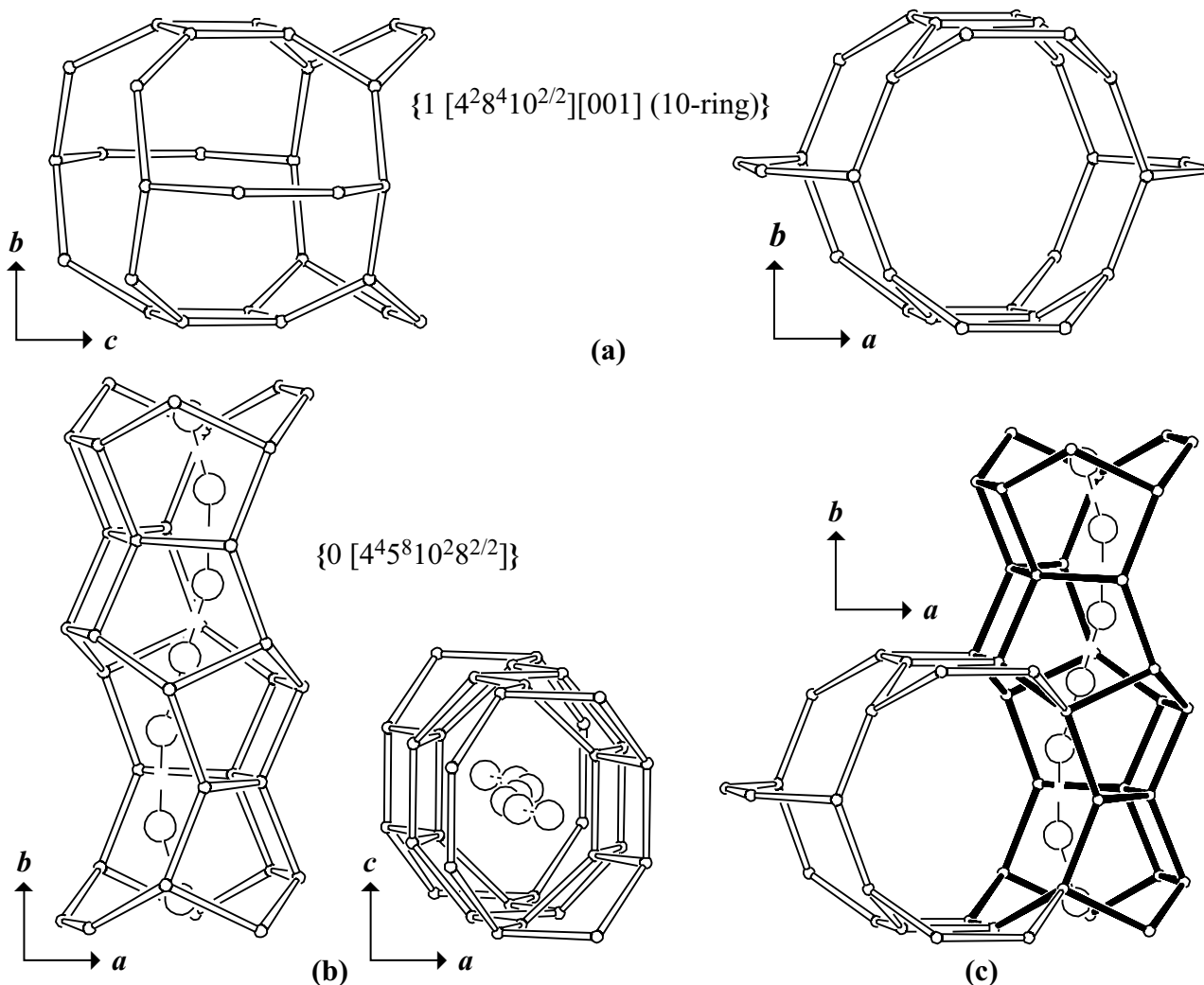


Figure 4. (a): 10-Ring channel viewed along a (left) and along c (right); (b): 8-Ring channel viewed along c (left) and along b (right); (c): Fusion of channels viewed along c . ▲

5. Supplementary information:

Other framework types containing (modified) cavities

Several other framework types can be built using (modified) cavities.

In the **INTRO**-pages links are given to a detailed description of a sub-set of framework types that contain (modified) cavities (choose: **Cages**). There is also a link provided to a summary of the PerBUs used in the building schemes of these framework types (choose: **Appendix; Figure 11**).

Alternative description using saw chains

In several framework types at least one of the unit cell dimensions is about $n \cdot 7.5 \text{ \AA}$ (where $n = 1, 2, 3 \dots$ etc.). In many cases this indicates the presence of saw chains.

In the **INTRO** pages links are given to descriptions of other framework types containing (twisted) saw chains (choose: **Saw chains**). There is also a link provided to a summary of the Periodic Building Units used in the building schemes of these framework types (choose: **Appendix; Figure 2**).

