

# Haris Ali Khan

Adjunct Faculty

College of Aeronautical Engineering

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## About

Dr. Haris Ali Khan is working as Adjunct Faculty in the College of Aeronautical Engineering. Dr. Haris Ali Khan has a PhD in Industrial Manufacturing Engineering. Dr. Haris Ali Khan has published 23 research articles & conference papers having a citation count of 161, carried out 2 projects and filed 0 intellectual property.

## Qualifications

**PhD in Industrial Manufacturing Engineering** 2015 - 2020  
Pennsylvania State University , United States

## Experience

**Adjunct Faculty** 2024- Present  
College of Aeronautical Engineering

**Defence Faculty** 2020 - 2024  
College of Aeronautical Engineering

**Maintenance Engineer** 2007 - 2013  
C-130 Overhauling Depot , PAF Base Nur Khan

## Research Projects

### National Projects

**Indigenous development of scanning scheme to identify loose rivets in aircraft skin panel** 2022  
**Funding Agency:** PAF  
**Amount:** PKR 900,000.00  
**Status:** Approved\_inprocess

**Finite Element for identification of critically stressed area of an Aircraft's Engine Intake area** 2022  
**Funding Agency:** PAF  
**Amount:** PKR 900,000.00  
**Status:** Approved\_inprocess

### International Projects

## Research Articles

**A Lock-In thermography based post-processing scheme for the detection of sub-surface rivet-related defects in aircraft structures** 2025  
*Haris Ali Khan Sharjeel Salik Butt Shahab Uddin Ali Javed Talha Ali Khan Zia Ul Islam*  
*Mechanical Systems and Signal Processing*, Volume 228, Article Number 112423  
**Impact Factor:** 7.900 | **Quartile:** 1  
**DOI:** <https://doi.org/10.1016/j.ymsp.2025.112423>

**Investigating the failure mechanism of an aircraft longeron fitting and devising the mitigation techniques** 2025  
*Syed muhammad wajeeh Shah Sara Khushbash Haris Ali Khan Muhammad Talha*  
*Engineering Failure Analysis*, Volume 168, Article Number 109115  
**Impact Factor:** 4.400 | **Quartile:** 1 | **Citations:** 1  
**DOI:** [10.1016/j.engfailanal.2024.109115](https://doi.org/10.1016/j.engfailanal.2024.109115)

**Towards diagnostics of aerospace structural defects using a novel physics-based post-processing scheme employing lock-in thermography** 2025

Zia Ul Islam Haris Ali Khan Zahid Ahmed Qureshi Maheen Khan Abdullah Tariq Butt Talha Ali Khan  
*Measurement*, Volume 241, Article Number 115645

**Impact Factor:** 5.200 | **Quartile:** 1 | **Citations:** 1

**DOI:** <https://doi.org/10.1016/j.measurement.2024.115645>

**Investigation of temperature assisted corrosion failure of an aircraft turbine blade**

2025

Asad Hameed Sara Khushbash Asad Mumtaz Haris Ali Khan Aamer Shahzad  
*Engineering Failure Analysis*, Volume:167, Part A, ID:108909,

**Impact Factor:** 4.4 | **Quartile:** 1 | **Citations:** 1

**DOI:** <https://doi.org/10.1016/j.engfailanal.2024.108909>

**A quadrilateral inverse plate element for real-time shape-sensing and structural health monitoring of thin plate structures**

2024

Ihtisham Khalid Zahid Ahmed Qureshi Haris Ali Khan Selda Oterkus Erkan Oterkus  
*Computers and Structures*, Volume 305, Article Number 107551

**Impact Factor:** 4.400 | **Quartile:** 1 | **Citations:** 6

**DOI:** [doi.org/10.1016/j.compstruc.2024.107551](https://doi.org/10.1016/j.compstruc.2024.107551)

**Extrusion-based additive manufacturing of CFRP/steel/CFRP multi-material structure: Process development and influence of heat treatment on the mechanical performance**

