

Adapting mechanochemical C–N bond forming reactions for greener synthesis of pharmaceuticals

Nikonovich, Tatsiana; Nallaparaju, Jagadeesh Varma; Mishra, Kamini Atindrakumar; Jarg, Tatsiana; Kudrjašova, Marina; Kananovich, Dzmitry; Aav, Riina GSFMT Scientific Conference 2023 : Tartu, 23-24 May, 2023 : abstracts 2023 / art. O21 : ill <https://fmdk.ut.ee/programm-2023/> <https://fmdk.ut.ee/wp-content/uploads/2023/05/Nikonovich.pdf>

Greener pharmaceutical synthesis via mechanochemical C–N bond formation

Nikonovich, Tatsiana; Nallaparaju, Jagadeesh Varma; Jarg, Tatsiana; Kudrjašov, Artjom 13th Paul Walden Symposium : Program and abstracts 2023 / p. 52 https://walden.osi.lv/wp-content/uploads/2023/09/Abstract_book_Walden_2023.pdf

How reliable is internal standard method in monitoring mechanochemical synthesis? A case study of triphenylmethane in HPLC-UV-MS analysis of hemicucurbit[n]urils

Jarg, Tatsiana; Tamm, Jevgenija; Suut-Tuule, Elina; Lootus, Ketren-Marlein; Kananovich, Dzmitry; Aav, Riina RSC Mechanochemistry 2025 / p. 507-515 <https://doi.org/10.1039/D4MR00145A>

Interplay of monosaccharide configurations on the deacetylation with Candida Antarctica Lipase-m

Hunt, Kaarel Erik; Miller, Annette; Liias, Kristin; Jarg, Tatsiana; Kriis, Kadri; Kanger, Tõnis Journal of organic chemistry 2025 / p. 663-671 <https://doi.org/10.1021/acs.joc.4c02582>

LC-MS profiling of dynamic covalent library during mono-biotinylated hemicucurbit[8]uril solid-state synthesis

Jarg, Tatsiana; Suut-Tuule, Elina; Ustrnul, Lukas; Kananovich, Dzmitry; Aav, Riina Balticum Organicum Syntheticum (BOS 2024) : Book of Abstracts 2024 / art. P44, p. 63 https://boschem.eu/bos2024/wp-content/uploads/sites/5/2024/07/BOS2024_Abstract-Book.pdf

Mechanochemical birch reduction with low reactive alkaline earth metals

Nallaparaju, Jagadeesh Varma; Satsi, Riin; Merzhyievskiy, Danylo; Jarg, Tatsiana; Aav, Riina; Kananovich, Dzmitry Angewandte Chemie international edition 2024 / art. e202319449 <https://doi.org/10.1002/anie.202319449>

Mechanochemical synthesis of 5[aminol4]cyanoxazoles

Merzhyievskiy, Danylo; Shablykin, Oleh V.; Jarg, Tatsiana; Brovarets, Volodymyr S.; Aav, Riina; Kananovich, Dzmitry European journal of organic chemistry 2025 / art. e202500145 <https://doi.org/10.1002/ejoc.202500145>

Mechanochemically driven covalent self-assembly of a chiral mono-biotinylated hemicucurbit[8]uril

Suut-Tuule, Elina; Jarg, Tatsiana; Tikker, Priit; Lootus, Ketren-Marlein; Martõnova, Jevgenija; Reitalu, Rauno; Ustrnul, Lukas; Ward, Jas S.; Rjabovs, Vitalijs; Shubin, Kirill; Nallaparaju, Jagadeesh Varma; Vendelin, Marko; Preis, Sergei; Öeren, Mario; Rissanen, Kari; Kananovich, Dzmitry; Aav, Riina Cell reports physical science 2024 / art. 102161 <https://doi.org/10.1016/j.xcrp.2024.102161>

Mechanochemistry-amended Barbier reaction as an expedient alternative to Grignard synthesis

