Minutes of April 13, 2021

A meeting of the Wausau Water Works Commission was called to order at 10:30 a.m. in City Hall on Tuesday, April 13, 2021. In compliance with Wisconsin Statutes, this meeting was posted and receipted for by the Wausau Daily Herald on April 8, 2021.

Members Present: President Rosenberg, Commissioners Robinson-via Webex, Herbst, Force, Gehin. Others Present: Eric Lindman, Dave Erickson, Scott Boers, Valerie Swanborg, MaryAnne Groat- via Webex, Steve Opatik/Becher Hoppe- via Webex, Lisa/Clark Dietz, Chris Collins/SunVest Solar, Ann Jacobson, Toni Vanderboom.

1) **Approve Minutes of March 2, 2021 Meeting.**

Herbst moved to approve the minutes of the March 2, 2021 meeting. Seconded by Gehin. Motion to approve the minutes carried 5-0.

2) **Director's Report on Utility Operations.**

Lindman advised on updates for the water and wastewater plants and operational matters and if any commissioners had any questions on what is on the director's report. There is an update on lead and copper rule that will impact us in the future.

Gehin asked what the results of the mercury test was and what we'll have to do to show compliance.

Erickson replied we haven't received anything from DNR but the limit is 3.8 and we are at 3.83. It's not much but it is over the limit.

Robinson asked if we knew the source.

Erickson replied saying sometimes we get spikes. We have an older system but it dropped after we put in the dental amalgam regulations and when we cleaned the sewers we disturbed sediments and/or historic materials so it comes through the plant and it was his intention to monitor and see how we are doing. The February results were 3.83 and March was slightly below that 3.8, so it's still elevated and we are anxious to see if it drops back to normal or if we've got some kind of elevated trend for some reason.

Force asked what is normal.

Erickson replied, we bounce around but he couldn't remember the last time we'd gone over the limit of 3.8 but in past have been about one, two, and three range.

Force asked if this was parts per billion and with the recent rain have we been able to put any black gold out on the farmer's fields or started emptying shed?

Erickson replied this is parts per billion, so it's a very small amount. We got started last week hauling out biosolids but were rained on so they were planning to start again Sunday because the weather report was looking good but then weather changed so it changed the plan.

New plan was to start Wednesday or Thursday whenever the fields dry up and hall on Thursday, Friday, and Saturday.

Force asked if we were hauling liquid or cake.

Erickson replied that we have a cake that we spread.

Force indicated that 22 Homeowner's have called expressing interest in lead line replacement, what is the per replacement cost about or around?

Lindman replied that the cost has been about $3,500.00 within our construction project limits then outside projects where there are sidewalks costs get close to $5,000.00.

Robinson asked for future discussion if anyone has looked at the American Rescue plan particularly on the allowance for investment in the water and sewer and how it might come into play with the instances of lead and copper line replacements.

Rosenberg replied yes, we're talking about it at the finance committee today but we are still waiting on guidance from the treasury and it's a good topic to hit in maybe the next couple months.

Robinson asked if this was also the infrastructure proposal.

Rosenberg stated no and that this is the first plan coming through and we haven't heard of the infrastructure yet.

Robinson asked if there's money in the rescue plan for the lead and copper line replacement.

Rosenberg states it had to do with the sewer or water.

Lindman reiterated that it is the Utility projects-Water Sewer and broadband specifically.

Robinson asked if he can elaborate on that and if it is available state by state.

Lindman stated there'll be different allocations. For state, we are not sure yet how to apply for them or how to reach out for those funds. A month or two ago we talked about preparing a plan on how to remove those lead service lines that we have or maybe different options for the commission to consider. We were proposing 450k this year but with 30,40,50 million dollar worth of work we have to do, we'd be at if for years. Putting a program together in the next couple years and trying to dovetail some of the funding and figure out how we can do better.

Rosenberg suggested if we want to put this on the agenda in the next few months maybe when we have a better idea.

Robinson stated that his understanding was that checks were going to come to the communities for the American Rescue Act and the city's allocation based on legislative fiscal bureau was $15,747,334 but that's for a number of eligible activities including lost revenue and others, so there will be potential opportunities for the city. The city will receive $26 million in this goal and for Marathon County just under $52 million that will be coming so there are opportunities ahead.