2024

Waseem Ahmad Haris Ali Khan Sharjeel Salik Hafiz Qasim Ali Sara Khushbash Zahid Ahmad  
*Journal of Manufacturing Processes*, Volume 124, Pages 891-908

**Impact Factor:** 6.100 | **Quartile:** 1 | **Citations:** 6

**DOI:** <https://doi.org/10.1016/j.jmapro.2024.06.017>

**Multi-functional hybrid sandwich composite structures: Evaluating damage mechanics and tolerance using compression after impacts**

2024

Zafar Iqbal Malik Adeel Umer Haris Ali Khan Kamran Asim  
*Journal of Reinforced Plastics and Composites*, Pages 1-17

**Impact Factor:** 2.300 | **Quartile:** 3

**DOI:** <https://doi.org/10.1177/0731684424127298>

**Investigating damage resistance in aerospace radome applications: Experimental analysis of hybrid sandwich composites**

2024

Zafar Iqbal Malik Adeel Umer Kamran Asim Haris Ali Khan  
*Journal of Reinforced Plastics and Composites*, Pages:16

**Impact Factor:** 3.100 | **Quartile:** 2 | **Citations:** 5

**DOI:** [10.1177/07316844241229849](https://doi.org/10.1177/07316844241229849)

**Design, Development, and Performance Evaluation of FDM-Based Fastening Techniques for Single-Lap Joints**

2023

Maqsoora Nazim Haris Ali Khan Sabih Ahmad Khan Hamza Liaqat Khurram Rehman  
*JOM*, Pages 1-11

**Impact Factor:** 2.6 | **Quartile:** 2 | **Citations:** 6

**DOI:** <https://doi.org/10.1007/s11837-023-06324-1>

**Multi-disciplinary optimization of hybrid composite radomes for enhanced performance**

2023

Muhammad Talha Aamir Muhammad Ali Nasir Zafar Iqbal Haris Ali Khan Zhaib Muneer  
*Results in Engineering*, Volume:20, Issue:1, Article Number: 101547

**Impact Factor:** 6.000 | **Quartile:** 1 | **Citations:** 12

**DOI:** [10.1016/j.rineng.2023.101547](https://doi.org/10.1016/j.rineng.2023.101547)

**Development of a design space for dissimilar materials joining in aerospace applications**

2023

Sabih Ahmad Khan Hamza Liaqat Farooq Bin Akram Haris Ali Khan  
*Aeronautical Journal*, Pages 1-18

**Impact Factor:** 1.4 | **Quartile:** 3 | **Citations:** 5

**DOI:** [10.1017/aer.2023.109](https://doi.org/10.1017/aer.2023.109)

**Investigation of the mechanical behavior of FDM processed CFRP/Al hybrid joint at elevated temperatures**

2023

Sabih Ahmad Khan Haris Ali Khan Abdullah Khan Shuaib Salamat Syed Saad Javaid Raja Muhammad Awais  
*Thin-Walled Structures*, Volume 192, Article Number 111135

