

**MINUTES OF THE
SALT LAKE CITY MOSQUITO ABATEMENT DISTRICT
18 February 2021
BOARD MEETING**

Presiding: Neil Vickers, Ph.D., Board Chair 2021

Time: 12:32 p.m.

Place: 2215 North 2200 West, Salt Lake City, UT 84116

Trustees Present: Neil Vickers, Chair (Attended Remotely)
Van Turner, Vice-Chair (Attended in Person)
Carlton Christensen (Attended Remotely; left the meeting after Item 8)
La Vone Liddle (Attended Remotely)

Trustees Absent: Dr. Dagmar Vitek

Others Present: Ary Faraji, Ph.D., Executive Director (Attended in Person)
Gregory White, Ph.D., Assistant Director (Attended in Person)
Aleta Fairbanks, CPA, CFO (Attended in Person)
Richard Holman, Chair of Westside Coalition (Attended Remotely; left the meeting before Item 3)
Dr. Brian Moench, M.D., Board President of Utah Physicians for a Healthy Environment (Attended Remotely; left the meeting before Item 3)
Dorothy Owen, Board Chair of Westpointe Community Council (Attended Remotely)
Allan Phelps, NeighborWorks Salt Lake, Resident (Attended Remotely; left the meeting during Item 3)
Jack Ray, President of Utah Waterfowl Association (Attended Remotely; left the meeting during Item 3)
Jeff Richards, North Point Duck Club Board Member and Shareholder (Attended Remotely; left the meeting during Item 3)
Lionel Trepanier, Utah Tar Sands Resistance (Attended Remotely)

1. Roll Call:

Trustee Vickers called the meeting to order at 12:32 p.m. Executive Director Faraji confirmed that the meeting was being recorded, and no conflicts of interest were declared.

2. Public Comment:

The District is currently in the process of applying for the Innovative Readiness Training (IRT) Civil-Military Partnership with the US Air Force to evaluate aerial pesticide applications while the District conducts its regular mosquito abatement activities. Utilizing the Air Force's equipment is a benefit to the District because the District will not have to pay for the use of the aircraft or the labor of operating the plane. In addition to being able to apply pesticides without all of the costs associated with contracting out aerial pesticide applications, the Air Force will also conduct evaluations of the sprays conducted to gain more information on how the climate of our region influences ultra-low volume pesticide sprays. This information will be shared with the District. The IRT program will also be beneficial to the Air Force because pesticide applications conducted in Salt Lake City will be more similar to the arid climate in the middle east and other regions where our troops are deployed, rather than other studies being conducted under humid conditions at low elevations where many of their routine training sprays occur. Additionally, this partnership will also benefit the Air Force through essential training that will help maintain their proficiency when they are actually deployed during emergency situations. One of the requirements of the IRT application is to submit an Environmental Assessment (EA). The EA was submitted to three Agencies for review and comments:

Utah Department of Environmental Quality, Division of Water Quality
US Fish & Wildlife Service, Utah Ecological Service Field Office
Utah Department of Health, Environmental Epidemiology Program

The District incorporated the comments received from the above Agencies into the EA and posted it for public comment on the Public Notice Website and on our website. The District was also required to publish a non-compete notice to aerial pesticide applicators, which was published in the Deseret News and the Salt Lake Tribune. It reads as follows:

Salt Lake City Mosquito Abatement District intends to solicit assistance from the Department of Defense's Innovative Readiness Training (IRT) program. The assistance will include the application of public health pesticides via aerial application over portions of rural areas of northwest Salt Lake City and adjacent areas of unincorporated sections of Salt Lake County. These areas to be treated are north and west of the SLC International Airport. The spraying dates are expected to be 30 August to 3 September 2021. Aerial applicators or private individuals who have questions or who wish to voice opposition to military assistance for this project may contact Ary Faraji, Executive Director of Salt Lake City Mosquito Abatement District; 2215 N 2200 W; Salt Lake City, UT 84116 or via email at ary@slcmad.org, no later than thirty (30) days after publication of this notice. Persons not filing comments within the timeframe noted will be considered to have waived their objections to military assistance for this project. This posting will expire on 15 March 2021.

The following individuals were in attendance to make public comments, and a few of these comments are included:

Dr. Brian Moench – The Utah Physicians for a Healthy Environment has a long-term concern about using Air Force helicopters to blanket areas with pesticides. Three minutes

did not provide him with the opportunity to breakdown the failures of the District's research article justifying this action, the EA the District has released, or the EPA's assessment methodology. The Board needs to hear this information before these plans go any further. He read some summaries of medical research on the pesticides that will be used. The Utah Physicians for a Healthy Environment is preparing a scientific rebuttal to the justification that the District is using for the aerial spraying, and he requested an opportunity to discuss it in detail during the March 2021 Board Meeting.

