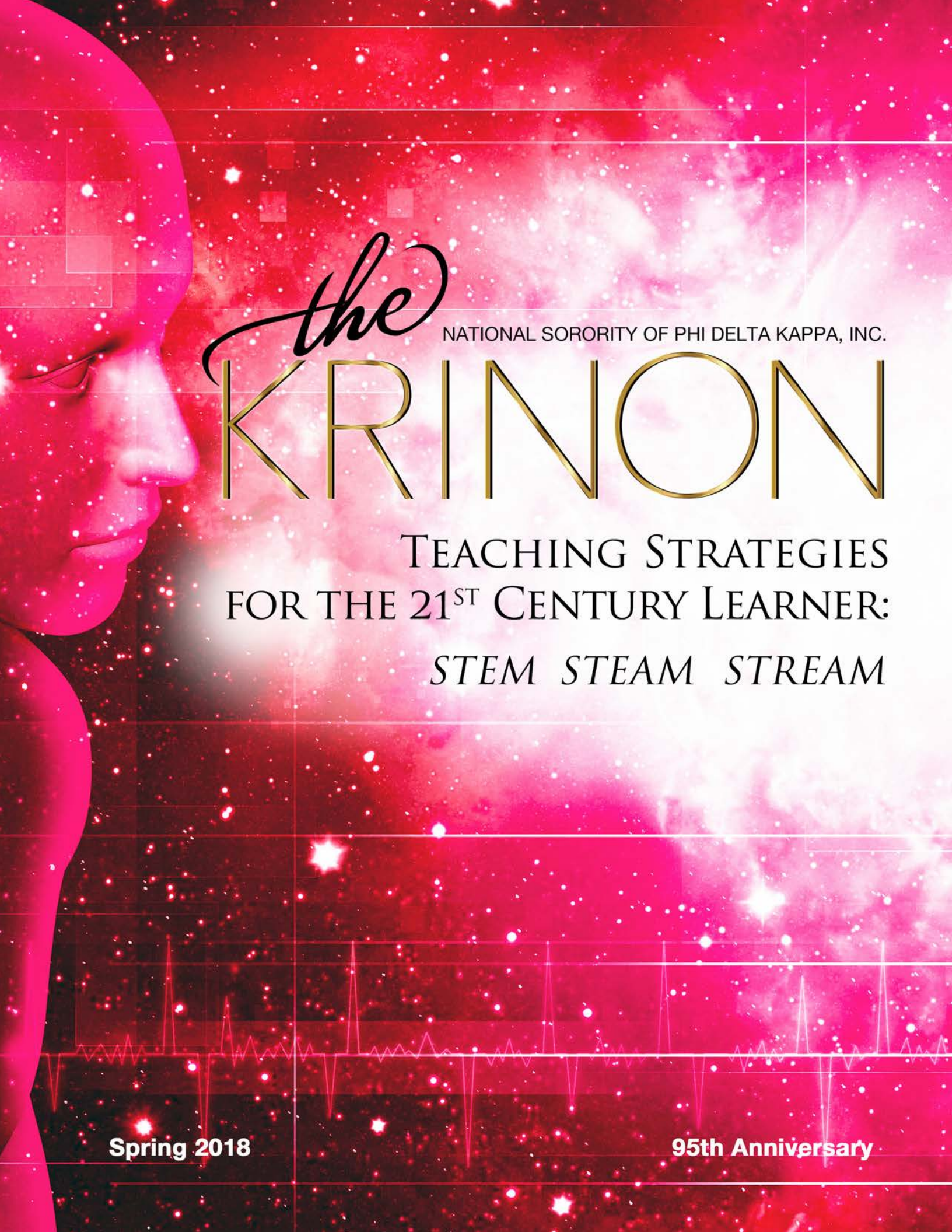

the KRINON

NATIONAL SORORITY OF PHI DELTA KAPPA, INC.

Teaching Strategies for the 21st Century Learner:

STEM STEAM STREAM

Spring 2018

95th Anniversary

NATIONAL SORORITY OF PHI DELTA KAPPA, INC.

About Us

The Sorority was founded in 1923 in Jersey City, New Jersey. Its purpose is:

- To stimulate professional growth among teachers;
- To foster a true spirit of sisterhood;
- To promote the highest ideals of the teaching profession; and
- To encourage the development of the potential of our youth.

There are over one hundred chapters across the United States.

Our Philosophy

The National Sorority of Phi Delta Kappa, Inc. is a professional organization of teachers dedicated to the task of educating youth of America. We believe education to be a potent factor in maintaining and perpetuating democracy as the most ideal form of life. To remain in this position, modern education must provide youth with abilities for developing an integrated personality, assuming a successful place in a group and adjusting to the ever changing problems of society.

Through day by day instruction in the classroom and multiple contacts in the community, the National Sorority of Phi Delta Kappa, Inc. seeks to inform all citizenry of the ever changing problems of our society and to equip them with the necessary social and academic skills to solve these problems according to a true democratic process. In addition, we are committed to celebrating success of individuals and groups and to honoring the legacy of those who have gone on before us. The National Sorority of Phi Delta Kappa, Inc. shall continue to take its rightful place among those who point the way in establishing, maintaining and sustaining avenues of communication between and among all people and in fostering the pursuit of excellence in education.

Purpose

The Krinon is the official journal of the National Sorority of Phi Delta Kappa, Inc. It is published for the purposes of:

- Providing current, relevant facts regarding emerging initiatives, trends and issues which impact education, family, school, and community; and
- Promoting and advancing the interests of the members.

Publication Date

The magazine is published annually.

How to Reach The Krinon Staff

Correspondence, which includes your name, title, email or home address, and telephone number may be sent to the current Chief Editor at nspdkchiefkrinon@gmail.com.

Subscription

Members who are financial before December 1st of the current sororal year will receive a free subscription. Non-member subscription cost $10.00.

Publication Policy

Information submitted must adhere to the established guidelines of the magazine. All submissions are subject to editing for clarity and length. Photographs must be original. Full color, high quality photographs are acceptable.

Special thanks to Frederick Burton Design LLC for its services to this journal.

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NATIONAL SORORITY OF PHI DELTA KAPPA, INC.

the KRINON

Teaching Strategies for the 21st Century Learner:

STEM STEAM STREAM

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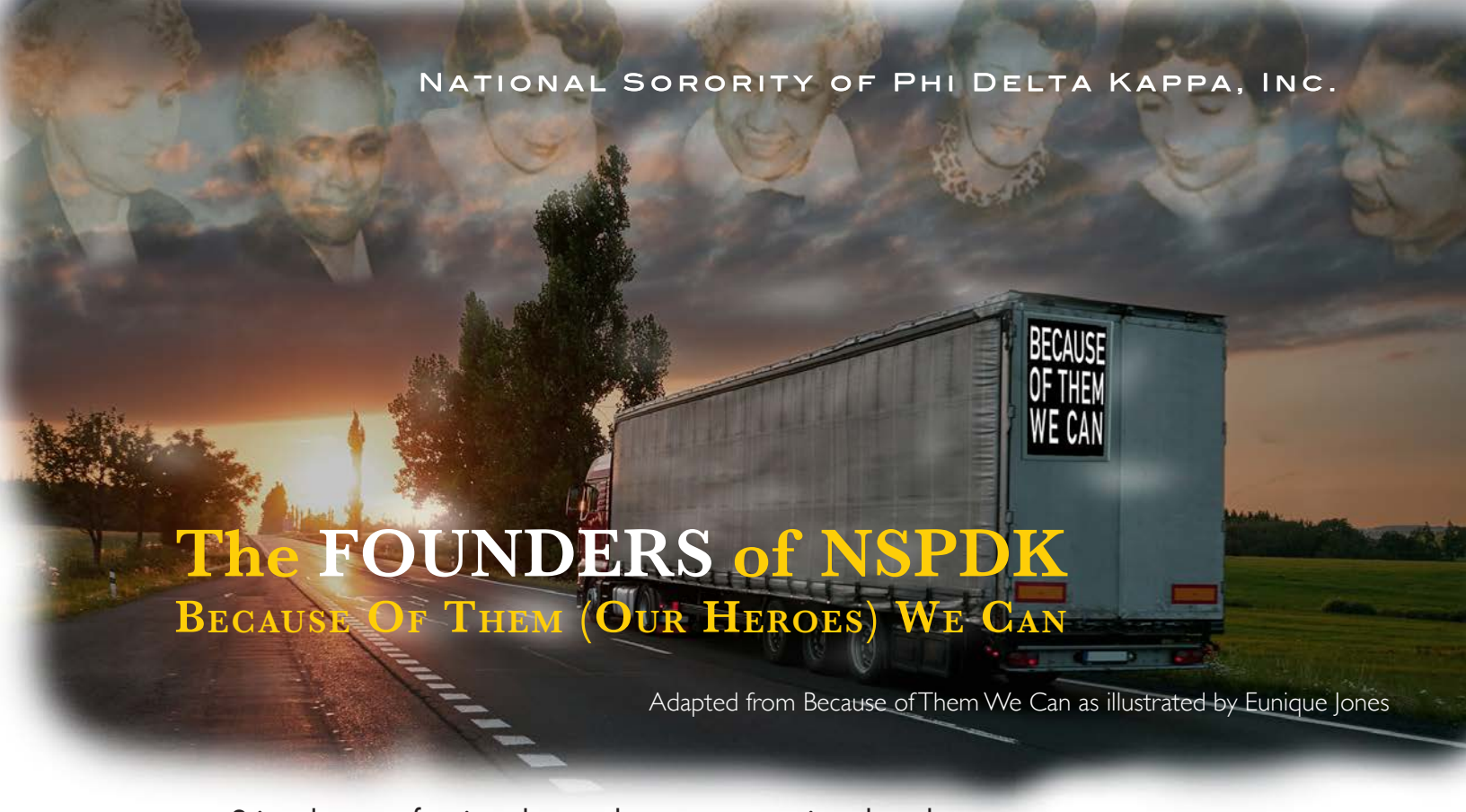
95th Anniversary

Our Founders

Front Row L-R:
Gladys Cannon Nunery, Julia Asbury Barnes, Gladys Merritt Ross (Mother founder), Florence Steel Hunt

Second Row L-R:
Ella Wells Butler, Marguerite Gross, Mildred Morris Williams

Not Pictured
Edna McConnell



The FOUNDERS of NSPDK

Because Of Them (Our Heroes) We Can

Adapted from Because of Them We Can as illustrated by Eunique Jones

Stimulate professional growth among our sisterhood
Promote the highest ideals of teaching
Develop the potential of our youth

BECAUSE OF THEM WE CAN FOCUS ON
Y ~~ Youth ~ Xinos, Kudos, & KOT's
E ~~ Education ~~ Academic issues & trends
S ~~ Service & being visible in the communities we serve

BECAUSE OF THEM WE AFFIRM A STRONG
"Pursuit of Excellence" in education
Support the ethical moral standards of our youth
Public service mission

BECAUSE OF THEM WE HAVE
Purpose
Focus
Willing workers called into our sisterhood

BECAUSE OF THEM WE KNOW & USE REAL FACTS
Educators are real
Resilience is real
Make a way out of no way is real

By Esther Phillips
Delta Beta Chapter
Austin, TX

FOREWORD

An Argument for Interdisciplinary and Creative Approaches to Teaching STEM, STEAM and STREAM

By Carla F. Carter, Ph.D.
Gamma Nu, Chapter
Little Rock Arkansas

In a lecture on Ted Talks, acclaimed astronaut Mae Jemison (Ted Talks 2002) said "we need to revitalize the arts and sciences right now… ." She continued by elaborating further on the debate around the sciences versus the arts. She contended that many school staff and personnel, especially those involved in career counseling and academic mentoring, refer to the sciences as "not being creative," and those students whose passion stem in the creative were told that "the arts aren't analytical."

Growing up, Mae Jemison knew that she was going to be an astronaut. She followed closely the Gemini and Apollo programs in space and had done tons of science projects. But, she also had a passion for fashion design and dance and loved Lola Falana and Alvin Ailey Dance Company.

When she attended Stanford University, she majored in Chemical Engineering. As the Black Student Union President, she found herself during her senior year juggling highly advanced science classes while also producing and choreographing a dance production. While designing the light show, she began to question whether she should go to New York City and become a professional dancer or go to Medical School. Although the latter won over the dancing, she talks about the items that she took into space on her first mission; a poster of Judith Jamison from Alvin Ailey (performing her rendition of CRY, for Black Women Everywhere), a boondoon statue from the Women's Society in Sierra Leon, and a certificate for Chicago Public School students to work together to improve their science and math skills. When asked why she took those items with her, she said because it allowed her to remember the creativity needed to create and launch the space shuttle.

Dr. Jemison believes that the same skill set of imagination and analysis it took to carve a boondoon statue or the ingenuity it took to choreograph, and stage Cry are the same skills needed for the advancement in the sciences. Dr. Jemison (2002) believes, "The difference between art and science is not analytical versus intuitive." In other words, she stressed, (2002) "… science provides an understanding of a universal experience and art provides a universal understanding of a personal experience."

Like Mae Jemison, I can remember cans of paint, styrofoam balls, glitter, paste and card board to make solar systems, volcanoes and other science projects. Science was interdisciplinary and fun on the elementary level. I learned how to mix colors to make the perfect shade for mars, the sun, the moon, larva, and decorate science posters. During the creative process of "the science project," I forgot that I actually thought I hated science. I won

many science fairs, and not because I loved the research, it was the creativity of how to show the project that made me delve into the research.

Somewhere along the line in middle school and high school, when the subjects became isolated, plagued by teachers who loved their subject area but forgot how to passionately teach it to already disgruntled adolescents, the joy and creativity was dwindled done to rote memorization of facts, numbers, statistics and theories. The creativity of science and math was missing. Yet, I remember in visual and performing arts classes, vocabulary words being used from science and math like synthesis of harmony and color to decorate sets; and math equations in music to learn four-four time and eighth notes; like the use of kinetic energy to propel a dancer's body forward to leap. And that is what is happening for many of our students today. They have gone missing from the STEM because that connection between the arts and the sciences and real world everyday function has gone missing. Yet, the world is ever growing and evolving and there is practically no field that a student can achieve without the knowledge of technology, math and science.

This issue of The Krinon examines creative ways to integrate STEM, STEAM and STREAM across disciplines. It is important that all of us pay attention to the language and subtext we are transferring to our students. As teachers we are human, and we can be subjective when it comes to how we view subjects outside our scope of understanding. We don't view students as whole but complex individuals with various passions and interests. We don't take into consideration the contemporary culture of this generation and how they receive and process information. Everything about iGeneration's and Alpha's learning incorporates a series of visual, auditory, kinesthetic and tactile modalities to access and retain information.

We challenge you to incorporate some of the strategies in this issue whether you are a science, math or art teacher. We encourage you to research arts integrated science and math projects and vice versa. One such project is Science Genius which uses hip hop and science vocabulary terms to create "cipher like battle" competitions amongst high school youth in New York City. Dr. Christopher Emdin, Associate Professor in the Department of Mathematics, Science and Technology at Teachers College, Columbia University is the creator of Science Genius and has found that after its implementation into schools, students have increased their interest and their test scores in science and math. For more information on Dr. Emdin, look for him on Ted Talks. But to understand the Science Genius pedagogy, get his book, Urban Science Education, for the Hip-Hop Generation.

If you are an art teacher, ask your science and math colleagues how you can support their areas. Little things like the chemical compounds of colorization (ask any young hairstylist want-to-be) and you will perk their interests right away. Request the assistance of the athletic departments to help with physics formulas. In the visual arts, discuss the properties of alloys and copper for sculpture.

The reason STEAM and STREAM have become more of a focus is because educators finally get that the interdisciplinary aspect of science and math weaved with the arts is just as important for the success of students as the setting up of learning communities and cohorts.

By approaching STEM, STEAM and STREAM as a way of thinking and learning and not as isolated subjects, devoid of the creative thought process of discovery and innovation, we foster in our students a natural curiosity for accessing knowledge for themselves as well as tap into their most artistic pathways to invent, develop and implement new avenues that progress and propel us forward in those fields.

References: Jemison, M., PhD. (2002). Mae Jemison on Teaching Arts and Science Together [Video]. Ted Talks. https://youtu.be/6Vy0ncmUvUw

KRINON INSIDE

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SOCIAL EMOTIONAL DEVELOPMENT

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Supreme Basileus' Greeting

Greetings to all Readers:

Once again, teachers have been called upon to become the conduit by which change will take place in the current and future generation- al workforce. We have been asked to create leaders in the STEM, STEAM and STREAM disciplines. As the world changes, so does the educational system.

In February, 2018 my local newspaper ran a two page article saluting engineers and recognizing National Engineers Week. Although this Spring 2018 edition of The Krinon focuses on STEM, STEAM or STREAM, it wasn't until I began to research the current strategies for instruction in these areas that I became more aware of the need for targeted and integrated instruction in the areas of science, technology, engineering and mathematics, even at the elementary school level. In addition, there are major changes that must take place at all levels of education and across all curricular disciplines.

Architecture and engineering occupations are projected to grow by 7 percent from 2016 to 2026. This is about as fast as the average for all of the other occupations combined, and nearly 195,000 new jobs are projected to be added. During National Engineers Week, teachers were encouraged to provide students time to dream and to dream big. For those dreaming of careers in the STEM disciplines or possessing a passion for making a difference, just think about how great it would be to have the know-how to make those dreams and passions a reality. For students who dream of stars, planets, volcanoes, bridges, trains, flying cars, never-thought-of Olympic feats, or world peace, what a wonderful motivation to receive encouragement to dream big and make those dreams their reality.

STEM is not just about science, technology, engineering and mathematics, but it's about weaving all of the other so-called soft subjects, i.e. creative arts, performing and visual arts, drama and literacy, with technical subjects to create a better product. An example of a current idea that blends these areas into one focus follows. A high school senior is taking a fifth period class in Environmental and Spatial Initiatives (EAST) and is faced with a challenge of converting all of the VHS tapes of the City Council meeting for the past 20 years onto current technology files. The students in the class are asked to use technology to solve anticipated problems and will receive mentoring credits from community leaders for the project.

What this all tells me is that there will always be a need for good teachers. There is a natural curiosity that all children possess. The inquisitive nature of many students has often been suppressed because many felt that certain subjects were not appropriate for all students. It was often assumed that these subjects were much too difficult; the academic-knowledge or skill levels of teachers were not superior, therefore student success was not guaranteed. All of which has been proven false.

I invite you to enjoy this 2018 Edition of "The Krinon" and think seriously about how education is changing to meet the needs of our world.

Moving NSPDK Forward……Together!

