

Lake Township Planning Commission
Regular Meeting
February 26, 2014
Approved Minutes

The meeting was called to order at 7:00 pm. In attendance were Planning Commission members: Jerry Pobanz, Bob Siver, Nicole Collins, and Clay Kelterborn. Guest Kevon Martis of Riga Township. There were 4 audience members.

Motion by Clay, to approve the January 22, 2014 minutes, seconded by Bob. All ayes. Motion carried.

Motion by Clay, to add Kevon Martis to agenda under new business, seconded by Jerry. All ayes. Motion carried.

Correspondence: Letter from Jane Kaneko regarding portable toilet facilities on Port Austin Road and residential exterior lighting.

Article submitted by Lou Colletta regarding violation of sound ordinance in Mason County.

Discussion began regarding Mason County, who states that their wind turbines are too loud. Consumers Energy brought a litigation plan to the county which they rejected. The County is retaining a noise expert to create noise litigation for Consumers Energy. During this process the turbines were not shut down. Consumers asked the judge for a stay which was denied. Consumers said they would take an average from ambient noise instead of staying within the 35-40 decibels and this was contested.

Jerry said, that placement of turbines in relation to dwellings so that noise never goes above 35-40 decibels is 6,500 ft. That is for 470 ft. turbines. Kevon stated that the ordinance created in Riga Twp. was adopted as a state model ordinance. We worked with Foster Swift, one of the states premier municipal law firms to create our ordinance. Your job as a Planning Commission and the same is true of the Board of Trustees is to protect the health, safety and welfare of the people of the township. It is strictly a secondary question as to whether or not the ordinances you enact to make people safe allows a person to perform an activity profitably or not. This is not your concern. You cannot say that the reason we permitted an unhealthy ordinance is so that entity B can make sure they are guaranteed their profit. Your concern is health, safety and welfare first. I can't answer directly as to what size noise limits result in what kind of setbacks. I don't know what type of turbines will be proposed here. When we first started our ordinance in 2008, they brought us zoning ordinances from Huron County, Oliver Twp, plus the State guidelines and said here is what everyone is doing in the State. At the time the turbines were 390 ft. Nobody asked how big, are the turbines proposed for our township? We found out from the FAA that they could be 490 ft. A developer in Sanilac County has asked for approval for 72, 590 ft. turbines. Also 570 ft. is slated for approval in Alabama. You can't assume that the 470 ft. or 490 ft. are the ones you'll see here. Just because a wind developer wants 500 ft. turbines, it's not exclusionary to say you'd

be happier with 200 ft. You absolutely have that authority. There is a case called John Check vs. Bay Township where the developer wanted to build turbines and the existing ordinance prohibited anything taller than 30 ft. So the developer sued and lost. It is not exclusionary to choose a limit that you think protects the health, safety and welfare of the community. Here you've had a rather permissive ordinance appear before your people for a vote already and 61% to 39% decided it was too permissive for their taste. I would give you the same advice that Foster Swift gave us, write a strong ordinance that's defensible in court and is reasonable. The guidelines of what that looks like is your ordinance has to have a rational relationship to protecting the health, safety and welfare of your people, should not be arbitrary or capricious and not give the impression that you are deliberately trying to target an individual, group or entity.

Jerry asked what size turbines they started with? Kevon answered the first ones in Ubley and Elkton were 390 ft. The ones in Mackinaw City were shorter than that. The next were 476 ft. and 494 ft. The latest for Sanilac County are 590 ft.

C. O'Conner asked where is the money is coming from for decommissioning? Jerry answered that in the ordinance the money is to be put aside with a bond issue.

C. O'Connor would like the PC to address disposal of broken turbine pieces. He feels that DTE should deal with their waste so it does not end up in a Huron County landfill. There should be a court order forcing them to take broken blades out of this county. Jerry stated that our plan for decommissioning is to have everything removed including all cement and to have area put back to farmland.

C. O'Connor said they will need something with teeth to be able to enforce it, such as a cash bond. Kevon added that Riga Twp. had a bond and asked an attorney from Foster Swift if it was iron clad. He said that nothing is iron clad. He recommended we have a decommissioning bond but will the bonding agent really want to pay out in the end? It's certainly better to have one. Exelon, who wanted to build in Riga Twp., is now asking that we put full faith and credit behind them for decommissioning. I wouldn't recommend it. In Ubley they're on their 3rd owner in 7 years. The wind developer you are dealing with today is most certainly not the one you'll be dealing with 10 yrs. from now. The average change of ownership is about every 6 or 7 years. DTE said they will be putting new gear boxes in every 10 years for \$450,000.00. In 20 years they will be expired and have to be removed or the towers and all will have to be replaced. That's according to Detroit Edison's submittals to the Public Service Commission (MPSC). According to Detroit Edison they will have to do a massive overhaul. Even the tubular towers in 20 to 25 years won't be useable. Decommissioning is critical.

