THE 20th SEMI-ANNUAL POSTER PRESENTATION

HONORS & EMERGING SCHOLARS
Poster Presentation

LEARNING COMMUNITIES
Theme-Based
Poster Presentation

Wednesday, May 7, 2014
11:00 AM - 4:00 PM

Thursday, May 8, 2014
10:00 AM - 3:00 PM
Atrium Ground & First Floors

Awards Ceremony
12:30 PM
Atrium Amphitheater

CONTENTS

AWARDS CEREMONY

May 8, 2014
Atrium Amphitheater • 12:30 PM

GREETINGS

RUSSELL K. HOTZLER
President

BONNE AUGUST
Provost and Vice President for Academic Affairs

PAMELA BROWN
Associate Provost

HONORS SCHOLARS RECOGNITION

JANET LIOU-MARK
Director of the Honors Scholars Program

LAURA YUEN-LAU
Coordinator of the Honors Scholars Program

EMERGING SCHOLARS RECOGNITION

JUSTIN VAZQUEZ-PORITZ
Director of Undergraduate Research

LEARNING COMMUNITIES RECOGNITION

ESTELA ROJAS
Director of Learning Communities

BEST POSTER AWARDS

RENETA D. LANSIQUOT
Assistant Director of the Honors Scholars Program

WASHINGTON, D.C.
January 2-4, 2014

HONORS COURSES

MAT 1475H: Calculus I Honors
Prof. Kate Poirier

ROLLER COASTER
Danielle Alphee, Mouhamath Ciss, and Chun Kit Szeto
ABSTRACT: Riding roller coasters is an exciting and thrilling way to spend your day. You may have many questions about them. For instance, how is a roller coaster built? We will address this question using calculus.

STOCK MARKET CRASH
Jimmy Choi, Masaab Sohaib, and Nicholas Yu
ABSTRACT: When people mention the stock market they usually incorporate it with earning money. With the positive momentum of the stock these past couple years, people neglect the possibility of a stock market crash. If the market goes up it could also go down. But how fast could it drop? Imagine investing with your life savings in the stock market before the crash; how fast and how much money could you lose? In this project, we are going to use calculus to answer these questions and project a function of the graph for the future.

WHERE SHOULD A PILOT START DESCENT?
Abu Butt, Nai Bing Jiang, and Amir Magar
ABSTRACT: In this project, we determined where a pilot should begin to descend for landing, starting at a certain height. Our goal is to find out the speed, height, and distance from the runway when an airplane should start landing. We will use knowledge of calculus to solve this problem.

MUAY THAI KICK
Ismail Akram, Darren Gopaul, Andrew Maloney, and Gabriel Ortiz
ABSTRACT: Ponder the difference between the concrete mathematics and the organic martial arts. Initially, one would think that the two have very little in common. However, as juxtaposing they may be, martial arts thrive on mathematics. In our project, we shall research the mathematical aspects of a Muay Thai roundhouse kick. We shall analyze several key components of the kick; velocity, acceleration, etc. to conclude the following: the point at which the kick is at its highest speed and speed at impact.

STEINWAY PIANO FACTORY TOUR
January 23, 2014

NSF REU
AMERICAN METEOROLOGICAL SOCIETY 94TH ANNUAL MEETING
February 1-2, 2014

HONORS IN A REGULAR COURSE

DISSOLVED OXYGEN AT THE COVE BETWEEN TWO BRIDGES
Olubunmi Adisa, Tatiana Davydova, Maxwell Dunfey, Malvia Freckleton, Timothy Gaita, Jeffrey Guaraca, Matthew Henning, Julio Huerta, Fatema Jannat, Ilirjana Kuqi, Jamie Matias Anderson, Amani Nassir, Angela Oei, Gagandeep Singh, Hardeep Singh, Karla Torres and Matluba Vafaeva
Profs. Alberto Martinez, Diana Samaroo, Jay Deiner, and Suresh Tewani
CHEM 1210: General Chemistry II