Richard Holman – The EPA has allowed neurotoxins to be used by ignoring the available scientific toxicological reports that are available. He read the document discussing how the District will manage the aerial spraying, and he stressed the need for community engagement because the spraying will be conducted close to the communities that the Westside Coalition represents. He felt the required notifications were not sufficient, and citizens should have been contacted directly. The public domain contains data which does not agree with the District's study, and he had concerns that the District has not vetted our information accurately or correctly. The documentation he saw is not 100% reliable, and it may be harmful to wildlife and people in the area. Please engage the communities more; community councils will be responsive and can provide the support the District wants.

Lionel Trepanier – He felt there was a problem with the required public notice of the environmental assessment, for he thought posting it on the Public Notice Website was insufficient. In his opinion, the EA should have been published in the newspaper as well, and the comment period should be longer than twenty-eight days. In addition to being reviewed by the Utah Department of Environmental Quality - Division of Water Quality, the US Fish & Wildlife Service - Utah Ecological Service Field Office, and the Utah Department of Health - Environmental Epidemiology Program, he felt the EA should have undergone a public review. In his opinion, even though the pesticides are applied in compliance with EPA-approved chemical labels, the use of Dibrom is frightening. He was also dissatisfied with the regulations of Utah's Public Notice Website. He felt the rule requiring agendas to be posted on the Public Notice Website twenty-four hours prior to a board meeting to be unsatisfactory, and having to contact someone to obtain information on how to attend the meeting at the posted address was offensive.

Dorothy Owen – The West Point Community Council has had a continuing relationship with the District, particularly over the last two years. The District's staff has attended their Annual Night Out Event, explained District operations, conducted demonstrations, and answered questions. She was, therefore, surprised and disappointed that she had not received notice about the EA, and she was embarrassed to hear about the Air Force spraying the area from people in the community rather than from the District. She hopes this lack of communication will be corrected in the future.

Jack Ray – Dorothy Owen let him know about this board meeting shortly before it started, and he reiterated the concern over the lack of citizen outreach and pesticide toxicity. He feared that pesticides could affect the wildlife, thereby affecting humans upon consuming the waterfowl. He has not had time to review the EA, and he would like an opportunity to submit further comments based on details in the assessment.

Allan Phelps – He had read the EA and appreciated the in-depth and care that the study involved. He was concerned about the other insects that will be affected by the pesticides and how that will affect the ecosystems. Jack Ray was able to address Allan Phelps's question about the history of the natural and man-made wetlands. The wetlands of the duck clubs were established to replace the wetlands that were drained to accommodate Salt Lake City's airport and development in surrounding areas.

Jeff Richards - The District has been very good at responding to issues he has had in the past. He echoed Jack Ray's and also the public notice comments. He was frustrated to learn about the board meeting from Jack Ray just minutes before it began. He felt that there should be more outreach and some direct notice to landowners who are so heavily affected. He is also concerned about the wildlife, and he hopes to have more direct communication in the future.

Public comments were also posted in the "chat box" of Zoom, and these questions will be saved and addressed after the meeting. Executive Director Faraji also asked the public to email him directly if there are any specific questions for the District to reply to. His email address was put into the chat window for all attendees.

Executive Director Faraji gave a brief response to the public comments: The Salt Lake City Mosquito Abatement District is the oldest mosquito abatement district in Utah; in fact, in 1923, Utah was the third state to actually enact legislation to create a mosquito abatement. Many of us are environmentalists, ecologists, entomologists, and biologists, and we have an extreme interest in protecting the environment and wildlife. If there is anything we can do to reduce our ecological footprint, we do our best to incorporate it. Our mosquito control program has also changed drastically over the years. The amount and volume of the more environmentally-friendly and/or improved products that we utilize in our applications are magnitudes lower than what is used in agricultural spraying, for example.

The majority of our applications for mosquito control rely on larval control measures, where we are able to specifically target mosquito larvae with bacteria that generally only affect mosquitoes. Our public health and quality-of-life preservation missions are paramount. We understand that the adulticides we do have to use are broad-spectrum insecticides, and we use research and surveillance to help us fulfill our missions as efficiently, as environmentally-friendly, and as effectively as possible. The adulticide applications that we have been conducting are only performed on an "as needed" basis. In order to make informed decisions concerning applications, we utilize a very specific scientific program that uses traps that are situated throughout our jurisdiction. We monitor mosquito populations twice a week; we always trap before and after an adulticide application so that we can gauge the efficacy of the application, we monitor species composition, and we also document actual population abundance of the mosquitoes.

