Ram Seshadri: Publications and Patents

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In press, or submitted:

K. Wyckoff, J. Bienz, M. Saber, A. Zohar, A. K. Cheetham, and R. Seshadri, Relating structural features to electrode performance in Wadsley-Roth anodes.

A. Reach, M. Wright, A. Mulligan, Z. Fang, K.-T. Tseng, C. Wang, J. Hu, M. Chi, A. K. Cheetham, R. Seshadri, and J. Sakamoto, Enhanced sodium dynamics in biphasic NaSICON solid electrolytes, *Chem. Mater.*

H. Tian, T. Li, A. Mulligan, J. Tregidga, M. Wright, A. Zohar, A. Chezhiyan, M. Preefer, K. Stone, J. Hu, G. Wu, A. Manjón-Sanz, S. Lapidus, J. Harter, A. K. Cheetham, and R. Seshadri, Structural propensities in Cs_2MBiX_6 (M = Na, Ag; X = Cl, Br) bismuth halide double perovskites. *Chem. Mater.*

K. Brockmeyer, A. Bologna, M. Wright, J. Wong, C. Rodriguez, T. Li, R. A. Segalman, and R. Seshadri, Direct microwave pyrolysis of cellulose to hard carbon anodes for sodium-ion batteries, *Chem. Mater.* [**DOI: 10.1021/acs.chemmater.5c02824**]

A. Watkins, A. K. Cheetham, and R. Seshadri, Metallic oxides and the overlooked role of bandwidth, *Chem. Mater.* [**DOI: 10.1021/acs.chemmater.5c02578**]

Appeared:

450. A. Zambotti, K. Thurber, A. Sebastian, K. Liang, R. Chen, J. Li, A. Zohar, Arava; G. Nkala, Y. Li, A. Van der Ven, R. Seshadri, J. Nelson Weker, B. Melot, S. Tolbert, and B. Dunn, Morphological impact on sodium-ion storage in TiO_2 (B) nanostructures, *Chem. Mater.* **38** (2026) 252–265. [**DOI: 10.1021/acs.chemmater.5c02317**]

449. A. Balvanz, A. Pournara, R. P. Reynolds, P. E. Meza, C. D. Malliakas, J. D. Fletcher, R. Seshadri, V. P. Dravid, and M. G. Kanatzidis, Tuning optical properties and local lone-pair off-centering in "hollow" $FA_{1-x}en_xPb_{1-y}Sn_yBr_3$ perovskites, *Chem. Sci.* **17** (2026) 526–543. [**DOI: 10.1039/D5SC01841B**]

448. A. Bologna, D. Liu, S. Antall, B. Schmidt, R. Zhang, F. Seeler, K. Schierle-Arndt, and R. Seshadri, Impact of Al and Cu current collectors on Li-ion battery recycling, *ACS Sustainable Resour. Manage.* **3** (2026) 223–232. [**DOI: 10.1021/acssusresmgt.5c00528**]

447. S. J. Gomez Alvarado, J. R. Chamorro, D. Rout, J. Hielscher, S. Schwarz, C. Benyacko, M. B. Stone, V. O. Garlea, A. R. Jackson, G. Pokharel, R. Gomez, B. R. Ortiz, S. Sarker, L. Kautzsch, L. C. Gallington, R. Seshadri, and S. D. Wilson, Interleaved bond frustration in the triangular lattice antiferromagnet $LnCd_3P_3$, *Nature Mater.* **25** (2026) 65–72. [**DOI: 10.1038/s41563-025-02380-x**]

446. M. A. Wright, A. S. Mulligan, D. Rout, J. Hu, J. Liu, R. L. Behrens, J. R. Chamorro, S. D. Wilson, A. K. Cheetham, and R. Seshadri, Strong, yet split hydrogen bonding with ice rules in delafossite $(H/D)RhO_2$, *Angew. Chem. Int. Ed.* **64** (2025) e15471. [**DOI: 10.1002/anie.202515471**]

445. M. A. Wright and R. Seshadri, Linking battery electrode science with correlated and quantum materials, *Phys. Rev. Mater.* **9** (2025) 110302. [**DOI:10.1103/zwkw-zc5n**]

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442. O. Kuklinski, A. Brumberg, L. Tang, A. S. Mulligan, T. Kodalle, C. M. Sutter-Fella, R. Seshadri, and M. L. Chabinyc, Two-step spin-coating of vacancy-ordered double perovskites enables growth of thin films for electronic devices, *J. Mater. Chem. C.* **13** (2025) 11402–11412. [**DOI: 10.1039/D5TC00502G**]

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