SURROUNDED BY TWO INDUSTRIAL GIANTS: BROOKLYN & MANHATTAN—ASSAYING PH, HARDNESS, NITRATE, NITRITE, AND CONDUCTIVITY
Olubunmi Adisa, Tatiana Davydova, Maxwell Dunfey, Malvia Freckleton, Timothy Gaita, Jeffrey Guaraca, Matthew Henning, Julio Huerta, Fatema Jannat, Ilirjana Kuqi, Jamie Matias Anderson, Amani Nassir, Angela Oei, Gagandeep Singh, Hardeep Singh, Karla Torres, and Matluba Vafaeva
Profs. Diana Samaroo, Alberto Martinez, Jay Deiner, and Suresh Tewani
CHEM 1210: General Chemistry II

PROGRAMMING ARDUINO MICROCONTROLLERS USING MATLAB
Joe Nathan Abellard
Prof. Edward Morton
EMT 2320: Advanced Mechanisms

THREE DIMENSIONAL GEOMETRIES IN AUTOCAD
Mohsin Alam
Prof. Barbara Mishara
ARCH 1230: Building Technology II

TURBULENCE OF DIPLOAR EXCITON BEC
Md Arefin
Prof. German Kolmakov
PHYS 1442: Physics 2.3

CLONING A PCR FROM THE LEAST SHREW
James-David Brown
Prof. Jeremy Seto
BIO 3620: Molecular and Cell Biology

WHEEL OF FORTUNE: AN INFORMATION THEORY APPROACH
Peter Danshov
Prof. Johann Thiel
MAT 2440: Discrete Structures and Algorithms I

CLONING OF CELLULAR MARKERS
Brittiny Dhital
Prof. Jeremy Seto
BIO 3620: Molecular and Cell Biology

USING SATELLITE REMOTE SENSING TO MONITOR LAKE MORPHOLOGY AND DYNAMICS
Bruno Fernandez
Profs. Reginald Blake and Hamidreza Norouzi
PHYS 1112: Principles of Science II
The Center for Remote Sensing and Earth System Sciences (ReSESS)

MONITORING MADE EASY
Paul Julien
Prof. Yu Wang
CET 4982: Special Projects in Technology

EXPERIMENTING WITH GLUTEN AND DAIRY FREE CAKES
Jodian M. Laird
Prof. Louise Hoffman
HMGT 4968: The Art of Vegetarian Cuisine

ISOLATION AND KINETICS OF A CARBOHYDRATE METABOLIZING ENZYME
Adriana Mediavilla
Prof. Nathan Astrof
BIO 3601: Biochemistry

DETERMINING THE PROTEIN CONTENT OF MILK
Lizbeth Moya
Prof. Nathan Astrof
BIO 1101: Biology I

COLOR IN DENTISTRY
Shabnam Nia
Prof. Renata Budny
RESD 1212: Fixed Prosthodontics II

THERMODYNAMICS OF HURRICANES
Kenneth Perera
Prof. Boris Gelman
PHYS 1441: Physics 1.3

ADVANCING TECHNICAL WRITING IN VIRTUAL WORLDS
Walter Rada
Prof. Reneta D. Lansiquot
ENG 3773: Advanced Technical Writing

AMERICAN MUSEUM OF NATURAL HISTORY
March 7, 2014

CULTIVATING FINE DINING ETIQUETTE
Prof. Karen Goodlad • March 12, 2014

THE EFFECTS OF WAR
Marlin Reid
Prof. Lynn Cole
ADV 3601: Information Design

CURCUMIN: HEALTH BENEFITS AND NUCLEAR MAGNETIC RESONANCE CHARACTERIZATION
Geoffrey Robinson
Profs. Alberto Martinez and Diana Samaroo
CHEM 2223: Organic Chemistry I

MONITORING MADE EASY
Washington Sarmiento
Prof. Yu Wang
CET 4982: Special Projects in Technology

SIMULATIONS AS A PREDICTOR OF THE FINITE SUMS OF FRACTIONAL POWERS OF UNIFORM DISTRIBUTIONS
Steven Tipton
Prof. Satyanand Singh
MAT 3672: Probability and Mathematical Statistics II

DYNAMICS OF BOSE-EINSTEIN CONDENSATE OF MICROCAVITY POLARITONS
Marieme Toure
Prof. Oleg Berman
PHYS 1442: Physics 2.3

THE GERMAN ECONOMIC ADVANTAGE
Thomas Waters
Prof. Randall Hannum
ECON 1101: Macroeconomics