Jerry asked if it would be too much to ask for a cash deposit to take them down. Kevon said, I think you can, but what we found in Riga Twp. is that once the turbines are built your ability to enforce your ordinance will be limited by your financial ability to fight litigation. If you're going to litigate with a Fortune 500 company, your pockets are going to run empty far faster than theirs. So, you're really asking yourselves, how do we safely host a Fortune 500 company in our township and is strong ordinance language enough if they actually get built. Our township did the math and we realized we could be in interminable litigation like they are in Mason County over archaic definitions of noise, sound, rare weather events and it can take years. If you're having negative noise

events like we've seen in Ubly, Elkton, Missaukee County Mi. and Mason County, you are powerless to make that stop as a board or planning commission. So, you have to ask yourself, what are we willing to risk and how enforceable is it? We concluded in Riga that no matter how strong we wrote it, if it was written in such a way that they actually got built, we'd have a hard time enforcing it.

Jerry said, the Mason County article brings up sound. They had their own county sound people or hired someone to test. Now they're told it doesn't matter, they have no clout. Kevon said, that's what the lawsuit is going to be. A battle of experts, deep pockets and insurance policies to figure out who's right. In the meantime the turbines keep spinning. It depends on how aggressive you are, what your financial means are as to what kind of court orders you can generate in the whole litigation process. It's a difficult thing, once they're in place, to go back and retroactively protect your people. When I was on the Planning Commission in Riga Twp. we had two developers, UV Wind (the turbine company) and Exelon from Chicago. They each gave presentations on what the project was going to look like. They made a lot of claims like no louder than a refrigerator, no property value effects. There were about 150 people in the room. I asked the developer, are you willing to assure them that their concerns about noise, property value impact, shadow flicker, bat, bird kills, etc. are unfounded, but in the event that those things all turn out to be real, are you willing to make this community financially whole? Are you willing to promise them that tonight? They said, we are not prepared to make that guarantee tonight. That means that you who are sworn to protect the health, safety and welfare of the community are the line of defense for the community. Not just for this activity but for any activity.

Jerry said, you mentioned bat, bird kill. The taller they are, the slower they go? Kevon answered, not necessarily. They only look slower. The angular velocity at the tip of the much longer rotor is still 179 to 200 mph. They spin at roughly 16 rpm. The tip speed is very fast.

Jerry asked, if we write an ordinance and say 390 ft. as a height limit would they still come here and look for bigger ones? Kevon said, that because your township has shown that 61% to 39% were not interested in the last ordinance, that's a red flag to wind developers for the future. You can write an ordinance that caps at 50 or 100 ft. Developers told Riga, if they write an ordinance that's too exclusionary they would sue. Our lawyer advised that as long as the ordinance was written for the health, safety and welfare of the people, the township was in a strong position. The State guidelines, in their final report on safety regarding renewable energy, as of the Fall of 2013 says 1 ¼ mile set back from homes and noise limits below 40 (dBA) decibels. Go to mich.gov/energy, then to PDF file: Report on Renewable Energy. If you find yourselves in court, you can reference this State document.

Clay said, so the 1 ¼ mile would be 6,500 ft. Kevon said, if you look at specifications for the Vestas V-100 (Elkton and Minden City) they make 106.5 decibels at the source where the noise is being produced. As the rotors get bigger it gives you more low frequency noise which is the most troubling. Riga added a 50-55 decibel low frequency level which is reasonable. If you have a 35 decibel night time noise limit, the developers claim they cannot hit below 42.2. The wind developers are looking for friendly setbacks, under 1,500 ft. and noise limits 45 and above. So, dBC is wise to include.

Jerry said, that a lot of ordinances state setbacks in 2 different ways. Why not just state footage? Kevon stated, that it's a very strong position to have a multiplier.

Clay asked, if you can have both and say not less than? Kevon answered, yes. You can have a multiplier and say not less than so many feet.

Clay said, the PC had settled on 1,700 ft. from a property line. Does that seem reasonable? Kevon said, documentation from Vestas and Nordex regarding 490 ft. turbines says 1,640 ft. setback as a safety factor. Why would you make a setback 1,640 ft. from a house where your children are now playing within a danger zone, where employees have to wear hard hats?

