MINUTES OF THE MEETING
OF THE
MICHIGAN STATE UNIVERSITY
BOARD OF TRUSTEES

June 18, 2021

President Stanley called the meeting of the Board of Trustees to order at 8:00 a.m.

Trustees present: Dianne Byrum, Melanie Foster, Renee Knake Jefferson, Dan Kelly, Pat O’Keefe, Brianna Scott, Kelly Tebay, and Rema Vassar.

University officers present: President Stanley, Provost and Executive Vice President Woodruff; Executive Vice Presidents Beauchamp and Woo; Senior Vice Presidents Frace and Gore; Vice President and General Counsel Quinn; Secretary Barr; Vice Presidents Bales, Bollman, Byelich, Guerrant, Haas, Swain, and Wilbur; and Interim Vice President Gage. Faculty liaisons present: Richard Fulton and Anna Pegler-Gordon. Student liaison present: Georgia Frost.

All actions taken were by unanimous vote of the Trustees present, unless otherwise noted.

1. On a motion by Trustee Kelly, supported by Trustee Foster, the BOARD VOTED to approve the agenda.

2. On a motion by Trustee O’Keefe, supported by Trustee Kelly, the BOARD VOTED to approve the minutes of the April 16, 2021 Board of Trustees meeting.

3. Public Participation
   a. Chris Bremer-Swimming and Diving
   b. Marilyn Corson Whitney, Ph.D.-Swimming and Diving
   c. Jorge A. Gonzales-Swimming and Diving
   d. Sidney Appelboom-Swimming and Diving
   e. Selman Akbulut-End Corruption at MSU
   f. Elena Emory-Brianna Scott
   g. Erica Thibodeau-Marilyn Tarrant
   h. Nicholas DeFauw-Recreation Center
   i. Michael Green-MSU Olympians

4. President’s Report

   President Stanley provided the following report to the Board:

   I would like to thank everyone who took the time to speak today.
I want to start with an acknowledgement of the passing of alumnus and an exceptional friend of Michigan State University, Eli Broad, back on April 30. I had the opportunity to pay tribute to Broad in front of Broad College of Business students at their graduation ceremony the day after his death, and to speak to his outside impact in other settings. But I think it’s important to do it again today. Mr. Broad was someone whose genius and philanthropy touched so many lives in so many ways. From cutting edge science at the Broad Institute, to contemporary art here and in Los Angeles, to one of the world’s best business schools, and so many other places. Eli’s relentless commitment to achieving and supporting excellence was transformational. He will be missed.

This week, we were pleased to announce a partnership with the Gilbert Family Foundation and the Rock Family of Companies for support of the new Developer Academy in Detroit, Michigan, that MSU is planning with Apple. We all share a vision to empower diverse entrepreneurs, creators, and coders by developing skills for technology careers for today and tomorrow. The Apple Developer Academy will open this fall downtown on the second floor of Bedrock’s 660 Woodward Ave. space, known as the historic First National Building in the heart of downtown Detroit. We expect the academy to impact close to 1,000 students a year.

Here on campus last week, we hosted U.S. Secretary of Agriculture Tom Vilsack, U.S. Senator Debbie Stabenow, and U.S. Representative Elissa Slotkin. They held a roundtable discussion with Michigan foresters and farmers that focused on the impacts of climate change. And I joined them on a tour of our exciting new undergraduate STEM Teaching and Learning Facility, which will open fall semester. This is a remarkable building. One that showcases sustainability, as it to see it in action.

Late last month, I finally had the opportunity to tour Michigan State University’s extraordinary operations in Flint, a pioneering project that epitomizes many of MSU’s strengths, particularly how we partner with communities to work with them to solve critical problems. I was hosted by College of Human Medicine Dean Aron Sousa and staff from the college’s Division of Public Health. I want to thank Dr. Debra Furr-Holden, Dr. Mona Hanna-Attisha and the others who presented and joined our very productive conversations. Another highlight was my meeting with Dr. Jennifer Edwards-Johnson and some of our medical students. And I had a very informative discussion with our partners at the C.S. Mott Foundation and with Flint area elected officials, and the opportunity to meet MSU extension staff there, and tour the Flint Farmers Market. It was great to visit with some of the amazing people that are working with and for the people of Flint to help improve the quality of life for all members of the Flint community. I think every Spartan can be proud of this groundbreaking program.
I now want to talk about several of our agenda items. Michigan State University is committed to delivering an exceptional undergraduate campus experience and a world-class education for all students. This experience is underpinned by our talented faculty and staff members, and state of the art technology and facilities such as the new STEM building. We very much recognize the need to continue enhancing the student experience and supporting our excellent faculty and a great learning environment, while remaining affordable.

Let me talk for a minute about how we keep an MSU education affordable, specifically, Michigan State University’s commitment to financial aid. The budget we are proposing to the board today once again includes an increase in regular financial aid of $3.8 million this year. That is on top of several years of financial aid increases, even as we exercised restraint on tuition. In fact, we have not raised tuition in nearly four years. But our general fund financial aid has increased 18 percent, with $27 million. And this is important, because over two thirds of our students receive some form of financial support, including loans.

In addition, we have distributed $30 million in emergency federal aid to help students through the pandemic over the last two academic years. And next year, importantly, our students will be eligible for an additional round of COVID-19 higher education and emergency relief funds, referred to as HEERF. We are proud of the successes our commitment to affordability and excellence has produced, including steadily rising graduation rates, and narrowing gaps in those rates among student groups. And importantly, we have continued to work to be diligent financial stewards, even during the pandemic. Now, after four years without a tuition increase for first-year students, I am asking the Board to adjust MSU’s tuition rates upward for the 2021-2022 academic year by 2 percent. That would equal $290 a year for incoming resident first-year students.

The Board and administration are very cognizant of the financial stresses students and families have experienced through the COVID-19 pandemic. I appreciate the thoughtfulness of our board members over the last few months while we have discussed many budget implications, alternatives, and scenarios. This tuition plan, part of a three-year budget, helps us give the university the support it needs, and offers Michigan State University (our students and families) a greater degree of certainty about future costs. Importantly, through a combination of financial aid sources and the distribution of emergency grants to students included in federal COVID-19 legislation, families with an annual income of less than $100,000 will not be impacted by this increase 2021-2022. This is important- again, families with an annual income of less than $100,000 will not be impacted by this increase 2021-2022. Spartan Advantage program participants, with family income below federal poverty guidelines, will see no out-of-pocket increases and will continue to receive financial aid equivalent to the total cost of attendance. Tuition dollars support all our academic programs, including those designed to give students the greatest chances and opportunities to succeed. These include MSU’s Neighborhood Student Success Collaborative, our first and second-year student experience
programming, academic support services in every college, and much more. While we want all students to have an outstanding experience at MSU, completing their degree in a timely manner delivers a lifetime of value. Students’ ability to persist is often not tied to their ability to afford college, but rather competing stressors, physical and mental health, academic support, food and housing security, which are all areas that our student success programs are designed to address. Especially since the pandemic, we have seen great increases in demand for mental health services in the nearly two years I have been here. These modest increases will also help support these critical services.

Something else that supports mental as well as physical health is recreation. Michigan State today is the only Big Ten and major state public university without a student recreational fee to maintain and upgrade recreational facilities. The adequacy of our rec facilities is something I have heard about from our students since I arrived at Michigan State University. A fee, and the needed facility upgrades, are something ASMSU has considered supporting and students have addressed at board meetings. So, we propose to phase-in an annual student recreational facility fee, starting at $100 next year and reaching $260 at the end of a three-year period. That fee would be exactly in line with the Big Ten average and would allow us to significantly improve our recreational and intramural facilities, hopefully with significant improvements visible by spring of 2022.

I also want to address room and board rates. Michigan State on campus residents enjoy not only a safe, convenient, and welcoming place to live, but also the presence of social and academic supports that contribute to their success. A year ago, with the onset of the COVID-19 pandemic, I did not seek an increase in room- and-board rates. But MSU today is well below many of our peer universities in this area. We charge the second-lowest rate in the Big Ten and fifth lowest among Michigan public universities. The rising cost of food, facility maintenance, safety upgrades and other expenses has surpassed revenue to support the standards we adhere to. Today, I am asking trustees to consider an annual room and board increase next year for residence halls of $204, or 91 cents per day. University apartment rental rates would not change, they would remain the same. This 1.95 percent increase would generate $2.7 million in additional revenue to better support our residential and dining facilities, and MSU’s rate would still be the second lowest in the Big Ten.

Michigan State is a global research university whose vital mission starts with offering exceptional value to its students and to our stakeholders across Michigan. The proposals in front of the Board would allow us to maintain that essential value of accessibility and excellence to students and the state.

I want to close now on a celebratory note, by marking Michigan State’s inaugural observance of Juneteenth this week. As of yesterday, Juneteenth became a federal holiday, something we can all celebrate. Tomorrow’s culminating activities include a live and in-person program of music and commemorative presentations
at Munn Field. I urge everyone to learn more about these events by going to the webpages of the Office of Inclusion and Intercultural Initiatives.

And with that, I’ll conclude my remarks.

5. Gifts, Grants and Contract Report


Trustee Foster moved to approve the recommendation, with support from Trustee Kelly.

THE BOARD VOTED to approve the recommendation.

6. Research Presentation

Interim Vice President Gage introduced Dr. Stacey A. Missmer, Professor of Obstetrics, Gynecology and Reproductive Health, who gave a presentation entitled “Reproductive Health Science: Multi-disciplinary Discovery and Community Engagement.” (Appendix A)

7. Personnel Actions

Provost Woodruff presented the following personnel actions.

LeConte’ Dill, Dr.PH. – AY, Associate Professor, Department of African American and African Studies, with Tenure, effective September 16, 2021.

Kimberly A. Dodd, DVM, Ph.D. – AN, Associate Professor, Department of Pathobiology and Diagnostic Investigation, with Tenure, effective September 1, 2021.

Trimiko Melancon, Ph.D. – AY, Professor, Department of African American and African Studies, with Tenure, effective August 16, 2021.

