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1. REPORT DATE (DD-MM-YYYY) 09-07-2021	2. REPORT TYPE Final Report	3. DATES COVERED (From - To) 11-Jan-2018 - 10-Sep-2019
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4. TITLE AND SUBTITLE Final Report: Nanoscience Education Mini-track at FNANO18	5a. CONTRACT NUMBER W911NF-18-1-0075
	5b. GRANT NUMBER
	5c. PROGRAM ELEMENT NUMBER 611102

6. AUTHORS	5d. PROJECT NUMBER
	5e. TASK NUMBER
	5f. WORK UNIT NUMBER

7. PERFORMING ORGANIZATION NAMES AND ADDRESSES St. John's University, New York 8000 Utopia Parkway Queens, NY 11439 -9000	8. PERFORMING ORGANIZATION REPORT NUMBER
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9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS (ES) U.S. Army Research Office P.O. Box 12211 Research Triangle Park, NC 27709-2211	10. SPONSOR/MONITOR'S ACRONYM(S) ARO
	11. SPONSOR/MONITOR'S REPORT NUMBER(S) 72949-LS-CF.1

12. DISTRIBUTION AVAILABILITY STATEMENT Approved for public release; distribution is unlimited.
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13. SUPPLEMENTARY NOTES The views, opinions and/or findings contained in this report are those of the author(s) and should not be construed as an official Department of the Army position, policy or decision, unless so designated by other documentation.

14. ABSTRACT

15. SUBJECT TERMS

16. SECURITY CLASSIFICATION OF:			17. LIMITATION OF ABSTRACT UU	15. NUMBER OF PAGES	19a. NAME OF RESPONSIBLE PERSON Philip Lukeman
a. REPORT UU	b. ABSTRACT UU	c. THIS PAGE UU			19b. TELEPHONE NUMBER 718-990-2920

RPPR Final Report
as of 12-Jul-2021

Agency Code: 21XD

Proposal Number: 72949LSCF

Agreement Number: W911NF-18-1-0075

INVESTIGATOR(S):

Name: Philip Lukeman
Email: phil.lukeman@gmail.com
Phone Number: 7189902920
Principal: Y

Organization: **St. John's University, New York**

Address: 8000 Utopia Parkway, Queens, NY 114399000

Country: USA

DUNS Number: 073134744

EIN: 111630830

Report Date: 10-Dec-2019

Date Received: 09-Jul-2021

Final Report for Period Beginning 11-Jan-2018 and Ending 10-Sep-2019

Title: Nanoscience Education Mini-track at FNANO18

Begin Performance Period: 11-Jan-2018

End Performance Period: 10-Sep-2019

Report Term: 0-Other

Submitted By: Philip Lukeman

Email: phil.lukeman@gmail.com

Phone: (718) 990-2920

Distribution Statement: 1-Approved for public release; distribution is unlimited.

STEM Degrees:

STEM Participants:

Major Goals: Introduction: We propose a nanoscience education mini-track at FNANO18 – a conference already supported by ARO.

Accomplishments: This grant funded a nanoscience education mini-track at FNANO18 (Foundations of Nanoscience) – a conference already supported by ARO. FNANO's attendees - predominantly faculty, postdoctoral associates and graduate students, all of whom are involved in education - saw a poster session focused around nanoscience pedagogy and an invited speaker who talked about effective programs & pedagogy in nanoscience.

The speaker for 2018 was Prof Gwen Stovall, Clinical Assistant Professor, Freshman Research Initiative, UT Austin.

On April 17, she introduced UT Austin's FRI, "Freshman Research Initiative". FRI programs take large groups of undergraduates supervised by 'research educators' - effectively teaching postdocs - and have them do research when they would normally be doing freshman and sophomore labs. She described the scientific benefits and logistical challenges of programs such as these and participated in a Q&A afterwards + had informal discussions with interested faculty. Prof Stovall said that this was a productive meeting, to quote, she "even walked away with contacts for FRI replication and a new idea for some of my aptamer sensor work". Interest was expressed in having similar speakers in future years of FNANO.

Training Opportunities: Nothing to Report

Results Dissemination: Nothing to Report

Honors and Awards: Nothing to Report

Protocol Activity Status:

Technology Transfer: Nothing to Report

PARTICIPANTS:

Participant Type: PD/PI

RPPR Final Report
as of 12-Jul-2021

Participant: Philip Lukeman

Person Months Worked: 1.00

Project Contribution:

National Academy Member: N

Funding Support:

Partners

,

Prof Gwen Stovall, Clinical Assistant Professor, Freshman Research Initiative, UT Austin. Speaker at conference.

I certify that the information in the report is complete and accurate:

Signature: Philip Lukeman

Signature Date: 7/9/21 2:44PM

Scientific Progress and Accomplishments

Final Report

"Nanoscience Education Mini-track at FNANO18"

Philip S Lukeman
Chemistry, St. John's University

Period of performance 11 January 2018 – 10 September 2018

Proposal Number: 72949-LS

Agreement Number: W911NF-18-1-0075

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See below for excerpt from program from FNANO18

University of Leeds, U.K.					DNA Origami Structure	
Posters: Track on Teaching Through Nanoscience						
	Poster	p153	Michael Hudoba, Carlos Castro, Peter Beshay and Rutva Patel	Department of Engineering, Otterbein University, USA	Development of DNA Origami Education Modules for Middle School, High School, and Undergraduate Students and Educators	
	Poster	p155	Jinglin Fu	Department of Chemistry, Center for Computational and Integrative Biology, Rutgers University-Camden, USA	Undergraduate teaching and research on DNA-scaffolded proximity assembly of biochemical reaction circuit	
Special Track on Teaching Through Nanoscience. Track Chair: Philip Lukeman, St. John's University						
4:45-5:25 PM	Keynote	p39	<u>Gwendolyn Stovall</u>	Freshman Research Initiative, The University of Texas at Austin, USA	Freshman Research Initiative: Transforming Education through Research	