Etta F. Carter, Ph.D.
26th Supreme Basileus
2018-2021

You are invited to write a response to this edition of "The Krinon." Contact us at: nspdkhdq@aol.com

Chief Editor's Message

Welcome to "The Krinon" 2018

Prepare yourself for the fabulous and exciting journey you are about to embark on. This adventure will take your creative mind through the five senses of sight, hearing, smell, taste and touch. Get aboard the "Teaching Strategies for the 21st Century Learner: STEM, STEAM, STREAM." On this journey, you will experience:

Sight:	Visualize learning through the eyes of a new generation of learners
Hearing:	Listen to what the author is saying through the ears of the learner
Smell:	Breathe in the fresh and new aroma of STREAM
Taste:	Chew and digest a new flavor of teaching and learning
Touch:	Touch a child's life with the new educational experiences of the 21st century

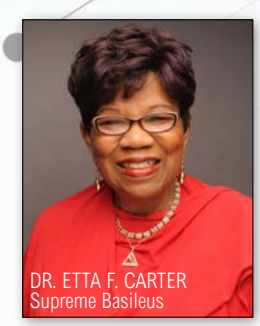
This journal has been created by the members of the National Sorority of Phi Delta Kappa, Inc. for being a beacon of light, as educators, to encourage others as we live and grow in the 21st century. We live in a nation that is experiencing challenge after challenge. Education is a powerful weapon which we can use to make positive changes in the world. We are taking teaching and learning above and beyond. Today's students are moving beyond the basics and embracing the 4Cs, super skills, for the 21st century. Communication is the first "C" which involves sharing thoughts, questions, ideas, and solutions. Collaboration is the second "C" where students work together to reach a goal, putting talent, expertise, and knowledge to work. Critical Thinking, number 3 "C", is looking at problems in a new way. This is where we link learning across subjects and disciplines. Creativity, our fourth "C," is where we try new approaches to get things done through innovation and invention. STREAM encompasses STEM and STEAM as a multidisciplinary approach thereby giving us sound cross curricular teaching. As educators, we no longer live in the one room school house bubble and neither do our students. So, let's join as active teachers and retired teachers being mentors, motivators, and cheerleaders to help our students achieve success in the 21st century.

We are thankful to our Supreme Basileus, Dr. Etta F. Carter, and the Executive Council for our theme "Teaching Strategies for the 21st Century Learner: STEM, STEAM, STREAM." As you read the articles, open your mind and absorb the creativity. STEM, STEAM, STREAM may not always jump right out at you. However, remember we are all 21st century learners.

Fantastic job authors and associate editors, Lindy Perkins (Alpha Rho Chapter, Dallas, TX), Novella Page and Linda Lewis (Alpha Beta Chapter, Nashville, TN). You are greatly appreciated!

Joyce Williams
Chief Editor
Gamma Tau Chapter
San Antonio, TX

National Directorate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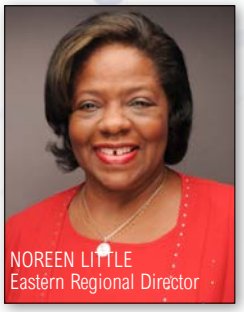
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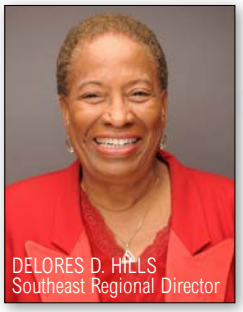
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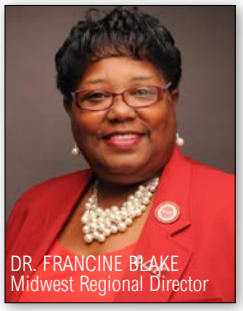
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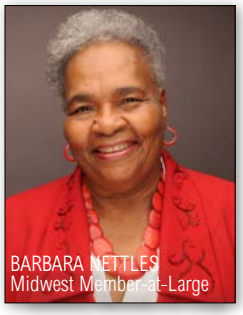
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Perpetual Scholarship Foundation

The Perpetual Scholarship Foundation, Incorporated was established as a non-profit educational tax-exempt 501 (C) (3) foundation, which exists as a subsidiary under the umbrella of the National Sorority of Phi Delta Kappa, Inc. It is managed by a 24-member Board of Directors. The PURPOSE of the Foundation, according to its Articles of Incorporation, is to provide financial support to the scholarship program of the National Sorority of Phi Delta Kappa, Inc. Annually, the Foundation donates funds to the Sorority's general treasury earmarked specifically for educational scholarships for high school girls and boys; and female college students aspiring to become teachers. The Perpetual Foundation also offers scholarships to members of the Sorority who are pursuing a doctoral degree.

Front Row: L-R: Mary Langford, Louise Smith, Kathleen Thomas, Lisa Frieson, Florence O. King, Mary Jane McCoy, Delois Dailey
Back Row: L-R: Suzanne Gibbs, Betty Glover, Jessie Hopkins, Huberdean Lowe, Alleane Butts, Dr. Cynthia Warren, Opal Hampton
Not pictured: Tillie Colter, Margaret Hope

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National Anthropos

The National Anthropos, an affiliate of the National Sorority of Phi Delta Kappa, Inc. was founded in 1979. It was the successor to the Sorority's "Men In Our Lives" which was formed in 1949. The intent of the National Anthropos is to take part in, assist, and support the activities of the Sorority in the areas of education, youth development, social interaction, and other areas. Their allegiance is first and foremost to the National Sorority of Phi Delta Kappa, Inc. resulting from the very special relationship of its men to the women of the Sorority. Anthropos membership is open to any male friend of Sorors in good standing, including spouse, relative, or friend. The Anthropos welcome young men who have been Kudos, have shown interest in continued affiliation, and who are sponsored by a Soror. The primary focus of the National Anthropos is Recruitment, Retention, and Communication. The National Anthropos are dependent on the Sorors for new Anthropos. We are committed to developing compelling programs to keep Anthropos engaged throughout the year. The National Anthropos are dedicated, committed and supportive of the National Sorority of Phi Delta Kappa, Inc. Visit their website at www.nationalanthropos.com.

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Chief Editor

Joyce Williams is a Life Member of the National Sorority of Phi Delta Kappa, Inc. She was inducted into the Gamma Tau Chapter in San Antonio, TX in 1985, currently serving in her thirty third year. Her education was completed in the city of San Antonio, receiving a Bachelor of Science degree in Elementary Education from Our Lady of the Lake University and a Master of Arts degree in Educational Psychology (Guidance and Counseling) from the University of Texas at San Antonio. Professionally, as an educator, she spent her entire career employed by the San Antonio Independent School District. She taught fifth grade (all subjects) for nine years. As a counselor, she served ten years on the elementary level and then advanced to the middle school level for nine years and eight years on the high school level. She retired with a total of thirty six years, all with San Antonio ISD. Even though she is officially retired, she still works for the district on a part time basis as a school counselor.

As a member of the National Sorority of Phi Delta Kappa, Inc. she has served as Tamias, Tamiouchos, 1st Anti Basileus, Basileus, Executive Advisor, Xinos Advisor and scholarship chair. On the regional level, she has served as Regional Epistoleus, SW Region Xinos Chair, and SW Region Membership Chair. Other memberships include National Education Association, Texas School Counseling Association, Sigma Gamma Rho Sorority, and Maranatha Bible Church. Part time profession is photography, graphic designing of souvenir booklets, videography, and physical fitness.

Joyce Williams
Chief Editor, The Krinon
Gamma Tau Chapter, San Antonio, TX

Associate Editors

Soror Linda Lewis is Alpha Beta's second newest initiate, and the only Local Honorary Member of the Southeast Region. Since moving to Nashville in 1996, she has served as consultant to various chapter officers, and produced a standardized Krinon Club Manual. She is a proud Vietnam Veteran, having served in the United States Air Force for six years as an Instructional Designer, Technical Writer and Training Administrator. She holds the rank of Major in the United States Air Force Auxiliary (Civil Air Patrol) where she currently serves as both Aerospace Education Officer and Professional Development Officer, overseeing the training for her squadron's adult members. In her spare time, Soror Lewis assists various individuals in learning basic computer skills, consults in the technical aspect of preparing doctoral dissertations, and oversees her two curated newsletters – The Alpha Beta Gazette and The MOOC Abstract.

Linda D. Lewis
Alpha Beta Chapter
Nashville, TN

Greetings Sorors,

I feel honored to be selected to serve as a proof reader for The Krinon Magazine Committee of The National Sorority of Phi Delta Kappa, Inc. Please take some time to get to know the layout of our Krinon Magazine. You will notice our Philosophy, Purpose and Publication information is usually on the inside cover followed by the table of contents.

You can look at one category at a time or just peruse the articles and choose which to read first. Just as with a paper magazine, you may want to sit and read the whole thing at once or come back to this issue several times to digest the articles more slowly. As educators, many articles will be helpful ideas that can be utilized in your setting.

I believe that no matter whether The Krinon Magazine is delivered to your doorstep or to your computer, printed on glossy stock or on cheap tabloid paper, appearing on your iPad or your cell-phone screen, it cannot be accomplished without you, the Sorors of the National Sorority of Phi Delta Kappa, Inc. Please commit yourself to submitting educational articles that we can share with other sorors.

"Education is a shared commitment between dedicated teachers, motivated students and enthusiastic parents with high expectations." I challenge all my Sister educators, both active and retired, to make the 2018 year one of best ever by being effective and efficient as an educator.

Novella M. Page
Alpha Beta Chapter
Nashville, TN

Greetings,

As we answer the call to do "even more," it is apparent that more needs to be done. I am certainly appreciative of serving and working for a great organization such as the National Sorority of Phi Delta Kappa, Inc. The resources and information you provide for The Krinon helps to make a difference in someone's life. NSPDK brings a wealth of knowledge that reaches out and makes a person's path just a little easier.

As educators, it is our task to be intentional about educating children and driving them towards mastery. It is also our task to be intentional about empowering others with a plethora of skills to transform their lives. The Krinon allows educators to share best practices, experiences and knowledge with a large audience of individuals.

I find it most humbling to be a part of this dynamic contribution to education. Please continue to share your concerted influence. The depth and breadth of your collective educational experiences will surely transform our society.

Dr. Lindy M. Perkins
Alpha Rho Chapter
Dallas, TX

Eastern Region

Dear Sorors and Friends of Public Education,

We have seen the pendulum for education swing from left to right and back again. In the 1950s and 1960s, we were taught a well-rounded in depth education; at the time, we were training to work in factories or offices. Young ladies were encouraged to go into the fields of education or nursing; times were simpler.

In 1986, Lucy Calkins, Columbia University, introduced the Writing Workshop to the New York City Public Schools. Its purpose was to get children writing at the earliest stages of their education. In 2003, the Reading Workshop and Writing Workshop became the curriculum for all elementary and middle schools; and while it was touted as the standard for raising student achievement, it fell short on teaching handwriting, phonics and spelling.

As we progressed into the technological age, selecting, purchasing and utilizing computers, hardware and software in our classrooms, it became clear that our students needed more emphasis in science and math, thus the birth of STEM. As you know, science and math require much reading with greater specificity and technological vocabulary. How then does one succeed if reading skills are underdeveloped?

As a reading teacher, inclusion of reading/writing into the various programs is personally gratifying. It is widely known that all the information young people require for success has been already written somewhere. They need only to read to broaden their discoveries. These findings and discoveries must then also be written for understanding by others.

Reading, writing, and speaking (verbal communication skills) enhance one's technological and scientific proficiency; thereby shaping the skills for sharing the information in a coherent manner. Consequently, my message to educators and to parents is to continue to read to/and with children daily. Talk to them about what they have read, expose them to the world around them; a walk in the park, a trip to the public library, a ride to the super market, all experiences to provide them with rich opportunities to read and write that well. The need to be more than proficient writers is not diminished by technology, it only increases exponentially.

Teaching to the "whole child" has become a focus for those of us in public education! We cannot afford to let our children fall through the cracks. This focus has led to our doing all that we can to propel them towards success. As a result, the arts must not be forgotten. In addition to producing our entertainers and creative artists, this discipline is required to keep children focused, while motivating others to learn and do well academically, particularly in the areas of technology and mathematics. We can't let our children down!

It is our job to advocate not only for the programs we want in our schools, but for equity we deserve in our school districts. Policy makers must be urged to fund the needed co-curricular programs; arts, reading and writing, as well as our library systems if we are to succeed in today's global job market.

Our children must have full access to acquiring technology skills and effective communication skills as well! Let's move forward with STREAM and create leaders we can be proud of!

Sisterly,

Noreen Little
Eastern Regional Director

Southeast Region

Greetings,

It is a pleasure to extend greetings on behalf of the members of the Mighty Southeast Region of the National Sorority of Phi Delta Kappa, Inc. and to thank The Krinon for this opportunity. The Southeast Region had a very successful, educational, uplifting and focused 50th Regional Conference April 13th-16th, 2017 hosted by Upsilon Chapter, at the Embassy Suites by Hilton in Montgomery, Alabama.

The Region's Theme: SER Emphasizes "Education: A Tool for Economic Prosperity," and the Conference Theme, "50 Golden Years of Memories, Legacies and Enhanced Sisterhood," were in concert with our national focus "Moving NSPDK Forward...Together."

The field of education presents numerous challenges that demand more creative teaching styles to reach the varied learning methods. Our Every Member Forum program addressed one possible solution by presenting a game show where the emphasis centered on "What You Know About PDK." The game show host asked questions about the duties and responsibilities of various officers, role played an activity of a specific committee chair, then challenged the members to positively respond with three responsibilities of said chair. The professional development workshop encourages teachers and administrators to continue classes and workshops available locally and statewide through continuing educational programs. We were treated to a sparkling presentation by Zeta Delta, Selma, Alabama, the newest chapter to our sisterhood. I am delighted to announce that Tuskegee University has appointed nursing education veteran Dr. Constance Smith Hendricks as its new Dean of School of Nursing and Allied Health, effective January 2, 2018. Dr. Hendricks served as a professor and Nursing Administrator at the community hospital in 2010 at Tuskegee. Formally, she was employed at Concordia College Alabama where she was the founding chair of the Division of Health Sciences. It was through Dr. Hendricks' concerted efforts that Delta Zeta Chapter became a reality. The Southeast Region thanks our beautiful Soror Hendricks and sends Kudos to all participants, assistants and readers of The Krinon.

Delores D. Hills
Southeast Regional Director

Midwest Region

Dear Sorors,

I humbly and gratefully extend greetings to our Supreme Basileus, Executive Council, and Sorors of our illustrious Sorority. Greetings from the "Making A Difference" Midwest Region and our twenty phenomenal chapters.

The Krinon's theme, "Teaching Strategies for the 21st Century Learner: STEM, STEAM, STREAM," is an appropriate theme as we guide our youth today. With the world moving fast and furious in the areas of technology, engineering, mathematics and science, we need to continue to guide our youth to leave their mark in history.

This year our Xinos/Kudos conference was held in Alsip, Illinois, hosted by Beta Mu Chapter with the theme "Pride in the Past, Faith in the Future." With this theme, our youth were able to take a good long look at where we have been, along with the struggles and the unique accomplishments we have made throughout history. They were able to see our struggles as a people, yet have the faith in what they have to offer in the future in the sciences using robotics, technology, and mathematics challenging their minds and their hands for good.

Our Midwest Regional Conference will be held in Kansas City, Kansas, at the Sheraton Overland Park, Overland Park, Kansas, host chapter Alpha Alpha, May 4-6, 2018. "Pursuing Excellence Through Education" is the charge our founding Sorors set before us. The Midwest will celebrate their 78th Regional Conference and together we will continue to equip ourselves with the tools needed to continue to be "MAD," Making A Difference in the lives of our children.

To my Sorors in this illustrious Sorority; continue the struggle.

"Give instruction to the wise, and they will become wiser still; teach the righteous and they will gain in learning." – Proverbs 9:9 (NRSV)

MAD LOVE for PDK,

Rev. Dr. Francine E. Blake
Midwest Regional Director

Southwest Region

Dear Sorors,

I bring you well wishes from the Southwest Region. I begin this greeting with much concern and encouragement for people of color. We are truly experiencing troubling times in our Nation. As people of color, we are facing dire economic, health and social injustices under the current Republican leadership. The time has come for us to be pro-active. We must take a firm stand against the social, racial and political injustices of this administration. We must seize the opportunity, as black educators, to positively impact the young minds and parents we encounter on a daily basis. We must be vigilant in our efforts to develop educational opportunities for all children and promote family values. We must continue to be of service in our communities by promoting the highest ideals of the teaching profession. With this in mind, I leave this thought with a quote from Maya Angelou, " History despite its wrenching pain, cannot be unlived, but if faced with courage, need not be lived again."

The Southwest Region continues to SOAR as we prepare for our upcoming conferences. We are committed in our endeavors to embrace new challenges and recommitted to standards of excellence in education. We are challenged to embrace the obstacles of a global society. As African-American educators, we will continue and enhance our efforts to raise the bar in education and promote the development of every youth's potential.

In conclusion, the Southwest Region will continue to meet the challenges set by our National Directorate and our respective communities. We will continue to work to pursue excellence and embrace the highest standards in education. The Southwest Region will continue to S.O.A.R. promoting Sisterhood, embracing Opportunities, taking Action and getting positive Results. I encourage each of you to take flight and S.O.A.R.

Sisterly,

Dr. Sylvia M. Williams
Southwest Regional Director

Far West Region

Greetings from the Far West Regional Director

It is my privilege to greet you and to extend a warm welcome to you on behalf of the small but mighty resilient Far West Region.

Our mission as educators is to provide quality education for all. As we embrace the 21st century as educators, excellence in education should be our goal. Excellent is an attitude that educators, community leaders and students must pursue until it becomes a habit. To be successful, efforts must be focused on improving schools and raising student's achievement utilizing innovated teaching strategies. Two of these strategies or teaching models that I would like to address is STEM and STEAM. These two innovated approaches connect education, technology and art. This approach is designed as a guide to prepare the 21st century student for a global society. STEM education encompasses the processes of critical thinking, analysis and collaboration in which students integrate the processes and concepts in the real-world contexts of science, technology, engineering and mathematics, fostering the development of STEM skills and competencies for college, career and life. STEAM on the other hand takes the process a step further by focusing on the "arts" as well. It is a variation of STEM. STEAM stands for science, technology, engineering, the arts and mathematics.

The instructions we follow and give determine the future you, you and you create. By utilizing the two new innovative teaching strategies of STEM and STEAM students will be able to face challenges that confront them in the global world in the 21st century.

Velma Brown
Far West Regional Director

Youth Education Service

INTERNATIONAL PROJECTS
NATIONAL PROJECTS
LOCAL PROJECTS
NUTRITION, HEALTH & HYPERTENSION
ASSAULT ON ILLITERACY
CHILDREN & ADULT BENEFITS
EARLY CHILDHOOD
TOUCH-A-CHILD
SECOND CAREERS
RETIRED SORORS
VOLUNTEERS
FOUNDERS DAY
EDUCATION
HUMAN RIGHTS

SCHOLARSHIP
READING POWER
AFRICAN AMERICAN HISTORY
COMPUTER LITERACY
MATHEMATICS
TEACH-A-RAMA
LEADERSHIP TRAINING
PUBLIC RELATIONS
ACADEMIC ISSUES
CURRENT TRENDS
COMMISSION ON CIVIL RIGHTS

YOUTH GUIDANCE
XINOS (HIGH SCHOOL GIRLS)
KUDOS (HIGH SCHOOL BOYS)
COLLEGE GUIDANCE
KAPPA OMICRON TAU (KOT)

21st Century TEACHPRENEURS

Close your eyes — literally — and think for sixty seconds about our world. Is it changing? With that being said, how are you connecting literacy in the classroom with the "real world?" How are you allowing students to research, apply and deliver their interest and ideas in the classroom (EZONE, 2016)? How are you preparing them to be life-long learners and maintain their interests within the school and community? Let us explore flexible resource tools that can be implemented in reading.

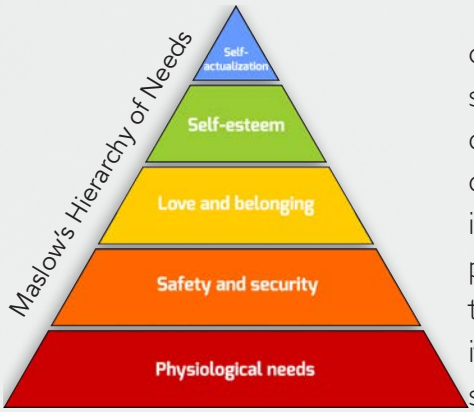
As we explore the resource tools, remember literacy is constantly changing, and we must adapt with change. As an advocate for students, "What 21st century skills are you using to regulate students temperature?" In order to understand and regulate students "temperatures," one must understand one or more of Vygotsky's multiple intelligences. For example, during free play, two year old Kevin loves to draw illustrations and engulfs the sensory area. The teacher observed over a two week period that Kevin uses both visual and kinesthetic intelligences.