COUNTRY MARKETING PROJECT STATEMENT
Irene Zhang
Prof. John F. Dixon
MKT 1212: Consumer Behavior

A STUDY OF BIRTH WEIGHT IN AMERICA
Bao Zheng
Prof. Bruce Kan
MAT 1272: Statistics

BOSE-EINSTEIN CONDENSATION OF TRAPPED POLARITONS IN A MICROCAVITY
Mohammad Zilon
Prof. Boris Gelman
PHYS 1441: Physics 1.3

EMERGING SCHOLARS

THE IMPACT OF CSS AND TYPOGRAPHY ON THE WEB DESIGN INDUSTRY
Hibba Abbas
Prof. Marcos S. Pinto

MULTI-AGENT SIMULATIONS AND SEA TURTLE POPULATION MODELING
Abrar B. Abdurrob
Prof. Sheila Miller

PROGRAMMING ARDUINO MICROCONTROLLERS USING MATLAB
Joe Nathan Abellard
Prof. Edward Morton

NON-EQUILIBRIUM DYNAMICS OF A TRAPPED BOSE-EINSTEIN CONDENSATE OF MICROCAVITY POLARITONS
Ishtahad Ahmed
Profs. Oleg Berman and German Kolmakov

VIEW FROM THE TOP
Tasnuva Ahmed
Prof. Paul King

EMOTIONAL STRESS, MEANING-MAKING, AND WELL-BEING
Curtis Appiah
Profs. Jean Kubeck Hillstrom, Ernie Cote, Pa Her and Eleanor Strehl

TURBULENCE OF DIPOLAR EXCITON BEC
Md Arefin
Profs. Oleg Berman and German Kolmakov

MENTORING AMONG REGISTERED NURSES: A LITERATURE REVIEW
Ayanna Austin
Profs. Aida Egues and Elaine Leinung

IN-DEMAND COMPUTER LITERACY SKILLS FOR HOSPITALITY PROFESSIONALS
Jovany Bravo
Prof. Patrick O'Halloran

STEPPING STONES: A LOOK AT CIRCULATION IN DOWNTOWN BROOKLYN
Catherine Brito
Prof. Paul King

CHRONICLING THE ACHIEVEMENTS AND ACTIVITIES OF HONORS SCHOLARS AT CITY TECH
Christian Brito
Prof. Reneta D. Lansiquot

CLONING A PCR FROM THE LEAST SHREW
James-David Brown
Prof. Jeremy Seto

MODELING AND ANALYSIS OF A FOLDABLE BICYCLE WITH DETACHABLE FRAME
Jose Romeo Bugayong
Prof. Angran Xiao

CAD/CAM INTEGRATION IN INJECTION MOLD DESIGNS
Ricardo Clarke
Prof. Angran Xiao

STEPPING STONES: A LOOK AT CIRCULATION IN DOWNTOWN BROOKLYN
Genaro Cobar
Prof. Paul King

HOW CAN PEER LED TEAM LEARNING WORKSHOPS ADDRESS STUDENT LEARNING STYLES TO FACILITATE INDEPENDENT STUDENT READING IN BIO1101
George S. Cobos
Prof. Davida Smyth

LOCAL 6 NYC CHRONOLOGICAL RECORD OF SIGNIFICANT EVENTS
Blanca Cortes
Prof. Patrick O'Halloran

PEER MENTORING: EFFECT ON RETENTION AND GRADUATION RATES
Monique Crawford
Profs. Aida Egues and Elaine Leinung

EMOTIONAL STRESS, MEANING-MAKING, AND WELL-BEING
Cherishe Cumma
Profs. Jean Kubeck Hillstrom, Ernie Cote, Pa Her and Eleanor Strehl

WHEEL OF FORTUNE: AN INFORMATION THEORY APPROACH
Peter Danshov
Prof. Johann Thiel

EXPLORING KNOWLEDGE-BASED POTENTIAL FUNCTIONS USED IN PROTEIN STRUCTURE ANALYSIS AND PREDICTION
Brittiny Dhital
Prof. Armando Solis