3) Presentation and Update on Proposed Solar Array at the New Water Treatment Facility.

Please refer to attached documents in the packet of the presentation by Clark- Dietz.

Lindman introduced Lisa from Clark- Dietz and Tonia via Webex as they will walk us through where they are at with the proposed solar project and answer any questions you might have.

Lisa states it has been a couple months since we've been here and wanted to update you with the solar project.

Last time we talked about the sighting and initial location north of the plant was not suitable for the solar. We investigated areas further to the North when the property on 1010 Bugbee became available, we shifted our focus to that property. Survey field work has been done, the city is pursuing purchase of that property and when that is finalized we will have the geotech done. Next step is preliminary sizing of the array and layout so we brought in a resource we

worked with in the past. SunVest and our company together have done a number of projects. They are going to help us with the constructability and cost estimating. I have Chris Collins here from SunVest Solar who will walk you through what he's done with some preliminary layouts.

Collins presented stating they are based in Milwaukee, WI. He is based out of the office in Madison, Wisconsin. We have been in business together since 2009. We are perennially the number one solar developer in the state, we're the 14th largest solar developer in the country. I am a Project Developer. So brief history, we have a development team that develops projects. We have a design and engineering team that figures out all the electrical schematics and drawings. Then we have an operations team that implements the projects and an assessment management team who follows up on the systems to see that they are performing the way they should. We had multiple discussions on where this array would go and where to put it and how big layout big of a layout would be at 1010 Bugbee. The goal of the water filtration plans was originally 3 million kilowatt hours a year. Goal was to get to 90% of that consumption. One of the challenges is that there's a limit to the efficiency of the panels so you need quite a bit of surface area to try to get to that 90%. We have looked at a fixed tilt array where the panels are fixed to the south then we have the single axis access array meaning the panel of rows run North/South and the panels turn during the day from east to west so we can gather more electricity that way. So we went with the Single Access tracking system. Every megawatt and every thousand watt, kilowatts of solar panel that goes up takes about 6 acres of land. We need to spread the rows out so one doesn't shade the other. The location at Bugbee Avenue is 1.23 megawatts. All these numbers are conservative because we haven't seen all the geotechnical results and we need to look at topography and things but we have a fair amount of play with topography and it could follow the terrain. For every kilowatt we install for a single access tracking array, it will produce 1405 kilowatt hours. We are taking the 3 million, knocking off to 90% of that usage and looking at how much the system can produce and how much it can offset. 1.23 Megawatt system will produce one million seven hundred and twenty two thousand kilowatt hours or more, about 57% of the estimated consumption of that facility. Estimated cost of that is about 15 hundred and sixty dollars per kilowatt installed. We are coming in more conservative but as we know more about the particulars we can chip away at the numbers. Estimated cost of the electricity and value of that solar every month and every year and divide that with what the system is going to use by the value of that solar and the return on the investment is about 13.9 years. We will know more and perhaps the installed price drops that return on investment will also lower. On the next page you can see the preliminary layout. Oblong where there are no panels was a very steep heel we cannot put panels on. This layout uses 410 watt panels. That is one technology in this industry that is constantly changing. Next year we could be looking at a 450 or 470 watt panels. This could affect how much of the offset there is and what is the cost of the panels at that time. Panel prices have been dropping the last several years. Design would be a 1.92 megawatt system. Estimated cost $2,977,300 and ROI would be 14.7 years- all very preliminary and conservative. Panels capture photons from the sun and convert those into direct current which is captured throughout the array that runs to the inverters placed on the array that changes that direct current to usable ac current. Then it's just a matter of building blocks you start with a panel then you have an array and all that electricity is collected to one spot then through electrical wiring and conduits is sent to the area of interconnection for the plant which is the next step.

