Office of School Board Members Board Meeting of October 19, 2022 October 19, 2022

Dr. Marta Pérez, Board Member

Co-Sponsors: Ms. Perla Tabares Hantman, Chair

Dr. Steve Gallon III, Vice Chair Dr. Dorothy Bendross-Mindingall

Ms. Luisa Santos

REVISED AT DAIS BY BOARD ACTION

SUBJECT: REQUEST FOR APPROVAL OF RESOLUTION NO. 22-045 OF THE

SCHOOL BOARD OF MIAMI-DADE COUNTY, FLORIDA, RECOGNIZING MR. SHAWN BEIGHTOL AS THE 2022 ANNUAL QUEEN SMITH AWARD WINNER FOR COMMITMENT TO URBAN PUBLIC EDUCATION FROM THE COUNCIL OF THE GREAT CITY

**SCHOOLS & MCGRAW-HILL EDUCATION** 

COMMITTEE: PERSONNEL, STUDENT, SCHOOL & COMMUNITY SUPPORT

LINK TO STRATEGIC

PLAN: HIGHLY EFFECTIVE TEACHERS, LEADERS, & STAFF

Miami-Dade County Public Schools is fortunate to have many exceptional teachers, one of which is Mr. Shawn Beightol, a 29-year veteran who currently teaches chemistry at John A. Ferguson Senior High School. This year, we were just informed, Mr. Beightol has won the very prestigious 2022 Annual Queen Smith Award winner for Commitment to Urban Public Education from the Council of the Great City Schools (CGCS) and McGraw-Hill Education. This is the highest award this national organization presents to a teacher in the United States.

#### **COMMITMENT TO EDUCATION**

Mr. Beightol's career demonstrates a nearly 3-decade long commitment to delivering quality education, from his classroom to the national teacher training stage. From standing on street corners raising public awareness of the issues teachers' face to the board rooms of both the School Board and the teacher's union advocating for excellence in education.

#### **TEACHER OF THE YEAR**

Early in his career, Mr. Beightol's approach to teaching at-risk students in the alternative high school William H. Turner Technical Arts High School drew attention. It earned him the beginning teacher of the year award, numerous grants, the position of coordinating the middle school advanced agricultural science summer camp, an invitation to become a "Master Teacher" trainer with the national Southeastern Consortium for Minorities in Engineering (SECME) at Georgia Tech, and the granting of the National SECME Teacher of the Year award!

#### **ANTARTICA STUDIES**

As if this wasn't enough, Mr. Beightol won the Teacher's Experiencing Antarctica award where he took (virtually) students from all over the world on the hunt for submarine volcanoes off the coast of Antarctica and connected them to their student-built weather station. On his return, Mr. Beightol led students on multiyear research projects that were published and presented at state and national conferences.

Revised Good Cause B-8 Mr. Beightol was then invited to teach in an Advanced Academic Program at Florida International University (FIU) that was basically "dual enrollment" for at-risk students. During this time, he continued to participate as a national teacher trainer (Valdosta State University/Teacher Channel) and expanded the Engineering club at Dr. Michael M. Krop Senior High School, nearly securing a grant to place microgravity research on the space shuttle/ISS.

#### <u>ACTIVISM</u>

Ten years into his career, Shawn began to take interest in the forces affecting teacher quality at both the district and the teacher's union level. As a school board speaker, as a lead steward with the United Teachers of Dade (UTD), and teachers' union presidential candidate, Mr. Beightol used passion, knowledge, and the platform (as a continuously recognized and awarded teacher and union steward) to push for reform at both the School Board and the Union.

#### **VERY BRILLIANT MAN & CAREER**

Mr. Beightol leaves a legacy of outdoor educational programming with our district, having worked to not only be trained in outdoor education, but to recruit and fund other teachers to do the same.

He is a selfless teacher who creates enthusiasm in his students who love him. The world is a better place because Shawn Beightol has touched so many lives.