Elaine B. Richardson, Ph.D. - AY, Professor, Department of African American and African Studies, with Tenure, effective August 16, 2021.

Morgan Shipley, Ph.D. – AY, Associate Professor, Foglio Endowed Chair of Spirituality, Department of Religious Studies, with Tenure, effective August 16, 2021.
Cameron G. Thies, Ph.D. – AN, Dean and MSU Foundation Professor, James Madison College, with Tenure, effective July 1, 2021.

Jennifer Wolak, Ph.D. - AY, Professor, Department of Political Science, with Tenure, effective August 16, 2021.

The title of Senior Vice President and Chief Financial Officer be changed to Senior Vice President, Chief Financial Officer and Treasurer, and that all applicable policy documents be revised to reflect the change in title, effective July 2, 2021.

Lisa A. Frace, MBA, AN- Senior Vice President and Chief Financial Officer, for a change in title to Senior Vice President, Chief Financial Officer and Treasurer, effective July 2, 2021.

Ann E. Austin, Ph.D., AN - Associate Dean, College of Education; University Distinguished Professor, Department of Educational Administration, for a change in title to Interim Dean of the College of Education, and for a change in salary to $300,000, effective July 1, 2021.

Douglas A. Gage, Ph.D., AN – Interim Vice President for Research and Innovation, Office of Research and Innovation, for the removal of Interim, for an appointment of Vice President for Research and Innovation, effective June 18, 2021 through June 17, 2024.

Kelly F. Millenbah, Ph.D., AN - Senior Associate Dean, College of Agriculture and Natural Resources; Professor, Department of Fisheries and Wildlife, for a change in title to Interim Dean, College of Agriculture and Natural Resources, and for a change in salary to $300,000, effective July 1, 2021.

Dylan A. T. Miner, Ph.D., AY - Professor, Residential College in the Arts and Humanities; Director, American Indian and Indigenous Studies Program, for a change in title to Interim Dean of the Residential College in the Arts and Humanities, and for a change in appointment basis to AN, and salary to $148,520, effective July 1, 2021.

Provost Woodruff presented the following candidates for the designation of University Distinguished Professor, effective June 18, 2021.

Susan M. Barman, Ph.D., Department of Pharmacology and Toxicology, College of Human Medicine

Federica Brandizzi, Ph.D., Plant Research Laboratory, College of Natural Science

Kalyanmoy Deb, Ph.D., Department of Electrical and Computer Engineering, College of Engineering
Kristie Dotson, Ph.D., Department of Philosophy, College of Arts and Letters

Manoochehr M. Koochesfahani, Ph.D., Department of Mechanical Engineering, College of Engineering

Joseph S. Krajcik, Ph.D., Department of Teacher Education, College of Education

Robert L. Last, Ph.D., Department of Biochemistry and Molecular Biology, College of Natural Science

Kenneth M. Merz, Jr., Ph.D., Department of Chemistry, College of Natural Science

Thomas Reardon, Ph.D., Department of Agricultural, Food, and Resource Economics, College of Agriculture and Natural Resources

Randall J. Schaetzl, Ph.D., Department of Geography, Environment, and Spatial Sciences, College of Social Science

George W. Sundin, Ph.D., Department of Plant, Soil, and Microbial Sciences, College of Agriculture and Natural Resources

Trustee Byrum moved to approve the recommendations, with support from Trustee Scott.

THE BOARD VOTED to approve the recommendations.

8. Committee on Budget and Finance

Trustee Foster presented the Trustee Budget and Finance Committee Report and the following recommendations and resolutions.

A. 2021-22 Budget Development Guidelines, 2021-22 Tuition & Fee Rates, 2022-23 Core/Professional Undergraduate Tuition Rates, 2023-24 Core/Professional Undergraduate Tuition Rates

The Trustee Committee on Budget and Finance recommends that the Board of Trustees adopt the 2021-22 Budget Development Guidelines which include revenue and expenditure totals and tuition and fee rates for the 2021-22 academic year, and Core/Professional undergraduate tuition and fee rates for the 2022-23 and 2023-24 academic years.
BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby adopts the attached 2021-22 Budget Development Guidelines (FY22 Budget Guidelines), including tuition and fee rates for the 2022-23 and 2023-23 academic years, as reflected in attachment B; and

BE IT FURTHER RESOLVED, that the Board hereby directs the Administration to develop and implement the 2021-22 General Fund, MSU AgBioResearch, Michigan State University Extension, and Intercollegiate Athletics budgets in accordance with the FY22 Budget Guidelines.

Trustee Foster moved to approve the recommendation, with support from Trustee Byrum.

Chairperson Byrum said that setting tuition is among the most difficult decisions that the Board undertakes. She thanked the trustees for their time and dedication as numerous work sessions were held regarding the budget. She noted that everyone participated fully and that she appreciates their contributions. Chairperson Byrum thanked President Stanley, Provost Woodruff, and the Deans for their contributions. She said that MSU tuition for 2021-22 will have a zero percent increase for most families with an annual income of less than $100,000. Chairperson Byrum stated that for those families, this is the fourth year of no tuition increase and that MSU has not raised tuition since 2018. She said that during that same time, MSU sponsored financial aid has increased by 18 percent despite no tuition increases. Chairperson Byrum noted that this has been an additional $27 million to support students and that this modest increase of two percent will help MSU continue services to support student achievement, specifically in addressing the graduation gap for all students. She said that she is proud to report that graduation rates have improved every year for the past six years at MSU, from 77 percent in 2015 to 81 percent in 2020. Chairperson Byrum noted that this is good news, but we also know that there is more work to be done. She stated that this year’s budget includes another $3.8 million in financial aid. Chairperson Byrum stated that this budget recognizes the need to continue enhancing the student experience and supporting an excellent faculty and student environment while remaining affordable for our students.

Roll Call Vote

Trustee Byrum—yes
Trustee Foster—yes
Trustee Kelly—yes
Trustee Knake Jefferson—yes
Trustee O’Keefe—no
Trustee Scott—yes
Trustee Tebay—no
The Trustee Committee on Budget and Finance recommends that the Board of Trustees authorize the Administration to implement academic year 2021-22 room and board rates.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby adopts the basic residence hall double room and board rate of $10,676 for first-year, transfer, and returning students who select the silver unlimited meal plan for the 2021-22 academic year.

BE IT FURTHER RESOLVED, that the Board of Trustees of Michigan State University hereby adopts no rate increase for 1855 place, University Village, and Spartan Village apartments for the 2021-22 academic year.

Trustee Foster moved to approve the recommendation, with support from Trustee Byrum.

Roll Call Vote

Trustee Byrum—yes
Trustee Foster—yes
Trustee Kelly—yes
Trustee Knake Jefferson—yes
Trustee O’Keefe—yes
Trustee Scott—yes
Trustee Tebay—yes
Trustee Vassar—no

THE BOARD VOTED to approve the recommendation.

The Trustee Committee on Budget and Finance recommends that the Board of Trustees accept a charitable gift of approximately 46 acres of property located in Liberty Township, Jackson County, Michigan.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby authorizes the Administration accept by charitable gift approximately 46 acres of property located in Liberty Township, Jackson County, Michigan from the Murphy Family Revocable Trust.
Trustee Foster **moved to approve** the recommendation, with support from Trustee Kelly.

**THE BOARD VOTED to approve** the recommendation.

9. Committee on Academic Affairs

Trustee Byrum presented the Trustee Academic Affairs Committee Report and the following recommendations and resolutions.

A. Revisions to the Faculty Grievance Policy

The Trustee Committee on Academic Affairs recommends that the Board of Trustees approve revisions to the Faculty Grievance Policy.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves the revisions to the Faculty Grievance Policy included as attachment A. (Appendix B)

Trustee Byrum **moved to approve** the recommendation, with support from Trustee O’Keefe.

**THE BOARD VOTED** to approve the recommendation.

10. Committee on Audit, Risk and Compliance

Trustee Kelly presented the Trustee Audit, Risk and Compliance Committee Report and the following recommendations and resolutions.

A. Approval of Contract Terms

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and **Nordisch, LLC**, a Wisconsin limited liability company, in which MSU faculty member Dr. Roozbeh Dargazany holds a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with **Nordisch, LLC**, consistent with earlier public notice and with a “Research Agreement Term Sheet” presented to the Board. (Appendix C)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and **Iaso Therapeutics**, a Delaware corporation, in which MSU faculty member Dr. Xuefei Huang holds a financial interest.
BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a license agreement with *Iaso Therapeutics, Inc.*, consistent with earlier public notice and with a “License Agreement Term Sheet” presented to the Board. (Appendix D)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and *Iaso Therapeutics, Inc.*, a Delaware corporation, in which MSU faculty member Dr. Xuefei Huang holds a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with *Iaso Therapeutics, Inc.*, consistent with earlier public notice and with a “Service Agreement Term Sheet” presented to the Board. (Appendix E)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and *EeroQ Corporation*, a Delaware corporation, in which MSU faculty member Dr. Johannes Pollanen holds a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with *EeroQ Corporation*, consistent with earlier public notice and with a “Sponsored Research Agreement Term Sheet” presented to the Board. (Appendix F)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and *EeroQ Corporation*, a Delaware corporation, in which MSU faculty member Dr. Johannes Pollanen holds a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with *EeroQ Corporation*, consistent with earlier public notice and with a “License Agreement Term Sheet” presented to the Board. (Appendix G)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and *Jolt Energy Storage Technologies LLC*, a Michigan limited liability company, in which MSU faculty member Dr. Thomas F. Guarr holds a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with *Jolt Energy Storage Technologies, LLC*, consistent with earlier public notice and with a “Service Agreement Term Sheet” presented to the Board. (Appendix H)
The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and Jolt Energy Storage Technologies, LLC, a Michigan limited liability company, in which MSU faculty member Dr. Thomas F. Guarr holds a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with Jolt Energy Storage Technologies, LLC, consistent with earlier public notice and with a “Research & Service Agreement Term Sheet” presented to the Board. (Appendix I)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and Black Pine Engineering, LLC, a Michigan limited liability company, in which MSU faculty members Dr. Norbert Mueller and Dr. Blake Gower hold a financial interest.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with Black Pine Engineering, LLC, consistent with earlier public notice and with a “Equipment Rental Agreement Term Sheet” presented to the Board. (Appendix J)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and Corporation for Digital Scholarship, a Virginia non-profit corporation, in which MSU faculty member Dr. Sharon Leon serves as an officer.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with Corporation for Digital Scholarship, consistent with earlier public notice and with a “Service Agreement Term Sheet” presented to the Board. (Appendix K)

The Trustee Committee on Audit, Risk and Compliance recommends that the Board of Trustees approve a contract between Michigan State University and National Pesticide Safety Education Center, a company in which MSU employee Tom Smith is the executive director.