We need to talk to WPS as to how you want us to interconnect this and with Clark- Dietz and the electrical service at the water filtration facility determined by our design and what it means to interconnect this with the electrical service there. It could be that it never touches the

facility, it just hits a transformer and the power goes to WPS and they offset it in billing or would it be behind the meter that hits their electrical service and instantaneously offsets what the facility is using at that time. Field would be pile driven steel vertical posts they are GPS located. It takes a minute and half to drive a post. Then they follow behind to install racking between the posts, then the tracking motors that turn those panels. Then dc wiring to the inverters and ac wiring to whatever point transformer or combiner panels. Collins presents on current projects they were working on as examples. Different types of arrays. Picture of a fixed array see page 9. What's becoming more popular with the larger arrays are Pollinator arrays. It creates a habitat for butterflies and bees, some people are even looking at sheep but we haven't explored that yet because we'd have to let people in to tend to the sheep where there is high power flowing. Page 11 shows the pile driving machine that posts go in. We would do a pull test to see how much pressure it takes to pull it out again because we want to make sure these are rated for 110 mile an hour tornado type winds. Then they go out in order again. Page 12, next step where you follow behind with the angle racking. Page 13, Inverters installed right on the array. All conductors/panels flow to one collection point then gets into electrical design how we will tie into water construction plant. Timeline we are looking into getting everyone trained and doing this is about 6 months depending on time of the year and weather. Any questions.

Force asked what kind of energy saving procedures we have in the new plant and if we are doing everything we could to reduce energy consumption.

Boers replied saying it was looked at considerably all throughout our design, electrical engineers have looked through our lighting options, our LED occupied room sensors to vfd's on our motors, high efficiency motors, through the whole process. We looked at this. I don't know if there is something specific you are looking for?

Force replied no, he was just thinking if the consumption number that SunVest is using is a number as far as what we'd expect the plant to consume.

Lisa replied that they calculated this based on actual plant load.

Force stated, if we were to go with that construction that would occur a year from now, do we expect any change in the price of panels and the other solar apparatus between now and then.

Collins replied that panels are as low as he has ever seen them but there is talk they could drop for next year. He replied he gets nervous about making a claim. He states as a company, when we purchase panels, purchasing 20 megawatts of panels so about 30k panels, we might be able to realize some savings but we don't know till November what will have next year and what price will be.

Force asked if they have ever upgraded panels on existing installation as new technology comes along.

Collins replied they have not done that but explains that the panels carry a manufacturer's warranty to deliver 80% of their rated output at 25 years. Now they are coming out with bifacial panels and that warranty is 30 years. There's a 10 year workmanship warranty, the rest of the 25 years is the performance of the panels. That technology is always evolving there are people in labs all over the world trying to get a little more efficiencies out of the panels but we are still hovering just below 20% efficiency on the panels.

Force asked how the weather may impact the efficiency of the panels and the maintenance of the system.

Collins replied that they had design tools which factor in 30 years of weather data for the exact location where they set up the future arrays. The National Renewable energy laboratory in Colorado studies the weather patterns. We are compensating for snow cover, cloud cover, cloudy days, semi-cloudy days, and sunny days is where we get that estimate for what it will

produce. We'd set up some kind of regular maintenance that's part of our asset management team.

Force asked if that would be a contract with SunVest to provide maintenance.

Collins replied it could be if they did the work.

Force asked how this ROI compared with other facilities SunVest has installed and mentioned what he thought was an incentive through WE Energies and WPS now as he believed is now part WE Energies, are there any incentive available locally.

Collins replied that ROI is about the same. The challenge here would be if there is a tax credit available for people that buy solar but we can't monetize the tax credit here being that you're a public entity. The solar now program went to the public service commission to apply for that program and the queue for that is full. I don't know if they're going to expand it. Until now WPS and WE Energy have been operating separately even though they are kind of the same company. I wouldn't want to speak to that.

Rosenberg suggested to stay tuned for the next agenda item.

Robinson stated he was just going to ask whether the new infrastructure bill has a number of incentives for the development of solar and if we had a chance to look at that to see if there was any potential programs that would benefit this project?

Collins replied there were a round of office energy innovation grants that came around but is currently closed, there is no information if they will open that up again- that was one potential funding source. There is some money from Focus and Energy but the amount that they gave out wouldn't have any effect on this.

Robinson asked if SunVest has looked at the proposed infrastructure bill on the federal level.

Collins replied no. He says they were talking about it, but in his world unless something is in writing and exists, he'd normally wait to see how it sort of flush out on what exactly is available.

