

# Manfred Wildner

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/7744966/publications.pdf>

Version: 2024-02-01

50  
papers

778  
citations

471509

17  
h-index

610901

24  
g-index

54  
all docs

54  
docs citations

54  
times ranked

792  
citing authors

| #  | ARTICLE   | IF  | CITATIONS |
|----|---|-----|-----------|
| 1  | Iron redox reactions in the tourmaline structure: High-temperature treatment of Fe <sup>3+</sup> -rich schorl. <i>Geochimica Et Cosmochimica Acta</i> , 2012, 86, 239-256.  | 3.9 | 59        |
| 2  | The crystal chemistry of birefringent natural uvarovites: Part II. Single-crystal X-ray structures. <i>American Mineralogist</i> , 2001, 86, 1231-1251.   | 1.9 | 49        |
| 3  | The crystal chemistry of birefringent natural uvarovites. Part IV. OH defect incorporation mechanisms in non-cubic garnets derived from polarized IR spectroscopy. <i>European Journal of Mineralogy</i> , 2002, 14, 1019-1026.   | 1.3 | 35        |
| 4  | The crystal chemistry of birefringent natural uvarovites: Part I. Optical investigations and UV-VIS-IR absorption spectroscopy. <i>American Mineralogist</i> , 2001, 86, 1219-1230.   | 1.9 | 34        |
| 5  | Structure and crystal chemistry of vivianite-type compounds: Crystal structures of erythrite and annabergite with a Mössbauer study of erythrite. <i>European Journal of Mineralogy</i> , 1996, 8, 187-192.   | 1.3 | 32        |
| 6  | Radio-colouration of diamond: a spectroscopic study. <i>Contributions To Mineralogy and Petrology</i> , 2013, 165, 843-861.   | 3.1 | 31        |
| 7  | Jahn-Teller distortion of Mn <sup>3+</sup> -occupied octahedra in red beryl from Utah indicated by optical spectroscopy. <i>Journal of Molecular Structure</i> , 2018, 1152, 79-86.   | 3.6 | 30        |
| 8  | Crystal structures of Co <sub>3</sub> (SeO <sub>3</sub> ) <sub>3</sub> ·½H <sub>2</sub> O and Ni <sub>3</sub> (SeO <sub>3</sub> ) <sub>3</sub> ·½H <sub>2</sub> O, two new isotypic compounds. <i>Monatshefte für Chemie</i> , 1991, 122, 585-594.  | 1.8 | 28        |
| 9  | Optical absorption spectroscopy in geosciences. , 0, , 145-188.   |     | 28        |
| 10 | The crystal chemistry of birefringent natural uvarovites. Part III. Application of the superposition model of crystal fields with a characterization of synthetic cubic uvarovite. <i>Physics and Chemistry of Minerals</i> , 2002, 29, 595-608.  | 0.8 | 22        |
| 11 | Optical absorption spectroscopy in geosciences. , 0, , 93-143.  |     | 22        |
| 12 | Synthesis and crystal structure of monoclinic Fe <sub>2</sub> (SeO <sub>4</sub> ) <sub>3</sub> . <i>Monatshefte für Chemie</i> , 1991, 122, 617-623.  | 1.8 | 21        |
| 13 | Vibrational behavior of the Si—O stretches in compounds with kirkite-type chains Na <sub>2</sub> Me(SeO <sub>4</sub> ) <sub>2</sub> ·2H <sub>2</sub> O with matrix-isolated SO <sub>4</sub> <sup>2-</sup> and Me <sup>2+</sup> guest ions (Me = Mn, Co, Ni, Cu, Zn, Cd). <i>Vibrational Spectroscopy</i> , 2003, 31, 115-123. | 2.2 | 21        |
| 14 | Crystal chemistry of the new mineral brandholzite, Mg(H <sub>2</sub> O) <sub>6</sub> [Sb(OH) <sub>6</sub> ] <sub>2</sub> , and of the synthetic analogues M <sup>2+</sup> (H <sub>2</sub> O) <sub>6</sub> [Sb(OH) <sub>6</sub> ] <sub>2</sub> (M <sup>2+</sup> = Tj, Et, Q, O, O, f, g, BT, Over)                             | 1.9 | 20        |
| 15 | Blue Zircon from Ratanakiri, Cambodia. <i>Journal of Gemmology</i> , 2018, 36, 112-132.   | 0.2 | 20        |
| 16 | Crystal structures of the new pseudo-isotypic compounds NaFe(SeO <sub>3</sub> ) <sub>2</sub> and BaCo(SeO <sub>3</sub> ) <sub>2</sub> . <i>Journal of Alloys and Compounds</i> , 1996, 239, 99-102.   | 5.5 | 18        |
| 17 | High-Pressure Behavior of Nickel Sulfate Monohydrate: Isothermal Compressibility, Structural Polymorphism, and Transition Pathway. <i>Inorganic Chemistry</i> , 2020, 59, 6255-6266.  | 4.0 | 18        |
| 18 | Syntheses and crystal structures of Pb(SeO <sub>3</sub> ) <sub>2</sub> and two modifications of Sn(SeO <sub>3</sub> ) <sub>2</sub> . <i>Journal of Alloys and Compounds</i> , 2006, 419, 45-49.   | 5.5 | 17        |