BE IT RESOLVED, that the Board of Trustees of Michigan State University hereby approves a research agreement with National Pesticide Safety Education Center, LLC, consistent with earlier public notice and with a “Service Agreement Term Sheet” presented to the Board. (Appendix L)
Trustee Kelly moved to approve the recommendations, with support from Trustee O’Keefe.

THE BOARD VOTED to approve the recommendations.

11. Committee on Student Life and Culture

Trustee Scott presented the Trustee Student Life and Culture Committee Report.

The Committee on Student Life and Culture received a DEI update from Vice President and Chief Diversity Officer Jabbar Bennett.

12. Chairperson’s Report and Trustee Comments

Chairperson Byrum said that on behalf of the Board of Trustees she would like to honor the life of Eli Broad who passed away on April 30, 2021. She said that Mr. Broad and his wife Edythe have been generous supporters of MSU, and their gifts have made an impact in many ways across the university including, The Broad Art Museum, the Broad College of Business, and the College of Education, just to name a few. She said that several trustees, including herself, had the opportunity to meet Mr. Broad at the dedication of the Minskoff Pavilion and she is personally very grateful for that opportunity to meet him that day, and to thank him in person. Chairperson Byrum wished Vice President Mark Haas a long and happy retirement. She also gave well wishes to Robert Floden, Dean of the College of Education, who is retiring, Ron Hendrick, Dean of the College of Agriculture, who is leaving MSU to become the Provost at Texas Tech University, and Stephen Esquith, Dean of the Residential College of Arts and Humanities, who is retiring and returning to the faculty. Chairperson Byrum welcomed Cameron Thies, the incoming Dean of the James Madison College and noted that she looks forward to meeting him. She also welcomed to Nobel Laureate Robert H. Grubbs, who has been appointed as a visiting Hannah Distinguished Professor, the most prestigious faculty appointment in the university. She stated that he is going to be serving as a special advisor to the provost in the honorifics activities that she is pursuing. Chairperson Byrum said Provost Woodruff was named one of twelve geniuses who are currently rocking science, technology, and the world and is featured as one of the wonder women of science. She also congratulated Dr. Felicia Wu, MSU Hannah Distinguished Professor, who was appointed to the World Health Organization’s Foodborne Disease and Epidemiology Reference Group. Chairperson Byrum recognized Saturday June 19, Juneteenth Day, the oldest nationally celebrated and now federal holiday, in commemoration of the ending of slavery in the United States. She applauded the leadership of the Office of Inclusion and Intercultural Initiatives, Black Students Alliance, Black Faculty, Staff, and Administrator’s Association, Department of African American and African studies, and MSU Black Alumni for planning and executing the first ever campus and community celebration.
Vice Chairperson Kelly said that he echoed Chairperson Byrum’s comments with regards to the Dean departures from the university. He also acknowledged Vice President Haas, who he worked with closely. Vice Chairperson Kelly said that he considered Vice President Haas to be a true professional and he has appreciated working with him. He said that he has graduated three children from Broad Business College and has his fourth as a senior in the college and would be remiss in not acknowledging Eli Broad’s contribution to the University. He thanked him and his family and offered his condolences.

Trustee Foster read a resolution honoring Vice President Mark Haas (Appendix M). She thanked Jeff Grabill, Associate Provost for Teaching, Learning, and Technology, and director of the Hub for Innovation, Learning, and Technology. She noted that Jeff, for several years, was the lead MSU administrator in cultivating our relationship with Apple Developer Academy and he also played a key leadership role in Science Gallery Detroit. Trustee Foster stated that she has appreciated his business acumen and entrepreneurial spirit in the Provost Office. She thanked her colleagues for approving the tuition increase and believes that a tuition increase is necessary so that MSU’s fine team of educators and administrators can lead the academic enterprise that changes the lives of individuals, communities, and the world. Trustee Foster noted that it is of utmost importance that we have the resources to retain our membership in the AAU and continue to be ranked as one of the Top 100 research universities in the world. She thanked the fine faculty and staff for their continued commitment and dedication to excellence at Michigan State University.

Trustee Knake Jefferson thanked those who participated again in the public comments to share their extraordinary experiences as members of MSU Swim and Dive Team. She said that she has appreciated learning the personal and professional stories of those who have been writing. Trustee Knake Jefferson said that she was part of one of the public forums to hear from more of you and again those of you who spoke this morning and that she has learned so much about the importance of that program in your lives and I thank you for taking the time to share your stories with us and I thank you for your passion. She said that with regards to the tuition increase, she has heard many concerns about it, advocating for a higher increase, advocating for a lower increase, and she believes that at the end of the day where we are is where we need to be. Trustee Knake Jefferson said that after four years of holding tuition solid and not increasing it and being able to come up with a plan where there will be zero impact for families earning less than $100,000 and making sure that we have the necessary financial resources to support our students is important. She said that the increased support includes being able to focus on student success, mental and physical health, food and housing security, and critical academic support. And, also supporting our faculty and our staff who have continued to deliver excellent education through a global pandemic. Trustee Knake Jefferson said that these are some of the reasons why she supported that decision. She also thanked Dr. Stacey
Missmer for her important work in women's health and is grateful that she was able to share just a glimpse of that with us today.

Trustee O'Keefe congratulated Dr. Missmer for her efforts to elevate women's health as a result of her work. He noted that with a wife who fought cancer last year after a misdiagnosis, as the father of a daughter and a grandfather to five granddaughters, he cheers her efforts. Trustee O'Keefe echoed Trustee Knake Jefferson's comments relative to the Swim and Dive program and noted that it has certainly been an eye opener for him as a trustee. Trustee O'Keefe recognized Dr. Marilyn Whitney's story on the drive to be a champion despite the lack of Title IX initiatives when she competed noting that his sister at MSU was a softball player during the same time and incurred the same inequities and he is proud now of the opportunities that women have in competing in sports. Trustee O'Keefe also recognized the great works of Eli Broad and stated that he was a great champion of business and a selfless supporter of MSU. He noted that as a student at MSU, he had the pleasure of working summers delivering carpet to Koffman and Broad, Mr. Broad's home building operation. Trustee O'Keefe thanked Dan Gilbert and his Rocket Mortgage families for supporting his alma mater in unprecedented ways, including the latest Apple Venture. He hopes that Dan Gilbert and Matt Ishbia continue to be great examples of Spartans Will. Trustee O'Keefe congratulated Doug Gage on his appointment and looks forward to his continued leadership with the university. Trustee O'Keefe said that the Board worked hard on the budget with many meetings, analyses, and very robust discussions. Trustee O'Keefe said that he ran to protect the interests of students and their families, with a voice for those not in the room. He said that it would have been easy to vote with the rest of the Board, but he chose differently to continue to elevate the discussion on student costs and spiraling student debt. Trustee O'Keefe said that while he disagrees with the conclusions that we reached, he can assure everyone that the Board worked hard and diligently to try to balance competing interests.

Trustee Scott extend her condolences to the family of Eli Broad, noting that she had the distinguished honor of meeting him and that will always be a very memorable moment for her as a graduate of the Eli Broad College of Business. She also extended a congratulatory retirement and a thank you to Vice President Mark Haas, noting that she really appreciates the knowledge and the depth he has given to MSU to make sure that financially we are staying on track. Trustee Scott said that she has learned a lot from him over the course of the time that she has been a trustee and part of the Audit, Risk, and Compliance Committee. She thanked Dr. Missmer for her work and placing emphasis on such a stigmatized area of women's health. She said that she appreciated her presentation today and all that she is doing in that area. Trustee Scott also like thanked and acknowledge again those who have spoken so passionately on the Swim and Dive Program. She noted that she appreciated hearing about their experiences and the impact that the program has had on your lives and you sharing your stories with the Board. Trustee Scott said that she wants to continue to hear from the group
and appreciates what the impact of the decision has had on them and others who are so close to the program. Trustee Scott noted the continued personal attacks on her during public participation at meetings and suggested that illusory truth effect was being used. She said that it is basically based on the idea that if you repeat something often enough people will slowly start to believe it is true. Trustee Scott said that part of guarding against the illusion is the obligation that it puts on each of us just to stop repeating falsehoods. She noted that because we live in a world where facts do matter, and they should matter, she thinks it is important for all of us to remember that. Trustee Scott said that Elena Emory and Erica Thibodeau, who are neither survivors nor MSU students, clearly have an agenda and are working on behalf of someone. She said that she has not quite figured out who that would be, but they are pushing a false narrative and have neglected to reach out to her directly or to even look into the facts which would prove them wrong. Trustee Scott said that she feels strongly that if you repeat things without bothering to check if they are true then you are helping to make a world where lies are used to confuse people, a place that is not something that we as Spartans would attribute to being part of our core values. She asked that they please think about what they are repeating and noted that the lies are falling on deaf ears.

Trustee Scott said that Juneteenth, which is something that as an African American woman is extremely important to her, is also known as the day of freedom and it commemorates the official end of legal slavery in the United States. She said that it is important that everyone has a chance to learn about the history because it is very much a part of the American fabric. And, honoring the end of slavery is really a historical moment where the self-evident truths in the Declaration of Independence, that all men are created equal, and that we all have inalienable rights, really began at that moment to apply to every American. Trustee Scott said that it marks an end of an era of blatant hypocrisy present in the United States from the very beginning and really a start in a path towards racial healing and redemption, something that obviously is still being pursued today and that we still must work on. She said that she is excited that MSU is going to be celebrating it and encouraged those of you who can attend the festivities to do so noting Trustee Vassar would be a panelist.

