

## **Description of Additional Supplementary Files:**

**Supplementary Dataset 1:** Sequence homology search for Pcc1 and Pcc2 orthologs. The table contains raw data and the summary of the raw data from the Jackhmmr search.

**Source data:** Enzymatic activity and tRNA binding of archaeal KEOPS complexes. The file contains raw data obtained for measurements of t6 A formation and tRNA binding using purified KEOPS complexes.