INTEGRALS IN DIMENSIONAL REGULARIZATION
Farjana Ferdousy
Prof. Giovanni Ossola

THE MICROBIOLOGY OF THE BUILT ENVIRONMENT: INVESTIGATING THE PREVALENCE OF ANTIBIOTIC RESISTANT BACTERIA IN DIFFERENT SITES OF CITY TECH
Fabiola Fontaine
Prof. Davida Smyth

DEVELOPMENT OF A GAS ACTUATED TURBINE DRIVEN LOADING MECHANISM
Daniel Frederick
Prof. Angran Xiao

CSS, RESPONSIVE WEB DESIGN AND ITS IMPACT ON MOBILE DEVELOPMENT
Felix Gallardo
Prof. Marcos S. Pinto

STEPPING STONES: A LOOK AT CIRCULATION IN DOWNTOWN BROOKLYN
Andrea Garrido
Prof. Paul King

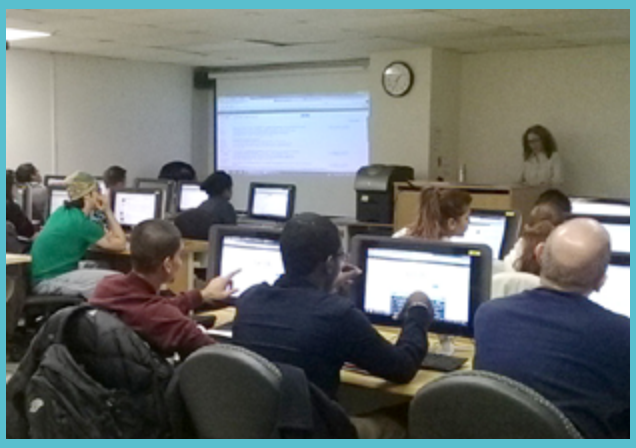
MENTORING AMONG REGISTERED NURSES: A LITERATURE REVIEW
Anyelina Genao
Profs. Aida Egues and Elaine Leinung

AN EVALUATION OF CERTAIN CONVERGENT SERIES VIA FOURIER ANALYSIS
Joshua Haber
Prof. Satyanand Singh

FEASIBILITY STUDY OF ENERGY STORAGE SYSTEMS FOR HOME USE
Blaire Harrington
Prof. Masato Nakamura

ELLIPTIC FUNCTIONS AND SOME APPLICATIONS
Adam Ibrahim
Prof. Satyanand Singh

STEPPING STONES: A LOOK AT CIRCULATION IN DOWNTOWN BROOKLYN
Raymond Jimenez
Prof. Paul King



ADVANCING LIBRARY RESEARCH TECHNIQUES
Prof. Maura A. Smale • March 13, 2014

DOMESTIC VIOLENCE AND THE IMPACTS ON AFRICANA WOMEN: A BRIEF OVERVIEW ON RACE, CLASS, AND ROOT CAUSES
Natalia Jones
Prof. Christine W. Thorpe

CHRONICLING THE ACHIEVEMENTS AND ACTIVITIES OF HONORS SCHOLARS AT CITY TECH
Leonard Jules
Prof. Reneta D. Lansiquot

MENTORING AMONG REGISTERED NURSES: A LITERATURE REVIEW
Emily Kheluram
Profs. Aida Egues and Elaine Leinung

CORE PARTITIONS OF NUMBERS
Dekuwin Emmanuella Ingrid Kogda
Prof. Corina Calinescu

STRESS RESISTANCE IN TETRAHYMENA THERMOPHILA
Elizabeth Kolmus
Prof. Ralph Alcendor

SYMMETRIES AND MODELS OF BARYONS
Aleksey Kravtsov
Prof. Boris Gelman

EXPERIMENTING WITH GLUTEN AND DAIRY FREE CAKES
Jodian Laird
Prof. Louise Hoffman

USING A COMPUTER SCIENCE CONCEPTS ONTOLOGY FOR AUTOMATIC ITEM GENERATION
Constadinos Lales
Prof. Benito Mendoza

DEVELOPING AND DELIVERING EFFECTIVE RESEARCH POSTER PRESENTATIONS
Profs. Justin Davis and Jody Rosen • March 20, 2014

THE MICROBIOLOGY OF THE BUILT ENVIRONMENT: INVESTIGATING THE PREVALENCE OF ANTIBIOTIC RESISTANT BACTERIA IN DIFFERENT SITES OF CITY TECH
Manhin Lam
Prof. Davida Smyth