#### SIGNIFICANT IMPACT IN THE FIELD OF EDUCATION

#### 1. Awards

- a. 2015 2016 Everglades National Park Residency, "Teacher-Ranger-Teacher"- worked as a ranger for a summer "shadowing" scientist to bring practical applications of science back to classroom.
- b. 2014 2015 Teacher of the Year, John A. Ferguson Senior High School.
- c. 2013 2014 Resolution #14-019 of the School Board of Miami-Dade County Public Schools (M-DCPS) echoed NASA's recognition of Mr. Beightol's authoring of a web/cell phone app used to locate rocket launch direction (where to look to observe) and vehicle height from viewing angle. NASA/Harvard University and Journal Physics Teacher reference it in their publications.
- d. 2010 2011 National Right to Work Foundation's Carol Applegate Education Award national award given to teachers who fight against damaging/coercive union policies harmful to education.
- e. 2007 2008 United Teachers of Dade (UTD) Union Steward of the Year Nominee.
- f. 2006 2007 United Teachers of Dade (UTD) Union Steward of the Year finalist.
  - i. These awards are important to interpret the Applegate Award in 2010 Mr. Beightol is pro-union, ran for union president twice, was an excellent union steward. He worked to see it reformed and focus its energies on the job of representing teachers.
- g. 1998 1999 National SECME, Inc.'s Teacher of the Year Beightol's classroom and extracurricular work to increase under-represented persons in STEM fields were recognized by the Southeast Consortium for Minorities in Engineering (based out of Georgia Tech).
- h. 1998 1999 NSF's Antarctic Research Program Awardee M-DCPS Science Coordinator Connie Thornton challenged Beightol to apply to go to Antarctica and to take his classroom with him...which he did. In the Summer of 1998, primarily at-risk urban students who had failed in other schools were brought into Mr. Beightol's science class where they modeled a Research and Development engineering company. They designed and built a weather station that was mounted to the research vessel in Antarctica and from which they could gather weather data on the web (a fairly cutting-edge curricular feat in the late 90s).
- i. 1997 1999 Research Corporation/NASA-Florida Space Grant Consortium's Partners in Science Award

   brought Mr. Beightol into a chemistry research lab at Florida International University to work alongside research scientists to provide authenticity to his classroom/lab effect on students.
- j. 1996 1997 SECME Teacher of the Year, M-DCPS Science/Math coordinators were becoming increasingly aware of unique classroom style and lab activities in the inner-city school and the impact of his teaching on underrepresented minority students in the STEM fields.
- k. 1995 1996 Dade Public Education Fund Grant Recipient.
- I. 1995 1996 Outstanding Presenter, Florida's Conference on Improving Education.
- m. 1994 1995 Net In the Classroom Internet Lesson Plans, Florida Department of Education (FDOE) Mr. Beightol wrote an award-winning curriculum for using the internet in the science classroom at a time when he was told that the internet was a "fad" in the classroom!
- n. 1994 1995 Beginning Teacher of the Year, William H. Turner Technical Arts High School.

#### 2. Student Research

- a. Mr. Beightol placed graduating senior, Ana Pereira in a University of Miami Atmospheric Chemistry lab for summer 2021 internship starting next week for her summer before college. Dr. Tony Hynes, University of Miami
- b. Mr. Beightol placed graduating senior, Raquel Buriani in a University of Miami Cancer Research lab for summer 2021 internship starting next week for her summer before college with Dr. Anouk Hamers.
- c. Mr. Beightol guided a low performing regular chemistry student (Eddy Collantes) to build a science fair experiment to investigate factors affecting automotive cooling systems, Fall 2021, John A. Ferguson Senior High School.
- d. Mr. Beightol involved several students and attended with them a computer/software modeling chemistry course at the University of Miami Summers of 2018 and 2019.
- e. Ferreira Animal Hospital Student Internships Having built Ferreira Animal Hospital from the ground up with his domestic partner, Mr. Beightol wrote the veterinarian internship training manual and designed the program that allowed students from John A. Ferguson Senior High School veterinarian program to intern/train at the hospital. 2012-2014
- f. Titanium Dioxide "In Situ Photodegradation of Automotive Pollutants" Mr. Shawn Beightol, Ms. Ana Castro, and Mr. Paul Reynolds, Annual Meeting of the Florida Sections American Chemical Society, May 2-3, 1997, Orlando, Florida Mr. Beightol supervised student research done at both M-DCPS William H. Turner Tech High School and FIU campuses where high school students investigated the removal of pollutants from simulated road surfaces via solar energy derived from a titanium dioxide coating on road surfaces. Students worked two years on this and traveled to present at the 1997 ACS Florida Meeting.