Trustee Tebay thanked those who spoke on behalf of the Swim and Dive team for again joining us and for continuing the conversation. She said that she knows there was a presentation given to AD Beekman about options from our alumni, our swimmers, and allies of the team to talk about options to potentially bring the team back. Trustee Tebay said that she appreciates those who continue to be thoughtful in their story telling of how impactful the Swim and Dive team has been to people over the years and it is truly remarkable to see just what great leaders and professionals have come out of that program and it certainly brings a sense of pride to me for MSU. She acknowledged the fact that the Mental Health Services fund, or former Healing Fund, for the survivors is not managed by any trustee, but is managed by a third party called New Directions. She noted that if anyone is having issues with any claims please call the number 877-250-6408. She thanked Dr. Missmer for the research that she’s doing noting that she has a number of
friends who have been diagnosed with endometriosis and that it is such an important health issue to learn more about. Trustee Tebay thanked Mark Haas for his work for MSU and wished him well in retirement. She also congratulated Dr. Gage, whom she has had the distinct pleasure of getting to know over the last couple of years, on his appointment for Vice President of Research. She thanked Deans Floden, Hendrick, and Esquith for all their work for MSU, and welcomed Dean Thies, noting that as an alumna of James Madison College, she is looking forward to working with him. Trustee Tebay acknowledged the Juneteenth celebration and thanked Trustee Scott and Dr. Stephanie Anthony, who brought it to the attention to the Board. She thanked Trustee Vassar for speaking at the celebration and noted her excitement that it has become a federal holiday and is receiving the recognition that it deserves. Trustee Tebay thanked Vice President and Chief Diversity Officer Jabbar Bennett and his team for all their hard work contributing to the celebration.

Trustee Vassar acknowledged Trustee Scott and said that she was sorry that this continues to be brought up for her every single time we have a meeting, and that she can hear the pain in her voice. She apologized for how she’s feeling in this space and acknowledged that she hears and sees her and is in a compassionate and empathetic moment with her. Trustee Vassar said that she is extremely grateful for the families and communities who have supported MSU through this pandemic and for the administration, that has continued to impress her with its intolerance of intolerance, and the commitment to diversity and inclusion. She said that she appreciates the work towards emancipation for all our students. Trustee Vassar thanked the faculty, particularly Dr. Missmer, who presented her important research here today, and thanked the staff for their service and sacrifice during a whole global pandemic, it is unparalleled. She thanked the distinguished alumni who engage us on issues of importance to you and the MSU community. Trustee Vassar said that Swim and Dive continues to be impressive advocates and that she appreciates the engagement of MSU’s BA’s advocacy for low income and middle-class families with regards to the tuition increase. Trustee Vassar said that she would like to thank the voters who put her to work with such a dedicated group of elected officials. She said that she is learning so much from their varied experiences and diverse talents and that she likes them! She thanked the Board for its collective dedication and extremely hard work. She thanked the students noting that they have had a record year of challenges, obstacles, toils, and snares. She thanked them for their persistence and powerful examples of perseverance noting that they are the real MVPs of this academic year. Trustee Vassar said that her hope as we close out this academic year is for us to rejuvenate this summer. She said that Spartans Will rest!

13. Request to Adjourn

   On a motion by Trustee Byrum, supported by Trustee Scott, THE BOARD VOTED to adjourn at 9:40 a.m.
Respectfully submitted,

[Signature]

Brian Quinn
Acting Secretary of the Board of Trustees
Reproductive Health Science: Multi-disciplinary Discovery and Community Engagement

MSU Board of Trustees Meeting
June 18, 2021

Stacey Missmer, Sc.D.
Department of Obstetrics, Gynecology and Reproductive Biology
Michigan State University College of Human Medicine
Reproductive Health

- Encompasses exposures and outcomes relating to the **reproductive system** including **reproductive endocrinology**
- Pathology impacts **multiple systems** not just gynecology or pregnancy
- Lifelong impact on health and wellness

Menstrual Functioning, Ovarian Aging, Menopausal Transition, PCOS, Endometriosis, Fibroids, Adenomyosis, Vulvodynia, Pelvic Floor Disorders, STIs, Infertility, Fecundity, Obstetrics ...
Women’s Health ≠ Reproductive Health

Reproductive Health =

Enigmatic
Complex
Challenging
Critical to health and wellbeing
Department of Obstetrics, Gynecology, and Reproductive Biology

Translational Science Continuum

Community
Family
Individual
Organs
Cells
Genes

Adolescent
Early Adult
Middle Adult
Older Adult

Strutz
Johnson
Missmer
Poland
Meghea
Mauer
Luke
Ondersma
Debena
Ford
Avery
Roman
Strutz

Fazleabas
Jeong
Teixeira
Kim
Kohan-Ghadr
Arora
Woodruff
Chandler
Risinger

Gu
Leach
Joshi
Martin
Schmidt
MacKeigan

Women's Life Course Continuum

Courtesy of Dr. Rick Leach, Chair
**CHM Department of Obstetrics, Gynecology and Reproductive Biology**

In 2020 - nearly $10 million in NIH grants

5th largest among 68 similar departments nationwide

Blue Ridge Institute for Medical Research (BRIMR.ORG) Ranking Tables of NIH Funding to US Medical Schools in 2020

<table>
<thead>
<tr>
<th>Rank</th>
<th>Name</th>
<th>Ob/Gyn</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>UNIVERSITY OF CALIFORNIA SAN FRANCISCO</td>
<td>$20,214,420</td>
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<tr>
<td>2</td>
<td>NORTHWESTERN UNIVERSITY CHICAGO</td>
<td>$14,659,769</td>
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<tr>
<td>3</td>
<td>UNIVERSITY OF NORTH CAROLINA CHAPEL HILL</td>
<td>$10,775,880</td>
</tr>
<tr>
<td>4</td>
<td>UNIVERSITY OF CALIFORNIA SAN DIEGO</td>
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<tr>
<td>5</td>
<td>MICHIGAN STATE UNIVERSITY</td>
<td>$9,852,995</td>
</tr>
<tr>
<td>6</td>
<td>COLUMBIA UNIVERSITY HEALTH SCIENCES</td>
<td>$7,617,081</td>
</tr>
<tr>
<td>7</td>
<td>YALE UNIVERSITY</td>
<td>$7,413,369</td>
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<tr>
<td>8</td>
<td>UNIVERSITY OF OKLAHOMA HLTH SCIENCES CTR</td>
<td>$6,634,874</td>
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<td>UNIVERSITY OF MARYLAND BALTIMORE</td>
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<td>UNIVERSITY OF ALABAMA BIRMINGHAM</td>
<td>$6,355,042</td>
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<tr>
<td>11</td>
<td>WASHINGTON UNIVERSITY ST LOUIS</td>
<td>$6,349,100</td>
</tr>
<tr>
<td>12</td>
<td>JOHNS HOPKINS UNIVERSITY</td>
<td>$5,635,634</td>
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</table>
Endometrial-like tissue (glands and stroma) growing outside of the uterus -- Peritoneal cavity, but also distal sites (e.g. lung, heart, brain)

Estrogen-dependent, progesterone-resistant, inflammatory disorder

Zondervan, Becker, Missmer. NEJM 2020
Major Health Issue

1 in 10 women have endometriosis during their reproductive years

U.S. costs for diagnosis, treatment, and quality of life / work productivity = $69 Billion
Similar to Crohn’s, Rheumatoid Arthritis, and Diabetes Mellitus

Higher risk of ovarian cancer, autoimmune disorders, heart disease

Zondervan, Becker, Missmer. *NEJM* 2020
Missmer SA. *Int J Epidemiol* 2009
Major Clinical Obstacles

- Currently, diagnosis requires surgery
- Etiology remains unknown
- Treatment is inadequate for most, with symptom recurrence in ~60%

Zondervan, Becker & Missmer. NEJM 2020
14 active grant awards
Major Clinical Obstacles

- Many PCPs unaware of disease
- Symptoms are nonspecific or associated with other disorders
  - May be mistakenly dismissed as “normal” menstrual pain
  - Embarrassment specific to pelvic pain

Mihalyi A, et al. *Hum Reprod*  2010
Menstrual Stigma

20% of women do not feel comfortable talking about menstruation with healthcare providers.

64% of teens believe society teaches people to be ashamed of their periods.

58% of women have felt embarrassment because they were on their period.

10% of men do not feel comfortable talking about menstruation with anyone.
Major Clinical Obstacles, con’t

- Many PCPs unaware of disease
- Symptoms are nonspecific or associated with other disorders
  - May be mistakenly dismissed as “normal” menstrual pain
  - Embarrassment specific to pelvic pain

6.7 years
average delay in diagnosis

65% misdiagnosed
Median see 5+ MDs to get correct diagnosis

Mihalyi A, et al. *Hum Reprod* 2010
Paths to Diagnosis, i.e. Excluded Women

Zondervan, Becker, Missmer. *NEJM* 2020
Women’s Outcomes Research and Knowledge (WORK) Study
Who Can Join?

Girls and young women ages 12 to 30 years old with a history of pelvic pain

GOAL: To enroll 1,000 participants across Michigan
Recruitment Partners

Clinical and community sites of enrollment chosen to include diverse women throughout Michigan

- CHM Clerkships
- MSU Extension partners
- Health departments
- Community colleges & universities
- Pharmacies
- Libraries
- Bus stations
- Movie theaters
- Shopping malls
- Churches
- Gyms
Enrollment to date = 286 participants

https://go.msu.edu/workstudy
COVID-19 and Gynecologic Health

PRE-PANDEMIC
- Endometriosis
- Chronic Pelvic Pain

PERI- AND POST-PANDEMIC
- Greater risk and severity of COVID-19
- Lower antibody response to SARS CoV-2 infection or vaccination
- Stay at home
- Social isolation
- Economic stressors

↑ Distress Unhealthy coping

Increased frequency and severity of chronic pelvic pain
What epidemiologists need most is courage and persistence and energy, because answers are not obvious or easy.