Furthermore, how we implement students' intelligences, plus nurture them into orchestrators in the classroom is important. The National Education Association (NEA) cited on their website, four C's of 21st century learning (NEA, 2017):

The four Cs of 21st century learning are: Communication, Creativity, Collaboration, and Critical Thinking

Communication

As a current reading specialist, communication is valuable. We must communicate to our students and their families how we are going to create orchestrators within our society. Communication allows **TEACHPRENUERS** to create, develop, investigate and hypothesize student's self-actualization. In the diagram below, what do you notice about the first component a student needs? Yes, you answered correctly. In order to nurture them into orchestrators, we must ensure they have the essential basic needs.



As former President Barack Obama stated in a press conference on education "…education is no longer just a pathway to opportunity and success, it's a prerequisite for success." In order to have success, students' basic physiological needs must be met.

Creativity

Creative **TEACHPRENUERS** allow students to take intellectual risks, foster learning ideas and nurture incremental and radical concepts. Creativity allows students to develop and create their inner self. During instructional activities like reading and writing, they learn their strengths and challenges which helps them cultivate and find their inner self as well as what they were created to become in life.

Collaboration

In the Seven Challenges Workbook (2015), one challenge is to have deep conversations. You do this by listening and repeating in your own words what you just heard from the speaker's point of view. It allows the speaker to feel satisfaction. While teaching reading, you must adapt mentally how to communicate with other like-minded educational advocates and families. Collaborating helps explain intent as well as invites consent from the listener.

Furthermore, collaborating with families can make a HUGE difference. If you diligently involve all parties in the learning process, explain your conversational intent and allow them to consent, they will be fully committed (Rivers, 2015).

Critical Thinking

As we know, our world is changing and students' "temperatures" regulate at various degrees based upon **TEACHPRENUERS'** professional guidance. We must create an atmosphere which cultivates an effective paradigm. In this quadrant, as an educational advocate for literacy, let's hearken student-centered classrooms and teach them to become orchestrators. This approach will prepare them for real life and create knowledge and wisdom, so they will notice and understand how to handle challenges involving world issues.

In conclusion, our world is changing and so are the children in the 21st century. As educational advocates and **TEACHPRENUERS**, we must constantly encourage communication, collaboration, creativity and critical thinking during literacy. As Ms. Lumas, lead consultant of EZONE, Educational Resources and Consulting says, we will research, apply and deliver!

By Maureen Simmons
Alpha Nu Chapter
St. Louis, MO

References: Lumas, Siyan. Ezone. Research, deliver, and apply. Retrieved from info@ezoneresources.com, December 12, 2017; Montopoli, Brian. (2009). Obama's remarks on education. Retrieved from https://www.cbsnews.com/news/obamas-remarks-on-education/ on December 12, 2017; National Education Association. Preparing 21st century students for a global society; an educator's guide to the four C's.

If We Introduce S.T.R.E.A.M. in Pre-Kindergarten & Kindergarten, Will Our Students Sink or Swim?

Navigating through the rigorous rapids of S.T.R.E.A.M. is not easy work. Educators need access to a compass and equipment to guide the students through the twists and turns of S.T.R.E.A.M., and the process begins as early as pre-kindergarten.

What is S.T.R.E.A.M.? S.T.R.E.A.M. is the combination of science, technology, reading & writing, engineering, art, and math. If we educators do not give students the proper guidance, a compass, tools that enhance their skills, and an oar, they will be up-the-creek without a paddle.

Pre-kindergarten and kindergarten are where students are exposed to learned optimism, enveloped in resilience and social agility. Character strengths, including self-control and willpower (or grit), serve as the compass to academic success. Students are taught to work hard, be nice, and that there are no shortcuts in learning. Good habits promote discipline, and quality character strengths display curiosity, optimism, gratitude, social intelligence, zest, self-control, and grit. We

must also add perseverance and empathy to the academic mechanism for students to understand and embrace the need for the compass or guidance.

Once we lay the foundation for the journey to and through S.T.R.E.A.M., students must take master lessons on how to use and get the maximum performance from the equipment, the oars.

During pre-kindergarten and kindergarten, we must expose students to science. Science can be integrated across the curriculum because it is a natural fit for the way children see the world. Inquisitiveness in the area of science gives children the building blocks to learn how to observe our world, asks questions, and problem solve.

In this fast-paced world, exposing pre-kindergarten and kindergarten to technology is a MUST! Technology governs every aspect of our society today. Technology is a valuable tool in the classroom when used to enhance learning and support instruction. Children at this age are native to technology, so if education appropriately applies technology, students will be able to navigate through this twist of the rapids.

Pre-kindergarten and kindergarten children are drawn to Lego and K'Nex building sets, engineering. They have innate ability to creatively build a structure in their mind and then physically show it through their building blocks representation. At times, when the educator solicited to look at their invention has no real concept of what it is they are looking at, the child can articulate just what it is they have created, how it works, and why it is needed. It is at *this* point in the learning process that we, the educators, must cultivate this learning experience, secure the foundation of invention, and facilitate engineering thinking.

In the area of art within the rapids of S.T.R.E.A.M., this oar comes as second nature to children. Pre-kindergarten and kindergarten students love to create through art. As with engineering, once the children complete their masterpiece, they are more than willing to share their design and what their imagination is creating. Many mediums of art can be used to enhance learning in this area of S.T.R.E.A.M. for pre-kindergarten and kindergarten. As educators, it is our responsibility to lay the foundation and expose our students to the many areas of art and creativity. Supplying this tool in the navigation of S.T.R.E.A.M. will help students master this concept with confidence.

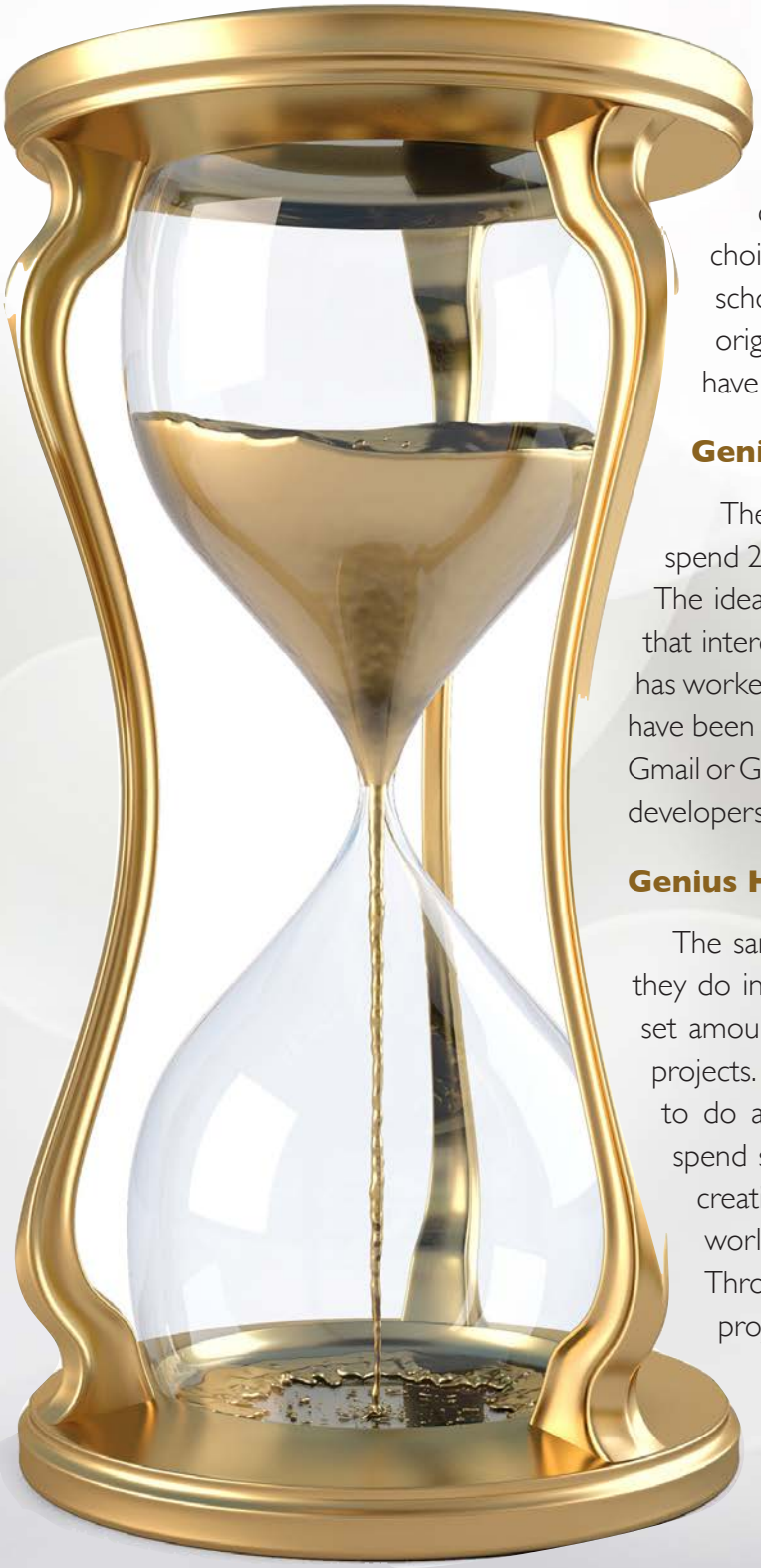
Math is the anchor of S.T.R.E.A.M. In every aspect of this concept math has a skill level that builds upon the previous experience and allows the pre-kindergarten and kindergarten student to navigate the rapids of S.T.R.E.A.M. through analytical thinking. Math is the ultimate puzzle for this age group. Students are creatively engaged in meeting the challenge of creating what is in their imagination.

There are four areas of development in children's learning: language, physical, social-emotional, and cognitive. The four categories are closely related and often overlap. For students to successfully navigate S.T.R.E.A.M., we as educators must master development in these areas. Progress in one area reciprocally affects and influences progress in all the other areas.

As stated before, navigating through the many rapids of S.T.R.E.A.M. is not easy work, but if we are to assist our students in the process, we must lay the foundation in pre-kindergarten and kindergarten by supplying the compass through guidance and developing and fine-tuning the tools/equipment, the oars. In using best practices within our instructions, we can teach our students to navigate S.T.R.E.A.M successfully.

By Danielle Williams
Delta Phi Chapter
New Haven, CT

AN OVERVIEW OF THE GENIUS HOUR:
If You Had an Hour Per Day to Unleash Your Creativity, *What Could You Produce?*



What is Genius Hour? [1]

Genius hour is a movement that allows students to explore their own passions and encourages creativity in the classroom. It provides students a choice in what they learn during a set period of time during school. It's not easy to determine where the idea was originally created, but there are at least two events that have impacted genius hour.

Genius Hour Origins

The search-engine giant, Google, allows its engineers to spend 20% of their time to work on any pet project they want. The idea is very simple. Allow people to work on something that interests them and productivity will go up. Google's policy has worked so well that it has been said 50% of Google's projects have been created during this creative time period. Ever heard of Gmail or Google News? These projects are creations by passionate developers that blossomed from their 20-time projects.

Genius Hour in Education

The same Genius Hour principles apply in the classroom as they do in the corporate environment. The teacher provides a set amount of time for the students to work on their passion projects. Students are then challenged to explore something to do a project over that they want to learn about. They spend several weeks researching the topic before they start creating a product that will be shared with the class/school/world. Deadlines are limited and creativity is encouraged. Throughout the process the teacher facilitates the student projects to ensure that they are on task.

There are many educators leading the way with passion projects in their classes, but much of their inspiration came from the book The Passion-Driven Classroom: A Framework for Teaching & Learning by Angela Maiers and Amy Sandoval.

Many teachers are raving about the autonomy that students are finding in their classes, including myself. I have been leading a group of 6th graders through the genius hour process this year and it has been very rewarding to watch them learn. A goal of every teach should be to create lifelong learners. Genius hour projects are a huge step towards that goal.

How Does Genius Hour Work in School?[2]

Genius Hour begins with a simple premise. Give your students 20% of their class time to learn what they want. They choose the content while also mastering skills and hitting the academic standards.

With Genius Hour, students own the entire journey:

- They choose the topics based upon their own geeky interests.
- It doesn't have to be a traditionally academic area. They might like fashion or food or sports or Legos or Minecraft or deep sea creatures.
- They can then match these topics with topic-neutral standards.
- Students ask the questions and engage in their own research to find the answers.
- Along the way, they design their own plan of instruction. They decide on the resources and activities. Each student sets goals and engages in self-assessment.
- They work at their own pace and set their own deadlines.
- Students decide on the grouping. Some work alone. Others work in pairs or small groups.

In the end, students figure out what they will make and how they will share their learning with the world.

A word of caution: It's not a free-for-all. The best Genius Hour projects have systems and structures that empower students to reach their full potential. Even so, there will be mistakes. You'll have to experiment. But in the end, students are empowered to be self-directed learners, engaging in creativity and critical thinking. In other words, they own the learning.

S.T.R.E.A.M. Reassigned

What could a retired educator do with a Genius Hour? I decided to explore this by setting aside one hour (it actually took three) to exercise some creativity in my spiritual practice. In so doing, I reassigned the letters of the S.T.R.E.A.M. acronym as follows:

Silence/Stillness: During your daily quiet time, turn off the TV, PC, phone, etc.
Thankfulness: Every day, write in your journal five things for which you are grateful.
Releasing: Forgive those who have wronged you, whether or not they ask for it.
Eucharist: Partake of Holy Communion as often as your faith tradition allows.
Adoration: Have regular dates with God, the lover of your soul.
Music: This refers to uplifting sounds, not meaningless or irritating noise.

So, the result of my Genius Hour is this:

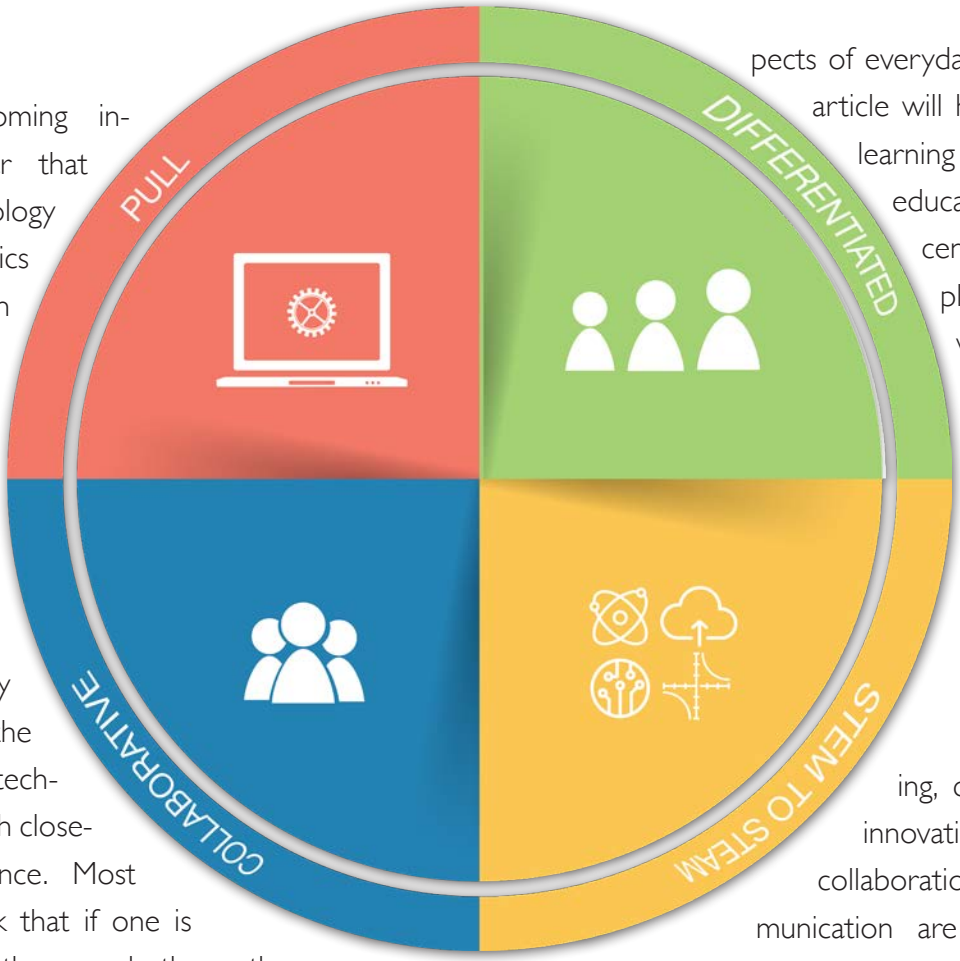
Silence+Thanksgiving+Releasing+Eucharist+Adorati on+ Music = An UpSTREAM Spiritual Practice!

By Linda D. Lewis
Alpha Beta Chapter
Nashville, TN

***Recommended Reading and Viewing**: John Spencer's YouTube Video List: https://www.youtube.com/user/OurSocialVoice/videos; Videos by SoulPancake's Kid President: (watch ALL of them!): Kid President's Pep Talk to Teachers and Students, https://ww.youtube.com/watch?v=RwlhUcSGqgs; A Pep Talk from Kid President to You, https://www.youtube.com/watch?v=l-gQLqv9f4o; How to Change the World (a work in progress), https://www.youtube.com/watch?v=4z7gDsSKUmU; Kid President's 20 Things We Should Say More Often, https://www.youtube.com/watch?v=m5yCOSHeYn4; Kid President Needs All Moms to See This! https://www.youtube.com/watch?v=GIeKpyZhR18; Awesome Girls! https://www.youtube.com/watch?v=g-pGp7E-NxU; Kid President's 25 Reasons to be Thankful! https://www.youtube.com/watch?v=yA5Qpt1JRE4; Kid President Changes the Future, https://www.youtube.com/watch?v=C1XltS91WDI; Kid President's Letter to A Person On Their First Day Here, https://www.youtube.com/watch?v=l5-EwrhsMzY; 30 Minutes of Uninterrupted Kid President, https://www.youtube.com/watch?v=a2sx8Ytl-*

***References**: (1) YouTube. (September 6, 2016). What is Genius Hour? Introduction to Genius Hour in the Classroom[Video file]. Reviewed from https://www.youtube.com/watch?v=NMFQUtHsWhc&feature=youtu.be; (2) YouTube. (2017, March 9, 2017). What is Genius Hour? An overview of Genius Hour and 20% time in the classroom [Video file]. Reviewed from https://www.youtube.com/watch?v=2n7EelMbzG0*

21st Century Learning Strategies that Enhance Math or Technology



Introduction

It is becoming increasingly clear that having technology or mathematics knowledge in the 21st century will be a vital component of success in areas of employment. The present society seems to link the knowledge of technology and math closely to intelligence. Most individuals think that if one is intelligent, then they can do the math and have the technological know-how, while those that are not extremely intelligent cannot grasp math concepts, and do not possess technological knowledge. I have observed, during my experience as an educator for over 40 years, that a majority of elementary and high school students in urban school districts attend remedial programs (Guyotte et al., 2015). About 90% of these students will not finish the course and will end up dropping out of the class and later school. In this regard, technology and math are no longer solitary subjects; rather they are two subjects that are integrated into many aspects of everyday learning. This article will highlight briefly learning strategies that educators in the 21st century are implementing and will enhance, as well as bridge math and technology.