Jerry said, that the PC decided it would be from the property line. Kevon stated, that is what Foster Swift argued in favor of. What other zoning is based on an interior feature of your neighbor's property? When that circle overlaps your property, the developer takes away your right to build on your own property because it's within the safety setback. Riga has a 2 stage setback, one distance for participants, one for non-participants. We said it is not fair to take away someone's property rights without their consent and compensation. For non-participants, we said 5X the height from the property line and for participants, 1000 ft. The big setback can be reduced down to the smaller if they negotiate a waiver with the developer. Now it's up to the developer to negotiate favorable terms. This Board is saying that the impact of the development is so intense, that individuals should have the ability to consent and negotiate compensation.

Bob asked, if the waiver seems a bit hypocritical. Kevon said, you've already set a standard saying here's what we think is safe. If people voluntarily want to take it upon themselves, you're not standing in their way.

Bob said, the children, mail carrier, delivery person can't voluntarily consent, so you're still putting people inside what we consider the danger zone. Jerry agreed with Bob. He said, I don't think we should give away the ability to encroach on another's dwelling. Kevon said, you have a strong reason to use health and safety numbers. If you're going to use 40 or 35 decibels then your 4X the height setback is irrelevant. The wind developers with the V-100 said that a 40 decibel night time noise limit is 4,300 ft. from the property line. You should look at the literature and say 1,640 ft. should be the bare minimum. If the employees can't be inside that footage without protection, nobody should. What you put together should be rational, reasonable and easy to defend in court.

Bob explained that the PC is using a 3 mile set back from the bay based on the recommendation by U.S. Fish and Wildlife. We have a 1 mile set back from Rush Lake and the rivers. How do you feel about those numbers? Kevon said, if you have any evidence or reason to believe there is significant wildlife features in those areas, you have the authority to protect them whatever way you believe is reasonable.

Clay shows an overview of the 3 mile and 1 mile set backs from the bay, Rush Lake and rivers. Clay asks, is it arbitrary to make setbacks based on recommendations? Kevon

answers, no. Fish and Wildlife wrote strongly worded letters to Garden Peninsula and Heritage Energy saying they do not support this project because of where it's located. The whole peninsula was within the 3 mile recommendation. You don't have to permit every kind of lawful use in your township. The fact that you are picking known water features and using guidelines is perfectly acceptable.

Jerry said, now that I see 35–40 decibels that might be something to shoot for. Kevon told the PC that Dr. McKinney, a noise expert who works for American Wind Association, when questioned under oath said if it was his home, noise limits should be 35 or something under 40. The World Health organization says night time annual noise average for Europe should not exceed 40 decibels, dBA. There's a real relationship between noise and health because you have to sleep.

Clay asked Kevon to expand on the averaging. Kevon said, the developers will bring in a noise expert to measure ambient noise. They will say there's a 45 decibel, LEQ (an average over an hour) night time noise limit in your community, so our turbines will be 45 decibel/LEQ. If they measure night time noise from 12:00 am – 1:00 am and get 25 decibels for 59 minutes and one car drives by for 1 minute at 65 decibels, because it's all rhythmic, the average noise limit just went up to 42 decibels despite the fact that, 59 out of 60 minutes you were listening to 25 decibels. A turbine can run at 60–65 decibels for a minute or two and not break the 45 decibel per hour average but be loud enough to wake you up. It's hard to average sound because of extraneous conditions. A limit should be a limit and easy to understand.

Clay said, in our set backs we decided for participants and non-participants it would be from the property line. Bob stated, I think we've been consciences so far. We should stick with our principles all the way. Nicole said, we have been very alert to all concepts. Kevon stated, I think you have a great start. No ordinance is exclusionary. If you want to build you have to buy and control the land to develop. Exclusionary is to deny a person all economic benefit from their property.

Jerry said, we've worked with different heights and thought going below 500 ft. would be too exclusionary. What do you think? Kevon said, no. You have the right to decide what your community looks like. In Frankenmuth, all buildings, by law, must have a Bavarian theme. If you decide you don't want to see turbines higher than 50 ft. that's not exclusionary. We are a local rule State and you get to decide what happens here. The developers will tell you, the State of Michigan said, we have to develop this wind inside the State because it's the law. That law was declared unconstitutional because it violates the interstate commerce clause. It has not been litigated yet, but a Federal judge declared Michigan's law stating their wind energy be constructed only in the State is unconstitutional.

Jerry asked, if Michigan went to Canada to get wind? Kevon answered, the average price of wind in the Thumb with everything in place is \$80.00 per megawatt hour. Wind can be bought from Iowa for \$30.00. Why are we paying 3 times as much when we can buy it for less, elsewhere? All the wind turbines that are operating in Huron County right now can be replaced by a single gas turbine that sits on a semi-trailer. Only 2% of our electricity in Michigan is coming from wind, despite spending 2.5 billion dollars on it.