CHRONICLING THE ACHIEVEMENTS AND ACTIVITIES OF HONORS SCHOLARS AT CITY TECH
Liza Luboa
Prof. Reneta D. Lansiquot

INTEGRALS IN DIMENSIONAL REGULARIZATION
Daniel David Madray
Prof. Giovanni Ossola

THE EFFECT OF HIGH FAT DIET IN FEMALE REPRODUCTION
Faizan Khalid Malik
Prof. Sanjoy Chakraborty

INFOGRAMS: GRAPHIC SYMBOLIC SUMMARIES AND OPTIMAL LEVELS OF ABSTRACTION FOR ANATOMY AND PHYSIOLOGY
Andrew Maloney
Prof. Vasily Kolchenko

CLASSIFICATION OF LOW/HIGH REDSHIFT GALAXIES USING MACHINE LEARNING
Mario R. Martin
Prof. Viviana Acquaviva

HOW BEST TO ACTIVELY ASSESS THE SUCCESS OF READING STRATEGIES IN PEER LED TEAM LEARNING WORKSHOPS IN BIO 1101
Shannon Massry
Prof. Davida Smyth

CHRONICLING THE ACHIEVEMENTS AND ACTIVITIES OF HONORS SCHOLARS AT CITY TECH
Mandy Mei
Prof. Reneta D. Lansiquot

CHRONICLING THE ACHIEVEMENTS AND ACTIVITIES OF HONORS SCHOLARS AT CITY TECH
Khoreece H. Mendoza
Prof. Reneta D. Lansiquot

CORRELATION BETWEEN SOIL PROPERTIES AND WINE CLASSIFICATION
Jeffrey Michel
Prof. Melanie Villatoro

DESIGN METHODOLOGY - THROUGH FILM
Loyra Nunez
Prof. Lia Dikigoropoulou

SOLAR DECATHLON 2015 DURA PARAMETRIC DESIGN REFLECTING WALL
Daniel Otto
Prof. Alexander Aptekar

SYSTEM DESIGN FOR RENEWABLE ENERGY
David Owoeye
Prof. Masato Nakamura

MECHANICAL TESTS OF POLYETHYLENE GLYCOL DISCRYLATE (PEGDA) AND POLYDIMETHYLSILOXANE (PDMS) BASED TISSUE SCAFFOLDS
Peter Pena
Prof. Ozlem Yasar

CHAOS THEORY
Kenneth Perera
Prof. Sheila Miller

THE USE OF REFLECTIVE STRATEGIES TO DEVELOP PROBLEM-SOLVING, READING AND WRITING SKILLS IN ELECTRO-MECHANICAL MANUFACTURING WORKSHOP
Andris Pinkhasik
Prof. AE Dreyfuss

CHRONICLING THE ACHIEVEMENTS AND ACTIVITIES OF HONORS SCHOLARS AT CITY TECH
Walter Rada
Prof. Reneta D. Lansiquot

SYNTHESIS AND CHARACTERIZATION OF A RESVERATROL ANALOGUE AS POTENTIAL METAL ION IONOPHORE AND HYDROXYL RADICAL PRODUCTION INHIBITOR
Tanzeen Rahman
Prof. Alberto Martinez

PROMOTING CRITICAL THINKING THROUGH BLOOM'S TAXONOMY IN BIO 1101 PEER-LED WORKSHOPS
Ayesha Rasool
Prof. Davida Smyth

CURCUMIN: HEALTH BENEFITS AND NUCLEAR MAGNETIC RESONANCE CHARACTERIZATION
Geoffrey Robinson
Prof. Alberto Martinez

PEER MENTORING NURSING STUDENTS: DOES THIS HELP WITH RETENTION AND GRADUATION RATES
Peggy Saint-Vil
Profs. Aida Egues and Elaine Leinung

ARCHITECTURAL DESIGN PORTFOLIO BOOKLET
Margarita Salas
Prof. William Valdez

WHO RUNS THE WORLD: QPSK - UNDERSTANDING PHASE SHIFT KEYING FOR COMMUNICATION
Fauziya Sani
Prof. Lufeng Leng