#### 3. Student school-site "original" Labs

- a. COVID tests and chromatography following a required COVID test, Mr. Beightol realized the technology was essentially "paper chromatography" and wrote a chemistry lab for the 2021-2022 school year. John A. Ferguson Senior High School.
- b. Cell phone spectrometers students designed and built flame emission spectrometers that fit on their cellphones and study light emission from energized chemical samples. Of particular note was that they were able to distinguish Paschen IR series lines of hydrogen spectrum. Fall 2013, John A. Ferguson Senior High School.
- c. Rocket Launch App students-built clinometers to measure the angle of a rocket viewed upon launch from Kennedy Space Center and viewed from John A. Ferguson Senior High School. They fed the data into a software app that Beightol wrote and published on the internet in order to calculate the height of the rocket in feet. 2013-2014, John A. Ferguson Senior High School.
- d. Absorption Spectrometers using computers donated by a local charity, Mr. Shawn Beightol's chemistry students built homemade absorption spectrometers ("Colorimeters") connected to the computers via the gameport and running custom software that Mr. Shawn Beightol wrote as part of his Masters Research at Florida International University. 2002-2005, Dr. Michael M. Krop Senior High School.

#### 4. Professional Development for Teachers

- a. Florida State Level/DOE
  - i. "Teaching Sustainability in the Science Curriculum" Mr. Shawn Beightol and Mr. L. Jack Moller for the Governor's Commission for a Sustainable South Florida, Environmental Education Council, November 1, 1997, Fort Lauderdale, Florida.
  - ii. "The Internet and the Florida Information Resource Network" Mr. Shawn Beightol, State Vocational Teachers Conference, October 18, 1997, Miami, Florida.
  - iii. "Restructuring Applied Technology Pre-K through Post-Secondary Curriculum Framework Review" contributor, FDOE/University of West Florida, November 28—29, 1995, Tampa, Florida
  - iv. "Agridemics: an Integrated Approach" Mr. Shawn Beightol and Everal Miller, Florida's Conference on Improving Education, September 27, 1995, Orlando, Florida.
- b. National/SECME/Other State Universities
  - i. "Teaching Conservation Laws with Spreadsheets, Labs, and Systems of Equations," Valdosta State University/The Teacher Resource Network, 2010, Valdosta, Georgia.
  - ii. "Teaching Electricity and Magnetism," Valdosta State University/The Teacher Resource Network, Valdosta State University, 2009, Valdosta, Georgia.
  - iii. "Mathematics Matters Every Day Bringing Mathematics into our World" Mr. Shawn Beightol, SECME Summer Institute, Embry-Riddle Aeronautical University, 2007, Daytona Florida

- iv. "Projectile Motion and Computer Modeling" S. Beightol, C. Bennett, T. Harris, R. Jones, P. Mahaffey, G. O'Leary, and R. Ribando, SECME Inc. Summer Institute at University of Virginia, 1997, Charlottesville, Virginia.
- v. "Full of Hot Air: Exploring the Ideal Gas Law with Hot Air Balloons" Shawn Beightol and John Roberts (Project SERVE), Southeastern Consortium for Minorities in Engineering Summer Institute at Tuskegee University, 1996, Tuskegee, Alabama.

#### c. District

- i. "Florida Teachers Certification Exam Chemistry 6-12 preparation," M-DCPS, Center for Professional Learning, Miami, Florida, 2018.
- ii. "Google Docs Forms Application: Real-Time Data Collection and Feedback School Laboratory Learning Tool Using Cell-Phones/Wireless/3/4G Data Tools in the Classroom," Dade County Science Teachers' Association 2012 STEM Conference, December 8, 2012, Coral Gables, Florida.
- iii. "Team Building for Implementing a SECME Pre-Engineering Program in Your School," M-DCPS USI/SECME District Conference, Miami, Florida, 1997.
- iv. "Positive Multicultural Experiences" Mr. Shawn Beightol, Southeastern Consortium for Minorities in Engineering, Miami Jackson Senior High School, Miami, Florida, 1995.

