

Recent publications: Ab initio studies of reactive scattering processes

[Arslanoglu, B., Larson, Å. & Orel, A. E.](#)

[Dissociative electron attachment to NaCN.](#)

[European Physical Journal D: Atomic, Molecular and Optical Physics, 79\(9\), Article ID 106 \(2025\).](#)

[Nebrin, O., Smith, A., Lorinc, K., Hörnquist, J., Larson, Å., Mellema, G. & Giri, S. K.](#)

[Lyman- \$\alpha\$ feedback prevails at Cosmic Dawn: implications for the first galaxies, stars, and star clusters.](#)

[Monthly notices of the Royal Astronomical Society, 537\(2\), 1646-1687 \(2025\).](#)

[Arslanoglu, B., Begau, M., Orel, A. E. & Larson, Å.](#)

[Mutual Neutralization in Collisions of B⁺ and H⁻.](#)

[Few-body systems, 66\(3\), Article ID 33 \(2025\).](#)

[Gatchell, M., Paul, R., Ji, M., Rosén, S., Thomas, R. D., Cederquist, H., . . . Zettergren, H.](#)

[Mutual neutralization of C₆₀⁺ and C₆₀⁻ ions Excitation energies and state-selective rate coefficients.](#)

[Astronomy and Astrophysics, 693, Article ID A43. \(2025\).](#)

[Hörnquist, J., Orel, A. E. & Larson, Å.](#)

[Dissociative recombination and resonant ion-pair formation in electron collisions with HD⁺.](#)

[Physical Review A, 109\(5\), Article ID 052806. \(2024\).](#)

[Kálosi, Á., Grieser, M., Isberner, L. W., Kreckel, H., Larson, Å., Neufeld, D. A., . . . Novotný, O. \(2024\).](#)

[Dissociative recombination of rotationally cold ArH⁺.](#)

[Physical Review A, 110\(2\), Article ID 022816. \(2024\)](#)

[Larson, Å. & Orel, A. E.](#)

[Mutual neutralization in collisions of Li⁺ with CN⁻.](#)

[Physical Chemistry, Chemical Physics - PCCP, 26\(3\), 1977-1983 \(2024\)](#)

[Larson, Å. & Orel, A. E.](#)

[Mutual Neutralization in Collisions of Li⁺ with O⁻.](#)

[Atoms, 12\(12\), Article ID 61. \(2024\).](#)

[Hedvall, P., Hörnquist, J., Yakovlev, S. L., Elander, N. O. & Larson, Å.](#)

[Treatment of asymptotic non-adiabatic couplings with higher order reprojection method in the diabatic representation .](#)

[Journal of Chemical Physics, 161\(5\), Article ID 054303. \(2024\)](#)

[Hörnquist, J., Hedvall, P., Orel, A. E. & Larson, Å.](#)

[Associative ionization in collisions of H plus + H⁻ and H\(1s\) + H\(ns\).](#)

[Physical Review A: 108\(5\), Article ID 052811 \(2023\).](#)