DESIGN METHODOLOGY - THROUGH FILM
Faraz Siddiqui
Prof. Lia Dikigoropoulou

BEYOND THE EVENT: THE ENVIRONMENTAL IMPACT OF EVENT TOURISM
Angela Siu
Prof. Gerald Van Loon

INFOGRAMS: GRAPHIC SYMBOLIC SUMMARIES AND OPTIMAL LEVELS OF ABSTRACTION FOR ANATOMY AND PHYSIOLOGY
Kelly Smith
Prof. Vasily Kolchenko

SYMMETRIES AND MODELS OF BARYONS
Masaab Sohaib
Prof. Boris Gelman

DEVELOP AN APPLICATION FOR MOBILE USING LINE WAITING ALGORITHMS
John Soto
Prof. Fangyang Shen

CAD/CAM INTEGRATION IN THE DESIGN OF INJECTION MOLD
Yamba Subba
Prof. Angran Xiao

HIGGS BOSON PHYSICS AT THE LARGE HADRON COLLIDER
Danielle Telemaque
Prof. Andrea Ferroglia

THE APPLICATION OF ANALYZING MATERIAL DENSITY USING SOUND WAVES
C. Daniel Thomas
Prof. Angran Xiao

SIMULATIONS AS A PREDICTOR OF THE FINITE SUMS OF FRACTIONAL POWERS OF UNIFORM DISTRIBUTIONS
Steven Tipton
Prof. Satyanand Singh

DYNAMICS OF BOSE-EINSTEIN CONDENSATE OF MICROACTIVITY POLARITONS
Marieme Toure
Profs. Oleg Berman and German Kolmakov

THE MICROBIOLOGY OF THE BUILT ENVIRONMENT: INVESTIGATING THE PREVALENCE OF ANTIBIOTIC RESISTANT BACTERIA IN DIFFERENT SITES OF CITY TECH
Wing Pan Kenny Tsang
Prof. Davida Smyth

MECHANICAL TESTS OF POLYETHYLENE GLYCOL DISCRYLATE (PEGDA) AND POLYDIMETHYLSILOXANE (PDMS) BASED TISSUE SCAFFOLDS
Yekaterina Ulanova
Prof. Ozlem Yasar

B LYMPHOCYTES AND MULTIPLE SCLEROSIS
Thomas Waters
Prof. Andleeb Zameer

NYC FIRE DEPARTMENT C14 CERTIFICATE OF FITNESS
Associate Provost Pamela Brown • March 27, 2014

AFRICAN BURIAL GROUND NATIONAL MONUMENT
April 4, 2014

STEM C2 RESEARCH SUMMIT
PLTL - Bergen Community College • April 11, 2014

SUPER EXTERIOR CLADDING SYSTEMS
Agata Whyte
Prof. Alexander Aptekar

THE INTERACTION OF PORPHYRIN-RELATED COMPOUNDS WITH PROTEINS
Andrew Wills
Prof. Diana Samaroo

2 BRIDGES REVIEW
LITERARY MAGAZINE INTERNSHIP
Michael Youmans
Prof. George Guida

BOSE-EINSTEIN CONDENSATION OF TRAPPED POLARITONS IN A MICROCAVITY
Mohammad Zilon
Profs. Oleg Berman and German Kolmakov

BROOKHAVEN NATIONAL LABORATORY
April 22, 2014

LEARNING COMMUNITIES
THEME BASED PROJECTS

EXPLORING LIFE
Danielle Assouline, Farhana Azimulla, Rhonneil Cooper, Daphney Delvoix, Shakeyra Edwards-Elliot, Michelle Evans, Anisa Fadel, Christina Gigante, Kisha Hopkins, Bezer Jean-Louis, Hadiqa Latif, Anisa Nawreen, Thalia Ocasio, Quincy Richardson, Keneisha Robinson, Carlos Salazar, Anthony Williams, and Ling Yang

Profs. Andleeb Zameer and Suzanne Miller
BIO 1101: Biology I
ENG 1101: English Composition I