We do not have many product options when it comes to quickly reducing an adult mosquito population in the Salt Lake area. Dibrom (naled) is a much heavier insecticide, which allows us to spray it at the aerial height that we do and still ensure that the droplets are getting down to the lower levels where the adult mosquitoes are essentially flying. We try to limit the actual exposure to pollinators, non-target insects, and human populations by utilizing three main things: 1) the timing of the application - Our applications are conducted

only at night, after sunset, so we are mainly targeting mosquito populations. 2) the amount of the chemical - Our application rate is 0.75 ounces to an acre, which is less than 1 ounce of product covering the entire area of a football field. 3) the size of the droplets – The miniscule droplets are intended to stay aloft in order to make contact with an adult mosquito before they dissipate in the air prior to reaching the ground.

We only use products that are evaluated, registered, and labeled for use by the Environmental Protection Agency. Prior to being utilized commercially, they have undergone years of biological, environmental, and ecological assessments to ensure that, when being used according to the label, the pesticides do not have a negative impact on humans, wildlife, or the environment.

We have not conducted aerial adulticide applications over residential areas because abatement efforts have been largely successful in the western rural areas and we have been able to prevent the dispersal of those mosquitoes into the City. Concerning the actual EA, what we are planning on doing with the Air Force is nothing out of the ordinary from our routine procedures. We are not introducing any new pesticides or any additional applications. The basic difference will be that the Air Force will be making the aerial applications instead of our contracted aerial applicator, which means that the District will not have to contract this work out. We will be utilizing Air Force equipment and saving money for the District and Salt Lake City residents. The Air Force specializes in responding to natural disasters, and they will also be receiving valuable training that can be used in emergency situations in arid, windy, locations.

Public comments were closed at 1:17 p.m.; Trustee Vickers invited the attendees to submit any comments, questions, or reports directly to the Board of Trustees or to the Salt Lake City Mosquito Abatement for our consideration. The Trustees indicated that they hear these concerns and will certainly take them into consideration regarding the matter at hand. Executive Director Faraji invited the members of the public to join us for the rest of the meeting. Richard Holman and Dr. Brian Moench departed the meeting immediately. Allan Phelps, Jack Ray, and Jeff Richards left the meeting during the presentation of the minutes; Dorothy Owen and Lionel Trepanier stayed online for the remainder of the meeting. A complete transcript of the audio recordings is available upon request.

3. Approval of the 21 January 2021 Minutes of the January Monthly Board Meeting:

The minutes had been distributed to the Trustees prior to the meeting, and no modifications were necessary. Trustee Christensen made a motion to approve the 21 January 2021 minutes, which passed unanimously after being seconded by Trustee Turner.

4. Presentation of the January 2021 Financial Statements and Approval of Bills for Payment:

The Board Members had received the Board Meeting Packet beforehand, and they had taken the time to look over the financial statements and payments. CFO Fairbanks

reviewed the Financial Statements with the Board; all expenditures were presented, with special attention being paid to items over \$1,000. Documentation for every payment accompanied the checks when they were signed, and there were no unusual or out-of-the-ordinary monetary transactions. Trustee Liddle made a motion to adopt the January 2021 Financial Statements and to approve January's bills for payment. After being seconded by Trustee Christensen, the motion passed unanimously.

5. Update on Millcreek Community Reinvestment Area Proposal:

The paperwork has been reviewed by our attorney, and no problems were identified. Executive Director Faraji will sign and finalize the documents.

6. Discussion and Approval on Construction Proposal for Insectary Remediation through Design West Architects:

We have discussed how a considerable amount of condensation has been occurring on the floors in the insectary and causing fears of mold transpiring. Design West conceded that the insectary should have been designed with a moisture-resistant drywall and agreed to pay for tearing out the existing walls and remediating the mold issue. Radiant heating will be placed in the floor, especially near the west walls where the major moisture is accumulating. Design West obtained an estimate of \$46,545.00 from Roger Knight Construction, and Scott Olcott has asked if the District will finance \$7,810.00 for the Heat Zone Electrical and Tile in addition to the \$6,059.35 still remaining from our previous contract. After a debated discussion, Trustee Turner made a motion to only release the \$6,059.35 that the District still owes Design West. The condensation problem is due to a design flaw, and rectifying this situation is Design West's responsibility. The motion was seconded by Trustee Christensen, and it carried with all in favor except for Trustee Liddle. She justified her vote by expressing her displeasure with the many problems the District has experienced due to other design flaws, and she thinks no further funds should be given to Design West, including the previously-owed amount.

