Citation on the Research Work of the Applicant duly signed by the Nominator

1. Dr. S. Johnson Retnaraj Samuel, Associate Professor (Research) and Centre Head for Molecular and Nanomedical Sciences, Sathyabama Institute of Science and Technology. Chennai hereby acknowledge the significant contributions of Dr. S. Jackson Durairaj. Associate Professor (Research), Molecular and Nanomedical Sciences, Sathyabama Institute of Science and Technology, Chennai to the fields of regenerative medicine, molecular biology, and cellular research. The following list outlines the top ten publications by Dr. S. Jackson Durairaj, highlighting their key discoveries and contributions:

1. Rajagopalan et al., 2024

Title: Understanding the multi-functional role of TCTP in the regeneration process of Earthworm, Perionyx excavatus

Journal: Tissue Engineering and Regenerative Medicine 21, no. 2 (2024): 353-366. Contribution: This study elucidates the multifaceted role of TCTP (Tumor Protein p53) in earthworm regeneration, suggesting its potential as a target in regenerative therapies.

Citation: 1

2. Subbiahanadar Chelladurai et al., 2020

Title: Exploring the effect of UV-C radiation on earthworm and understanding its genomic integrity in the context of H2AX expression

Journal: Scientific Reports 10, no. 1 (2020): 21005.

Contribution: Investigates how UV-C radiation impacts genomic integrity in earthworms, focusing on H2AX expression and DNA repair mechanisms.

Citation: 10

3. Rossan Mathews et al., 2024

Title: Biochemical and functional characterization of heat-inactivated coelomic fluid from earthworms as a potential alternative for fetal bovine serum in animal cell culture

Journal: Scientific Reports 14, no. 1 (2024): 5606.

Contribution: Characterizes earthworm coelomic fluid as a viable alternative to Fetal Bovine Serum, demonstrating its effectiveness in supporting cell growth in culture.

4. Vivekanandam et al., 2022

Title: Designing of cytotoxic T lymphocyte-based multi-epitope vaccine against SARS-CoV2: A reverse vaccinology approach

Journal: Journal of Biomolecular Structure and Dynamics 40, no. 24 (2022): 13711-13726.

Contribution: Develops a multi-epitope vaccine against SARS-CoV-2 using a reverse vaccinology approach, contributing to advanced vaccine development strategies.

Citation: 2

5. Paul et al., 2022

Title: Importance of clitellar tissue in the regeneration ability of earthworm Eudrilus eugeniae

Journal: Functional & Integrative Genomics 22, no. 4 (2022): 1-32.

Contribution: Emphasizes the critical role of clitellar tissue in earthworm regeneration, providing insights into tissue-specific regenerative processes.

Citation: 9

6. Jackson Durairaj Selvan Christyraj et al., 2020

Title: Understanding the role of the clitellum in the regeneration events of the earthworm Eudrilus eugeniae

Journal: Cells Tissues Organs 208, no. 3-4 (2020): 134-141.

Contribution: Explores the clitcllum's role in earthworm regeneration, advancing knowledge on tissue repair and regenerative mechanisms.

Citation: 16

7. Subramaniam et al., 2024

Title: Profiling microRNAs of earthworm, Perionyx excavatus and deciphering the expression of distinct novel miRNAs regulating epimorphosis regeneration Journal: Gene (2024): 148636.

Contribution: Profiles microRNAs in earthworms, identifying novel miRNAs that regulate epimorphic regeneration, contributing to gene regulation understanding during regeneration.

8. Rajagopalan et al., 2022

Title: Comparative analysis of the survival and regeneration potential of juvenile and matured earthworm, Eudrilus eugeniae, upon in vivo and in vitro maintenance

Journal: In Vitro Cellular & Developmental Biology-Animal 58, no. 7 (2022): 587-598

Contribution: Analyzes survival and regeneration potential in juvenile versus mature earthworms, providing insights into developmental stage impacts on regeneration.

Citation: 4

Rajagopalan et al., 2024

Title: The molecular mechanisms underlying the regeneration process in the earthworm, Perionyx excavatus exhibit indications of apoptosis-induced compensatory proliferation (AICP)

Journal: In Vitro Cellular & Developmental Biology-Animal 60, no. 3 (2024): 222-235.

Contribution: Explores apoptosis-induced compensatory proliferation (AICP) in earthworm regeneration, offering insights into molecular dynamics underlying regenerative processes.

10. SC et al., 2012

Title: Autofluorescence in BrdU-positive cells and augmentation of regeneration kinetics by riboflavin

Journal: Stem Cells and Development 21, no. 11 (2012): 2071-2083.

Contribution: Investigates riboflavin's role in enhancing regeneration kinetics by

influencing cell proliferation and repair mechanisms.

Citation: 39

These publications highlight **Dr. S. Jackson Durairaj's** substantial contributions to understanding regenerative processes and advancing cellular and molecular biology. Each study has provided valuable insights and made significant advancements in the respective fields.

5 Februs Pening Samuel 31/08/14

Date: 31-08-2024

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