| #  | ARTICLE  | IF  | CITATIONS |
|----|--|-----|-----------|
| 19 | Crystal structures of SrSeO <sub>3</sub> and CaSeO <sub>3</sub> and their respective relationships with molybdomenite- and monazite-type compounds an example for stereochemical equivalence of ESeO <sub>3</sub> groups (E = lone) Tj ETQq1 1 0.784314 rgBT /Overlo   | 0.3 | 17        |
| 20 | Spectroscopic characterisation and crystal field calculations of varicoloured kyanites from Loliondo, Tanzania. Mineralogy and Petrology, 2013, 107, 289-310.  | 1.1 | 17        |
| 21 | Investigation of the kieserite-“szomolnokite solid-solution series, (Mg,Fe)SO <sub>4</sub> ·H <sub>2</sub> O, with relevance to Mars: Crystal chemistry, FTIR, and Raman spectroscopy under ambient and martian temperature conditions. American Mineralogist, 2019, 104, 1732-1749.   | 1.9 | 17        |
| 22 | Infrared study of $\hat{1}/2$ OD modes in isotopically dilute (HDO molecules) Na <sub>2</sub> Me(XO <sub>4</sub> ) <sub>2</sub> ·2H <sub>2</sub> O with matrix-isolated X <sup>2+</sup> O <sub>4</sub> <sup>2-</sup> guest ions (Me=Mn, Co, Ni, Cu, Zn, Cd, and X=S, Se). Journal of Molecular Structure, 2002, 643, 37-41.                    | 3.6 | 15        |
| 23 | Crystal chemistry of synthetic Co- and Ni-analogues of natrochalcite the shortest known hydrogen bonds among mineral-type compounds Part I: Single-crystal X-ray structures. European Journal of Mineralogy, 2007, 19, 805-816.  | 1.3 | 15        |
| 24 | (Na,Ca)(Ti <sup>3+</sup> ,Mg)Si <sub>2</sub> O <sub>6</sub> -clinopyroxenes at high pressure: influence of cation substitution on elastic behavior and phase transition. Physics and Chemistry of Minerals, 2010, 37, 25-43.   | 0.8 | 15        |
| 25 | Crystal structures and structural relationships of KFe <sub>2</sub> (SeO <sub>2</sub> OH)(SeO <sub>3</sub> ) <sub>3</sub> and SrCo <sub>2</sub> (SeO <sub>2</sub> OH) <sub>2</sub> (SeO <sub>3</sub> ) <sub>2</sub> . Journal of Alloys and Compounds, 1996, 240, 25-32.   | 5.5 | 13        |
| 26 | Mechanisms of OH defect incorporation in naturally occurring, hydrothermally formed diopside and jadeite. Physics and Chemistry of Minerals, 2007, 34, 543-549.  | 0.8 | 12        |