7. Discussion and Approval for Zions Public Finance Proposal for Creation of Financial Sustainability Model:

Because of the way the certified tax rates have been set up in Utah, the amount of property taxes that the District receives each year essentially remains the same and only new growth can increase this dollar amount. Growing costs due to inflation do not necessarily enter into these calculations; if house values rise, our tax rate is reduced to ensure that the overall revenue remains the same. The cost to provide similar services from year to year is greater every year, and now the problem is exacerbated because the Inland Port Authority is taking 75% of our new growth in that area. The Board has approved pursuing a tax increase and has also expressed an interest in acquiring the assistance of a specialist to help the District define future trends, growth, and needs which will support our property tax increase request.

Zions Public Finance has provided a proposal to create a financial sustainability model for \$5,000.00 and, by coordinating with Executive Director Faraji and CFO Fairbanks, will have something to present to the board in April. The Board felt \$5,000.00 for examining the District's financial requirements with an educated second pair of eyes was very reasonable as well as beneficial. Trustee Christensen made a motion to approve the Zions Public Finance proposal to create a financial sustainability model for \$5,000.00, and Trustee Liddle seconded the motion. Dorothy Owen asked to have several economic development proposals that the Westpointe Community has been working on included in this sustainability model. By having this discussion early on, positions can be debated and resolved prior to awarding contracts. Trustee Christensen commented that some of this proposal will be applicable to the Westpointe Community, but it will be difficult to include the schools because we don't have any jurisdiction over them. They do share the same property tax base, so the information may have some relevance to others who see it, but we are only looking at it from the perspective of the District. A vote was taken, and it passed unanimously.

8. Discussion and Approval for District to Participate in Media Requests with the Ouellessebouyou Alliance:

Executive Director Faraji pointed out several of the extremely-beneficial projects that the Ouellessebouyou Alliance has accomplished in Mali, and he discussed their hopes of providing a mosquito abatement program to reduce the incidence of malaria in that region. The Ouellessebouyou Alliance has asked Executive Director Faraji to support its media pursuits as an active participant. Although the Trustees agreed that this project will be advantageous, they felt strongly that conducting media interviews and engaging the public in promoting the project is not a role for a public agency. Sharing our expertise and teaching a holistic approach to mosquito control is fine, but we cannot provide any financial assistance or any direct solicitation for additional funds. However, general mosquito control videos that can be utilized by them as well as by the public we serve would be fine.

Trustee Liddle made a motion to decline direct involvement in media solicitations with the Ouellessebouyou Alliance at this time. The motion disapproving participation was seconded by Trustee Christensen, and it carried with Trustees Turner and Vickers also voting against participating in media requests. Trustee Christensen left the meeting after the vote was taken.

9. Report on Attended and Reminder/Approval of Upcoming Training/Meetings:

- **PacVec Annual Meeting, 17-18 February 2021, Online**

The Pacific Southwest Center of Excellence in Vector-Borne Diseases provides training grants to improve public health surveillance through increased host and vector screening, and Utah recently received one of these grants for a student. The District received a \$25,000 grant from the Pacific Southwest Center of Excellence to work on next-generation sequencing of our mosquito populations out on the west side. PacVec is hosting its 4th Annual Meeting in 2021, and the meetings are going on right now.

Assistant Director White presented yesterday, and he shared the presentation with Hanna Rettler, the State of Utah's Zoonotic Epidemiologist with the Public Health Department. Trustee Vicker's student, Kirsten Wilson, also received a \$25,000 grant and gave a very good presentation on the Western tree hole mosquito, *Aedes sierrensis*, this morning.

We are also participating in an additional grant from another collaborator on insecticide resistance status of mosquitoes. This grant is headed by Dr. Tara Thiemann with the University of the Pacific and is specifically investigating resistance status in *Culex tarsalis* populations.

- **AMCA Annual Conference, 1-5 March 2021, Salt Lake City, Utah**

Senator Mitt Romney has agreed to open AMCA's Annual Conference this year, and Dr. Sammie Dickson will be presenting the Memorial Lecture on Dr. Lewis Nielsen (longtime University of Utah professor and member of this District's Board). Assistant Director White is running a symposium on collaborations between different entities within Utah, including IDbyDNA, the State of Utah Health Department, BYU, Utah State University, and the University of Utah. Executive Director Faraji is running a Mosquito Lightening session with a series of three-minute talks on various mosquito-related topics. Additionally, he will be delivering his presidential address and awarding select recipients with the AMCA's highest honors. Executive Director Faraji was also responsible for publishing an entire issue of the *Wing Beats* journal as a dedication to the research, surveillance, and control measures that Utah has been involved in since the early 1900's. He will provide copies of that journal to the Board when they are available.