**Impact Factor:** 6.4 | **Quartile:** 1 | **Citations:** 16

**DOI:** <https://doi.org/10.1016/j.tws.2023.111135>

- Investigation of failure and development of mitigation techniques of a cracked aircraft wing spar cap** 2023  
*Haris Ali Khan Asad Hameed Armaghan Shahid S Zameer Abbas Sara Khushbash*  
*Engineering Failure Analysis* , Volume 147, Article Number 107149  
**Impact Factor:** 4.0 | **Quartile:** 1 | **Citations:** 10  
**DOI:** 10.1016/j.engfailanal.2023.107149
- A Novel Framework for Qualification of a Composite-Based Main Landing Gear Strut of a Lightweight Aircraft** 2023  
*Muhammad Ayaz Ahmad Syed Irteza Ali Shah Sabih Ahmad Khan Haris Ali Khan Taimur Ali Shams*  
*Polymers* , Volume 15(6), Article Number 1402  
**Impact Factor:** 4.967 | **Quartile:** 1 | **Citations:** 2  
**DOI:** <https://doi.org/10.3390/polym15061402>
- Classification of progressive failure and mechanical behavior of dissimilar material hybrid joints at varying temperatures** 2023  
*Raja Muhammad Awais Zain-ul-Abidin Sabih Ahmad Khan Haris Ali Khan Sara Khushbash*  
*Thin-Walled Structures* , Volume 182, Part A, Article Number 110212  
**Impact Factor:** 5.881 | **Quartile:** 1 | **Citations:** 16  
**DOI:** <https://doi.org/10.1016/j.tws.2022.110212>
- Sensor Fusion and On-Line Monitoring of Friction Stir Blind Riveting for Lightweight Materials Manufacturing** 2022  
*Zhe Gao Haris Ali Khan Jingjing Li Weihong (Grace) Guo*  
*Journal of Manufacturing Science and Engineering* , Volume 144(6), Article Number 061009  
**Impact Factor:** 3.033 | **Quartile:** 2 | **Citations:** 1  
**DOI:** <https://doi.org/10.1115/1.4052907>
- Development and characterization of a new riveting process for pre-drilled holes hard-to-access aircraft riveted joints** 2022  
*Haris Ali Khan Nafey Zafar Asad Hameed M Farooq Bin Akram Kamran Asim Syed Saad Javaid Abdullah Khan*  
*The International Journal of Advanced Manufacturing Technology* , Pages 1-12  
**Impact Factor:** 3.4 | **Quartile:** 2 | **Citations:** 8  
**DOI:** 10.1007/s00170-022-09167-3
- Failure analysis of a cracked cylinder block assembly of an aircraft brake system** 2022  
*Asad Hameed Ali Nawaz Haris Ali Khan M Farooq Akram Zahid Mehmood*  
*Engineering Failure Analysis* , Volume 133, Article Number 105948  
**Impact Factor:** 3.114 | **Quartile:** 2 | **Citations:** 6  
**DOI:** <https://doi.org/10.1016/j.engfailanal.2021.105948>
- Design space optimisation of an unmanned aerial vehicle submerged inlet through the formulation of a data-fusion-based hybrid model** 2021  
*M Farooq Bin Akram Haris Ali Khan Taimur Ali Shams Dimitri Mavris*  
*The Aeronautical Journal* , Volume 125 , Issue 1292 , Pages 1815-1832  
**Impact Factor:** 0.818 | **Quartile:** 4 | **Citations:** 5  
**DOI:** <https://doi.org/10.1017/aer.2021.37>
- Roll Bonding Processes: State-of-the-Art and Future Perspectives** 2021  
*Haris Ali Khan Kamran Asim Farooq Bin Akram Asad Hameed Abdullah Khan Bilal Mansoor*  
*Metals* , Volume 11(9), 1344  
**Impact Factor:** 2.351 | **Quartile:** 2 | **Citations:** 46  
**DOI:** <https://doi.org/10.3390/met11091344>
- Increased  $\Sigma 3$  boundaries: Effects of friction stir and post heating on pure copper** 2021  
*Nannan Chen Haris Ali Khan Shenxi Li Jingjing Li*  
*Materials Characterization* , Volume 176, Article Number 111120  
**Impact Factor:** 4.342 | **Quartile:** 1 | **Citations:** 4  
**DOI:** <https://doi.org/10.1016/j.matchar.2021.111120>

### Investigation of Temperature Assisted Corrosion Failure of an Aircraft Turbine Blade

2024

SARA KHUSHBASH Asad hameed ASAD MUMTAZ BHATTI Haris Ali Khan Aamer Shahzad Farooq bin akram  
10th International Conference on Engineering Failure Analysis, res.country(88,)

**Citations:** N/A

**DOI:** not given yet