~ Zena Stein, 2003
Thank you!
missmers@msu.edu
FACULTY GRIEVANCE POLICY

I. POLICY STATEMENT

This Policy is intended to provide a fair, internal process for resolving employment related disputes that arise between faculty or academic staff members and administrators. The formal procedures described in this Policy are intended to be used only when matters cannot be resolved informally. A faculty or academic staff member who feels aggrieved should first seek an informal resolution at the unit, department, or college level before filing a formal grievance under this Policy. The FGO may be consulted for assistance with informal resolution including mediation. The procedures contained in this Policy are not intended to be used to challenge the desirability of unit or University policies.

II. DEFINITIONS

A. Grievance: A written complaint filed by a faculty or academic staff member against an administrator of the University alleging a violation of University, college, department, school, or unit policy or established practice.

B. Faculty member: A person with a paid University appointment at the rank of professor, associate professor, assistant professor, or instructor, including those with fixed-term and visiting status.

C. Academic Staff: A person with a paid University appointment at the rank of academic specialist, lecturer, assistant instructor, research associate, or librarian, including those in a continuing appointment system and those with fixed-term and visiting status.

D. Administrator: A person appointed as the head of an administrative unit, school director, department chair, dean, or separately reporting director. The President, the General Counsel and members of the General Counsel’s staff, and the Faculty Grievance Official ("FGO") are not subject to grievance under this Policy.

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1 The term “faculty” or “faculty members,” as used in this document, applies to all non-union faculty and academic staff.

2 Academic staff with an MSU Extension appointment are exempt from this policy and should refer to the MSU Extension Academic Appeals Process. Degree candidates completing an internship at MSU as part of their professional degree requirements are also exempt from this policy.

3 Non-academic administrators are not subject to grievance under this Policy.

4 If a grievance is filed against the Provost individually, a hearing will be held pursuant to Section III.I of this Policy. The finding(s) and recommendation(s) of the Hearing Panel will be forwarded to the President for decision instead of to the Provost. The President’s decision will be final and not subject to appeal.
E. **Policy**: A written statement of principles and procedures that govern the actions of faculty, academic staff, and administrators, including written rules, bylaws, procedures, or standards.

F. **Practice**: Actions taken by the administrator within an administrative or academic unit based on customs or standards in that unit that are usually unwritten but of longstanding duration, and for whose existence the grievant can offer evidence.

G. **Violation**: A breach, misinterpretation, or misapplication of existing policy or established practice.

### III. GRIEVANCE PROCEDURE

A faculty or academic staff member may file a formal grievance against an administrator that alleges a violation of University, college, department, school, or unit policy or established practice.²

#### A. INITIATION OF GRIEVANCE PROCEEDINGS

A faculty/academic staff member who feels aggrieved may discuss his/her complaint in a confidential conference with the FGO. The FGO shall inform the faculty/academic staff member if the potential grievance falls under the jurisdiction of another University policy rather than this Policy.

#### B. FILING A GRIEVANCE

To file a grievance, an individual faculty or academic staff member must submit⁶ a written, signed statement (the “grievance”) to the FGO within 28 days⁷ of the date that the grievant knew or should have known of the alleged violation.⁸ The grievance must contain the following

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² This Policy and its grievance procedures may not be utilized by faculty or academic staff who are covered by a collective bargaining agreement.

⁶ The grievance and any supporting documentation should be submitted electronically by 5:00 p.m. EST on the filing deadline. The FGO will confirm receipt via email, however, it is ultimately the responsibility of the grievant to ensure its receipt.

⁷ References to days in this document are to calendar days. If a deadline contained within this Policy falls on a weekend or University holiday or University closure, the deadline will be extended to the next day on which the University is open for business. The FGP does not restrict dates for submitting grievance documents to the academic year calendar; grievances are processed regardless of the timing of the academic year calendar with the exception of formal hearings which typically do not take place in the summer.

⁸ The FGO may waive or extend the time limits specified in this Policy for good cause or by mutual agreement of the parties. “Good cause” includes, but is not limited to, circumstances outside of a party’s control, such as illness, approved leave of absence, or extended travel for University business. Even with a showing of good cause, time limits will generally not be extended beyond an additional 28 days.
C. THE RESPONDENT

The FGO will provide a copy of the grievance and any documents submitted with the grievance to the respondent within three (3) days of receipt. The respondent shall submit any relevant documents concerning the FGO’s initial jurisdictional findings to the FGO within seven (7) days of receipt of the grievance.

D. JURISDICTIONAL AND PROCEDURAL DECISIONS AND JURISDICTIONAL APPEALS

1. The FGO shall determine whether the following jurisdictional requirements have been met within 14 days of the date that the grievance was filed. The FGO may also seek information from appropriate University office(s) to assist in making these jurisdictional determinations.

   a. Whether the grievant has standing under the Faculty Grievance Policy;

   b. Whether the grievant has timely filed a grievance;

   c. Whether the grievance is appropriate for filing at this level (i.e., whether a grievance has been filed at a lower level and then rejected);

   d. Whether the grievance is a new or amended grievance;

   e. Whether the grievance is procedurally proper; and

   f. Whether the grievance is factually supported.

The grievant must also submit any documents that are relevant to the FGO’s initial jurisdictional findings pursuant to Section III.D of this Policy.

The grievant may also submit additional information as follows:

1. the specific policy (including the specific section of the policy) or established practice that has allegedly been violated;

2. the date of the alleged violation and the date on which the grievant became aware of the alleged violation;

3. the facts relevant to the alleged violation;

4. the person(s) against whom the grievance is filed (the “respondent”); and

5. the redress sought.

A grievance may not be amended once it has been submitted and processed by the FGO prior to the issuance of jurisdictional determinations.

A grievant should cite the policy/handbook related to their contractual appointment (i.e., Tenured Faculty or Academic Specialist).

The respondent(s) named in a grievance should be limited to the administrator(s) that issued in writing the action(s) being grieved, e.g., while a Dean or other administrator may be in attendance at an intent-to-discipline meeting or an actual discipline meeting per Section VI.A of the Faculty Handbook Discipline and Dismissal of Tenured Faculty for Cause Policy, the only respondent(s) named in a grievance is the administrator who has formally imposed the written discipline (in consultation with the Dean’s office and Academic Human Resources).

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9 A grievance may not be amended once it has been submitted and processed by the FGO prior to the issuance of jurisdictional determinations.

10 A grievant should cite the policy/handbook related to their contractual appointment (i.e., Tenured Faculty or Academic Specialist).

11 The respondent(s) named in a grievance should be limited to the administrator(s) that issued in writing the action(s) being grieved, e.g., while a Dean or other administrator may be in attendance at an intent-to-discipline meeting or an actual discipline meeting per Section VI.A of the Faculty Handbook Discipline and Dismissal of Tenured Faculty for Cause Policy, the only respondent(s) named in a grievance is the administrator who has formally imposed the written discipline (in consultation with the Dean’s office and Academic Human Resources).
b. Whether the grievance has been filed in a timely fashion;

c. Whether the grievance identifies an appropriate respondent(s);

d. Whether the grievance adequately identifies the existing policies and/or established practices alleged to have been violated;\(^\text{12}\)

e. Whether the grievance contains a reasonably adequate statement of the facts relevant to the complaint; and

f. Whether any other jurisdictional issue(s) need to be decided in connection with the initiation of the grievance and, if so, an explanation of such issues.

2. The FGO shall inform the parties in writing whether each jurisdictional requirement has been met, along with the names of any University offices consulted regarding the jurisdictional decisions.\(^\text{13}\) If any jurisdictional requirement has not been met, the FGO shall dismiss the grievance.

3. Each party shall have the right to appeal the FGO's jurisdictional decisions by filing a written statement explaining the reason(s) for the appeal with the FGO within 14 days of the issuance of such decision (by 5:00 p.m. EST on the filing deadline).

4. If any party files an appeal of the FGO’s jurisdictional decision(s), the FGO shall submit the written appeal, together with any written response to the appeal from the parties and a written response by the FGO, to a three-person jurisdictional appeal panel drawn randomly by the FGO from the list of faculty, librarians, and other academic staff eligible to serve as members of the University Hearing Board or University Appeals Board.\(^\text{14}\) (See Section III.H of this Policy for selection criteria.) The panel shall deliberate and submit to the FGO a written decision (including the basis for its decision) on the appeal within seven (7) days of its convening by the FGO. The appeal panel’s decision is binding and may not be appealed (e.g., if a panel upholds a decision to dismiss a grievance on jurisdictional grounds the case is closed). No faculty member, librarian, or other academic staff member may serve on more than one jurisdictional appeal panel in any period of seven consecutive years.

\(^{12}\) As part of the initial jurisdictional determination, the FGO shall determine whether the policy specified in the grievance applies to the named respondent.

\(^{13}\) In keeping with current MSU established practice, notices provided under this Policy will be sent via email to the assigned msu.edu email address for both the grievant and respondent. Additional modes of dissemination (e.g., campus or U.S. mail, non-MSU e-mail) may be added, but MSU email is the official mode of communication used by the FGO.

\(^{14}\) Appeal panels may meet face-face or conduct meetings via University-approved virtual technology, which shall be determined by the FGO in keeping with University guidelines.
5. The FGO shall forward a copy of the jurisdictional appeal panel’s decision to the parties within seven (7) days of its receipt from the panel.

THE FORMAL HEARING PROCESS

E. INFORMAL RESOLUTION

1. After a grievance has met the jurisdictional requirements and before scheduling a formal hearing, the FGO shall confer with the parties and make every reasonable effort to resolve the grievance informally as quickly as possible. Discussions regarding informal resolution are expected to be treated with confidentiality and from this point forward may not be disclosed or referenced during any subsequent formal proceedings on the grievance. The FGO may recommend that the grievant drop the grievance because it lacks merit or for other just cause. Such a recommendation, however, shall not be binding on the grievant.