| 27 | Crystal-structure properties and the molecular nature of hydrostatically compressed realgar. Physics and Chemistry of Minerals, 2012, 39, 399-412.   | 0.8 | 12        |
| 28 | The crystal chemistry of the humite minerals: Fe <sup>2+</sup> -Ti <sup>4+</sup> charge transfer and structural allocation of Ti <sup>4+</sup> in chondrodite and clinohumite. European Journal of Mineralogy, 2002, 14, 1027-1032.  | 1.3 | 11        |
| 29 | The Crystal Structure of Ni <sub>21</sub> Sn <sub>2</sub> P <sub>6</sub> . Zeitschrift Fur Anorganische Und Allgemeine Chemie, 2009, 635, 301-306.   | 1.2 | 11        |
| 30 | Crystal chemistry of the kieserite-“cobaltkieserite solid solution, Mg <sub>1-x</sub> Cox(SO <sub>4</sub> )·H <sub>2</sub> O: well-behaved oddities. European Journal of Mineralogy, 2016, 28, 43-52.  | 1.3 | 11        |
| 31 | Polymorphism of Mg-monohydrate sulfate kieserite under pressure and its occurrence on giant icy jovian satellites. Icarus, 2020, 336, 113459.  | 2.5 | 11        |
| 32 | Crystal chemistry of synthetic Co- and Ni-analogues of natrochalcite the shortest known hydrogen bonds among mineral-type compounds. Part II: Spectroscopic studies. European Journal of Mineralogy, 2009, 21, 65-78.  | 1.3 | 8         |
| 33 | Preparation and crystal structure investigation of Sr <sub>2</sub> Co(SeO <sub>3</sub> ) <sub>3</sub> . Journal of Alloys and Compounds, 1995, 217, 209-212.   | 5.5 | 7         |
| 34 | Polarized electronic absorption spectra of colourless chalcocyanite, CuSO <sub>4</sub> , with a survey on crystal fields in Cu <sup>2+</sup> minerals. Physics and Chemistry of Minerals, 2014, 41, 669-680.   | 0.8 | 7         |
| 35 | Sailaufite, (Ca, Na) <sub>2</sub> Mn <sub>3</sub> O <sub>2</sub> (AsO <sub>4</sub> )(CO <sub>3</sub> ) <sub>3</sub> H <sub>2</sub> O, a new mineral from Hartkoppe hill, Ober-Sailauf (Spessart mountains, Germany), and its relationship to mitridatite-group minerals and pararobertsite. European Journal of Mineralogy, 2003, 15, 555-564. | 1.3 | 6         |
| 36 | Crystal structures of the new isotopic compounds Rb <sub>4</sub> (M <sup>2+</sup> )(Fe <sup>3+</sup> ) <sub>8</sub> [SeO <sub>3</sub> ] <sub>14</sub> [SeO <sub>2</sub> (OH)] <sub>2</sub> ·2H <sub>2</sub> O (M =) Tj ETQq0 0 0 rgBT /Overlo  | 0.8 | 6         |