#### d. School-site

- i. "Classwallet M-DCPS' Mechanism to Access Florida Lead Teacher Supply Money," M-DCPS, John A. Ferguson Senior High School Faculty Meeting, Miami, Florida, 2017.
- ii. "OneNote Digital Classroom, Intermediate Class," M-DCPS John A. Ferguson Senior High School Faculty Professional Development, Miami, Florida, 2016 2018
- iii. Beightol, Shawn, "High School Physics and Chemistry prerequisites," M-DCPS' John A. Ferguson Senior High School's Science Department, Miami, Florida, 2016.

#### 5. Big Science

- a. Climate Conference with Dr. Tony Hynes UM Mr. Beightol organized a school-wide climate conference with guest speakers Dr. Tony Hynes and Dr. Lisa Goes of University of Miami's Rosenstiel's School of Marine and Atmospheric Sciences. 2019.
- b. Attended Launch of asteroid exploring robot, Osiris-rex and organized school-wide video conference with Mr. Dave Lavery, program executive for solar system exploration, NASA. Through chance encounter in 2016, Shawn Beightol cultivated a professional relationship with Dr. Dave Lavery which resulted in the January 2018 schoolwide video/teleconference Dr. Lavery and our students. John A. Ferguson Senior High School, 2016-2018.
- c. 2017 Eclipse School Wide Viewing Mr. Beightol was one of only a few teachers who prepared ahead of time to present a full program of safe eclipse watching on the opening day of school in 2017: <a href="https://youtu.be/zTL2qDCdKAQ">https://youtu.be/zTL2qDCdKAQ</a> John A. Ferguson Senior High School Science Department, September 2017, Miami, Florida.
- d. Everglades Astronomy Night part of Everglades Camping Program, Mr. Shawn Beightol sets up Newtonian telescopes for planetary and lunar viewing in the Everglades, 2016-Present.
- e. NASA & Microgravity In 2000-2001, Mr. Beightol's SECME engineering club researched, designed and built a 2-axis clinostat as the basis for a successfully received NASA Microgravity experiment grant application. The grant made it through the first rounds and was rejected when it was realized the requesting organization was a high school. Dr. Michael M. Krop Senior High School, Miami, FL. 2000-2001.
- f. Antarctica in 1997 MDCPS' science coordinator approached Mr. Shawn Beightol to challenge him to apply for the National Science Foundation's "Teachers Experiencing Antarctica." Upon selection, Mr. Beightol utilized a summer program for at-risk students earning makeup credits to simulate an R&D engineering firm. Students studied, designed and built a weather station that went to Antarctica and was used to read daily weather and GPS data over the internet. William H. Turner Technical Arts High School, 1997 1999.
- g. Radio telescope Mr. Beightol built a radio telescope for students and faculty to monitor comet Shoemaker-Levy's impact on Jupiter, a shortwave radio source. William H. Turner Technical Arts High School, 1994.

#### 6. Book/Curriculum Writing

a. Math Matters Everyday – M-DCPS partnered with FIU, Miami Dade College, University of Miami, NASA SEMAA (aerospace STEM initiative), and SECME Inc. to establish a program of professional development opportunities to better prepare non-content certified teachers in STEM coursework. Mr. Beightol was a curriculum writer, adviser, model instructor (in training videos) and national presenter (at the 31<sup>st</sup> Annual SECME Summer Institute), Embry-Riddle University, Daytona, Florida. 2007.