Gehin stated most of his questions were answered but asked what the amount of budget we would need to have to maintain it and says he'd like to think the first year would be low but as the life of the solar array goes on if Collins could give us what his experience has been on an annual budget for him. If he puts a unit in, what that would cost?

Collins replied their asset management team has only been around 3 or 4 years, he was afraid to guess. He'd like to get a solid answer and get back to Gehin.

Gehin asked if it is possible for our own staff to take care of it.

Collins replied they can train staff on site on what to look for and larger issues, sometimes we will do it as an a la carte item, an inverter is bad, inverters are typically covered under 10 year warranty by the manufacturer so if you need to replace an inverter we would discuss the manufacturer how much of that truck roll would cover. Solar arrays are inherently low maintenance. We are talking about the tracking array here so we are looking at some regular maintenance that I think staff here can do.

Gehin asked if there were any means to remove the snow or do you just live with it and get less production.

Collins replied that the proposed single axis arrays have a snow shedding tool in them, that causes them to tilt as far as they could to shed some of the snow right off of them but if you have freezing rain and snow then of course it's going to stick. The panels don't produce heat but will get warm in the sun.

4) Update on Solar Partnership with WPS.

Lindman updates the Commission that as we entered into this contract with Clark-Dietz

for the design, we weren't sure of the size of the facility. Initially we were talking 300 kilowatts 400 kilowatts but now that we are up to one megawatt or more. WPS approached me about the possibility of partnering with us for some of the capital cost in helping get some of those credits in WE Energy. WPS is still working through a possible partnership proposal and with the PSC, this would be the first one that WPS on their territory. Kelly and Dave Schneider are proposing to come in May to discuss what their contribution could be to the project and have expressed that they would love to partner with us, whether it's just this one or future ones as well. They approached us and it was a positive conversation so I'm looking forward to having more detailed information from them.

Gehin asked if we would be projecting the 57% or if we would try to go larger?

Lindman replied that they talked about economy at scale but at that time didn't know exactly, we were hoping to get a megawatt and we are a little bit over. The survey that will be done will include an area a little north of 1010 Bugbee and hopefully there's a space there we could use. This was just a start for them, but they could look at other areas in the city to put it up even if it doesn't go directly to a facility, they could just connect it into their grid and we could get credits for that. This could be a small step into the potential that we could partner with WPS.

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5) Discussion and Possible Action Subsidizing the Rain Barrel Program for 2021.

Lindman states that our main focus was that we've got the third party vendor involved and they have a draft website put up. Lindman stated that Robinson and Force have both seen it. We have a setup of the rain barrel in the lobby here for people to see as well so now it's just deciding if the Commission wants to subsidize the rain barrels and to what level, then we can go live with the public so residents can actually begin to purchase. We are proposing a June delivery timeline and we'll establish a pickup area and everything as well. A couple months ago there was discussion with the subsidy on the sewer side that's locally controlled but on the water side its PSC controlled if water rate revenue is used. There's a process with the PSC on the water side if we want the water to help subsidize through use rates, we'll have to go through and get their permission to do so. Staff could walk through those steps with the PSC to move that forward. Even if it's the sewer that comes forward and subsidizes initially and then once we get authorization they can reimburse the sewer for full or half or however you would want that to be distributed.

Force asked if that would be time involved and if it would be an issue here if we are on a tight timeline to get this in place by June. Would the authorization of that subsidy take a long time or would we be able to get it quickly.

Lindman replied he didn't know what the PSC's timeline would be and requested Swanborg to see if she had any idea.

Swanborg answered that the information looked up on the PSC had two options. We could do it as a regular rate study or a stand alone application but either way they have a number of items we would have to include. I know the rate studies were taking 6-8 months. If we did stand-alone applications with some of the Covid process that municipalities are applying we are seeing it take 3-4 months, so we are outside of that timeline.

Gehin implied we had seen someplace that we might subsidize at $25/barrel.

Force replied that was a number that was discussed.

Gehin stated okay well if it was $25 and there was 500 barrels are we looking at $12,000 or $125,000 or I don't know what I did, I did my math real quick so I don't think it's a real big dollar amount.