| #  | ARTICLE  | IF  | CITATIONS |
|----|--|-----|-----------|
| 37 | Investigation of anhydrous metal(II) nitrates. I. Syntheses and crystal structures of $Mg(NO_3)_2$ , $Co(NO_3)_2$ and $Ni(NO_3)_2$ , with a stereochemical discussion. <i>Zeitschrift Fur Kristallographie - Crystalline Materials</i> , 2008, 223, 408-417.                             | 0.8 | 6         |
| 38 | Crystal Chemistry, Optical Spectroscopy and Crystal Field Calculations of $Co_3TeO_6$ and Solid Solutions $Co_{3-x}Zn_xTeO_6$ . <i>European Journal of Inorganic Chemistry</i> , 2018, 2018, 4221-4233.  | 2.0 | 6         |
| 39 | Contributions to the stereochemistry of zirconium oxysalts” part I: syntheses and crystal structures of novel $Zr(SeO_4)_2 \cdot H_2O$ and $Zr(SeO_4)_2 \cdot 4H_2O$ . <i>Monatshefte für Chemie</i> , 2018, 149, 1321-1325.   | 1.8 | 6         |
| 40 | Contributions to the stereochemistry of zirconium oxysalts” part II: syntheses and crystal structures of $Zr(SeO_3)(SeO_4)$ , $Zr_4(SeO_3)(SeO_4)_7$ , and $Zr_3(SeO_3)(SeO_4)_5 \cdot 2H_2O$ . <i>Monatshefte für Chemie</i> , 2019, 150, 593-603.                                      | 1.8 | 6         |
| 41 | Crystallography relevant to Mars and Galilean icy moons: crystal behavior of kieserite-type monohydrate sulfates at extraterrestrial conditions down to 15 K. <i>IUCr</i> , 2022, 9, 194-203.  | 2.2 | 6         |
| 42 | Photoluminescence of synthetic titanite-group pigments: A rare quenching effect. <i>Chemie Der Erde</i> , 2014, 74, 419-424.   | 2.0 | 5         |
| 43 | Neoproterozoic amorphous “ekkanite” ( $Ca_2Th_0.9U_0.1Si_8O_{20}$ ) from Okkampitiya, Sri Lanka: A metamict gemstone with excellent lead-retention performance. <i>Geology</i> , 2017, 45, 919-922.  | 4.4 | 5         |
| 44 | Structural and spectroscopic study of the kieserite-dwornikite solid-solution series, $(Mg,Ni)SO_4 \cdot H_2O$ , at ambient and low temperatures, with cosmochemical implications for icy moons and Mars. <i>American Mineralogist</i> , 2020, 105, 1472-1489.                           | 1.9 | 5         |
| 45 | $CoSO_4 \cdot H_2O$ and its continuous transition compared to the compression properties of isostructural kieserite-type polymorphs. <i>Zeitschrift Fur Kristallographie - Crystalline Materials</i> , 2021, 236, 225-237.   | 0.8 | 4         |
| 46 | Synthesis, structure and properties of blairite-type solid solutions, $Na_2Co_{1-x}Cu_x(SO_4)_2 \cdot 4H_2O$ ( $0 \leq x \leq 0.18$ ), and crystal structure of synthetic kirkite, $Na_2Cu(SO_4)_2 \cdot 2H_2O$ . <i>Physics and Chemistry of Minerals</i> , 2018, 45, 801-817.          | 1.8 | 4         |
| 47 | Contributions to the stereochemistry of zirconium oxysalts” part III: syntheses and crystal structures of $M_2+Zr(SO_4)_3$ with $M = Mg, Mn, Co, Ni, Zn$ and $Cd$ , and a note on $(Fe^{3+,2+},Zr)_2(SO_4)_3$ and $Fe_2(SO_4)_3$ . <i>Monatshefte für Chemie</i> , 2019, 150, 1877-1892. | 1.8 | 3         |
| 48 | Contributions to the stereochemistry of zirconium oxysalts” part IV: syntheses and crystal structures of $Zr_2(OH)_2(XO_4)_3 \cdot 4H_2O$ ( $X = S, Se$ ), $Zr(SO_4)_2 \cdot 4H_2O$ , and $Zr(SeO_3)_2$ . <i>Monatshefte für Chemie</i> , 2022, 153, 139-151.                            | 1.8 | 3         |
| 49 | Investigation of low-hydrated metal(II) nitrates. Syntheses and crystal structures of $Zn(NO_3)_2 \cdot H_2O$ and $M(II)(NO_3)_2 \cdot 2H_2O$ ( $M = Mg, Mn, Co, Ni$ ). <i>Zeitschrift für Kristallographie</i> , 2012, 227, 129-140.  | 1.1 | 2         |
| 50 | Syntheses and crystal structures of novel $Zr(SeO_3)(SeO_4)$ and $Zr(SeO_4)_2 \cdot H_2O$ . <i>Acta Crystallographica Section A: Foundations and Advances</i> , 2015, 71, s356-s356.   | 0.1 | 1         |