Pull Learning

Problem-solving, critical thinking, innovation, creativity, collaboration, and communication are all strategies that are used in teaching math and technology in the 21st century. What differentiates the 21st century technology and math classrooms is how the learning experience evolves rather than simply using learning resources, online tools, and program adoptions. Understanding the differences between a 'push and pull' learning is what is required in the development of skills and knowledge which are both crucial in the expansion of learning. Sometimes, I wonder if the question that teachers ought to address is whether their classrooms are designed to pull learning because, a pull learning environment supports learners to learn at different

rates, be actively engaged, and have an in-depth and rich inquiry in the learning process (Brownlie, Feniak & Schnellert, 2016). Often, our current educational system is intended for instructional efficiency that only push information rather than pulling authentic learning. Authentic learning provides the students with ownership of the choices, struggles, feedback, application, success, and discovery in their learning paths. To achieve an authentic learning framework, the system must adopt practices that are centered on an analysis or exploratory real-world methodology.

Differentiated Learning

Accordingly, educators should adopt learning experiences that differentiate among the individual learning requirements of students in that classroom. For students to achieve in math or technology, confidence is deemed to be a massive factor. I propose that students of the 21st century will find success by completing problems at their level of understanding which then will propel them to the next academic level. To further help individual students, teachers should ensure not to practice giving predetermined questions. Instead, they should create an understanding with the students by listening to their opinions and ideas and use procedures that will create interesting theoretical questions. These types of questions help to push the student's thought process as the questions begin to test their knowledge related to their ideas. Routine, questions should be avoided, and teachers should instead challenge their logical and critical thinking style.

STEM to STEAM Learning

Another strategy adopted in the 21st century that will enhance math and technology is through the use of STEAM education. STEAM education stands for science, technology, engineering and mathematics (Guyotte et al., 2015). This author believes that this type of education must include the arts, recognizing that for students to be successful in technical subjects like math and technology, learners should be creative and use critical thinking, which is enhanced by their exposure to the field of science. STEAM subjects helps learners develop vital interpretative skills, expanded learning, contributes to problem-solving and critical thinking. Other skills perfected by the STEAM approach are innovation and creativity, cross-cultural and social skills, adaptability and flexibility. Students must perfect these vital skills if they want to be successful in learning math and technology.

Collaborative Learning

Yet another strategy that was adopted in the 21st century classrooms to enhance math and technology is the use of collaborative learning that is self-paced. The self-paced learning allows the students to come up with their own understanding of the learning materials. Business leaders look for learners with the ability to analyze and evaluate content that they can use to solve world problems. Paraphasing O'Sullivan and Dallas, 2017, they mentioned in their research that informational skills acquired through collaborative learning strategies are needed in the 21st century learning of math and technology. Collaborative learning has helped to increase the understanding of mathematics and technology concepts as they allow for students to have different perspectives. This means that students can learn the concepts at their own pace, re-watch, pause, collaborate and even ask specific questions on areas in which they require further guidance. Often, the concepts that some students struggle with at the beginning of the course often

makes sense at the end. This allows them ample time to catch up with their fellow classmates. It should be noted that mastering numerous units in one course is more valuable than trying to understand several different courses.

Summary

This writer believes that the difficulty with technology and mathematics is simply the instructional approach teachers take in the classroom. Mathematics and technology involves tenacity, reasoning, logic and critical thinking. The lack of using 21st century teaching strategies in math and technology can be exhausting for teachers. Curricula in the 21st century is changing, and more STEAM procedures, logical thinkers, and modelers of concepts, and abstract ideas are needed. It is, therefore, the duty of educators to ensure that they teach using the STEAM approach to learning.

By Cynthia Warren
Alpha Nu Chapter
St. Louis, MO

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Guyotte, K. W., Sochacka, N. W., Costantino, T. E., Kellam, N. N., & Walther, J. (2015). Collaborative creativity in STEAM: Narratives of art education students' experiences in transdisciplinary spaces. International journal of education & the arts, 16(15).
O'Sullivan, M. K., & Dallas, K. B. (2017). A collaborative approach to implementing 21st century skills in a high school senior research class. Education Libraries, 33(1), 3-9.

Innovative Reading Program for the 21st Century Learner

Innovative educators are constantly seeking to improve the teaching strategies needed for the learning success of our 21st century learners. Wendy Francois-Richard of Epsilon Theta Chapter is one such innovative teacher. Upon receiving the Beaumont Public School Foundation Grant, Wendy was able to secure the purchase of the Mindplay Virtual Reading Coach Program.

The Mindplay Virtual Reading Coach online reading program is a unique innovative 21st century program that permits students with diverse skills and unique needs to read with control and precision. This online reading program offers several features directed to improve students' reading skills quickly and efficiently. A series of diagnostic tests are offered to establish a baseline for each skill area and subsequently measure student's progress. Mindplay can pinpoint strengths and weaknesses to create electronic individualized learning plans for students. Mindplay is adequate for all ages. It can serve as an online reading program for Tier 1 students and intervention for Tiers 2 and 3 students.

Innovative learning ideas are available for educators. Utilize grant opportunities to help purchase teaching tools like the Mindplay Virtual Reading Coach Program. Creative ideas are needed for the success of our 21st century learner.

By Debra Ward
Epsilon Theta Chapter
Beaumont, TX

Wendy Francois-Richard (left) accepting the Beaumont Public School Foundation Grant.

The Gamma Upsilon *future* Hidden Figures Math & Engineering Project

During 2017-18, five elementary and middle schools in Waco ISD have been under threat of closure by the Texas Education Agency because of their failure to pass the Texas STAAR exams for numerous years. Students have struggled particularly in math and science. The school district and numerous community organizations have become involved in helping students in these schools pass the Spring 2018 Texas STAAR exams. The Gamma Upsilon Chapter has been tremendously involved in this community-wide effort to aid the schools.

However, Gamma Upsilon wanted to help students move beyond merely passing a state exam. In the words of Basileus Jocelyn Pierce, Gamma Upsilon wants young women of color "to explore possibilities to become major contributors to futuristic, cutting-edge industries and discoveries." Consequently, Gamma Upsilon united with Waco ISD, the local chapter of the NAACP, the Waco Alumnae Chapter of Delta Sigma Theta Sorority, Inc., and the aerospace manufacturer and space transport service company, SpaceX, to organize the "Future Hidden Figures Math and Engineering Project" for middle school girls.

The goal of the Hidden Figures Project is to get young women excited about math, science, and engineering early in their academic careers. Gamma Upsilon's project is a multi-pronged, four-stage project extended over the 2018 spring and fall semesters.

The first stage of the "Future Hidden Figures Math and Engineering Project" is recruiting participants. For the project, the chapter recruited from a group of girls who attended the Waco ISD Inaugural 2018 Empower Women Summit. Designed to provide young women with the tools, encouragement, and vision to recognize their own power and to imagine futures beyond their current situations, the Empower Women Summit provided the ideal recruitment pool. The girls targeted for the summit came from backgrounds where careers in STEM fields were not at the top of the list. Yet, the girls were among the best at their respective schools. Additionally, they were highly motivated to excel in school and open to being mentored. Also, they were early enough in their academic careers to benefit from learning about the importance of developing strong skills in math and science to pursue potential careers in STEM areas.

During the second stage of Gamma Upsilon's math and engineering project, the aim is to teach the girls the history and legacy of women of color in the fields of math and engineering while also generating enthusiasm and motivation. Gamma Upsilon will create a reading group of Sorors and girls using Margot Lee Shetterly's book about African-American female mathematicians who worked at the National Aeronautics and Space Administration (NASA), Hidden Figures: The True Story of Four Black Women and the Space Race. (The chapter elected to use the Hidden Figures Young Readers Edition of Shetterly's book.) Gamma Upsilon has chosen to begin with the book, rather than with the film, because in her book, Shetterly details the history of African-American female mathematicians before the start of World War II and focuses on their pursuit of mathematics at historically black colleges. The reading group will read the book over the summer and will convene once during the summer to discuss it.

The third stage of the math and engineering project is to provide an opportunity for girls to interact with female engineers of color in their own community and develop mentoring relationships with them. Arrangements have been made for the Waco Hippodrome Theatre to hold a private viewing of the feature film based on Shetterly's book, Hidden Figures, and to provide a venue for a question-and-answer session. Gamma Upsilon has recruited female engineers from L3 Aerospace Systems Waco, which provides communication and electronic systems and products used on military and commercial platforms, and from Space-X. During the Q & A session, the engineers will share their experiences with the girls and then respond to their questions. Ultimately, the girls will be paired with engineer-mentors who have agreed to mentor and tutor the girls in math and science during the fall 2018 semester.

The last and culminating stage of "The Future Hidden Figures Math and Engineering Project" is a tour of Space-X's Rocket Development and Test Facility located in McGregor, Texas just a few miles outside of Waco. The tour will give the girls an opportunity to gain first-hand experience of the work that the engineers are involved in on a daily basis. Most importantly, Gamma Upsilon wants the girls to connect their math and science classes and interests with the real-world products that result from careers in engineering and use the knowledge and skills gained to make a difference in our world.

By Dr. Peaches Henry
Gamma Upsilon Chapter
Waco, TX

Meeting Students Where They Are

Should every child have an Instructional Plan? This is a big question that numerous teachers, both young and old, continue to face each day.

Educators have seen so many students, all races, struggle with the core subjects of reading and math. We must remember what we have always been told, "all students can learn," and that each child's learning style is different. Studies have shown that if we direct things at a level that a student can grasp, not only will the teacher be successful, but the student as well. We, as educators, must meet them where they are, even if they are functioning on a lower level. From that base, we can build; not only will the student be happy with his accomplishment, but the teacher will feel successful.

During the school year, educators discuss all cultures in history (past and present). We learn of their struggles to reach their goals. The first struggle we see is "cultures accepting who they are." We educate the students to know that they must work hard to get to where we want to be. Ask students to set their goals high and don't let anyone destroy their dream. Give students examples of people in history and the struggles they went through. Students are amazed. Exposing students to individuals in history is more of a reality for them which will provide more clarity of reaching goals.

Some students have ideas for inventions and patents. It is imperative that they learn of all cultures that invented many things that we use today; some are people they have heard of and others are not. Be a "student motivator."

Each morning read a passage from a book to your students. Example, What Color Is My World by Kareem Abdul-Jabbar. The book celebrates different inventions that were created by Black Americans. Students learn the background of each person, the product invented and the importance of each product. The reactions of pride and awe are priceless.

Teaching is not easy, but we can meet children "where they are." Share noted experiences with them which they can relate to. We must all strive to make them productive citizens in society.

By Carol A. Greene
Epsilon Chapter
Charleston, WV

The Spark of STEAM in Visual Arts Classes

Participating in the arts has always been special to me. Playing various clarinets in the high school band gave me a little something extra to look forward to while at school. However, my appreciation for the visual arts evolved as I found myself volunteering in my hometown's "150th Sesquicentennial Fair Park Planning Commission," and later, serving on the South Dallas Cultural Center Board in South Dallas. The latter afforded insights into the vitality of the visual arts (of course with the completion of key staff development). Indeed, it provided a helpful lens to better appreciate and assess teachers' K-5 fine arts teaching strategies, and to acknowledge the powerful impact teachers have upon youth's creativity, particularly in the visual arts. Thus, I share some strategies.

STEAM instruction removes learning limitations and institutes an appreciation for wonder, inquiry, and analysis. I have observed many successful art classes which lends credibility to a process that is inclusive of investigation, discovery, connection and reflection as students create. This process is proposed in Susan Riley's "Integration Foundation" model (2014). Moreover, Sally Moomaw further corroborates these points in Teaching STEM in the Early Years (2013) by listing the attributes of investigation, observation, and communication of shared knowledge through inquiry. For example, one first year art teacher, who quickly begins his second grade class with "Do Now" free drawing for five minutes. This is a request for each student to draw a dream he/she desires to come true. He then follows with "share out." This provides opportunities of sharing with classmates, which are really efforts designed to refine oral presentation skills and state meaningful, personal desires aimed to cultivate creativity. Crafting instruction to personal desires, the instructor follows with an introduction of the impressive artist Jacob Lawrence, employing "You Tube" to address the 5 Ws, plus how questions, a source that incorporates animation technology (cartoons) relevant to the children whose learning norm is computer/social media oriented and connects to students' daily experiences for extracting information. The core "questioning, oral/ choral response" technique that follows is enhanced with the use of random second grade student selections, options for students to choose fellow students to respond, and paired with student incentives to answer bonus questions, such as, "How can you use this in your life?" and "What examples can you provide?" These steps become his means to cultivate core knowledge/understanding about the artist. In contrast, Teacher G provides the type of instruction that is more global, affords application, analysis, synthesis, and evaluation. To begin, she incorporates the 2014 revised Voluntary Visual Arts Standards in conjunction with the district's curriculum. Her unit preparation on "patterns" is collaboratively pre-planned with fourth grade core teachers to select specific vocabulary (such as "rhythm," "movement," "patterns," "gradation," and "contrast" for example), that will emphasize the concept of patterns compared and contrasted in social studies, science, math and engineering, and reading/writing for the next

six weeks. All efforts will be pursued with some aspect of technology.

Since she is approaching visual arts as a lab, she uses models in commercials and magazines to examine the concept of patterns, gets Pinterest images with the aid of white board technology to project examples up close and center, and invites students to explore the various types of patterns present in homes, shops, grocery stores, and billboards. She extends an invitation for students to explore their surroundings, make connections, and follows by asking why patterns are significant to society, and requires students to identify patterns in their own daily class schedules and clothing. To this will be added brief assignments directing them to grasp the concept of patterns as they relate to wars (social studies), the economy (math), the scientific method (science), and rhythm and rhyme patterns in poetry or raps (reading/writing). The intent will be to further inquiry before creating visual sketches, drawings, and paintings that exhibit patterns.

Moreover, she will detail how authentic products will be evaluated with pre-determined rubrics, which requires written explanation about each created product. Near the end of the fun-filled journey, culminating activities will consist of gallery displays along school corridors, opportunities for exhibition in local district competitions, videotaping for television, and/or products for inclusion in her own school's digital gallery established with the aid of students' input for the school's website.

In conclusion, the implementation of these STEAM strategies will offer personal student achievement, fun, and enhanced art appreciation through real world connections.

By Rosalind Baylor-Cosey
Alpha Rho Chapter, Dallas, TX

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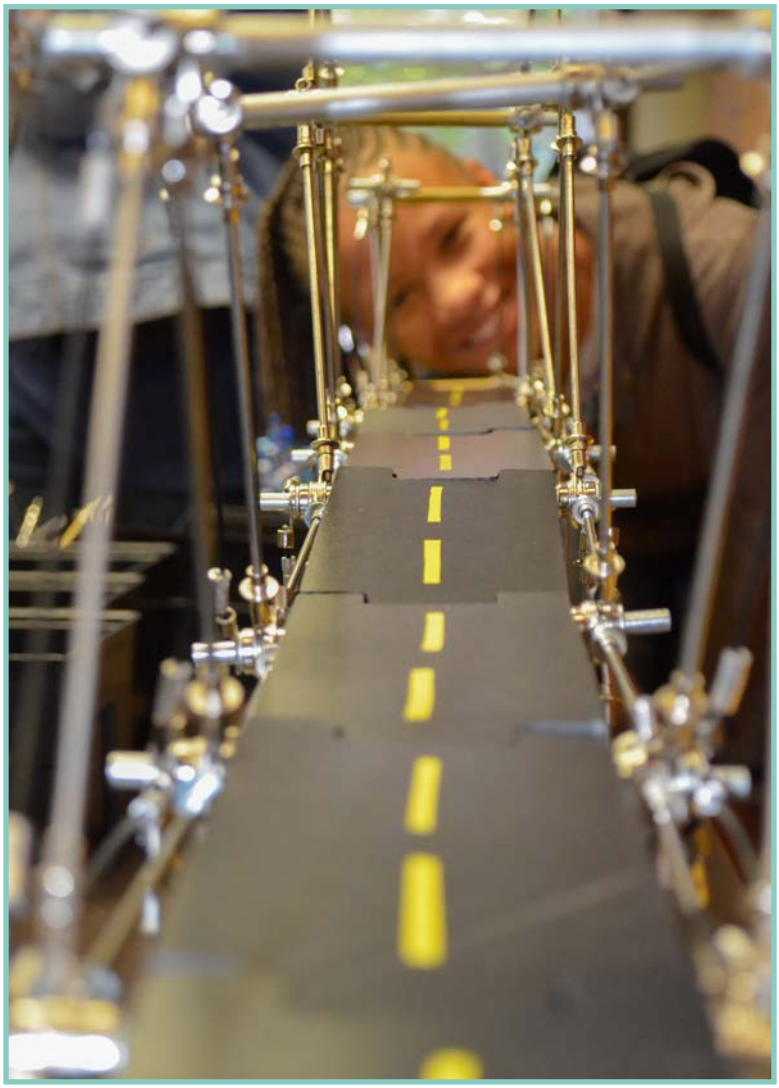
San Bernardino Students Learn by Doing



Soror Elizabeth Cochrane-Benoit, principal of Capt. Leland F. Norton Elementary School has worked tirelessly to build an engaging learning environment for her students. From kindergarten to sixth grade, students at Norton Elementary School learn by doing. That philosophy is prevalent when students learn about earth and life science by testing soil in the school garden. It's also the guiding principle when students in upper grades use sophisticated computer software to create 3D designs in a school lab equipped with the latest technology, and it is present when students visit local businesses to see how the work they do in the classroom is applied to jobs in their community.

Norton Elementary focuses their curriculum on STEM, short for science, technology, engineering, and math. The school's vision is to ignite students' creativity through project-based learning, a teaching method in which students gain knowledge and skills by working for an extended period to investigate and respond to an engaging and complex question, problem, or challenge.

Norton Principal Elizabeth Cochraine-Benoit said:

Since opening in 2012, the school has embraced the tenets of Applied Learning, a process of integrating one or more subjects with authentic, engaging, and relevant learning experiences. Applied Learning has the potential to put students on a path to college starting in elementary school. We believe in the value of students exploring cutting-edge technology. By applying what they learn in the classroom to real-world scenarios, students realize that learning about fractions or angles is important because they may one day use those skills in their career.

Students are more engaged in their education when they can take skills they learned in math and apply them as they design a 3D model, something Norton sixth graders regularly do in the school's 3D lab.

And learning isn't confined to a classroom. Cochrane-Benoit said, "It helps us push student learning beyond the classroom walls. Everything we do with Applied Learning helps students realize that what they learn today is valuable in everyday life and it could end up being a skill they need in their career."

Principal Elizabeth Cochrane-Benoit has opened the door for her students to see how the math they learn in class applies to real life during field trips to Technical Employment Training (TET), Inc., a local business partner of the San Bernardino City Unified School District. The business allows the students to see first-hand the advanced, high technology needed for the 21st century.

Under the leadership of Cochrane-Benoit, fourth-grade teachers have embraced the concept of STEM, and have received specialized training from Dr. Bill Clarke, TET president of Operations & Training. TET offers training and certification in manufacturing trades, diesel emissions, and other fields. TET's adult students learn math, literacy, and workplace skills in addition to their hands-on training at the operational manufacturing company.

When Norton Elementary fourth-grade students and their parents visit TET, they have a chance to see the manufacturing process in action and apply their knowledge of Cartesian coordinates to create eyeglass cases and key chains.

"Cartesian coordinates" is the math term for plotting points or lines from a pre-determined starting point. In recent years, manufacturing has gone high tech. Instead of cutting material by hand-operating a machine, operators program computerized machines to cut material at precise points and angles. One of the most common programming methods uses Cartesian coordinates.