2. If the FGO determines that the grievance cannot be informally resolved, the FGO shall so notify the parties in writing. If the grievant wishes to pursue the grievance, the grievant must submit a written request for a formal hearing to the FGO within 14 days of such notice. Failure to submit such a request will constitute a waiver of the faculty member’s right to pursue the grievance.

F. AMENDMENTS PRIOR TO HEARING

At this stage in the grievance process a grievant may amend his/her grievance until 28 days before the scheduled date for the formal hearing on the grievance, as long as the proposed amendment concerns the same subject matter as the grievance. The FGO shall decide whether to accept the proposed amendment, and any jurisdictional issues generated by the proposed amendment, at least 21 days before the scheduled date for the formal hearing. Either party may challenge the FGO’s decision by filing a written appeal with the FGO within seven (7) days of the FGO’s decision. Such appeals are processed in the same manner as other jurisdictional appeals under Section III.D.4 of this Policy. Any procedural issues (such as submission of new documents) generated by the amendment shall be decided by the hearing panel at the beginning of the hearing.

G. CONSOLIDATION OF GRIEVANCES

If a grievant files two or more separate grievances against the same respondent that raise related allegations or arise from a common set of facts, the FGO may consolidate such grievances into one grievance to be heard by a single panel. If a grievant files two or more separate grievances concerning different issues and the grievances are not consolidated, such grievances will normally be processed and heard sequentially in chronological order determined by the date on which the initial grievance was filed. Separate grievances filed by different grievants that involve related allegations or arise from a common set of facts may also be consolidated.
H. GRIEVANCE HEARING AND APPEAL PANEL COMPOSITION

1. A University Hearing Board and University Appeals Board shall be established from which grievance hearing and appeal panels shall be selected.

2. All faculty with appointment in the tenure system, librarians and other academic staff with appointment in a continuing appointment system, and full-time fixed-term faculty who have served at least three consecutive years and are engaged in the academic activities of the University on a regular basis are eligible and expected to serve as members of the University Hearing Board or University Appeals Board. No faculty/academic staff member or librarian may serve on more than one grievance hearing or appeal panel in any period of seven consecutive years. At the start of each academic year, the Academic Human Resources Office will provide the FGO with a list of all faculty, academic staff, and librarians eligible to serve on these Boards.

3. A grievance hearing panel shall consist of five members of the University Hearing Board who are selected randomly by the FGO. An appeal panel shall consist of three members of the University Appeals Board who are selected randomly by the FGO. Panel members shall serve throughout an entire proceeding.

4. The FGO shall take necessary precautions to avoid any conflict of interest on the part of the panel members. No panel member shall be from the same department(s) (or college in the case of non-departmental colleges) as the grievant or respondent.

5. A panel selected for a grievance involving the denial of reappointment or tenure in the tenure system shall be comprised solely of tenured faculty members. A panel selected for a grievance involving the denial of promotion to full professor shall be comprised solely of tenured faculty who hold the rank of full professor.

6. A panel selected for a grievance involving the denial of reappointment or promotion in an appointment system other than the tenure system shall be comprised solely of faculty members at the same rank or higher.

7. Each grievance hearing panel shall have a Presiding Officer selected at random by the FGO from a list established by the UCFA. The Presiding Officer shall have voice but not be a voting member of the hearing panel. The Presiding Officer shall apply the rules of procedure consistent with the guidelines stated in Section III.I of this Policy.

8. The FGO shall notify each party of the names of the Presiding Officer (if applicable) and members of the panel. Within seven (7) days of that notice, either party may submit a written challenge to the Presiding Officer or any member of the panel for

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15 An individual who also holds an appointment as an Administrator is not eligible to serve as a presiding officer or as a member of the University Hearing Board or University Appeals Board.

16 An individual who is on a sabbatical or other approved leave of absence is excused from service on the University Hearing Board and University Appeals Board for the duration of the leave.
cause. The challenge must explain the cause for removing the Presiding Officer or panel member. The FGO shall determine whether there is cause to dismiss the challenged member of the panel and select another member. In addition, each party shall have two peremptory challenges. The FGO shall notify the parties of any replacement Presiding Officer or members of the panel. Either party may submit a challenge for cause or remaining peremptory challenge to any replacement Presiding Officer or member of the panel to the FGO within three (3) days of that notice.

9. If a grievance hearing panel loses two or more of its members during the course of a hearing, the hearing shall be terminated, and a new panel selected.

I. GRIEVANCE HEARINGS: PROCEDURES

1. Hearings shall be scheduled as expeditiously as possible and with due regard for the schedule of both parties. Grievances involving faculty/academic staff who hold academic year (AY) appointments will normally not be held during summer semester unless the faculty/academic staff member has a summer appointment. On the rare occasion when a party fails to respond to repeated attempts to schedule a hearing or unreasonably delays the scheduling of a hearing, the FGO will schedule the hearing for the first date available to the other party.

2. The FGO shall convene the hearing panel and shall be present during all formal proceedings. The FGO shall provide written notice of the time and place of the hearing, the names of counsel, the names of any witnesses, and copies of any documents submitted by the parties and deemed relevant by the FGO, to each party at least seven (7) days before the hearing.

3. The hearing shall be conducted in good faith and must be completed within 14 calendar days unless the FGO determines that an extension of time is necessary.

4. All hearing proceedings shall be recorded (panel deliberations are not recorded). A party may submit a written request to obtain a copy of the recording from the FGO.

5. Hearings shall be closed unless the parties agree otherwise.

6. The privacy of confidential records used in the hearing shall be respected.

7. All parties may present their cases in person and may call witnesses on their behalf. The names of witnesses must be provided to the FGO at least seven (7) days prior to the hearing date.

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The standard the FGO shall follow in ruling on challenges is whether, in light of the challenged person’s knowledge of the case or personal or professional relationships with a party, the challenged person would be able to fairly and impartially hear the case and to render a fair and impartial judgment.
8. A party may elect not to appear, in which event the hearing will be held in his or her absence. Absence of a party shall not be prejudicial to the case. The FGO may grant permission for a party to appear via alternate communication methods for good cause.

9. All parties are entitled to counsel\textsuperscript{18} of their choice. The name of counsel must be provided to the FGO at least seven (7) days prior to the hearing date.

10. Any party or counsel shall be entitled to ask pertinent questions of any witness or the other party at appropriate points in hearings. The Presiding Officer shall determine what questions are pertinent.

11. The grievant bears the burden of proving that there has been a violation of policy or established practice. A hearing panel shall decide whether the preponderance of the evidence supports the allegations made by the grievant.\textsuperscript{19}

12. Hearing panels shall resolve any procedural issues raised by the parties, after providing each party the opportunity to be heard on such matters. However, neither party may challenge the FGO’s initial jurisdictional findings made pursuant to Section III.D of this Policy. The FGO shall distribute all documents submitted by the parties concerning procedural issues to the hearing panel, and shall include such documents in the grievance record.

13. Hearing panels may consider evidence submitted by the parties concerning the relative credentials of other faculty members in determining the merit of grievances involving salary, appointment, re-appointment, or promotion.

14. Hearing panels shall report their findings and recommendations in writing within 21 days of the completion of the hearing to the FGO, who shall forward them to the grievant, the respondent, their counsel, the Provost, or the President, as appropriate, and to the administrator who is the respondent’s immediate supervisor. The hearing panel’s report is advisory to the Provost and does not bind the Provost to a particular decision.

15. When a hearing panel sustains an allegation made in a grievance, it shall recommend appropriate redress consistent with existing policies, procedures, and practices.

\textsuperscript{18} The FGO recommends that grievants utilize faculty or other MSU personnel to serve as counsel; in the event that a grievant chooses to bring a personal attorney then an attorney from the MSU Office of General Counsel will be provided for the respondent.

\textsuperscript{19} “Preponderance of the evidence” means that the existence of the fact in issue is more probable than not. The “preponderance” of the evidence standard would be met where the members of the hearing panel find that the evidence supporting at least one of the allegations in the grievance is more convincing than the opposing evidence.
16. The Provost shall decide the grievance, in writing, within 28 days of receipt of the hearing panel’s findings and recommendations.  

17. All parties shall be notified in writing of their right to appeal by the FGO when a copy of any decision is forwarded to the parties.

IV. APPEALS OF PROVOST’S DECISION

A. Initiation of Appeals

1. The decision of the Provost in response to the findings and recommendations of the initial hearing panel may be appealed to the University Appeals Board. Appeals must allege either that there has been a prejudicial violation of the procedures established for the conduct of the initial hearing, and/or that the decision of the Provost is not consistent with the preponderance of the evidence presented at the initial hearing.

2. A written appeal must be filed with the FGO within 28 days of receipt of the decision of the Provost. Failure to appeal within the prescribed time shall be deemed acceptance of the Provost’s decision.

3. If an appeal is filed, the Provost’s decision on the grievance shall not be implemented, except insofar as the appeal is dismissed on jurisdictional grounds or the decision is subsequently ratified by the President.

B. Appeal Panel Procedures

1. The FGO shall randomly select a three-person appeal panel from the University Appeals Board. (See Section III.H of this Policy for selection criteria).

2. Appeals shall be decided upon the written appeal, the record of the hearing, the Provost’s decision, any written response to the appeal submitted by the parties, and a recommendation provided by the FGO. The parties may not submit new information or evidence unless the information/evidence is relevant to the appeal and was previously unavailable to the party although the party acted with due diligence to obtain such evidence.

3. Upon receipt of the appeal, the appeals panel will determine whether the jurisdictional requirements described in Section IV.A.1 of this Policy have been met. If the jurisdictional requirements have not been met, the appeal will be dismissed and the decision of the Provost shall stand.

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20 The FGO shall forward the Provost’s decision to the parties, their counsel, and the members of the hearing panel within three (3) days of its receipt.
4. If the appeal panel determines that it has jurisdiction to consider the appeal, the appeal panel will review the materials described above and recommend the affirmation, reversal, or modification of the Provost’s decision on the grievance. The panel may also recommend that the grievance be reheard by a new grievance hearing panel if it determines there was a prejudicial violation of the procedures established for the conduct of the initial hearing.