Rosenberg states that the issue was to get PSC's permission to use rates that we collect for water service as the Subsidy.

Lindman replied to keep things moving, we could use the sewer utility and then reimburse the water utility if that's how the Commission wanted to do it as well, it seems like that's the way to go, otherwise, we've got a time issue.

Rosenberg asked if there were any more discussion or is there a motion we'd like to entertain.

Force replied he'd move for $35/barrel subsidy through the sewer commission but there's a question if someone wants to put in two or three barrels, do they get two or three subsidies? I don't know the answer but I would propose $35/barrel subsidy.

Rosenberg stated so we have a $35/ barrel is there a second?

Robinson replied Seconded.

Rosenberg asked if there were any other discussion here.

Force replied that he would move to amend to put a limit to it of no more than two barrels per property.

Rosenberg states so we have an amendment to no more than two barrels per property

Gehin replied with accepting it.

Groat asked if the subsidy we were thinking of was from the sewer utility to the water utility because of cash flow problems and expressed concerns that someone could say sewer rates are to fund sewer activities and this was not a sewer activity correct.

Force stated if you could connect with a storm sewer.

Groat suggested that maybe it's something we want to research with legal and stated she knows we are not governed by the PSC, but feels we'd still have to support the users by just using sewer funds for doing sewer related functions.

Force says we could fund it out of the storm sewer and then reimburse the storm sewer from the water utility once we get permission from the PSC.

Groat says she was thinking we were meaning the waste water.

Lindman clarified earlier he was talking about sanitary but storm sewer is funded out of the levy but could we advance it out of the levy from storm sewer and then reimburse storm sewer once we get approval from the PSC.

Groat says we do not have a storm sewer reserve but we could do this it out of the general fund.

Lindman states we can research whichever one is cleaner for us and we can move forward with that.

Groat replied with a yes.

Rosenberg asked if there were any other questions.

Gehin stated he would be more supportive if it were $25/barrel and would like to cap it, let's say to the first 200 but that doesn't mean we couldn't continue it down the road.
He didn't know if that would push people to hurry up and do it and these are just comments he wasn't looking to offering amendment.

Force had a question if this would be a one-time subsidy or an annual subsidy?

Robinson states we'd want to look at this as a potential pilot project to see how it works.

Rosenberg recapped previous discussion on looking at a one time for now at $35/barrel at no more than two barrels per household.

Gehin states to make it the first hundred as part of our pilot and that it would have to come back to us for approval or if we didn't want to do that.

Robinson states that his concern with the hundred is that they estimate maybe a one percent take rate and if we are doing this we should be prepared and he was not adverse to a two hundred barrel cap but thinks one hundred is a bit low.

Gehin states we can make an amendment that the pilot includes not to exceed 200 barrels subject to further ratification by this body.

Rosenberg states we have a couple of things here viewing her parliamentarian, we should first vote on the amendment of no more than two per household. Motion carries 5-0. We have $35/barrel to no more than two per household entertaining a motion by Gehin to cap the program at 200, do we have a second? Seconded by Herbst.

Gehin says he would call it a pilot program.

Force states as we are already going full steam with this we want to encourage people to do this, they might not do it the first time around but they might see others doing it in their neighborhood and a year from now they may want to come in and do it. A $25/barrel subsidy, if we did 500, which is very generous, estimate would be $12,000 a go, in our world here in waterworks is not a lot of money. There's something about pilot that means temporary or experimental and doesn't have the same general broad appeal.

Rosenberg states we've done several pilots and task force as far as marketing goes. We have input from the city attorney.

Jacobson asked through what date are we were authorizing these changes. The first 200 or when they get to 200 or after they get to 200 then the pilot's subsets something like that.

Rosenberg replies yes that would be the indicator.

Jacobson follows with a question of then it would need to come back to the Committee for further authorization?

Rosenberg replies yes.

Lindman states that would be the subsidy that you're looking at because we can still sell more barrels at the price that's online, they just won't be subsidized so just the first 200 barrels sold is my understanding. We hadn't talked about limiting the number of barrels to get subsidized. We talked about the cost of the subsidy we anticipated $12 to $15 thousand dollars which would be maybe four to six hundred barrels sold but I'd have to check with the third party vendor so just the first 200 barrels sold those names would be the only ones getting the subsidy? Everybody else would have to switch over on the website to purchase them fully so I don't know how they do that.