During field trips, small groups of students program their coordinates into the TET machines and watch the machines create eyeglass cases engraved with the school name and the phrase Spectacular Spectacles.

"When students study Cartesian coordinates in algebra, they are learning how to program a manufacturing machine. The students just don't realize it," said their fourth grade teacher. "With field trips like the one to Technical Employment Training, more students will understand how they can use classroom math in the real world."

Cochrane-Benoit and Preciado agree the field trips are a great way to get students and their parents excited about math. Dr. Clarke is just as eager for parents and students to see the benefits of what he calls "stealth math," which is math learned as part of workforce training. Dr. Clarke emphasized, "We want to build a skilled workforce so that we can build our city up with a skilled workforce, and this first starts by training our youth."

Linda Bardere, APR, is director of Communications/Community Relations for the 49,000-student San Bernardino City Unified School District.

By Linda Bardere
Delta Rho Chapter
San Bernardino, CA

To TRACK OR NOT To TRACK?

To track or not to track? This is still the question. Teachers are concerned about differentiated learning according to a 2017 International Literacy Association poll. Placing learners on levels or tracks that are comfortable for them may allow for success but may not challenge them enough to reach international standards (Shanahan, 2014) or compete in the local job market. At one point in time, students were channeled into essential, general, honors, double honors, AP, or SPED classes while others were sent to vocational schools or technical schools. Next, we went to the opposite extreme, and cut out the vocational and technical training and decided that everybody should be taught the same standards, thus leaving the vocational and technical training behind. Now we have students who know Shakespeare but who have no marketable vocational skills.

The researcher of this article, tried to address the issues surrounding both approaches. Tracking was instituted because it had its advantages. It also left some deleterious long-term effects.

How do you teach the basic skills or Common Core, if you are in a Common Core district, while simultaneously guaranteeing that learners' learning style, achievement needs, interests, and perspectives are addressed? The Parallel Process attempts to combine the best of both pedagogical worlds into a system that is manageable for a teacher while it allows students to study across the disciplines.

In the Parallel Process, two or more versions of a story are written alongside each other on two facing pages. Each version builds foundation for each subsequent version. Most parallel books, whether digital or manual, include several genres that connect disciplines. They

are designed to use a STREAM approach.

Offering more than one selection accommodates for differing interests, achievement levels, learning styles, and perspectives. It provides opportunities for comparing and contrasting. Learners are not confined to one track but instead self-select to whatever level is of interest to them. They can see and hear whatever is taught to other students at the upper or lower levels.

This model organizes materials for teachers and allows them to differentiate instruction without the hassle of issuing and monitoring the use of different books or sites. All the versions are in one book or on one site. Corresponding reading and writing activities are provided in parallel too. All students are taught the same vocabulary and standards but are given practice at levels where they can experience success before moving to higher levels.

Parallel books are read in after-school, tutorial, or home school programs as well as independently. You may wonder, if elementary children are able to keep the versions straight and not mix them up. That question was the central research question in a yearlong research study conducted in five inner cities third through fifth grade classrooms. The answer is, yes. After the first few pages, the children — even special needs children — had no trouble distinguishing the easy versions from the more difficult ones. They use symbols and colors for extra help as they turn the page to continue their version.

The following excerpt from the fourth-grade collection, The Spider's Story, illustrates how different levels, genres, and disciplines are connected. This collection is based on the antics of Anansi the trickster spider from African folklore. In the first three fictional versions, Anansi wants to marry the king's daughter but must find out her name and tell it to the king. The page on the left shows Anansi confiding in his friend, the Lizard, telling him her name and the musical presentation he intends to perform before the king to win her. The three different versions provide plenty of opportunities for comparing and contrasting (Common Core R-2, R-3, and I-9).

Unique to the third and fifth levels are underlined words defined in lines immediately to the left. The fictional versions are designed to teach learners how to handle betrayal, failure, and bullies. Singing, dancing, and drumming are included. The easy fourth and harder fifth versions cross over into the disciplines of ecological science and social science. These versions explain the Ghanaian background of Anansi tales and the real-life habits of spiders (Common Core I-6). The man and the man-spider, Anansi's, behavior is understood better as one reads the science.

We have the obligation to spark the interests of all learners by exposing them to a broader curriculum. Some will only gain exposure while others will choose to complete activities that will reinforce mastery. Exposure is the essence of a parallel system. The parallel system guarantees individual success, but it is the exposure that creates opportunities rather than limits.

By Judith G. Armstrong, Ed.D, Mu Chapter, Chicago, IL

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Instruction That's Flippin' *Not Trippin'*

Education is one field that is constantly changing and adapting to meet the needs of students. As students' learning habits change, educational instruction must adapt to match those learning habits. Lage, Platt and Treglia (2000) introduced the idea of using technology to "flip" a traditional classroom environment. In this method known as the "flipped classroom," "inverted classroom," or "reverse instruction," among others, what is traditionally done in class is switched with what is traditionally done for homework. The flipped classroom encompasses any use of technology, including the Internet, to leverage the learning in the classroom, so teachers can spend more time interacting with students instead of lecturing. This is most commonly being done using teacher created videos that students view outside of class time.

Instead of students listening to a lecture during class and going home to do homework, students watch video lectures and complete what has traditionally been known as homework in class under the guidance of the instructor (Berrett, 2012). Moreover, flipping a class may, but doesn't necessarily, lead to flipped learning (Collins & Halverson, 2009; Flipped Learning Network, 2012).

Flipped learning is a pedagogical approach in which direct instruction transforms the group learning space into a dynamic, interactive learning environment where the teacher guides students as they apply concepts and engage creatively in the subject matter (FLN, 2014).

Evident in the research, technology has reached a level where the time has come for real educational reform that increases student achievement and engagement while teaching pertinent 21st century skills (Bishop & Verleger, 2013). At the heart of this concept is the idea of flipping traditional instructional practice with what students traditionally are assigned outside the classroom (Bergmann & Sams, 2009, 2012; Bishop & Verleger, 2013). Basically, lecture is assigned for homework, affording more time in class for application of new knowledge, active learning, and engagement (Bishop & Verleger, 2013). Flipped learning changes this typical homework scenario:

A 13-year old sits at the dining room table with a paper filled with numbers, letters, and shapes. She sort of remembers what her teacher said about the Pythagorean theorem, but not really. Her mother can't help. She's alone and stuck (Talbert, 2014a).

The concept of flipped learning provides this student the chance to learn the Pythagorean theorem at home prior to coming to class by watching a video provided by her teacher. She can

watch the video, re-wind, stop, or pause it based upon her needs. In class the next day, she can practice working the theorem in conjunction with other students and the teacher.

Flipped learning affords the instructor the opportunity to engage the varied learning styles in the classroom and implement pedagogies that encourage problem-based learning and inquiry-oriented strategies during class time (Ash, 2012; Bergmann & Sams, 2012; Lage & Platt, 2000). Additionally, flipped learning empowers the instructor to develop various learning experiences that are appropriate for the individual student (Bergmann & Sams, 2012). Flipping teaching and learning by creating and leveraging quality digital learning content, delivered outside of the classroom, frees up time in class and opens the doors wide on how you can use that valuable face to face time with your students. Many educators embrace this as an opportunity to let students get hands-on, get creative, inquire and explore, work on projects, and develop and demonstrate subject mastery in ways they enjoy and get invested in.

Tools and Resources

English

Teachers can have students use vocabulary and grammar drill programs such as Sadlier.com and Readingkeyfree.com to build skills, then use class time for higher-level activities like writing, and analysis of text. Or, teachers can create videos (Biteable.com) that explain language arts concepts.

Math

Teachers can flip their classrooms by using digital lessons to instruct students (Corbettmaths, Front Row and Illuminations) and allow them to practice skills at home using their personal or school-assigned devices before classroom discussions. Class time can then be used for whole-group, small-group and peer-to-peer activities that reinforce mathematical thinking. Using a combination of online-guided practice and teacher observation helps students grasp mathematical concepts and its relevancy to the real world.

Science

Flipped classroom and blended learning can open up a world of opportunities. Students can see science come alive and they can see science in a manner that couldn't be possible in a traditional classroom. For example, seeing videos of space explorations, using virtual reality or augmented reality simulation tools and videos rather than traditional dissections.

Resources

High quality materials can be found on YouTube, education focused sites such as Explore.org, Disney Educational Productions, YouTube EDU, Google Educational Videos, or subject specific sites such as Math4children.com, to name a few.

In closing, with advances in technology, it is becoming increasingly easier for teachers to offer dynamic multi-media educational resources to support both content and assessment between mathematics teacher and students (Talbert, 2014d). I believe true instructional reform in the mathematics classroom that increases student content knowledge while building 21st century skills is possible through the use of flipped learning. Educators and school administrators must understand the reality and prevalence of technology in the lives of students — "American schools aren't exactly frozen in time, but considering the pace of change in other areas of life, our public schools tend to feel like throwbacks. A yawning chasm separates the world inside the schoolhouse from the world outside" (Wallis & Steptoe, 2006, p. 2).

By Dr. Sandra Speller, Beta Gamma Chapter, Toledo, OH

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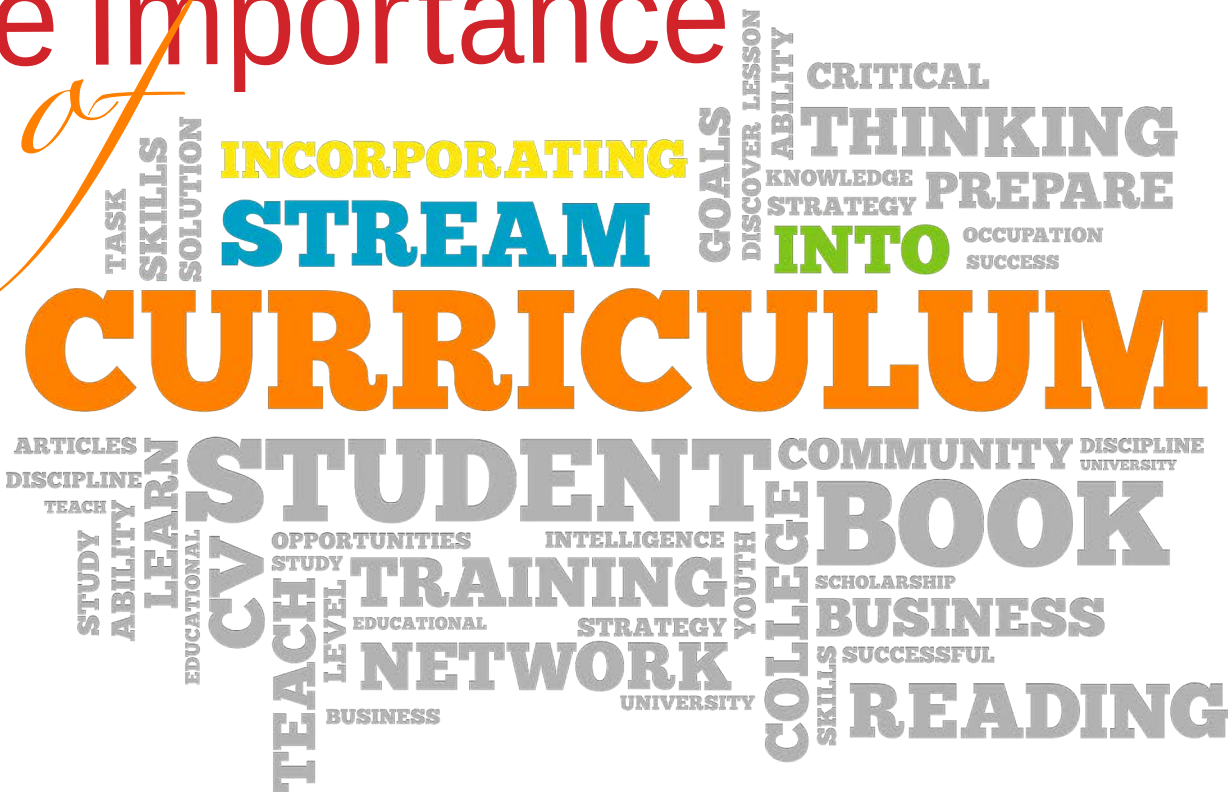
The Importance of Incorporating STREAM into CURRICULUM



The National Sorority of Phi Delta Kappa, Inc. is founded on and devoted to the advancement of all, through education. As educators, it is our responsibility to remain current on new studies and utilize research to enhance the learning experience so we may prepare students to strive for their personal best.

Michigan currently has:

Certified Teachers	86,154	Growth rate since 2013:	7%
Students Enrolled	1,555,370	School Districts	891
Teacher/Student Ratio	1:18	Graduation rate	77%
Public Schools	3,550	Spending per student	$10,948
Charter Schools	5,997		

According to statistics, Michigan is in the top ten highest states in the country for per pupil spending, yet we are not in the top ten for student performance.

The field of education has evolved over the years. In the 50s and 60s, students were prepared for the manual labor workforce. In the 70s and 80s, physical education and a shift toward math and science replaced home economics. Did educators of twenty years ago know that computers and technology would drive so much of our world today? Could they have known what skills would be needed in the job market today? It's unlikely, yet they had to do their best to prepare their students for the world today. Educators are still charged with the same complicated task: preparing students for the unknown.

As educators, we teach our students how to read, write, and comprehend. There are also the less tangible skills we teach; how to work in a team, think critically, and be curious about the things they encounter each day.

In 2006, there was a term that started to grow in the United States — STEM (science, technology, engineering, and math). One year later, in 2007, researcher Georgette Yakman announced the need to include the arts in STEM programs. Dr. Yakman took inclusion

of the arts and expanded on how it relates to the other STEM subjects. Her well-known quote is "Science and technology, interpreted through engineering and the arts, are all based on elements of mathematics." This statement is a rich beginning to our dive into the 21st century job market.

With our shift to STEAM, we can't lose sight of one very important aspect of emerging jobs, be they high-tech, low-tech, or no-tech — the importance of reading. Without the ability to read and write, there isn't a job for which STEM or STEAM education would be enough preparation.

With reading and reading comprehension added to the list, STREAM (science, technology, reading, engineering, art, and math) was born. The basis of STREAM was the growing concern that our students were not prepared for the high-tech jobs of the future. Education in the United States has now gone from STEM to STEAM to STREAM. Preparing students for the future by focusing on STREAM strengthens students' ability to be globally competitive in these fields.

To be prepared for the 21st century high-tech jobs, you will need to read; and read a lot. There can even be an argument made that due to the Internet, texting, emails, etc., people are reading more today than ever before. How do we expect our future employees to be able to compete in science, technology, engineering, the arts, or math without putting considerable emphasis on the critical need to be able to read, comprehend and write? Students of today, who are preparing for the unknown jobs of tomorrow, need to be fluent in all of the core subjects.

Reading must be at the forefront of every educator's mind. No matter what subject you teach, you are a teacher of reading. No matter what emphasis your school or the country puts on STEM or STEAM, we, as educators, must see the critical importance of putting the skills of reading and writing first as it is our fundamental means of communication.

Tony Wagner of Harvard University interviewed hundreds of CEOs in business, non-profits, and educational institutions and identified what he titled the seven survival skills required for the 21st century:

Skill 1: *Critical Thinking and Problem Solving*

Preparation: Students will need to develop their ability to see problems from different angles and formulate their solutions.

Skill 2: *Collaboration Across Networks and Leading by Influence*

Preparation: Not every person is born a natural leader. However, the ability to lead others can undoubtedly assist students to advance and become successful in their chosen career.

Skill 3: *Agility and Adaptability*

Preparation: Our students need to be comfortable with the idea of change and be willing to adapt to the changes around them.

Skill 4: *Initiative and Entrepreneurship*

Preparation: Students need to be able to take the initiative and contribute to the world.

Skill 5: *Effective Oral and Written Communication*

Preparation: Despite advances in technology, these skills never diminish in importance.

Skill 6: *Accessing and Analyzing Information*

Preparation: Students need to learn how to sift through the vast amount of information available through various sources.

Skill 7: *Curiosity and Imagination*

Preparation: Our task as educators has less to do with teaching them how to be curious and imaginative, and more to do with not taking that away from them.

According to Dennis Van Roekel, President of the National Education Association, the nation needs to connect students to jobs of the future by re-engaging them in these critical fields, and we must also have the teachers to help get them there. It isn't just the students who need preparation, but the educators as well. Taking advantage of professional development in STREAM, college courses, online courses, seminars, and workshops will better prepare us for the charge of educating our students for the 21st century.

We may not know exactly what lies ahead for our students, but we do know what skills they will need once they get there. If the United States is to hold a competitive edge in a rapidly changing global workforce, highly prepared educators who produce students that bolster the nation's science, technology, reading, engineering, art, and math (STREAM) skills are essential.

By Marguerite Harris
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There is a need for educators to embrace technology and its developments. As 21st century skills have been defined, established and are now assessed for the highest level of mastery, educators are faced with the challenge of inspiring children to develop use of their higher order thinking skills by integrating learning and innovation skills with digital literacy skills, and mixing in some career and life skills. Whew! What a challenge! As technology is a requirement for access and learning in each classroom, students are encouraged to make use of the advanced equipment we have. We as educators are now part of a growing international movement that focuses on the skills required for students to master content in preparation for success in a rapidly changing, digital society. Many of these skills are associated with deeper learning, which is based on mastering skills such as analytic reasoning, complex problem solving, and teamwork. These skills differ from traditional academic skills in that they are not primarily content knowledge-based.

Being an effective classroom teacher requires that we incorporate technology trends into our educational environments. As I researched trends in current education, I was able to compile a list of "trends in the current education environment," and

A List of the Top 4 Classroom Technology Trends in the Current Education Environment

now I will share them with you — *carpe diem*.

One of the greatest uses for technology allows us, right here in Webster Parish, to engage our students by using one of the latest instructional strategies that requires student engagement. I have a colleague who uses this strategy, and I have seen students literally run over each other to get to her classroom because they knew there would be an opportunity for them to "show their stuff"! Students are accountable and engaged in a flipped classroom. This instructional strategy and type of blended learning reverses the traditional learning environment by delivering instructional content, often online, outside of the classroom. It moves activities, including those that may have traditionally been considered homework, into the classroom. In a flipped classroom, students watch online lectures, collaborate in online discussions, or carry out research at home and engage in concepts in the classroom with the guidance of a mentor. The flipped classroom intentionally shifts instruction to a learner-centered model in which class time explores topics in greater depth and creates meaningful learning opportunities, while educational technologies such as online videos are used to 'deliver content' outside of the classroom. Here, in a flipped classroom, 'content delivery' takes on a variety of forms. Often, video lessons prepared by the teacher or third parties are used to deliver content, although online collaborative discussions, digital research, and text readings may be used.

Another trend in technology in the classroom is Remote Learning or Distance Learning. There are many advantages to remote learning, including the following:

1. Accessibility for those living away from the training center
2. No waste of time or other resources in transport, commuting to a central location for each class
3. Flexibility to study in any convenient location with an Internet connection
4. Self-paced learning
5. Just-in-time learning; more opportunities to study the most current material available
6. Flexibility for those with irregular work schedules
7. Accessibility for those with restricted mobility (e.g., handicapped, injured, elderly)
8. Accessibility for those with family responsibilities (e.g., parents with young children at home)

However, the disadvantages include: lack of social interaction; the format isn't ideal for all learners; some employers don't accept online degrees; requires learner to be adaptable to new technologies; and not all courses required to complete the degree may be offered online (the learner may have to take the traditional route). Distance education or distance learning is the education of students who may not always be physically present at a school. Traditionally, this usually involved the student corresponding with the school via post. Today it involves online education. Courses that are conducted (51 percent or more)

are either hybrid, blended or 100% distance learning. Massive open online courses (MOOCs), offering large-scale interactive participation and open access through the World Wide Web or other network technologies, are recent developments in distance education. A number of other terms (distributed learning, e-learning, online learning, etc.) are used roughly synonymously with distance education. Because of distance education, digital textbooks are on the rise. Students who are taking the non-traditional route of education are now using these e-textbooks or e-texts. Digital textbooks are a major component of technology-based education reform. They may serve as the texts for a traditional face-to-face class, an online course or degree, or MOOCs.