5. The findings and recommendation of the appeal panel shall be forwarded to the FGO within 21 days of the completion of the panel’s review of the appeal. The FGO shall forward the findings and recommendations to the President and to the parties and their counsel within three (3) days of its receipt.

6. For stated cause, the President may return the findings and recommendations to the appropriate panel once for reconsideration.

7. The President shall decide the appeal within 28 days of receipt of the appeal panel’s findings and recommendations. The FGO will forward a copy of the President’s decision to the parties, their counsel, and the members of the appeal panel within three (3) days of its receipt.

V. CONFIDENTIALITY

All records and information related to grievance proceedings under this Policy (both formal and informal) shall be kept confidential to the degree permitted by law. The FGO, parties to the grievance, their counsel, and other relevant administrators and faculty (including witnesses, presiding officers, and panel members) shall respect the confidentiality of information and records and the privacy of all parties whose interests are affected by a grievance.

VI. OTHER UNIVERSITY POLICIES

A. This Policy does not preempt or replace the Anti-Discrimination Policy (“ADP”) or the Relationship Violence & Sexual Misconduct Policy (“RVSMP”). Any grievance alleging violation of the RVSMP or discrimination or harassment in violation of the ADP will be referred to the appropriate University office for investigation and determination regarding those claims. The remainder of the grievance will proceed but will be revised to remove all references to the claims of discrimination/harassment or violation of the RVSMP.

B. A grievant must promptly notify the FGO if he or she initiates litigation against the University while a grievance is pending. A grievant may not pursue a complaint under this Policy while litigating the same issue(s). A grievance filed under this Policy shall be held in abeyance by the FGO pending the conclusion of the litigation.
C. Decisions and actions taken by an Institutional Review Board (IRB) and its Chairperson cannot be grieved under this Policy. However, disciplinary action imposed by an administrator on the basis of IRB action is grievable under this Policy.

D. Decisions and actions taken under the Procedures Concerning Allegations of Misconduct in Research and Creative Activities, the Anti-Discrimination Policy, the RVSMP, or the Faculty Conflict of Interest Policy cannot be grieved under this Policy. However, disciplinary action imposed by any administrator on the basis of a decision under one of these policies is grievable under this Policy.

VII. INDEMNIFICATION

In accordance with the University’s Indemnification Policy, indemnification shall be provided to the FGO, the FGO staff, members and Presiding Officers of hearing and appeal panels, and University faculty serving as unpaid, volunteer counsel for the parties to a grievance, in their roles as participants in a grievance.

VIII. UNIVERSITY COMMITTEE ON FACULTY AFFAIRS

A. The University Committee on Faculty Affairs (UCFA) serves as an advisory committee to the FGO regarding the University’s faculty grievance process.

B. The UCFA shall participate in the appointment, reappointment, and evaluation of the FGO, as described in the Appendix to this document.

C. The UCFA shall periodically review the performance of the FGO according to the procedures set forth in the Appendix to this document.

D. The UCFA shall have the responsibility to ensure that the procedures set forth in this document are fully implemented.

IX. FACULTY GRIEVANCE OFFICIAL

A. The FGO shall attempt to resolve grievances informally and without resort to formal hearings and to assure that all formal hearings are conducted in accordance with the procedures prescribed in this document.

B. The FGO shall administer the grievance procedures as set forth in this document and shall advise the parties about appropriate procedures to follow.

C. The FGO may request and shall have broad access to all relevant University information and records related to a pending or potential grievance, except those required to be kept confidential by law or contractual obligation. Upon request from the FGO, individuals or units should provide documents to the FGO in a form that protects the privacy and confidentiality of third parties. The FGO will share the documents with the
grievant/potential grievant if the FGO determines that the documents are relevant to the grievance/potential grievance and that the grievant/potential grievant has need of them for resolution of the grievance.

D. Upon the request of either party, the FGO has the authority to request that appropriate individuals discontinue or postpone any action threatening irreparable harm to any party to a grievance pending final disposition of a grievance.

E. The FGO shall not serve as advocate for any party to any grievance and may participate in a grievance proceeding only as FGO.

F. The FGO may recommend to the UCFA changes in this Policy.

G. The FGO shall report once a semester to the UCFA and once each academic year to the University Council, and shall sit as an ex officio member of the University Council.

H. The FGO shall forward to the Chairperson of the UCFA a copy of all decisions of the Provost and President. The Chairperson of the UCFA may share the decisions with the members of UCFA. The Chairperson of UCFA and the members of UCFA shall maintain the confidentiality of the decisions.

I. The FGO shall maintain records of all grievances.

X. REVISION OF THIS POLICY

A. Any faculty member or administrator may propose revisions to this Policy.

B. All proposals for revision shall be submitted to the UCFA, which shall consider them and forward them to the Faculty Senate.

C. If approved by the Faculty Senate, the proposal shall be submitted to the University Council.

D. Proposed amendments and revisions approved by the University Council shall be forwarded to the President for action by the Board of Trustees and shall become effective upon Board approval.

XI. HISTORY

An Interim Faculty Grievance Procedure was approved by the Board of Trustees on May 19, 1972. A revised Faculty Grievance Procedure was approved by the Board of Trustees on April 5, 1991 and revised on June 28, 2002, August 16, 2009, October 6, 2015, and February, 2020.

APPENDIX
Appointment, Reappointment and Evaluation of the FGO
I. Appointment of and Support of the FGO

1. UCFA shall prepare a list of candidates for presentation and discussion with the Provost and President.

2. Upon approval of the Provost, the President shall appoint the FGO for a term not to exceed five years. The President may reappoint the FGO for additional terms of up to five years each.

3. The FGO shall work with but be independent of the other administrative structures of the University in the pursuit of grievance dispute resolution.

4. The UCFA shall consult as necessary with the Provost and President concerning salary, budget, office, and staff for the FGO.

5. Whenever a vacancy occurs in the FGO position, the UCFA shall confer and recommend to the Provost and the President an individual to serve as Acting FGO.

II. Evaluation and Reappointment of the FGO

1. The UCFA shall annually evaluate the FGO pursuant to criteria established by the UCFA in consultation with the Provost and the President.

2. The UCFA shall discuss the evaluation with the FGO and shall forward its evaluation and a recommendation as to salary to the Provost and President.

3. The UCFA shall establish procedures for review of the FGO’s performance which shall be undertaken when reappointment of the FGO is under consideration. Such procedures shall involve input from individuals who have participated in grievances as grievants, respondents, their counsel, or hearing or appeal panel members or presiding officers.

4. If the FGO is a candidate for reappointment, the UCFA shall conduct a review of all of the FGO’s years of service and submit a recommendation on the FGO’s reappointment to the Provost and President.
RESEARCH AGREEMENT TERM SHEET

**Party:** Nordisch, LLC

**Project Description:** The damage/ageing prediction of composite materials

**Term:** 01/15/2021 – 01/14/2022

**Payment Terms:** $19,327.16 to MSU

**Services Provided:** By MSU to Nordisch, LLC: Pilot Phase-Composite Durability test  
By Nordisch, LLC to MSU: None contemplated under this agreement

**Use of University Facilities/Personnel:** Work is to be performed at Engineering Research Building/ Dr. Hamidreza Modares (Principal Investigator) and Dr. Roozbeh Dargazany (Key Personnel).

**Organization Type:** Wisconsin limited liability company

**Personnel Interest:** Dr. Roozbeh Dargazany, Associate Professor of Civil & Environmental Engineering, College of Engineering and his family own or have options to buy an ownership interest of more than 1% of the company.
LICENSE AGREEMENT TERM SHEET

Party: Iaso Therapeutics, Inc.

Agreement: Worldwide, non-exclusive license agreement for the sale of research products

Technology: TEC2017-0099, "Engineered virus-like particle Qβ as a novel carrier for vaccine development; including the following biological materials: Qβ-A38K, Qβ-A38K/A40C/D102C; Qβ-A40C/D102C, WT-Qβ

The parties may add or remove technologies under the agreement, including improvements generated under a separate sponsored research agreement, provided the change does not affect the financial consideration of the parties or the nature or extent of any pecuniary interest of MSU personnel

Term: Life of the patents or 20 years from effective date, whichever is longer

Potential Commercial Application: Commercially available research reagents are a key to the advancement of science; and minimize the investment of time and effort by scientists in the laboratory

Payment Terms: License issue fee: $2500

Royalties on products covered by patent rights – 3% of net sales; after cumulative product sales reach $150,000, 5% of net sales
Royalties on products not covered by patent rights – 1.5% of net sales

Services Provided: None contemplated

Organization Type: Delaware corporation
Personnel Interest: Dr. Xuefei Huang, a Professor in the Department of Chemistry, owns, or has options to buy, an interest in the company.
## SERVICE AGREEMENT TERM SHEET

**Party:** Iaso Therapeutics, Inc.  
**Project Description:** Mouse model support for proposal titled, "Development of proprietary bacteriophage Qbeta as a vaccine carrier platform for anti-salmonella vaccines"  
**Term:** 08/01/2021 – 07/31/2023  
**Payment Terms:** $26,000 to MSU in fees for service  
**Services Provided:**  
- By MSU to Iaso Therapeutics, Inc.: Animal administration for mouse studies  
- By Iaso Therapeutics, Inc. to MSU: None contemplated under this agreement  
**Use of University Facilities/Personnel:** Engineering Research Building  
**Organization Type:** Delaware corporation  
**Personnel Interest:** Dr. Xuefei Huang, a Professor in the Department of Chemistry, owns, or has options to buy, an interest in the company.
# SPONSORED RESEARCH AGREEMENT TERM SHEET

**Party:** EeroQ Corporation

**Sponsored Research Agreement:** Phase 4: On-chip charge sensor for single electron detection

**Term:** July 2021 – January 2022

**Potential Commercial Application:** Quantum computing and sensing for applications in information processing and charge sensing.