MONEY TALKS:
ECONOMICS AND ENGLISH SEEING GREEN:
THE ECONOMIC CONSEQUENCES OF
LEGAL MARIJUANA
Raj Algoo, Raymond Beck, Dallas Bell, Kevin Bloom, Antonio Burgess, Jia Cao, Christian Cortes, Jonathan Deng, Lissette Estevez, Mohammad Hijazi, Landysh Johnson, Mark Latroy, Khadeem Leiva, Jorge Lima, Isaih Liverpool, Anna Lukasik, Sade Osborne, Dennis Sarceno, Xiao Yu, and Jerry Zhao

Profs. Sean MacDonald and Will Kenton
ECON 1101: Macroeconomics
ENG 1101: English Composition I

DESIGNING A POSTER PRESENTATION
Ms. Jodi Ann Young • April 24, 2014

ETHICS OF SCIENCE
Dr. Nada Gligorov • Spring 2014

SPECIAL PROJECTS

A LIVING LABORATORY: REVITALIZING GENERAL EDUCATION FOR A TWENTY-FIRST CENTURY COLLEGE OF TECHNOLOGY
US Department of Education
Title V Grant #P031S100159
Profs. Jody Rosen and Jenna Spevack

FOSTERING STUDENT PARTICIPATION: STRUCTURE, DESIGN, AND COMMUNICATION ON THE OPENLAB
Shawn Brumell, Matthew Joseph, Shanel Mastroti, Ira Santiago, and Amber Vinson

MAT 3672: Probability and Statistics II
Prof. Satyanand Singh

NORMAL RANDOM VECTORS AND BIVARIATE DISTRIBUTIONS
Kadiatou Camara, Jacky Chen, Md Afzal, Hossain, Peter Lee, Steven Tipton and Roberto Torres

ABSTRACT: In this project we will simulate bivariate data to gain intuition about the bivariate normal distribution by comparing those data to the associated bivariate normal density surface. We will also illustrate results about covariance and correlation and anticipate theorems about transformations of normal random vectors.

RESD 1212: Fixed Prosthodontics II
Prof. Renata Budny

DAMAGED GOODS
Aliki A. Petratos

TEETH MYSTERIES
Maria Francisco

NSF LOUIS STOKES ALLIANCE FOR MINORITY PARTICIPATION (LSAMP) PROGRAM
Program Coordinator: Ms. Jodi-Ann Young

THE INTERACTION OF PORPHYRIN-RELATED COMPOUNDS WITH PROTEINS
Andrew Wills
Prof. Diana Samaroo

QUERYING AND INTERLINKING OPEN LINKED DATA
Adedamola Shomoye
Prof. Benito Mendoza

RESEARCH EXPERIENCES FOR UNDERGRADUATES IN SATELLITE AND GROUND-BASED REMOTE SENSING AT NOAA-CREST 2
National Science Foundation
NSF REU Grant #AGS-1062934
Profs. Reginald Blake and Janet Liou-Mark

LAG-CORRELATION ANALYSIS OF THE APRIL 2013 FLOOD EVENT IN ARGENTINA
Jhonatan Alvizurez

A COMPARISON OF SATELLITE LAND SURFACE TEMPERATURE WITH STATION MEASURED TEMPERATURE FOR IMPROVED DETECTION OF FROZEN GROUND
Sikha Basnet

CORRELATIONS BETWEEN AEROSOLS PSDS & PRECIPITATION IN PUERTO RICO
Sergio Bracho

USING MULTIPLE INSTRUMENT MEASUREMENTS TO ASSESS INTEGRATED WATER VAPOR PATH FROM A MULTISPECTRAL MICROWAVE RADIOMETER
James Fallon

THE EFFECTS OF GLOBAL WARMING ON TEMPERATURE & PRECIPITATION TRENDS IN NORTHEAST AMERICA
Felicia Francis

VALIDATION AND CALIBRATION OF THE SWAT HYDROLOGICAL MODEL AND SNTHERM SNOWPACK MODEL IN WATERSHEDS OF CANNONSVILLE, NEW YORK
Benjamin Joseph

USING REMOTE SENSING AND FIELD OBSERVATIONS OF COLORED DISSOLVED ORGANIC MATERIAL (CDOM) TO IMPROVE UNDERSTANDING OF CARBON DYNAMICS AT THE LAND-OCEAN INTERFACE
Lena Lai