The most interesting bit of information I uncovered was this new technology referred to as gamification. Gamification is the application of game-design elements and game principles in non-game contexts. Gamification commonly employs game design elements to improve user engagement, organizational productivity, flow, learning, crowd sourcing, employee recruitment and evaluation, ease of use, usefulness of systems, physical exercise, traffic violations, voter apathy, and more. A collection of research on gamification shows that a majority of studies on gamification find it has positive affects on individuals. However, individual and contextual differences exist. Gamification can also improve an individual's ability to comprehend digital content and understand a certain area of study such as music.

The last and most influential technology trend in the educational environment is social media. "Social media" is a phrase that we throw around a lot these days, often to describe what we post on sites and apps like Facebook, Twitter, Instagram, Snapchat and others. Social media also describe websites and other online means of communication that are used by large groups of people to share information and to develop social and professional contacts. Social media are also described as computer-mediated technologies that facilitate the creation and sharing of information, ideas, career interests and other forms of expression via virtual communities and networks. Social media are interactive Web 2.0 Internet-based applications. Social media contain user-generated content, such as text posts or comments, digital photos or videos, and data generated through all online interactions, all of which are the lifeblood of social media. With social media, users create service-specific profiles for the website or app that are designed and maintained by the social media organization. Finally, social media facilitate the development of online social networks by connecting a user's profile with those of other individuals or groups. In America, a survey reported that 84 percent of adolescents have a Facebook account. According to findings from the analytics firm Twopcharts that were reported in The Wall Street Journal recently, there are 974 million existing Twitter accounts. One of the other social media competitors, Snapchat, has 150 million daily active users globally, and Instagram (the mainly mobile photo sharing network), has reached 800 million monthly active users. Knowing that children are fully immersed in technology by the age of 10, utilizing the technologies and teaching them to use the technology responsibly and ethically to enhance lessons and activities is a responsibility all of us educators share!

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"A Novel Approach for Increasing Vocabulary"

In our diverse, multi-ethnic American country, it is very important that we, as teachers, respect the cultures of our students. This approach is a fun way for students to increase their speaking vocabulary and show them ways to incorporate those pesky and unfamiliar spelling words or subject-matter vocabulary into the lexicon of their everyday speech. How? It's done by assigning values to words. You can commence with the following chart or personalize your own chart.

Vocabulary Word Values

	10 cents	25 cents	50 cents	$1.00
A	ask	question	inquire	interrogate
B	bad	harmful	damaging	injurious
C	calm	peaceful	serene	tranquil
D	determine	solve	compute	calculate
E	easy	simple	effortless	uncomplicated
F	fast	swift	rapid	expeditiously
G	go	leave	depart	exit
H	hit	punch	strike	smite
I	inside	within	inner	interior
J	joy	delight	pleasure	bliss
K	keep	maintain	preserve	retain
L	little	small	tiny	miniature
M	make	create	invent	devise
N	new	recent	modern	contemporary
O	old	aged	ancient	antiquated
P	picture	illustration	image	depiction
Q	quick	speedy	immediate	prompt
R	rich	wealthy	affluent	opulent
S	stop	quit	cease	abandon
T	take	capture	seize	apprehend
U	up	high	above	overhead
V	visit	trip	journey	sojourn
W	walk	wander	roam	ramble
X	x-ray	photograph	image	reflection
Y	yell	shout	scream	shriek
Z	zeal	passion	devotion	fervor

During down times for the entire class (i.e., waiting in line: for dismissal, to use the lavatory, to go to the cafeteria; getting students to focus after recess; etc.), you can review some words. For example, "I heard someone use a dollar word in the cafeteria or on the playground. Can you guess what it is?"

By Dianna Mayo Neal
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21st Century Learning Can Be *Challenging & Fun!*

As a retired educator who still volunteers and works with many students, I find that trends in education evolve, change and eventually return as they were before. The difference being how the trend is expressed. However, with this difference in terminology or the use of acronyms, teaching is the same. This has not changed. Teaching is teaching. We want our children to get excited about learning and excel academically and go forward to help and teach others. Whether we are retired or still in the work force, as educators, we want our minority children to become proficient in engineering, mathematics and science.

Before the 21st century learning arrived, teachers called what today is "STEM" simply science, technology, English (language arts), and math. Additionally, as an elementary teacher, all subjects were taught by us and we did a fantastic job! Many scholars left elementary school and entered middle school ready and eager to learn. Teachers worked with students, conducting and experimenting with scientific projects. Science, as well as all other subjects, was taught daily and throughout the year. Each student produced a project that was exhibited at the annual science fair. The entire school was scheduled and invited to view the exhibits.

This same type of strategy was done with book fairs. For reading there was an annual book fair where each student created and published a book. All grade levels participated in the book fair and all were invited to attend the fair. Some of the students even became young authors. In addition to science and book fairs, there were

art fairs, oratorical programs, essay contests and art exhibits. Innovative and interesting field trips were planned to keep students abreast of current trends and learning experiences. Field trips also re-enforced what had been learned in the classroom.

In the 21st century, I believe our children have open minds about learning new innovative and diversified technologies. For example, with various technologies of today our students can, with the click of a computer mouse, tap of a cell phone, movable robotics and creative drones, easily manipulate these devices. They are on top of it all! In fact, in many instances learning and teaching are changing because students are teaching, helping and encouraging seniors, adults, and others how to become computer literate and how to use the cell phone. Adults have returned to night school and college to acquire more knowledge in the many uses of social media we are faced with.

Young minds are like sponges. They grasp everything technical with ease and in no time. As for my generation, seniors, retirees and many late bloomers, we are still learning how to become more technical. Some of us do "Get It!" When we learn, we can become more productive and accessible to volunteer in the classrooms with teachers and students. We can become "Mentors" and feel needed and beneficial.

There are far too many adults who feel left out. Even talking with some family members becomes tedious because we have to compete with cell phones; and social media are out of the question. So, basically, they rely on second hand news or "word of mouth." We can all benefit from learning techniques of the 21st century. All generations can be called the 21st century learner.

In the 21st century, not only are students being taught how engineering, technology and math relate to the world around them, they are also being taught how to discover and get excited with academic excellence and success.

Today, whether it's called reading, writing, arithmetic or STEM, STEAM or STREAM, it's all the same. The key is getting our youth involved and keeping them interested while making learning fun, exciting, challenging and successful. That is the GOAL.

By Delorace Daniels
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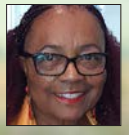

"Get Aboard"

Full Steam Ahead

Every student has a story of a school counselor who helped them along the way to be ready to either enter the world of work with their heads held high or with their heads hung low. Unfortunately, too many of our youth have heard words such as "you're not college material," "science or math isn't your thing," "too little too late." These are words that are heard throughout our schools and unfortunately through some school counseling offices.

So many school counselors, especially in urban districts, do not understand that, unconsciously, they are the "gatekeepers" to the science, technology, engineering, arts, and math pathways that so many of our students do not even know exists. As President Obama says, "An educated workforce is essential for America to compete and win. Without a workforce trained in math, science, technology and other skills of the 21st century, our companies will innovate less, our economy will grow less, and our nation will be less competitive."

While the passive aggressive thoughts of many school counselors have hurt the social-emotional success of our students, so has the lack of interest in learning about the various new career pathways in STEAM that exist to excite, engage, and encourage students of today. According to the American School Counselor Association, nationally, the average school counselor to student ratio is 450:1. With an average school year of 180 days, mathematically, how is it possible for a school counselor to see every student or their case load, let alone give intentional and individualized support to each student more than once in a school year?

History Repeating Itself

During the early 1900s, the work of researcher Parsons characterized the work of school counselors, then called vocational counselors, as teachers who worked with students to assist with career development and decision making. The work and duties of a vocational counselor were very different then than they are now. The primary role of a vocational counselor was to prepare students to go to work and to assist students in discovering the appropriate work paths (Gysbers, 2001).

Because the earlier years of the profession were grounded in the vocational movement, the term "guidance" was appropriately used. However, today, the term "guidance" has a limited definition of the role of the school counselor. Thus, the term, "guidance" is now viewed as an outdated label. The official classification of counselors is now "school counselors." Addressing school counselors as

guidance counselors may show a misunderstanding of the profession and the role of the school counselor and programs implemented by the school counselor (Felder, 2016).

During the 1950s, the title and role of school counselors began to change largely due to the organization of the American School Counselor Association in 1953, and the rapid development of school counseling at both middle and high school levels (Wittmer, Clark, & Sorenson, 2007).

This redefinition of the position of school counselor was made with the passage of the National Defense Act of 1958 and the Elementary and Secondary Education Act of 1965. Since the nation was in deep reflection of its failing schools, systems, and structures, the Education Trust and MetLife Foundation established the National Center for Transforming School Counseling. This Center ensured that school counselors are trained and ready to help all groups of students reach high academic standards that were mentioned in the Nation at Risk Report (1983). (Beesley, 2004; Gysbers & Henderson, 2001; Paisley & Borders, 1995; Wittmer et al., 2007). Almost immediately, this federal legislation guided a large amount of funding to the training of school counselors (Baker & Gerler, 2008; Wittmer, et al., 2007).

And here we are today, in the 21st century, with the same need to revisit the professional development and training of school counselors. Now is the time to encourage and retrain school counselors to inspire students to solve problems in biotechnology, structural engineering, artistic command, and climate preservation, while bringing awareness and making connections to the curriculum and career advancements of our growing global economy.

The School Counselors' Role

Before counselors can advise students about STEAM opportunities and careers, they must have equitable, high-quality career information (Feller, 2009). Knowing versus understanding can make the difference when counseling an entire school towards being post-secondary successful. To make connections between academics and the world of work for the students, school counselors must acquire the knowledge and understanding of the:

- individual cultures of their students;
- changing economy surrounding their schools and state; and
- school/district curriculum.

It is imperative that districts and schools support the professional development of school counselors (Felder, 2016). The effectiveness of our schools depends upon the skillful teaching of school counselors which has a positive impact on the academic, personal/social and college/career outcomes of students (ASCA, 2013). However, it is equally essential for school counselors to seek their own professional development to support their professional practice.

Below are additional strategies researcher Stephen Feller (2009) states counselor can use to expose students to STEAM careers and opportunities:

- Provide blended learning using the Naviance College and Curriculum using the Career Key Assessment to connect instruction to career interests and goals.
- Connect students with role models in STEAM fields, especially women and ethnic minorities in nontraditional programs and careers. If few professionals are available in these fields, consider inviting college students working toward STEAM degrees.
- Promote STEAM in tangible and real-life oriented ways. Connect academic courses with both career and technical education programs, such as teaching geometry through construction. Students are often motivated when they understand the real-world applications of what they are learning.

- Promote fun ways to explore STEAM interests through Space Camp (www.spacecamp.com), Camp Kennedy's Space Center (www.kennedyspacecenter.com/educatorsParents/camp.asp), NASA's Kid's Club (www.nasa.gov/audience/forstudents/index.html) and local STEAM career fairs within educational settings.
- Provide developmental guidance curriculum such as No Boundaries www.usatoday.com/educate/nasa/index.html, which helps students explore STEAM careers in a game simulation.
- Explore materials offering insights about STEAM such as NASA's Web sites, www.nasa.gov/audience/foreducators/index.html and http://education.nasa.gov/edprograms/core/home/index.html; The Gender Clip Project, www.genderchip.org; and the Sloan Career Cornerstone Center www.careercornerstone.org/diversity.htm.
- Utilize O*NET to focus on education plans and to obtain the necessary knowledge, competencies, and training for success in a particular STEAM career, http://online.onetcenter.org/find/career?c=15&g=Go.

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A New Vision In STREAM

{Sonnet: ABBACDCDEFFEF}

Phi Delta Kappa Sistahs are Intelligent
and Enthusiastically ready to Learn

Exploring Science, Technology, Reading,
Engineering, Arts, and Math

Constructing higher-order meaning
to avoid the female gender wrath

Next Generation Science Standards
are the New 21st Century Concern

We have been expected to raise the children
and do our daily house chores

Never to question the inner beauty
that makes us such phenomenal women

We have thrown our aprons on those
dirty glass ceiling floors

We are experiencing an educational
paradigm shift that is not a lemon

All aboard this new integrated science
curriculum that refuses to leave our girls

It has introduced Stem, Steam, and Stream
as a new vision

Rigor, science talks about phenomena,
hands-on experiments that's the mission

We will no longer accept excuses that pearls and curls
are unfit for these twirls

Calling All Educators to get on board for this revision
of STEAM.

I support the decision!

By Sibyl Brooks
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Adding *STREAM* to the Mix

Tap, tap, tap, tap...a, s, d, f . . . tap, tap, tap, tap . . . a, s, d, f . . . This is the sound that occurred in a Second Grade class in 1965 at Indiana Avenue School (K-6) located in Atlantic City, New Jersey. This class was taught by Ms. Coleman, an African-American teacher who had the foresight to prepare her young students for the computer age and future technology development. Ms. Coleman replicated a paper version of the keyboard, laminated it and instructed her children on the proper brush stroke when typing.

Enter 2018 and view young students using 3-D printers with confidence and gaining knowledge of programming Sphero robotic balls to follow simple commands. This early form of coding is defined as learning how to give a logical set of instructions to move a character along a preset course or pathway. The Lightbot and Scratch Jr. apps are utilized to introduce this concept at an Apple sponsored school under the leadership of an African-American female principal.

When two pre-kindergarten students expressed an avid interest in volcanoes and were motivated to produce a volcano, their exploration was sparked by their African-American female teacher. Instead of the classic volcano experiment, they looked at images on the computer and decided to build a volcano utilizing cardboard blocks. The blocks were in three (3) sizes – large, medium, small – and the result was a unique structure that portrayed the exact visual. The students were so proud when they wrote the words "danger," "lava" and posted the signs on their assemblage.

We often hear of the digital divide among people of color and especially when applied to STEM education. Urban schools are attempting to close this division of technical skills that require the 4Cs; collaboration, communication, critical thinking and creativity. In the production of the volcano, the young team collaborated to use blocks as a medium; communicated to plan their structure; demonstrated critical thinking by determining what size/type of blocks would be best for their design and applied creativity in adhering to how the finished product could look like a volcano. Plus, they had fun!

Educators must embrace the components of STEM – science, technology, engineering, math – and include the arts – STEAM – along with a definite focus on reading – STREAM. Preparation for 21st century high-tech careers includes the need to be able to read, comprehend (visuals and/or words), and write. This preparation cannot only enlist the endeavors of skilled educators but must include the families of young children.

As adults, we say "Oh, I'm not good at math" (or science, technology, engineering, etc.), and we may tend to pass this on to our children. It's clear in early literacy about what to do – read to your child, talk, think out loud, recite rhymes and sing songs. It should also be made clear to involve children in early math activities – looking at patterns, counting windows in a building, comparing small objects to larger objects and assembling puzzles. But too many families say, "Oh, they will learn that in school!" And we, as African-American educators, must take on this humongous task. But, in order to prepare our children well for the 21st century, all of us – educators and families – must value STREAM!

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Social Media

The TEACHING and LEARNING Process

Many educators are constantly faced with the good, the bad, and the ugly of social media within the classroom and the school. We see middle and high school students constantly reviewing the latest on Twitter, Instagram, and Snapchat. Teachers are faced with creating classroom rules and procedures that include what to do with the cell phone once entering the classroom. This obsession with using the cell phone to check the latest on these social media sites has become a big distraction to the teaching and learning process. How can we turn social media from being a distraction to being an ally to the classroom and school?

Let's begin by looking at the ugly/negative aspects of social media and teens. Currently, there are many articles and studies discussing how social use is linked to poor sleep habits and anxiety in teens. This is due largely to the need to be in the know and available 24 hours a day, and it is commonly related to low self-esteem, increased anxiety, poor sleep habits, and depression. This could explain why so many teens come to school so tired in the morning. Without realizing it, they were probably engaging in social media chats with friends for hours resulting in only a few hours of sleep.

Cyberbullying is another negative use of social

Despite all of the negatives surrounding social media, there are positive educational uses that we as educators cannot be afraid to use.

media. It begins with one person making hurtful comments about another person on one of the social media outlets. This comment is seen by the authors' followers who "like" the comment, make and additional comment, and/or share with his/her followers. As a result, many individuals are now adding their hurtful comments that are viewed as funny. The target of these comments sees all of the hurtful statements and becomes upset and depressed so much so that he/she does not want to come to school.

School fights and teacher-student interactions constantly fill the social media timelines. Too often, student fights ended up on social media with many of them becoming part of the 6 o'clock news. The same can be said for the countless clips of teachers disciplining students or a class that many have seen.

1. Social media enables a forum for educators to provide the community with stories we wish to tell. Use social media to show the positive things going on in the classroom and school. After checking board of education policies and procedures, posting pictures of classroom activities, assemblies, and classwork will provide the community with the great things happening in the classroom and school allowing us to share something more than test scores.

2. Since students are so into social media, let's meet them where they are and incorporate social media in the lesson. There is a strategy called #BookSnaps where students take a picture of a passage being read and annotate it with in Snapchat. (This video explains #BookSnaps - http://www.tarammartin.com/resources/booksnaps-how-to-videos/)

3. Social media are great places for educators to learn. Creating an online PLN (Personal Learning Network) or participating in "chats" allows educators to interact with educators globally and learn the latest strategies and techniques to enhance the teaching and learning process. This Google calendar site provides the latest schedule for many chats (https://sites.google.com/site/twittereducationchats/education-chat-calendar).

Only when we begin to embrace social media and make them a part of the learning experience, will we be able to truly educate students about this new phenomena and powerful tool.

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Cyber Savvy Sorors

"Technology is a wonderful tool but like all other tools, proper handling ensures safety."

All too often, we see reports that question the effects of technology on our personal lives. Chat rooms and blogs make us feel we have found a place where we belong, so we are less guarded. Dating apps, Instagram and Twitter have coaxed us into being more transparent with our thoughts and feelings and privacy in ways we may have never considered in a face to face conversation. People often say they feel freer to be their true selves online. Sociologists and psychologists have termed this the "Online Disinhibition Effect" to examine how the anonymity of being online stimulates fundamental changes in our normal behaviors. Conversely, there is a current trend of research receiving attention and support as former tech giant employees have come together to raise awareness sounding the alarms about the deliberate causations and harms of technological dependency. The newly formed Center for Humane Technology, leading the "Truth About Tech" campaign is boldly drawing the correlation between internet dependency to social, isolation and depression, most especially in our youth. Showing us all that swiping to the right, does not satisfy the soul.

We are left to wonder, does the internet really build relationships or simply lull us into accepting the illusion of communication and closeness that we use to replace real connection out of convenience?

While the debate lingers about the affects of cyber interaction on our psyche and personal relationships, one thing is true, we are exposing more and more of ourselves and our lives. As we post so much of our lives on the different platforms to share with friends and family, we are also risking the privacy and safety of these relationships and ourselves.