Force stated he would think it could cause paperwork issues and keeping track and number 199 and number 201, are they going to argue about the subsidy as to who was first? Are we getting ourselves into something that will make this more difficult than it needs to be? I'd want to consult with our partner here rainwater solutions to see what they thought about

this approach. They might have had other customers that either do it or have thought about doing it or don't do it.

Lindman states the way it's set up is just one time for 2021, then once selling the rain barrels is done, then it's done for the year. So for next year if the commission wants to do it again, they would come back for approval. So I think for now it is set up to be just a one-time event and not recurring, at least that's how I've portrayed it.

Robinson moves to say if we could deal with this as part of the budget for next year and budget it in. I think it would benefit from an evaluation at the end of the year which would be one of the reasons why you would have a pilot and I'm not opposed to a pilot. He wants to see if we could move our May 4th meeting to a morning as well due to scheduling conflicts of another meeting he has to attend.

Rosenberg states we can look at calendars to see if we can move something around. So right now we are looking at 200 barrel cap. Motion carried 3-1. We are at $35/barrel no more than 2 per household with a cap at 200.

At this time, Commissioner Robinson left the meeting.

6) Discussion and Possible Action of Water Distribution Maintainer and Relief Operator.

Boers starts with the position we proposed a while back, the commission approved it a year ago to be implemented. We've been looking at different ways to classify this position and Toni has classified this for us and this was her recommendation.

Force asked who does this position now.

Boers answers saying we have an open distribution maintainer right now and we'd like to incorporate this position into the plant as well and about five years ago under a different director this position was eliminated, but this position will help us out with the plant for weekend operations. We have three people we are rotating weekends and we just added a mechanics/ tech position that would make it four and this person would make it a five weekend rotation.

Force clarified that this position was eliminated and you're proposing we reinstate it correct?

Gehin questioned if this would be adding duties to the water maintainer.

Boers replied this would be adding on all the operator duties on to the maintainer so the maintainer will need to be able to operate the plant, be safe with chemicals, fix pumps, run through any issues that may occur during their responsibility at the plant.

Gehin replies so we are not adding additional staff, we are just beefing up the one we wanted filled in the first place?

Boers replied yes.

Rosenberg stated we have a motion to approve this job description change by Gehin and second? Seconded by Herbst.

Motion carries 4-0.

7) Discussion on PFAS/PFOS Compounds in Wisconsin.

Agenda item tabled until May.

8) **Discussion and Possible Action on Completing Smoke Testing as the Next Phase of the I&I study.**

Lindman begins with reconciliation from the last meeting where Strand and Associates presented and in their recommendation for smoke testing, with our staff reviewing, it seems like it's a reasonable cost to really get a good handle on some of our problem areas on potentially where we could identify some I&I fixes. The scope of services and opening up of the manhole seems to be efficient for them to do the inspections on those also and then set up their format on the inspection forms which our staff really liked and we can continue when the project is done. We would have some new staff members along with them during those inspections so they can get trained at the proper inspections of those manholes as well.

Force asked if in total the cost is $65,000.00.

Lindman replies $65,500.00 is correct.

Force moved to proceed with this completion of the smoke phase. Seconded by Herbst.

Gehin asked if we have a timeline, sees November 30th.

Lindman replies they wanted to try to do it during some dry weather along with the inspections during the wet weather.

Motion carries 4-0.

Force asked a question regarding the PFAS discussion, this has been moved to next month but are there any directives coming from the DNR yet on the PFAS.

Erickson replied he was training the other day and they had a draft interim guidance and laid out some numbers applying to our bio solids, there are some numbers of how much could be put in the farm field or restrictions if they were higher but not sure if that was official yet. It might not apply to us until our permit gets updated.

Force asked if we had any PFAS content in our bio solids.

Erickson replied we haven't tested the bio solids, the DNR tested our effluent and I'm expecting those results anytime but we haven't seen those results.

Adjourn.

There being no further business to discuss, the meeting is adjourned.