

Combustion synthesis and reactive spark plasma sintering of non-equiatomic coal-based high entropy intermetallics

Kuskov, Kirill Vasilevich; Nepapushev, Andrey A.; **Aydinyan, Sofiya**; Shaysultanov, Dmitry G.; Stepanov, Nikita D.; Nazaretyan, Khachik; Kharatyan, Suren; Zakharova, Elena V.; Belov, Dmitry S.; Moskovskikh, Dmitry O. *Materials* 2023 / art. 1490 <https://doi.org/10.3390/ma16041490> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

The influence of high-energy ball milling and nanoadditives on the kinetics of heterogeneous reaction in Ni-Al system

Nazaretyan, Khachik; Kirakosyan, Hasmik; **Aydinyan, Sofiya**; Zakaryan, Marieta; Abovyan, L. S.; Kulak, M.; Khina, B. *IOP conference series : materials science and engineering* 2021 / art. 012052 <https://doi.org/10.1088/1757-899X/1140/1/012052>

The interaction pathway in the mechano-ultrasonically assisted and carbon-nanotubes augmented nickel-aluminum system

Nazaretyan, Khachik; Kirakosyan, Hasmik; **Volobujeva, Olga**; **Aydinyan, Sofiya** *Metals* 2022 / art. 436

<https://doi.org/10.3390/met12030436> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Joint reduction of NiO/WO₃ pair and NiWO₄ by Mg + C combined reducer at high heating rates

Zakaryan, Marieta; Nazaretyan, Khachik; **Aydinyan, Sofiya**; Kharatyan, Suren *Metals* 2021 / art. 1351, 13 p. : ill

<https://doi.org/10.3390/met11091351> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Kinetic highlights of the reduction of silver tungstate by Mg + C combined reducer

Zakaryan, Marieta; Nazaretyan, Khachik; **Aydinyan, Sofiya**; Kharatyan, Suren *Metals* 2022 / art. 1000

<https://doi.org/10.3390/met12061000> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

The mechanism of joint reduction of MoO₃ and CuO by combined Mg/C reducer at high heating rates

Kirakosyan, Hasmik; Nazaretyan, Khachik; **Aydinyan, Sofiya**; Kharatyan, Suren *Journal of composites science* 2021 / art. 318, 20 p.

: ill <https://doi.org/10.3390/jcs5120318> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Nanosized molybdenum carbide synthesized by solution combustion synthesis with subsequent thermal treatment

Nazaretyan, Khachik; Kirakosyan, Hasmik; **Aydinyan, Sofiya**; Kharatyan, Suren *SHS 2017 : XIV International Symposium On Self-Propagating High Temperature Synthesis, September 25-28, 2017, Tbilisi, Georgia : Book of Abstracts 2017 / p. 175-176 : ill*

http://mmi.ge/uploads/files/2017-10/1507298270_book-of-abstracts-shs-2017.pdf

A new synthesis pathway for molybdenum carbide nanopowder by solution combustion

Kirakosyan, Hasmik; Nazaretyan, Khachik; **Aydinyan, Sofiya**; Tumanyan, Manvel; Kharatyan, Suren *The International Conference*

Dedicated to the 50th Anniversary of Self-Propagating High Temperature Synthesis (SHS-50) : proceedings = Международная конференция СВС-50, приуроченная к 50-летию юбилею научного открытия Явление волновой локализации автотормозящихся твердофазных реакций... : сборник материалов 2017 / p. 35-36 : ill <http://www.ism.ac.ru/events/SHS-50/abstracts.pdf>

A novel pathway of solution combustion synthesis of silicon carbide and SiC based composite whiskers

Kirakosyan, Hasmik; Nazaretyan, Khachik; Amirkhanyan, Narine; Beglaryan, Hayk; **Aydinyan, Sofiya** *Modern materials and manufacturing* 2023 2024 / art. 040009 <https://doi.org/10.1063/5.0189204>

The preparation of high-entropy refractory alloys by aluminothermic reduction process

Kirakosyan, Hasmik; Nazaretyan, Khachik; Kharatyan, Anahit; **Aydinyan, Sofiya** *Modern materials and manufacturing* 2023 2024 /

art. 040012 <https://doi.org/10.1063/5.0189206>

Preparation of nanosize MO₂C by combining solution combustion synthesis with subsequent F

Nazaretyan, Khachik; Kirakosyan, Hasmik; **Aydinyan, Sofiya**; Kharatyan, Suren *JTACC+V4 : 1st Journal of Thermal Analysis and*

Calorimetry Conference and 6th V4 (Joint Czech-Hungarian-Polish-Slovakian) Thermoanalytical Conference : June 6-9, 2017,

Budapest, Hungary : Book of Abstracts 2017 / p. 58 <https://static.akcongress.com/downloads/jtacc/jtacc2017-book-of-abstracts.pdf>

Study of reduction mechanism of WO₃+CuO mixture by combined Mg/C reducer - influence of high heating rate

Nazaretyan, Khachik; Zargaryan, Armen; **Aydinyan, Sofiya**; Kharatyan, Suren *JTACC+V4 : 1st Journal of Thermal Analysis and*

Calorimetry Conference and 6th V4 (Joint Czech-Hungarian-Polish-Slovakian) Thermoanalytical Conference : June 6-9, 2017,

Budapest, Hungary : Book of Abstracts 2017 / p. 206-207 <https://static.akcongress.com/downloads/jtacc/jtacc2017-book-of-abstracts.pdf>