Technology is a wonderful tool but like all other tools, proper handling ensures safety. Never accept friend requests from people you do not know on Facebook. There are many con men and women seeking to exploit people financially. There are equally as many if not more willing to exploit people emotionally. They make a connection as the friend of a friend to gain entry into your life. Verify their claim with your friend. However, if your friends are more concerned with building high volume of followers and expanding their friends' list, they often do not have a clue themselves who most of the people are on their list. This makes them and everyone in their contacts susceptible to the friend of the friend opening line or email hacks.

Before you accept a new friend, review their personal page as far as you can. Short posting histories, mostly selfies or only pictures of them alone are all red flags. Anyone can create multiple Facebook, Instagram and Twitter profiles. Also, it is common practice to swipe someone else's pictures and create an entirely bogus persona. Run an image search by just dropping the picture in the search bar.

Even if you know the person sending the request or message — ask a random off-the-wall question. Personal accounts get hacked into very easily and the newest trend is to use your friends to open the communication for sales or soliciting information for identity theft.

If you Google someone and see limited or no information, be cautious! Every time your name appears in print anywhere it can be retrieved through search engines such as Google. If they have nothing said about them anywhere, no connection to anything, a job, a school or even a phone, it might be because they are a fabrication.

Do not refer to yourself or children by their nicknames on any public post. Often these words are used as account passwords or answers to security questions, which you are now making public.

In the same respect, be mindful of listing all your important dates. Parasitic people armed with software are willing to devote hours to discover passwords. If you want to get or give birthday greetings, don't use the year or give the age of children. Never post anything that can be used to verify anything like bank account ownership.

Be cautious of anyone who uses apps to communicate with you. Line, Polo, WeChat, Kakao Talk, and the like all allow you to send and receive messages and some programs even allow phone calls without sharing your real personal phone number. While this may be useful in maintaining communication in business, schools or when working on a community projects, personal contact via these types of methods should sound an alarm. These apps are a favorite of adulterers who can leave the app on the phone while their personal call and message history show no evidence and the entire history can be easily deleted. They are also helpful for teenagers who have had their phone privileges restricted. These apps allow them to still communicate through any Wi-Fi services.

Another tip for parents of teens, as mentioned, anyone can establish multiple Facebook accounts. Your child may have one Facebook for family and one for their friends. A Google image search may reveal other names and profiles associated with

their image.

Post vacation pictures late or when you return. Do not announce to everyone that your house is empty or for how long. If you want to share with your friends change the privacy settings so that your posts are only visible to your friends. Make few if any public posts.

Don't reveal too much information about your specific address – be purposefully vague. It is very easy to get addresses from anyone and find the directions to anywhere.

Never make public what was meant to be private. Remember, even if you delete a post, it can be retrieved. As evidenced by the recent feature on Facebook of reposting pictures and creating personal history movies, they never really go away. Just keep saying the CLOUD knows all! So, slow down and think before you send.

Every post on Snapchat, a favorite among teens and tweens, can be recovered. Snapchat is so popular with this population largely because of its temporary history feature which deletes images from memory once they have been opened by the receiver.

Please don't look at your phone while walking around. Do one or the other. Along with that, never put both ear pieces in when in public. Your not paying attention to your surroundings is a signal for would-be assailants of your vulnerability. Any criminal will tell you, victims get picked like dates. Distracted people have delayed reactions, and it is easier to strike and get away.

When purchasing online, look for the green lock in the address bar with the "https://" that is the indication for a secured site. Blue and black locks are not verified safe sites.

Set up one email for all the online signups that is not used for anything else and one credit card not connected to your bank for online purchases. PayPal has great safeguards and security. Set up an account with them for purchases, even with the one card as an added layer of protection.

Never follow the link from an email claiming to be from your bank or credit card telling you there is a problem with your account. First, call your bank or credit company to see if there is a problem. Then double check the sender and secondly forward it to your bank or credit card company's fraud department.

It is not the intention of this article to discourage your urge to post. The suggestions were complied with the hope to help your cyber experiences to be smarter and safer. I wish you happy surfing.

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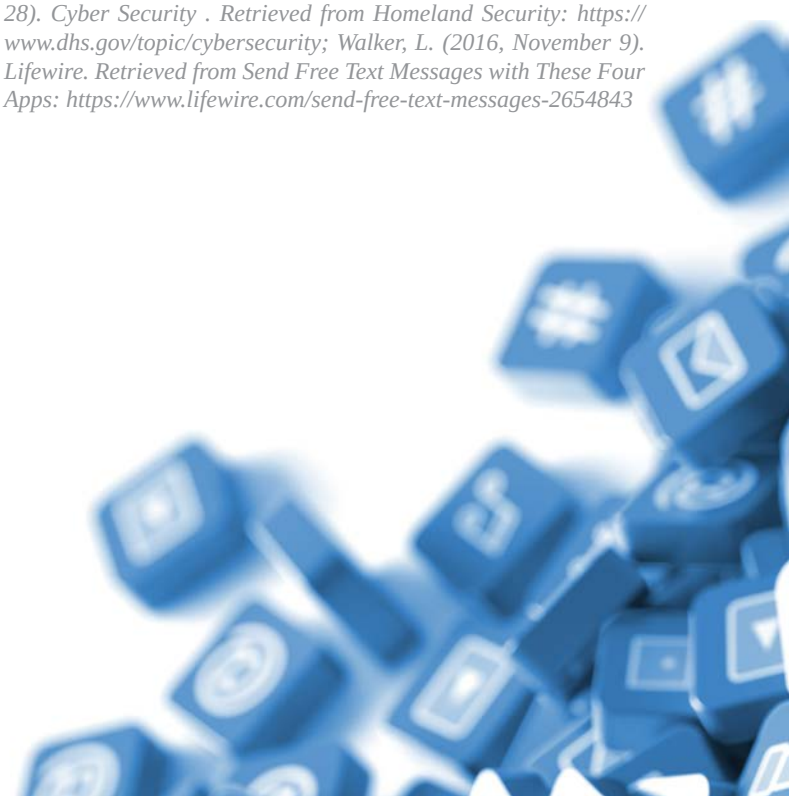

STREAM*ing*

There is not one educator north of the Mississippi who has not heard stories of cutbacks and budget windfalls in a staff meeting while at the same time being asked to do more with less. A part of why educators want to teach is because it makes you feel blessed to help others learn about a subject that brings you joy. You do not want to become weighed down and overcome with stress.

If there is no money to take students off campus on a field trip, then take a virtual field trip. You are invited to explore the "Discovery Education" website. There are many technological options available to help bring your students a different view of the world. Technology affords you the luxury of a low cost experience to accomplish this.

Teach a unit to your students about tracking their eating and exercise for at least seven consecutive days. Use an online tool that will generate a nutrition report so that students can see the number of calories and the nutritional value of their eating. Then, they will use a worksheet where they will calculate how many calories they need each day based on their activity level as opposed to how many calories they actually consumed. Students will then complete a reflective writing about this experience and set new goals as a result of what they learned about their behavior.

No funding to go to a conference? Join a professional association where you may have access to free webinars as a part of your membership fee. There may even be the opportunity to discuss with your tax preparer how to deduct your membership cost at the end of the tax year. Turn your stress buster technique into a teaching tool. Note the following technique.

Stress: A Poem

Some people carry it around every day.
Turmoil and havoc rules when you let it stay.
Remember all the types: Acute, Chronic, Distress and Eustress!
Emotional ups and downs; on your face, your breathing,
your heart rate and digestive system is where it will display.
Simple deep breathing or yoga can keep it at bay.
Some more advice for you and me,
Practice happy techniques and set STRESS free.
Remember to tell your students, "job, well done".
Strive to keep a steady pace
As you run the race.
When at home get a good night's rest
Knowing that when you show up to teach students,
they will try to give you their best.
And when they bring their electronic devices to class,
Adjust your lessons to keep them engaged.
Utilize discovery approaches to help ensure their attention to the topic will last.
STREAM away stress.

By Wilma Herndon
Beta Zeta Chapter
Durnham, NC

References: Discovery education 2017. Operation prevention the science behind opioid addition. Retrieved March 6, 2018 from https://www.operationprevention.com/virtual-field-trip

Understanding the Impact of STEM Education on Student Achievement

Science, technology, engineering, and mathematics (STEM) is the new focus in education to drive the 21st century learner. The 21st century's focus on science, technology, engineering, and mathematics will be the leading areas of the workforce. Preparing our students to meet the changing world is vital to our existence. There is a push for teachers to include STEM in the curriculum to expose our students and make them aware of the use and career within the fields of science, technology, engineering, and mathematics. However, many students are not entering into STEM careers. STEM subjects are vibrant, engaging, and exciting, but somewhere along the line pupils are being 'switched off' in their droves, and disengage with study beyond secondary schooling (Bell, 2015, p.74). The education of both students and teachers drives the lack of excellence in or interest in STEM careers.

What is STEM?

The acronym has much meaning depending on the viewpoint of the person and the profession. "In its simplest terms STEM is an acronym which describes the study of science, technology, engineering, and mathematics (STEM), a term whose original derivation is accredited to Judith Ramaley (Bell, 2015, p.62)." STEM has different meanings to different people, and there is no single definition. Bell (2015) writes after the implementation of the acronyms, no single, universal definition exists

and depending upon one's individual perspective or a prescribed context, STEM holds different meanings to different people. Unfortunately, one group of individuals that holds a different meaning is teachers. The teachers have the most significant impact on how students form their understanding of STEM. If teachers do not agree on the definition of STEM or convey the same meaning to students, then students' knowledge of the STEM program will be conflicted. There is a great need for teachers to improve student achievement in the areas of STEM. It has been said that STEM is a ubiquitous and ambiguous slogan (Bybee 2013), opaque and confusing (Angier 2010) even to those who employ it (Sanders 2009) (as cited in Bell, 2015, p.62). Due to this "slogan" atmosphere, neither teachers nor students have a deep understanding of STEM.

Need for STEM

We are living in an era of significant change where science, technology, engineering, and mathematics need to keep pace. Over the past decades, many reports argued that the United States faced a weakened position in the global economy in large part due to low student achievement in the areas of science and technology. The youth are the key to improving the outlook of this country's stand on the global setting because they will change the world. The focus should not be on the students only, but also should be on the teachers. To teach students effectively, teachers need tools, including a shared knowledge base. Reports advocate strengthening America's technical workforce by increasing the preparation and professional development of STEM teachers as well as the pipeline of STEM students (Rink, Kinlaw, Gladstone-Brown, & Cappiello, 2016). Wang, Moore, Roehrig, & Park (2011) recommend a comprehensive investment in quality STEM education programs that will increase the quality and knowledge of the STEM field teaching force.

STEM Teachers and Learning

Although there is a national movement for K-12 STEM education and its corresponding push to develop STEM educators, rather little attention has been given to the content of STEM teacher preparation or professional development. A recent review of the research on STEM education found that most current studies focused on the STEM learning of K-12 students, with relatively little attention paid to STEM teachers (Brown, 2012) (Rink, Kinlaw, Gladstone-Brown, & Cappiello, 2016). Teachers are in need of training, and until they receive it, student achievement will continue to decrease.

While educators are aware of the importance of STEM education, neither educators nor researchers consistently agree or understand what STEM education should be about in K-12 education (Wang, Moore, Roehrig, & Park, 2011). Due to this conflict teachers are not aware of their roles and the impact on students. Teacher perception also impacts student achievement in the long-term. Teachers tend to repeat previously learned behaviors that influence the way they teach or approach a topic or issue. One study found that the teachers' perception of STEM, their personal knowledge, and understanding of that knowledge, are intrinsically linked to the effectiveness of STEM delivery in their classroom practice. Where a teacher's knowledge and understanding are deficient, findings indicate the potential for pupil learning is limited (Bell, 2015, p.74).

The perceptions that a teacher holds have an impact on the students he or she teaches. There is a direct correlation between how teachers learn and how they teach their students. Bell (2015) writes, in teaching, how something is learned can

be as important as what is being taught. Currently, STEM educators feel uncomfortable with using STEM instruction and content, making them unlikely to adopt STEM approaches in their classrooms (Nadelson et al. 2013). Equally, they have been found to possess merely fundamental conceptions of STEM. Magnusson (et al. 1999) writes this could be both harmful to teaching adequate STEM concepts to students, as well as their own implementation of STEM teaching approaches (as cited in Radloff & Guzey, 2016). To combat these obstacles, educators need prior exposure to useful STEM experiences and instruction (Radloff & Guzey, 2016).

The methods of teaching STEM at the secondary level are not matching up with the process in each of the respective STEM fields. The nature of all areas is complicated, interrelated, and ever-changing. Teachers need a better understanding and exposure to the different fields. Continuous development within the areas of STEM will improve the teacher instruction and student engagement. Over time, students will persist with STEM fields beyond secondary school, eventually increasing the number of people working in STEM.

By Rosey Rawle-Pitter
Delta Phi Chapter
New Haven, CT

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Rink, C. R., Kinlaw, C. R., Gladstone-Brown, W., & Cappiello, J. (2016). Characterizing STEM Teacher Education: Affordances and Constraints of Explicit STEM Preparation for Elementary Teachers. School Science & Mathematics , 300-309.
Wang, H.-H., Moore, T. J., Roehrig, G. H., & Park, M. S. (2011). STEM Integration: Teacher Perceptions and Practice. Journal of Pre-College Engineering Education Research , 1-13.

AUTOBIOGRAPHICAL MAGAZINE PROJECT

A Non-Fiction Research Project
(Grades 6 - 12)
(NJCCCS: W. 4,5,6,10)

This is a creative research project. You will be using the computer center in your classroom, library, or home computer to research some of your information. You will be writing creatively about certain articles. This is a fun project that will not be overwhelming if you keep up with the sections. The final magazine is worth two test grades, so be sure to turn in quality work. Be sure to turn this sheet in with your magazine; it will be used as a rubric/grade sheet. Have fun, good luck, and don't procrastinate!

Directions: Design a magazine that reflects your interests! Base all of your articles on this interest. For example, if you are an athlete, create your own Sports Illustrated. All of the articles you write should revolve around sports. Perhaps you are interested in becoming a professional chef. Design your magazine after Gourmet Magazine and write all of your articles to reflect your interest in food preparation. Try to create a new title for your magazine — **BE CREATIVE!**

_____ 1. Cover - 5 pts

Your magazine cover should look like a real magazine. Study the elements of a typical cover. The date of your magazine should be YOUR 25TH BIRTHDAY. Your cover image should be related to your cover story. You may use Microsoft Publisher to create this cover. You will need to include the following elements on your cover:

A. The title of the magazine as it typically appears
B. Title of the cover story in prominent letters
C. Date of issue
D. Price of magazine
E. One dominant image, picture, or theme

_____ 2. Table of Contents - 5 pts

Include titles of your articles and page numbers. Be sure that your table is in order!

_____ 3. American Scene - 10 pts

Name of your junior high or high school
In this section, you will present one aspect of your junior high or high school that relates to your theme. Interview someone at the school who is connected to your theme. For a sports theme, you might interview the physical education teacher; for a food theme, you might interview the foods manager. Be sure to include quotes.

_____ 4. Cover Story - 20 pts

Dream about your future. What will you have achieved by age 25? Here is your choice to make it big. The story should be believable. The main part of this cover story should revolve around your magazine topic, but you may include information about other aspects of your life at 30. (2 to 3 pages in length)

_____5. Current Events -15 pts (5 pts each)

In this section, you will research FOUR current events that relate to your magazine theme. For each current event, you will locate and read an article and summarize it in one or two paragraphs. You will need to document your resources. (1 to 2 pages in length)

_____6. Highlights - 10 pts

In this section, report on the headlines of the day, month, and year you were born. Again, see if you can report on headlines that relate to your theme. Then, interview a member of your family about what he/she remembers was going on the day you were born. (1 to 2 pages in length)

_____7. Reviews - 10 pts (5 pts each)

Movies, books, music. You will need to read several reviews in order to get a feel for the style of a review. Choose a movie, book, DVD, CD that you have experienced this year and write a reaction to it. If interested in aerospace engineering "Hidden Figures" would be a good movie. WRITE TWO REVIEWS. (1/2 page for each review)

_____8. Reflection Essay - 15 pts

Look back and reflect on your life so far (from 2017 and back). Choose 3-5 significant memories, describe them, and discuss what each event meant to you. Again, try to follow your magazine theme. (2 to 3 pages in length)

_____9. Photographs/Illustrations - 5 pts

Include at least five photographs or illustrations that relate to your articles. This does not include the photos or illustrations on your title page. You may use the digital camera and import pictures.

_____10. Advertisements - 5 pts

Include at least 2 ORIGINAL advertisements in your magazine. They can be for items that exist, or you may invent them. Try to follow your magazine theme.

Don't forget to cite your sources. You may wish to include these citations at the end of the appropriate articles, or you may include a Works Cited Page (bibliography) at the end of your magazine.

By Jarian R. Graham, M.Ed.
Eta Chapter, Executive Advisor
Camden, NJ

Restorative Practices for All

The parents of your upbeat four-year-old black male student have told you repeatedly that he may be a little energetic at home, but in no way exhibits any extreme tendencies described in his school behavioral, oral or written progress reports. The parents insist that their child is simply a bright individual who is very young and needs time to adjust to school. It is now five months into the school year, and their young son has not yet become accustomed to the enriched and varied early learning practices; in fact, the early learner has tried several times to run out of the school building unattended, and has not safely shared spaces, activities or supplies with his classmates (almost daily). He tends to use some form of verbal and physical aggression toward other children and adults during the school day. There are school accident reports indicating that other young classmates and school personnel have incurred bruises from interacting with your four-year-old student. Additionally, when the young student is placed in other same grade classes and attends art, music, computer, gym classes or recess, there are sometimes similar serious outcomes; other students' parents have become more boisterous with a variety of circumstances and demands concerning the situation. With mounting issues, should the described young student receive more intense measures, such as an on-or-off school campus suspension? Will sending the young student to a place away from his young classmates for several days improve his behavior, or benefit his school community in the long run?

Schools are exploratory places where very young students naturally stretch their intelligence, interests and curiosity, and discover what their classmates are trying, handling, and where they sit or stand. Sometimes students may not see eye-to-eye during daily school exchanges and shared spaces; the natural school contacts may occur with strong emotions and disagreements. To support the early learner's inquisitiveness and conflicts, adults have to resist the typical "rapid response" to take care of matters for our young charges, such as immediately separating affected students

or taking the favored object away. Instead, prepared educators incorporate social-emotional prompts and activities; the social emotional structures support early learners with ways to solve conflicts peacefully. Goodman, Joshi, Nasim and Tyler (2015) found that when early learners develop social emotional skills they tend to be healthier, feel content and have greater educational and work-place success when they become adults.

The very young learners will not develop social emotional skills without explicit guidance and preparation. Clark, McLaughlin, and Aspden (2018) state the benefits of social emotional early education, and list evidentiary social and emotional practices to further develop young students' socialization, such as: listening to the students, describing to the students what they are doing, repeating the strategies that are working, validating the students' feelings, making inquiries, staying calm, and demonstrating calmness and language. Specifically, the parents of the four-year-old student described earlier can furnish to the current teacher whether their child, as a toddler, participated in social emotional skills developmental activities in his pre-school setting. The parents may decide to reflect if the current school where their kindergartner attends has social emotional values, beliefs and curriculum that nurture a whole child school experience.

School brochures and bulletins should furnish information, including the basic school philosophy, data, brand and principles. Today's parents and caregivers will most likely be able to read literature, have a virtual tour, and visit the school to determine if the school is a proper fit for their child. Seeing and hearing about the school profile, general academic and enrichment curricula, and indications of educational commitment will show how the school provides a safe and orderly climate that nurtures relationships, rigorous teaching and learning. Parents should also find the behavioral expectations to support student learning and how that infringes upon the mutual respect of all the students and adults of the school community. Some of the information the parents should identify, in particular, is whether the school promotes positive student interactions and opportunities; moreover, does the information specify whether parents, school and community-based organization partnerships exist? And just as important, is there accessibility and application of the school discipline code, parental bill of rights and responsibilities, student bill of rights and responsibilities and social emotional practices as standards that the school is actively engaging in and continuously striving to achieve?