- b. Holt, Rinehart & Winston Earth Space, 2006 Edition Mr. Beightol edited multiple chapters and wrote portions of chapters 12 and 13 (Earthquakes and Volcanoes) as well as 2 labs that were published in the lab manual. 2006.
- c. NPS Mr. Beightol has been writing practical chemistry labs annually for the National Park System (Everglades National Park, Education Center) in conjunction with successive grants 2015-2022.
- 7. **Union Involvement** Mr. Beightol became an outspoken participant in internal teacher union "politics" in order to bring about higher levels of accountability and professionalism in both conduct, practice and via recruitment connected to higher salaries.
  - See <a href="https://web.archive.org/web/http://www.shawnbeightol.com/2004campaign">https://web.archive.org/web/http://www.shawnbeightol.com/2004campaign</a> and <a href="https://web.archive.org/web/http://www.shawnbeightol.com/2index.htm">https://web.archive.org/web/http://www.shawnbeightol.com/2index.htm</a>
- 8. **School Board Involvement** Mr. Beightol is a regular speaker at the Miami-Dade County School Board meetings and has himself run for school board.
- 9. Camping/outdoor program Trained in the National Parks System's "Teacher-Ranger-Teacher" program as to the available programs and role of NPS in outdoor education as part of a school systems curriculum and the Everglades National Park's Environmental Education Center's camp chaperoning programs and then trained by SCI Foundation in Wilderness Survival and Leadership, Beightol began an annual introductory camping program for 26 of his students each year. Recruiting several teachers and obtaining grants for their training, he now has 5 outdoor education trained teachers and another 3 volunteer chaperones. The camping program has been grown by successful grants funding backpack camping equipment and another 16 "graduate" campers take part in an annual advanced backpacking camping trip for a total 42 students camping in the Everglades annually. Ten students have been successfully watertrained and were slated to begin sailing and taking part in beach cleanups out of the Coconut Grove Sailing Club just before COVID shut down those kinds of activities, though they are once again being scheduled. The club meets monthly to learn a new skill and to participate in physical conditioning. Mr. Beightol's vision is to export the outdoor program to other schools and to gain district recognition of outdoor education as an integral part of teaching the whole student. In line with these goals, Mr. Beightol has had one teacher from outside his school trained at the American Wilderness Leadership School and has participated in district meetings to help write the district language that will formalize and organize the many resources and activities available and in use by M-DCPS teachers.

## INVOLVEMENT IN A COMMUNITY ORGANIZATION WHOSE POLICIES AND PROGRAMS SUPPORT THE PERPETUATION OF CREATIVE AND EFFECTIVE EDUCATION FOR ALL AGE GROUPS

- 1. SCI South Florida Board Member, Educational Liaison SCI, a national organization devoted to promoting safe, responsible, sustainable outdoor recreation pertaining to hunting. Hunting is an integral to the North American Wildlife Conservation model that has been developed to use hunting revenues to fund wildlife conservation and accomplish wildlife population management. This successful model has been duplicated around the world. It is regarded as a science-based, research-driven solutions to real problems facing wildlife conservation and sustainable use of wildlife resources. In 2018, Mr. Beightol was requested by the Science & Math office of M-DCPS to attend SCI's Wilderness Leadership School and on his return, was invited to join the local chapter as a board member to extend their program into the public school/secondary school level.
- 2. **FWC Youth Hunting** Mr. Beightol volunteers with the Florida Fish and Wildlife Commission's (state agency) Youth Hunting Program to teach students from all over Florida to properly handle their firearm outdoors, to track and harvest wildlife in a safe, responsible, and sustainable manner.
- 3. **Miami River Watch** Mr. Beightol founded a grassroots activist movement comprised of river residents, employees/business owners, and property owners to leverage governmental agencies to focus on enforcement of existing rules, regulations, and laws to protect personal and commercial properties and wildlife on the Miami River.
  - a. Working with FIU Environmental Science Grad Students, assisting with guiding and data collection for a variety of research projects:
    - i. Manatee population
    - ii. Water Quality
    - iii. Social/Historical impact of the Miami River over time
  - b. "Meet and Greet" socials with River Residents and Employers/Employees

c. Maintains a mailing list to educate ~200 policy makers, law enforcement and other oversight agencies, residents, businesses regarding Miami River conditions and issues.

#### 4. M-DCPS

- a. Outdoor club described above.
- b. Archery team has received approval to start an archery club/team. Mr. Beightol's program will be the only public-school archery program south of Orlando, Florida by November 2021.
- c. School Advisory Council Mr. Beightol has served on the School Advisory Council at his current school since 2015. Prior to his transfer to John A. Ferguson Senior High School, Mr. Beightol served on the EESAC of Dr. Michael M. Krop Senior High School as the Union Steward 2004-2008.

## SIGNIFICANT LEADERSHIP ROLE IN FURTHERING A SPECIFIC ASPECT OF EDUCATION (CURRICULUM, TECHNOLOGY, POLICYMAKING)

- 1. Curriculum see above
- 2. **Technology** technology in the classroom, including cell phones and BYOD, learning/spearheading the learning of new platforms via training videos see above
- 3. **Policymaking** inputted on RRAS, inputted on STEM training, inputted on technology in education, currently in conversation with policy regarding outdoor education.