Varma Nallaparaju, Jagadeesh; Nikonovich, Tatsiana; Jarg, Tatsiana; Merzhyievskiy, Danylo; Aav, Riina; Kananovich, Dzmitry Angewandte Chemie international edition 2023 / art. e202305775 <https://doi.org/10.1002/anie.202305775> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Mechanosynthesis of hemicucurbiturils and their complexation : an analytical study = Hemikukurbiturillide mehhanosünteesi ja nende komplekseerimise analüüs

Jarg, Tatsiana 2024 https://www.ester.ee/record=b5702876*est <https://digikogu.taltech.ee/et/Item/dad72c56-32af-4ff4-b59d-24ee5e97b842> <https://doi.org/10.23658/taltech.57/2024>

Natural pigments (anthocyanins and chlorophyll) and antioxidants profiling of European red and green gooseberry (Ribes uva-crispa L.) extracted using green techniques (UAE-citric acid-mediated extraction)

Hussain, Shehzad; Sharma, Minaxi; Jarg, Tatsiana; Aav, Riina; Bhat, Rajeev Current research in food science 2023 / art. 100629 <https://doi.org/10.1016/j.crf.2023.100629> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Protecting-group-free mechanosynthesis of amides from hydroxycarboxylic acids : application to the synthesis of imatinib

Nikonovich, Tatsiana; Jarg, Tatsiana; Martõnova, Jevgenija; Kudrjašov, Artjom; Merzhyievskiy, Danylo; Kudrjašova, Marina; Gallou, Fabrice; Aav, Riina; Kananovich, Dzmitry RSC Mechanochemistry 2024 / p. 189–195 <https://doi.org/10.1039/D4MR00006D>

Protecting-Group-Free mechanosynthesis of amides from hydroxycarboxylic acids : application to the synthesis of Imatinib : preprint

Nikonovich, Tatsiana; Jarg, Tatsiana; Martõnova, Jevgenija; Kudrjašov, Artjom; Merzhyievskiy, Danylo; Kudrjašova, Marina; Gallou, Fabrice; Aav, Riina; Kananovich, Dzmitry ChemRxiv 2023 / 26 p. : ill <https://doi.org/10.26434/chemrxiv-2023-d4nxx>

Ring-opening coupling reaction of cyclopropanols with electrophilic alkenes enabled by decatungstate as photoredox catalyst

Krech, Anastasiya; Yakimchyk, Viktoryia; Jarg, Tatsiana; Kananovich, Dzmitry; Ošeka, Maksim Advanced synthesis &

catalysis 2024 / p. 91-100 <https://doi.org/10.1002/adsc.202300939> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Selective acetylation of unprotected thioglycosides and fully unprotected monosaccharides with *Candida antarctica* lipase-B

Hunt, Kaarel Erik; Miller, Annette; Jarg, Tatsiana; Kriis, Kadri; Kanger, Tonis ACS omega 2025 / p. 20047-20053
<https://doi.org/10.1021/acsomega.5c02467>

Synthesis of a novel monofunctionalized hemicucurbit[8]uril

Nguyen, Thi Thanh Ngan; Jarg, Tatsiana; Adamson, Jasper; Kananovich, Dzmitry; Aav, Riina Balticum Organicum Syntheticum (BOS 2024) : Book of Abstracts 2024 / p. 107 https://boschem.eu/bos2024/wp-content/uploads/sites/5/2024/07/BOS2024_Abstract-Book.pdf

Telescoped synthesis of vicinal diamines via ring-opening of electrochemically generated aziridines in flow

Laktsevich-Iskryk, Marharyta; Krech, Anastasiya; Fokin, Mihhail; Kimm, Mariliis; Jarg, Tatsiana; Noël, Timothy; Ošeka, Maksim Journal of flow chemistry 2024 / p. 139-147 <https://doi.org/10.1007/s41981-023-00296-8>