The parents should encourage the receiving school to also get to know their very young child; the student's interests, predominate home language, the month of birth, vision, hearing and other possible health concerns are also areas to share for differentiated learning activities as entry points and supportive scaffolding approaches. Malcolm Gladwell (2011) reveals some key differences of children born in the earlier months of the year. Important knowledge (such as each student's birthday, whether he or she wears eyeglasses, has limited English skills or dysgraphia) are examples of data that can be part of early significant lesson planning and resources. The information sharing will consider having the student participate in aligned social emotional activities, partnering with a peer coach, sitting closer to an anchor chart or big book, using digital devices, accessing language interpretation software and supportive handwriting tools that may be advantageous for the young student. The above named (and other) accommodations may also reduce some learners' frustrations and behavioral disturbances.

When dealing with very young children, we should remember that their brains are still developing; we adults may attempt to use our logic and multiple experiences to reason with our young charges who have much less life experience. Tasmin Kelly (2016) reminds readers that when our experiences occur over time, we acquire more information and gain new schemes with added perspectives. "Logical, abstract and hypothetical thinking starts kicking in from the ages of seven to eleven. Children of five and six have a small degree of logical thinking, but it's a mature skill that's still developing." Oftentimes, very young students need images and tangible objects when you are describing something; hence, mathematical concepts and the use of hands-on items, and puppetry with narrative stories, for example, are more valuable than solely talking at length to very young students.

Several social emotional school programs have visuals, and concrete resources to support the learning and peaceable activities. There are evidence-based curriculums that help to develop strategic social emotional healthy habits with young learners. The Georgetown University Center for Childhood and Human Development Center for Early Childhood Mental Health Consultation (ecmhc.org website) includes the following from a host of supportive early social emotional resources: Al's Pals; Incredible Years: Dina Dinosaurs Classroom Curriculum; Second Step; I Can Problem Solve; and PATHS. The school social emotional team can view several programs to determine which will be added to their SEL toolkit or piloted at their school and possibly adopted for increased implementation.

There is a positive trend showing that schools are addressing social emotional concerns. The largest public school district in the United States, the New York City Department of Education (grades K-12), has illustrated a decrease in school suspensions. The NYCDOE reported school suspension data from the 2016-2017 school year to the City Council in the fall of 2017; the 2017-2018 schools.nyc.gov website reveals that the overall number of suspensions during the school year 2016-2017 is down 6.4 percent when compared to the 2015-2016 school year. "As a result of the City's investment of more than $47 million annually to support the expansion of school climate and mental health initiatives, crime in schools is at an all-time low and suspensions in schools have decreased by 34 percent over the past five years."

The steady "down tick" numbers of NYC school suspensions are promising. The statistics prove that school suspensions are decreasing; however, racial disparities in school suspensions still exist. The New York Civil Liberties Union (NYCLU, 2016) reports that while school suspensions are declining, severe racial disparities continue, particularly amongst Black, Latino and White students, indicating that Black students were 3.6 times, and Latino students 1.7 times, more likely to be suspended than their White counterparts. Jimenez, McDaniels and Shapiro of the Center for American Progress (CAP, 2018) state that in the 2016-2017 school year, White students comprised 15 percent of the NYCDOE, but are suspended from school 8 percent of the time, whereas Black students consisted of 27 percent of the population but were suspended 47 percent of the time. The report further explains that causes for the suspensions were different in levels of seriousness; nonetheless, the racial disparities occur for varied infractions.

"Watch" groups like the NYCLU, National Black Child Development Institute (NBCDI), CAP and Educators for Excellence (E4E) keep track of racial disparities in school suspensions. These groups not only report on the data of

suspensions, but also study circumstantial concerns for school suspensions, such as economic factors, family composition, and parent education levels. Moreover, the degree that students have a voice and are engaged at school plays a significant role in preventing school suspensions. CAP (2018) states "…there is racial bias in disciplinary practices because of poverty rates or levels of misbehavior, but do not entirely explain the disparities. Factors such as disengagement from school, gender, or poor student-teacher relationships must be considered as well."

New York City Mayor De Blasio and Schools Chancellor Farina have publicized ways to support better school engagement and social emotional learning approaches in schools. The 2017-2018 schools.nyc.gov website documents that the city has funded $8 million to support innovative community workshops, a reporting portal, mental health training, expansions of student clubs and augmenting support for students, families and staff. The announced NYCDOE initiatives are steps toward better serving school communities and providing safer and more inclusive learning environments. There are a half dozen specific reforms described on the NYCDOE website; many include valuable approaches to lessen school suspensions, and restore a sense of worth for all.

There are growing collaborative communities encouraging less punitive measures whenever possible, and allowing students to be in their classrooms for productive learning experiences. The various groups are utilizing demonstrable resources and expertise at the schools and are also offering additional extended services beyond the school campuses; for example, one organization in particular is Educators for Excellence (E4E). E4E is a leading force that fosters positive disciplinary strategies and social emotional learning practices; they have been gaining support to move NYCDOE to restructure school climate and discipline. E4E recently held a panel discussion on how educators are applying restorative approaches in their classrooms; the panel consisted of representatives of The Restorative Justice Pilot in NYCDOE District 18 (the E4E plenary was well attended on February 1, 2018 at the Brooklyn Law School; the round table discussion included E4E members, policy makers, teachers, students and parents sharing how restorative practices have changed their school climate). The 2017-2018 schools.nyc.gov website indicates that NYCDOE has funded District 18 $500,000 to implement a district-wide restorative practices initiative at every school. "The 35 schools in the district had a 25 percent decrease in suspensions during the 2016-2017 school year, compared to the previous school year."

Advocacy groups such as the NBCDI push to stop school suspensions. NBCDI held a February 2018 New York City policy forum and panel discussion earmarking solutions to develop and sustain inclusive, culturally responsive early learning environments. A collective group of educators, policy makers, parents, and community-based organizations made a strong showing, discussion of strategies, and promise to end suspension in early learning education.

School pedagogues have received teacher state certification and earned necessary credit-bearing classes in childhood development and growth. New York State teachers and school leaders are meeting further state mandates to acquire Continuing Teacher and Leader Education (CTLE) credit requirements. School districts are supplying school personnel with approved professional learning sessions, that include meeting national, state and city Social, Emotional and Learning (SEL) mandates to better serve all students. Dignity for All, Respect for All, Behavioral

Crisis De-Escalation Intervention, Response to Intervention (RTI), and Restorative Justice practices are some professional learning sessions and procedures provided throughout the school year with specific steps to address student social emotional concerns.

Parents, students, educators and other stakeholders do have frameworks and support systems to develop and sustain student school success for all students. When we are collectively informed, seek tools and apply evidence-based strategic and innovative solutions, we establish advantages for every student's overall wellbeing that benefits the entire school community.

By Yvette Grant
Theta Chapter
Brooklyn, NY

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A Heart For The Goal!

If education is the key, hard work must be the door with a lock. In this, the year of 2018, education does not have the same weighted value as it did 18+ years ago. The world has changed and so has education for the 21st century learner. However, cultural ground-breaking identity still rests on the backs of those who knew struggle and success; the ones who fought for freedom, injustice and equality. Generations have changed over time, leaving its own original mark on history. One informing the other, and then creating a whole new identity.

We see that teachers create their own style of teaching based on how they learned or how the majority of their scholars learned. Therefore, teaching styles for the 21st century learner must include technology along with math, science, reading and writing. How do they grow? Children are like seeds planted by the rivers of living waters. True knowledge and wisdom equal success. This success is a privilege and should not be taken for granted by this current generation.

Classrooms are set up to catch the eyes that see (the hook), the ears that listen (the took) and the hearts that beat (the relationship). In the African-American culture, the church and the community blend in as one unit, one sound and one voice. It's all we had and still reigns true!

Our goal is, and always has been, to educate the total person, while recognizing their humanity, and connecting their mind, body, spirit and soul. Life is filled with wisdom and lessons from the sky. We never know the course we are granted until we face the challenges that are presented to us. Education and teaching belong to those who love it, are called to it, and live it. Teachers teach, educators empower, and leaders change the world; leadership, in the 21st century!

By Rev. Newtonia P. Hemphill
Alpha Rho Chapter
Dallas, TX

Chapters

Eastern Region

Alpha	Jersey City, NJ
Beta	Washington, DC
Gamma	Baltimore, MD
Epsilon	Charleston, WV
Zeta	Philadelphia, PA
Eta	Camden, NJ
Theta	Brooklyn, NY
Iota	Atlantic City, NJ
Xi	Chester, PA
Pi	Trenton, NJ
Rho	Wilmington, DE
Alpha Zeta	Richmond, VA
Alpha Lambda	Norfolk, VA
Alpha Mu	Annapolis, MD
Alpha Pi	Dover, DE
Alpha Tau	Roanoke, VA
Alpha Chi	Portsmouth, VA
Beta Epsilon	New York, NY
Beta Zeta	Durham, NC
Beta Lambda	Winston-Salem, NC
Beta Omicron	Jamaica, NY
Beta Tau	Salisbury, MD
Gamma Mu	Virginia Beach, VA
Delta Gamma	Virginia Beach, VA
Delta Lambda	Egg Harbor Twsp., NJ
Delta Nu	Bergen County, NJ
Delta Pi	Hillside, NJ
Delta Phi	North Haven, CT
Epsilon Alpha	Somerset, NJ
Epsilon Eta	New Bern, NC
Epsilon Sigma	Gastonia, NC
Epsilon Upsilon	Greensboro, NC
Epsilon Chi	Spring Valley, NY

Southeast Region

Nu	Birmingham, AL
Upsilon	Tuskegee, AL
Psi	Mobile, AL
Alpha Beta	Nashville, TN
Alpha Gamma	Jacksonville, FL
Alpha Delta	Miami, FL
Alpha Epsilon	Atlanta, GA
Alpha Theta	New Orleans, LA
Alpha Omicron	Tampa, FL
Alpha Phi	Pensacola, FL
Beta Beta	Montgomery, AL
Beta Eta	Memphis, TN
Beta Kappa	West Palm Beach, FL
Beta Xi	Orlando, FL
Beta Sigma	Lakeland, FL
Beta Pi	Chattanooga, TN
Gamma Gamma	Panama City, FL
Gamma Eta	St. Augustine, FL
Gamma Theta	Brewton, AL
Gamma Omicron	Miami, FL
Gamma Psi	Jackson, TN
Delta Delta	Jacksonville, FL
Delta Zeta	Waycross, GA
Delta Iota	Olustee, FL
Delta Mu	Memphis, TN
Epsilon Mu	Bainbridge, GA
Epsilon Tau	Stone Mountain, GA
Epsilon Psi	Jackson, MS
Zeta Delta	Selma, AL

Midwest Region

Mu	Chicago, IL
Sigma	Cincinnati, OH
Tau	Indianapolis, IN
Chi	Detroit, MI
Alpha Alpha	Kansas City, MO
Alpha Eta	Evansville, IN
Alpha Nu	St. Louis, MO
Alpha Xi	Cleveland, OH
Beta Gamma	Toledo, OH
Beta Delta	Dayton, OH
Beta Iota	Akron, OH
Beta Mu	Gary, IN
Beta Chi	Milwaukee, WI
Gamma Alpha	Columbus, OH
Gamma Beta	Kansas City, KS
Gamma Delta	Flint, MI
Gamma Kappa	Saginaw, MI
Gamma Rho	Shaker Heights, OH
Epsilon Xi	Forest Park, OH
Zeta Gamma	Maywood, IL

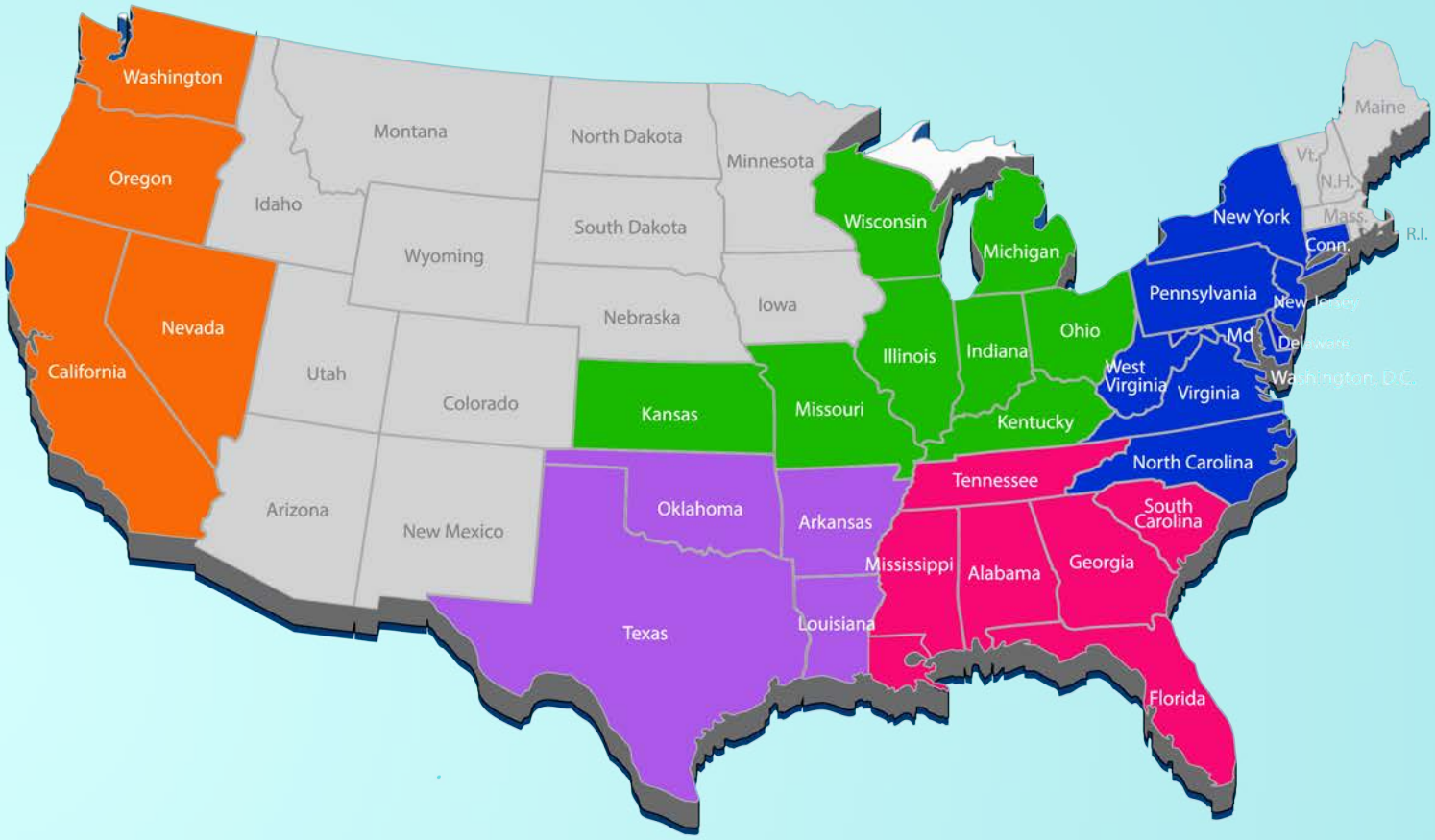
Southwest Region

Alpha Kappa	Tulsa, OK
Alpha Rho	Dallas, TX
Alpha Sigma	Fort Worth, TX
Beta Alpha	Shreveport, LA
Beta Rho	Texarkana, TX
Gamma Epsilon	Oklahoma City, OK
Gamma Nu	Little Rock, AR
Gamma Tau	San Antonio, TX
Gamma Upsilon	Waco, TX
Delta Beta	Austin, TX
Delta Epsilon	Dallas, TX
Delta Omicron	Muskogee, OK
Delta Chi	Houston, TX
Epsilon Beta	Tyler, TX
Epsilon Gamma	Plano, TX
Epsilon Delta	Lawton, OK
Epsilon Epsilon	Edmond, OK
Epsilon Theta	Beaumont, TX
Epsilon Zeta	Ennis, TX
Epsilon Iota	Galveston, TX
Epsilon Lambda	Orange, TX
Epsilon Pi	Arlington, TX
Epsilon Rho	Minden, LA
Zeta Alpha	Mesquite, TX
Zeta Beta	Port Arthur, TX

Far West Region

Beta Theta	Los Angeles, CA
Beta Nu	San Francisco, CA
Beta Phi	Compton, CA
Gamma Lambda	Pasadena, CA
Gamma Xi	El Cerrito, CA
Gamma Sigma	Las Vegas, NV
Delta Kappa	Inglewood, CA
Delta Xi	Long Beach/Carson, CA
Delta Rho	San Bernardino, CA
Delta Upsilon	San Diego, CA
Epsilon Nu	Moreno Valley, CA
Epsilon Omicron	Spokane, WA

Regional Locations



Regional Directors

Eastern Region

Noreen Little
Regional Director

Southeast Region

Delores D. Hills
Regional Director

Midwest Region

Rev. Dr. Francine E. Blake
Regional Director

Southwest Region

Dr. Sylvia M. Williams
Regional Director

Far West Region

Velma Brown
Regional Director

Conference Events

	REGIONAL	YOUTH
EASTERN	Host Chapter: Beta Zeta April 19 - 22, 2018 Sheraton Imperial Hotel & Convention Center Durham, NC	Host Chapter: Alpha Pi March 9 - 10, 2018 Dover Downs Hotel & Casino Dover, DE
SOUTHEAST	Host Chapter: Psi April 12 - 15, 2018 Marriott Mobile Hotel & Resorts Mobile, AL	Host Chapter: Gamma Gamma June 7 - 10, 2018 Hotel: TBD Location:TBD
MIDWEST	Host Chapter: Alpha Alpha May 3 - 6, 2018 Sheraton Overland Park Hotel Overland Park, KS	Host Chapter: Beta Mu March 22 - 25, 2018 Alsip Doubletree Hotel Alsip, IL
SOUTHWEST	Host Chapter: Epsilon Pi April 5 - 8, 2018 Sheraton Arlington Hotel Arlington, TX	Host Chapter: Delta Beta February 23 - 25, 2018 Omni Austin Hotel Southpark Austin, TX
FAR WEST	Host Chapter: Delta Kappa March 16 - 18, 2018 Double Tree by Hilton Culver City, CA	Host Chapter: Delta Upsilon April 13 - 15, 2018 Hotel: Double Tree by Hilton San Diego, CA

SAVE THE DATE!

National Sorority of Phi Delta Kappa, Inc

96th Anniversary Conclave

July 15 - 18, 2019

Pre-Conclave Activities:

Tours,
Entertainment,
Shopping, etc.
Saturday, July 13, 2019 - Sunday, July 14, 2019

Conclave:

Monday, July 15, 2019 - Thursday, July 18, 2019
St. Louis Union Station Hotel
1820 Market Street
St. Louis, MO 63103
314.621.5262

Dr. Etta F. Carter, Supreme Basileus
Margarette Galloway, First Supreme Anti-Basileus
Anita Totty, Conclave Coordinator
Dr. Carla F. Carter, Conclave Coordinator
Dr. Barbara Gwinn, Basileus, Alpha Nu Chapter

Joyce Williams, Chief Editor, Krinon
National Sorority of Phi Delta Kappa, Inc.
8233 South King Drive
Chicago, IL 60619

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