- **Visitors from Mali, 1-5 March 2021, Salt Lake City, Utah**

Two professors from the University of Bamako aided Executive Director in his visit to Mali, and they are very interested in visiting and seeing our facility to learn from our operations. They will be in Salt Lake City for the AMCA meetings and will be staying in the District's dormitory. Furthermore, they will be working on an experimental design for the mosquito control project in Mali during their visit. Additionally, Executive Director Faraji has been working on a Memorandum of Understanding between the American Mosquito Control Association and the Pan-Africa Mosquito Control Association, and the AMCA Board of Directors have signed off on it. Africa has decided to register 6 persons for the AMCA meetings as well.

- **Municipal Mosquito Control, 31 March 2021, Online and**
- **Texas Mosquito Control Association (TMCA), 7 April 2021, Online**

Both Municipal Mosquito and TMCA have reached out to the District for some presentations on some of the novel mosquito work we have been conducting. Executive Director Faraji and Assistant Director White will be providing two presentations on our work with 3-D printers, drones, and our creative traps.

10. Executive Director's Report:

The Board Members were given a few updates, which included the following: 1) Executive Director Faraji and CFO Fairbanks have participated in Utah Association of Special District's legislative sessions each week. UASD has been keeping an eye on the legislature, and no important laws that will affect the District have been passed so far this year. 2) A Secondary Job Notice form will be presented to the Board in March. We are also looking for a policy governing political and religious discussions at the workplace. 3) Tax increase information should be ready to be presented to the Board in April. 4) We have complied with all of the application steps required to work in tandem with the Air Force on the IRT. The Air Force will assist us with mosquito control, and we will be providing continuing training and proficiency for Air Force personnel. As previously explained, we submitted our environmental assessment to Utah Department of Environmental Quality's Division of Water Quality, US Fish & Wildlife Service's Utah Ecological Service Field Office, and Utah Department of Health's Environmental Epidemiology Program. We revised our document to incorporate their comments and posted it on the Public Notice Website and on our website. We have also published the non-compete notice to aerial pesticide applicators in the Deseret News and the Tribune. Once all of the steps are completed, we will bring the final application to the Board for review and approval. 5) We have purchased a new 3-D printer that uses resin, and we hope to save money by printing more of our own traps instead of purchasing them. 6) Assistant Director White discussed how we are collaborating with the University of Utah Engineering Department with a spray tunnel. They designed it for us, and we are using it to test pesticides. We have been calibrating it in order to discover the most effective pesticides to use on our local mosquitoes. We also want to use it as a tool to study and evaluate insecticide resistance, and we hope to have it running before the mosquito season begins this year. 7) On the molecular side, we have been getting the lab ready to look at the host DNA of the blood inside mosquitoes to get an idea about what they are feeding on in our area. 8) We are looking at our aerial treatments to see what kind of impact they could have on non-target insects. We did a large study on that in 2019, it was analyzed in 2020, and we are now working on the final analysis and writing it up so that we can publish our findings.

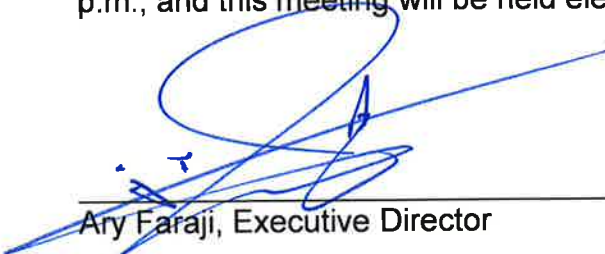
Lionel Trepanier thanked the Board Members for their patience and requested that the EA be made available for public comment. The community would like the Board to pause submitting the application to work with the Air Force until the community can bring a critique of the assessment to the Board. Executive Director Faraji thanked Lionel Trepanier and Dorothy Owen for their input and encouraged all interested parties to look over the environmental assessment and bring their comments back to the Board in March.

11. Probable Agenda Items for 18 March 2021 Board Meeting:

- Executive Director's Report
- Insectary / Facility Updates
- Secondary Job Notice Form
- IRT Update


12. Adjournment:

Trustees Liddle and Turner made and seconded a motion to adjourn the meeting at 2:25 p.m. The 18 March 2021 Regular Monthly Board Meeting will be held at 12:30 p.m., and this meeting will be held electronically.



Ary Faraji, Executive Director

18 MAR 21
Date



Van Turner, Vice-Chair

3-18-21
Date