GROUND REFERENCE AND ANCILLARY DATA VALIDATION OF FREEZE-THAW STATE PRODUCTS OF ALASKA
Berenice Oseguera

ESTABLISHING A CORRELATION BETWEEN THE URBAN HEAT ISLAND (UHI) EFFECT IN NEW YORK CITY AND THE LAND COVER
Awolou Sossa

DEVELOPING HIGH RESOLUTION AOD IMAGING COMPATIBLE WITH WEATHER FORECAST MODEL OUTPUTS FOR PM2.5 ESTIMATION
Daniel Vidal

INTER-ANNUAL COMPARISON OF SATELLITE PASSIVE MICROWAVE DATA WITH GROUND BASED RADIOMETRIC MEASUREMENTS
Guan Nian Zeng

IS 901: INDEPENDENT STUDY
MEDU 2901: PEER LEADER TRAINING IN MATHEMATICS

The Black Male Initiative, Perkins VTEA, and CUE Funding
Prof. AE Dreyfuss

HOW CAN THE PEER LEADER GET STUDENTS INVOLVED IN A MARKETING WORKSHOP?
Danny Chen

WHAT ASSUMPTIONS DO STUDENTS MAKE THAT PREVENT LEARNING IN MAT 1175?
Loudia Desir

WASHINGTON, D.C.

HOW DO THE COURSE EXPECTATIONS FOR EMT 1130 AFFECT STUDENTS' WORK PERFORMANCE?
Briyanna Forde

HOW CAN THE PEER LEADER SUPPORT STUDENTS IN STATICS II WORKSHOP WHO DOUBT THEMSELVES?
Kelly Huang

WHAT METHODS DO STUDENTS USE TO BUILD CONCEPTS IN MAT 1175 (FUNDAMENTALS OF MATHEMATICS)?
Rezwon Islam

HOW CAN THE PEER LEADER STRENGTHEN AN UNDERSTANDING OF CAREER ROLES IN A MARKETING WORKSHOP?
Marlon Kitenge

HOW DO VISUAL OR VERBAL EXERCISES AFFECT STUDENTS' ENGAGEMENT IN A MARKETING WORKSHOP?
Brittany Lallkissoon

WHAT ROLE CAN A PEER LEADER TAKE TO ADVANCE A WORKSHOP GROUP'S FUNCTIONING?
Victor Lee

HOW CAN A PEER-LED WORKSHOP IN STATICS PLAY A ROLE IN THE DEVELOPMENT OF FIRST GENERATION COLLEGE STUDENTS?
Roger Brian Mason

HOW CAN THE PEER LEADER HELP STUDENTS DEVELOP HABITS OF PERSEVERANCE IN COLLEGE ALGEBRA & GEOMETRY (MAT 1175)?
Ricky Santana

HOW CAN THE WORKSHOP SETTING PROMOTE CONCEPTUAL UNDERSTANDING IN STATICS I STUDENTS?
Ronald Suarez

WHAT CAN FUTURE MATHEMATICS EDUCATORS GAIN FROM LEADING STUDENTS IN A MAT 1275 WORKSHOP?
Jian Sun

HOW DO EMOTIONS DIRECT PROBLEM-SOLVING EFFORTS IN MAT 1275?
Benjamin Zeng

ACKNOWLEDGEMENTS

To the dedicated professors for mentoring students.

And a heartfelt thank you for your work "behind the scenes" to make this event a successful one:

Dean Karl Botchway
Dean Kevin Hom
Prof. Julia Jordan
Dr. AE Dreyfuss
Ms. Jodi-Ann Young
Ms. Laura Yuen-Lau
Mr. David Turkiew
Mr. George Lowe
Mr. Teddy Adolphe
Mr. Jeff Novak
Mr. Luboš Stepanek
Ms. Shawn Beatty
Mr. Alex Liang
Ms. Mursheda Ahmed
Mr. Christopher Chan

A special thank you to the judges of the poster competition:

Nadia Benakli
Monica Berger
Reginald Blake
Gwen Cohen-Brown
Aida Egues
Paul King
Ariane Masuda
Kara Pasner
Jonas Reitz
Gerarda Shields
Davida Smyth
Melanie Villatoro
Yu Wang
Lin Zhou

A special recognition and appreciation to **Ms. Mandy Mei** for designing the program.

NEW YORK CITY
COLLEGE OF TECHNOLOGY