**Payment Terms:** $50,000 to MSU to fund the research

**Services Provided:**
- By MSU to EeroQ Corporation: continued work toward development of a sensor
- By EeroQ Corporation to MSU: None contemplated under this agreement

**Use of University Facilities/Personnel:** Keck Microfabrication Facility at MSU in East Lansing.

**Organization Type:** Delaware corporation

**Personnel Interest:** Johannes Pollanen, a Jerry Cowen Chair of Experimental Physics and Assistant Professor in the Department of Physics and Astronomy, and members of his family own or have options to buy an ownership interest of more than 1% of the company.
## LICENSE AGREEMENT TERM SHEET

<table>
<thead>
<tr>
<th><strong>Party:</strong></th>
<th>EeroQ Corporation</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Agreement:</strong></td>
<td>Worldwide Exclusive license, all fields of use TEC2019-0110 “Blueprint for Quantum Computing System Based on Electrons on Helium”</td>
</tr>
<tr>
<td><strong>Term:</strong></td>
<td>Until expiration of patents</td>
</tr>
<tr>
<td><strong>Payment Terms:</strong></td>
<td>5% equity as upfront payment, milestone payments</td>
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<tr>
<td></td>
<td>Demonstrated a signal from an electron motional qubit coupled to a microwave resonator. Fee: $20,000</td>
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<tr>
<td></td>
<td>Demonstrate signal readout for multiple (two or greater) coupled electrons. Fee: $35,000</td>
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<tr>
<td></td>
<td>First use of qubit hardware built using licensed technology by any commercial end-user, via access in a cloud computing environment. Fee: $100,000.</td>
</tr>
<tr>
<td><strong>Services Provided:</strong></td>
<td>By MSU to EeroQ Corporation: Sponsored research conducted by Prof. Johannes Pollanen in Department of Physics Laboratory</td>
</tr>
<tr>
<td></td>
<td>By EeroQ Corporation to MSU: None anticipated</td>
</tr>
<tr>
<td><strong>Organization Type:</strong></td>
<td>Delaware corporation</td>
</tr>
<tr>
<td><strong>Personnel Interest:</strong></td>
<td>Dr. Johannes Pollanen, a Jerry Cowen Chair of Experimental Physics and Assistant Professor in the Department of Physics and Astronomy, and members of his family own or have options to buy an ownership interest of more than 1% of the company.</td>
</tr>
</tbody>
</table>
**SERVICE AGREEMENT TERM SHEET**

**Party:** Jolt Energy Storage Technologies, LLC (Jolt)

**Project Description:** Use of pilot plant infrastructure and operational staff at the MSU facility in Holland, MI for production of chemical intermediates, process optimization and related research.

**Term:** Five years, unless terminated at an earlier date at the discretion of either party.

**Contractual Terms:** Jolt Energy Storage Technologies LLC is responsible for all raw materials, for the shipping of all products and for disposal of all wastes generated. The company is responsible for complying with all applicable laws and regulations, as well as all MSU policies and cooperating fully with the MSU Office of Environmental Health and Safety. The company assumes all risks of failed production runs not resulting from demonstrable MSU error or negligence. No intellectual property ownership rights of either party are modified under this agreement.

**Payment Terms:** All payments by Jolt Energy Storage Technologies, LLC to MSU will be governed by the MSU Bioeconomy Institute rate sheet. The current version, dated March 17, 2021, is attached.

**Services Provided:**
- By MSU to Jolt: Pilot Plant scale-up of chemical syntheses.
- By Jolt to MSU: None contemplated under this agreement

**Use of University Facilities/Personnel:** MSU personal will execute the pilot plant synthesis runs in the MSU facility in Holland, MI.

**Organization Type:** Michigan limited liability company
**Personnel Interest:** Dr. Thomas F. Guarr, Professor Fixed Term, Director of R&D MSU Bioeconomy Institute owns an ownership interest of more than 1% of the company.
## RESEARCH & SERVICE AGREEMENT TERM SHEET

**Party:** Jolt Energy Storage Technologies, LLC (Jolt)

**Research Agreement:** Design and implement synthetic strategies to produce the compounds for Jolt Energy Storage Technologies, LLC. Conduct small scale reactions, develop purification methods, interpret analytical data and provide block flow diagrams for scale up reactions in the pilot plant at MSU-BI, Holland.

**Term:** June 21, 2021 – June 20, 2023

**Potential Commercial Application:** Key components for the development of organic redox flow batteries.

**Payment Terms:** $188,031 to MSU for research

**Services Provided:**
- By MSU to Jolt: Engage in chemistry research and synthetic organic chemistry to develop novel routes to useful reagents.
- By Jolt to MSU: None contemplated under this agreement

**Use of University Facilities/Personnel:**
- MSU St. Andrews in Midland, MI
- MSU Bioeconomy Institute in Holland, MI

**Organization Type:** Michigan limited liability company

**Personnel Interest:** Dr. Thomas F. Guarr, Professor Fixed Term, Director of R&D MSU Bioeconomy Institute owns an ownership interest of more than 1% of the company.
EQUIPMENT RENTAL AGREEMENT TERM SHEET

Party: Black Pine Engineering, LLC

Agreement: Rental of scientific equipment that is necessary for testing of a compressor prototype developed by Black Pine Engineering

Term: Through May 31, 2022

Payment Terms: Total equipment rental costs of $4,246

Services Provided:
- By MSU to Black Pine Engineering, LLC: none anticipated under the agreement
- By Black Pine Engineering, LLC to MSU: none anticipated under the agreement

Organization Type: Michigan limited liability company

Personnel Interest:
Dr. Norbert Mueller, Professor, Department of Mechanical Engineering, and Dr. Blake Gower, Research Associate in the Department of Mechanical Engineering own or have options to buy an ownership interest of more than 1% of the company.
SERVICE AGREEMENT TERM SHEET

Party: Corporation For Digital Scholarship

Project Description: The Omeka Team at the Corporation For Digital Scholarship will serve as sub-recipient to MSU on the project titled On These Grounds, A Project to Model and Share the Archival Materials and Data from Universities with Past Ties to Slavery

Term: July 1, 2021 – December 31, 2022

Payment Terms: $54,515 payment to Corporation for Digital Scholarship

Services Provided:

By MSU to Corporation For Digital Scholarship:
None

By Corporation For Digital Scholarship to MSU:
The Omeka Team will, in collaboration with MSU faculty and staff, build an Omeka S module to aggregate data from many Omeka S installations and design and build an Omeka S theme designed specifically for all partners to use and brand as needed

Use of University Facilities/ Personnel:
All work will be completed by Omeka Team web designers and developers in collaboration with partners at MSU

Organization Type: Corporation For Digital Scholarship, a Virginia non-profit corporation

Personnel Interest:
Dr. Sharon Leon, an Associate Professor in the Department of History serves as Vice President and Treasurer of Corporation For Digital Scholarship.
## SERVICE AGREEMENT TERM SHEET

<table>
<thead>
<tr>
<th><strong>Party:</strong></th>
<th>National Pesticide Safety Education Center (NPSEC)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Project Description:</strong></td>
<td>Worker training resources to mitigate the spread of infectious diseases at greenhouses and garden centers in Michigan</td>
</tr>
<tr>
<td><strong>Term:</strong></td>
<td>From the effective date upon approval of contract terms through December 31, 2021</td>
</tr>
<tr>
<td><strong>Payment Terms:</strong></td>
<td>$5,000.00</td>
</tr>
<tr>
<td><strong>Services Provided:</strong></td>
<td>By MSU to National Pesticide Safety Education Center: None contemplated under the agreement By National Pesticide Safety Education Center to MSU: Produce four 6-12 minute videos on safety practices for employers to utilize during employee training regarding mitigating the spread of infectious diseases at greenhouses and garden centers in Michigan</td>
</tr>
<tr>
<td><strong>Use of University Facilities/Personnel:</strong></td>
<td>Efforts of Mr. Tom Smith in his capacity as executive director of NPSEC; content of videos will be informed by MSU subject matter experts</td>
</tr>
<tr>
<td><strong>Organization Type:</strong></td>
<td>Michigan nonprofit corporation</td>
</tr>
<tr>
<td><strong>Personnel Interest:</strong></td>
<td>Mr. Tom Smith is the Associate Director of MSU’s Institute of Agricultural Technology and is the Executive Director of the National Pesticide Safety Education Center.</td>
</tr>
</tbody>
</table>
RESOLUTION HONORING MARK HAAS  
Michigan State University  
June 18, 2021

The Michigan State University Board of Trustees today extends to Mark Haas its deep appreciation for his service to this university, its students, faculty, staff and its stakeholders across Michigan.

MSU Vice President and Treasurer Haas joined the university in 2010, having already served the state of Michigan with distinction in a variety of executive capacities for 32 years. Deferring retirement, he continued his service to MSU in the crucial years of transition to a new president and in the especially financially challenging year imposed by the COVID-19 pandemic in 2020-21.

He now departs the university to enjoy a well-deserved retirement after a most successful decade as MSU’s principal financial officer. Vice President and Treasurer Haas’s accomplishments include leading university responses to external audits that included 10 years in a row of clean audits of the university’s annual financial statements; ensuring the university maintained strong AA credit ratings, due in part to his relationships with the investment banking community and credit rating agencies; and completing bond refinancing and utilizing interest rate swaps that saved the university $65 million.

In addition, he successfully negotiated higher Indirect Cost Recovery rates for federal research grants, resulting in a $30 million positive impact to MSU’s research endeavors; initiated systematic reviews of procurement and travel functions, saving the university $120 million; and expanded the university’s cash and debt management strategy to add a net $438 million to its investment income.

Vice President and Treasurer Haas has maintained a strong commitment to staff training, education, planning and leadership development through initiatives such as the Financial Administrator Development Program, an expanded Research Administrator Certification program and Project Management and Process Mapping that have been provided to thousands of MSU staff.

For his experienced counsel and exemplary service, the Michigan State University Board of Trustees offers its sincere gratitude to Mark Haas and wishes him a fulfilling retirement.

Dianne Byrum, Chairperson  
Melanie Foster, Trustee  
Pat O’Keefe, Trustee  
Kelly Tebay, Trustee

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