Name	Ihor Zorik
Position, Department/Faculty	Department 204 Faculty 2
Academic Degree, Academic Title	Associate Professor, PhD
Email:	i.zorik@khai.edu
Scopus Author ID:	6504675349
Web of Science ResearcherID:	EIY-4233-2022
ORCID iD:	0000-0003-3053-2369
Google Scholar:	aJIS5NkAAAAJ
ResearchGate:	

EDUCATION:

Basic education (university, major, year of graduation):
In 1996, he graduated from the Kharkiv Aviation Institute named after M. E. Zhukovsky with a degree in "Aviation Engines and Power Plants" and obtained the qualification of a mechanical engineer.
Postgraduate/Doctoral studies:
In 1996 he became a full-time postgraduate student. In 2020, he defended his PhD thesis, and in 2022, he was awarded the academic title of Associate Professor.
Additional training, certification programs:
Knowledge of the SolidWorks software product is confirmed by the certificates SOLIDWORKS CAD Design Associate (CSWA) - C-RFTMBJ83VD; SOLIDWORKS CAD Design Professional (CSWP) - C-W8XAZN7BSU; SOLIDWORKS Simulation Associate - C-C3EFDP7WXZ.

WORK EXPERIENCE:

Professional Career (Workplace, Years, Position):
From September 1, 1997, he was transferred to the position of assistant at the Department of Aircraft Engine Production Technologies at the M. E. Zhukovsky National Aerospace University "Kharkiv Aviation Institute". From 2016 to 2022, he worked at a private scientific and technical enterprise as a category 1 designer, developing the latest equipment for Philip Morris International, British American Tobacco Ukraine, and Imperial Tobacco Production Ukraine, and held the position of associate professor of the Department of Aircraft Engine Production Technologies part-time.

Teaching Experience:
During his work, he held the positions of postgraduate student, assistant, senior lecturer, associate professor. He has 25 years of teaching experience in higher educational institutions of III-IV accreditation levels.

Experience in International or National Projects:
Executor of the project "Cold Spray Radical Solutions for Aeronautic Improved Repairs (CORSAIR)" of the European Union Framework Program "FP7-TRANSPORT" (grant agreement No. 605207). The project implementation period is from 01.06.2013 to 30.11.2016.
Since 2019, he has been the executor of the research work "Innovative technologies of electrochemical suppression and electromagnetic decomposition for reducing NOx emissions in aircraft engines (DENOX)" of the European Union Framework Program "Horizon 2020" (grant agreement No. 831848).

RESEARCH ACTIVITIES:

Main Research Areas:
Scientific activities include the following state budget topics: “Theoretical studies of the synthesis of modern technologies for the creation and processing of new aerospace materials with increased resource characteristics” (No. DR 0100U003438 2000-2002); “Scientific foundations of the creation and processing of new materials that increase the life cycle of aircraft engines” (No. DR 0103U004082 2006-2008); "Theoretical foundations of the creation of protective nanocomposite coatings on highly loaded structural elements of aircraft engines" (No. DR 01121U001320 2012-2014), and the implementation of business agreements with OJSC "Motor Sich": "Obtaining nanopowders by kinetic explosion" 2010-2011; "Strengthening and restoration of end surfaces of blades of compressors of aircraft gas turbine engines" 2009-2011.
Many years of experience in applying gas-thermal coatings are also being implemented in the educational process, for example, in the discipline "Technology of Production and Repair of Aircraft Engines and Power Plants" using a detonation-gas installation for applying gas-thermal coatings with a redesigned and improved control system.
Number of Publications (Scopus, WoS, others):

Scopus – 3; ORCID – 17; Work of employees -25

Monographs, Textbooks:
Нанесення покриттів на деталі авіаційних двигунів газотермічними методами Запоріжжя : Мотор Січ, 2020. – 506 с. ISBN 978-966-2906-91-2 В. О. Богуслаєв А. І. Долматов К. Б. Балушок та ін.,

TEACHING ACTIVITIES:

Courses Taught:
Fundamentals of CNC equipment programming;
Systems of technical training for the production of ARCT;
Programming of CNC machines using CAD/CAM systems.

Author Courses, Academic Programs:
Fundamentals of CNC equipment programming;
Systems of technical training for the production of ARCT;
Programming of CNC machines using CAD/CAM systems.
Methodological Materials, Textbooks:
text

SELECTED PUBLICATIONS:

Key Articles (Scopus, WoS, others):
Вплив режимів роботи нагрівача установки газодинамічного напилювання на температуру нагрівання стисненого повітря. Aerospace Technic and Technology 2025-08-27 | Journal article
DOI: 10.32620/aktt.2025.4sup1.22 Contributors: Ihor Zorik; Oleksandr Shorinov; Serhii Nyzhnyk; Roman Ipatov; Dmytro Nahornyi
Numerical simulation of the outflow of two phase flow from detonation unit barrel. Technology Audit and Production Reserves. – 2020. – Vol. 2, no. 1. – P. 32–37.
Technology for restoration and repair of aircraft engine parts. AVIATION ISSN: 1648-7788 / eISSN: 1822-4180 2021 Volume 25 Issue 4: X–XX https://doi.org/10.3846/aviation.2021.15924.

Books, Chapters in Collective Monographs:
УДК 621.452.3.03:621.793.3 ISBN 978-966-2906-91-2 Нанесення покриттів на деталі авіаційних двигунів газотермічними методами. Запоріжжя: в-во «Мотор Січ», 2020 – 506с. 506/91 Богуслаєв В.О., Долматов

А.І., Балушок К.Б., та ін.

IT Skills:
SolidWorks / SolidCam / Microsoft Office