As the winner of the 2022 Annual Queen Smith award, Mr. Shawn Beightol will receive a \$5,000 check and plaque honoring his significant contributions to public urban education students on Friday, October 21, 2022, during the Council of the Great City Schools' 66 Annual Fall Conference in Orlando, Florida. Additionally, \$1,000 will be awarded to the Council of Great City Schools whose programs serve as models for educating future generations. (See attached letter)

We take great pleasure in presenting this proclamation to Mr. Shawn Beightol for receiving the 2022 Annual Queen Smith Award for commitment to Urban Public Education.

This item does not appear on the published agenda. There exists good cause to vary from the published agenda in order to timely and properly honor Mr. Shawn Beightol for his extraordinary accomplishments.

### ACTION PROPOSED BY DR. MARTA PEREZ:

That The School Board of Miami-Dade County, Florida, approve Resolution No. 22-045 of The School Board of Miami-Dade County, Florida, recognizing Mr. Shawn Beightol as the 2022 Annual Queen Smith Award Winner for commitment to Urban Public Education from the Council of the Great City Schools and McGraw-Hill Education.

#### **RESOLUTION NO. 22-045**

# OF THE SCHOOL BOARD OF MIAMI-DADE COUNTY, FLORIDA, RECOGNIZING MR. SHAWN BEIGHTOL AS THE 2022 ANNUAL QUEEN SMITH AWARD WINNER FOR COMMITMENT TO PUBLIC EDUCATION FROM THE COUNCIL OF THE GREAT CITY SCHOOLS AND MCGRAW-HILL EDUCATION

WHEREAS, Miami-Dade County Public Schools is fortunate to have many exceptional teachers, one of which is Shawn Beightol, a 29-year veteran who currently teaches chemistry at John A. Ferguson Senior High School. Mr. Beightol has won the very prestigious 2022 Annual Queen Smith Award for Commitment to Urban Public Education from the Council of the Great City Schools (CGCS) and McGraw-Hill Education. This is the highest award this national organization presents to a teacher in the United States; and

**WHEREAS**, Mr. Shawn Beightol stellar career demonstrates a nearly 3-decade long commitment to delivering quality education, from his classroom to the national teacher training stage. From standing on street corners raising public awareness of the issues teachers face to the board rooms of both the school board and the teacher's union advocating for excellence in education; and,

WHEREAS, Mr. Beightol impacts the lives of many students, both by helping them reach their academic potential and deepening their understanding of the forces that shape their lives, the nation, and the world. Whether it's taking (virtually) students from all over the world on the hunt for submarine volcanoes off the coast of Antarctica and connecting them to their student-built weather station or creating outdoor education programs proving that education is far more effective than legislation; and,

**WHEREAS**, the Council of the Great City Schools and McGraw-Hill Education present this award each year to honor the legacy of Queen Smith, the company's late vice president of urban programs. Her life represented honor, excellence, and commitment to urban public education; and,

WHEREAS, as the winner of the 2022 Annual Queen Smith award, Mr. Beightol will receive a \$5,000 check and plaque honoring his significant contributions to urban education students on Friday, October 21, 2022, during the Council of the Great City Schools' 66 Annual Fall Conference in Orlando, Florida. Additionally, \$1,000 will be awarded to the Council of Great City Schools whose programs serve as models for educating future generations; and,

**WHEREAS**, we take great pleasure in presenting this proclamation to Mr. Shawn Beightol for receiving the 2022 Annual Queen Smith Award for commitment to Urban Public Education.

#### NOW, THEREFORE, BE IT RESOLVED THAT:

The School Board of Miami-Dade County, Florida, approve Resolution No. 22-045 recognizing Mr. Shawn Beightol as the 2022 Annual Queen Smith Award Winner for commitment to Urban Public Education from the Council of the Great City Schools and McGraw-Hill Education.

A copy of this resolution is placed in the permanent records of this Board.

#### Presented this nineteenth day of October, A.D. 2022

THE SCHOOL BOARD OF MIAMI-DADE COUNTY, FLORIDA

	CHAIR
ATTEST:	
Secretary	
Secretary	