L. Colletta asked, why do we build wind? Kevon answered, their argument is job creation, wind reduces fossil fuel and how many homes you can power with wind. If you're concerned about reducing coal emissions, after spending 2.5 billion dollars at most coal emissions in Michigan have been reduced by 2 ½ %. That same money could have closed 50% of our dirtiest coal plants, if we built gas instead of wind. If we were to have 30% wind in Michigan (approx. 7,000 turbines) we'd have to close our coal and nuclear plants and replace them, with gas plants to pair with wind because gas is the only source flexible enough to balance the wind. We'll be using more gas than ever before. One reason Consumers wanted to build the Thetford Gas Plant was to balance the intermittent wind output in the Thumb.

Clay asked, are there any holes in our ordinance that you think we can shore up? Kevon said, on page 4, regarding the item under Dave Bourke, Public Service Commission, you need to insert regional transmission operator. The utility company does not own the grid. Wind developers in your community are concerned with 3 things, how high can I build, how close can I build and how noisy can I be. If any of those things don't work for them, all the others things are largely irrelevant. Also, make a note on decommissioning. You definitely want that. In Riga we required a bond from an independent.

Nicole said, we required a security bond but then cash was discussed. Can we do a cash escrow account? Kevon said, I think you can, but there's really no need if you do the bond. I would ask an attorney about that. On shadow flicker, most developers ask for 30 hours per year for shadow flicker. That's 30 hours per year, per turbine, per impacted parcel.

Clay asked, is it a standard? Can we set it at 15 hours? Kevon answered, that setting anything at 0 is exclusionary. There is a shadow flicker detection system that stops a turbine when shadow flicker hits a house. You can require the developer to use it in their project. Secondly, they can actually program each turbine to stop as the flicker is approaching a given house.

Clay asked, if it needs to be spelled out in the ordinance when that occurs, they have to cease? Kevon said, yes. Mason County adopted 10 hours per year for shadow flicker, Exelon assured that no house would have more than 10 hours. One home had 10 hours in the first 90 days. It turns out that 470 ft. turbines are throwing out shadow flicker for nearly a mile. The plot of shadow flicker is called the "butterfly map". They know where the shadow flicker is going to fall all throughout the season.

Bob asked, if it would be reasonable to include roads? Kevon said, you can but saying you can't cast shadow flicker on roads is a tall order.

Clay said, in our setback we agreed on 1,700 ft. from a road, is that legitimate? Kevon replied Ogden Twp. did it with a police power ordinance. There's a less strong relationship about shadow flicker being a safety concern on a rural roadway than noise. There's stronger science on that. Your ordinance should require them to submit a shadow flicker map as part of their documents.

Nicole said, to do studies on the sun is very simple and predictable. Kevon added, the companies routinely furnish those maps. The question is how many hours a year you want to endure? Also, the red lights can be annoying. There are proximity systems that use radar to detect approaching aircraft and only turn the red lights on when the aircraft needs them on. Two years ago, that was taken to the FAA for approval. I don't know if it has been approved.

B. Williams asked, if there is a time frame in the ordinance for take down and removal? Clay answered, that's where decommissioning funds become a leveraging tool that says this has to commence. Kevon added, you really need good legal council to look at decommissioning. I strongly suggest you hire an experienced attorney who has a lot of experience with wind.

Clay said, this is our 6th or 7th draft revision. We are fine tuning it toward a consensus. Probably by the next meeting we should be ready to have it reviewed by legal council. However, the language we are using has been used by other townships successfully. Do we need to go that extra step to legal council? Bob felt that they were not ready. He felt that with all the information given, the PC should look at several items such as height requirement, setback requirement, etc. He feels the PC has been too accommodating in the interest of not running into the accusation of being too restrictive. Jerry suggested a workshop before the next meeting to address Bob's concerns. Kevon said, Foster Swift brought Riga Twp. their model language with the height limits and decibels as variables. The variables were up to us as to how tall, how far away and how loud.

Jerry was of the opinion that shadow flicker is important if they come up with a way to quiet the turbine. Nicole said, they can't defy the laws of physics when the blades are moving in the air. They can make a quieter motor, but they can't quiet the air motion.

Jerry asked, if most of the noise is from the inside workings or the blades? Kevon answered, the low frequency noise is coming primarily from the rotor blades. The other frequencies are from the air (the whoosh sound) as well as from the generator itself. The employees are required to wear ear protection. Clay reiterated, that Kevon had mentioned 106.5 decibels at the site which is quite loud.

Kevon said, you have very solid framework and all you have left to decide is numbers.

L. Colletta said, the majority of the people are concerned with property values. Clay stated, that you can't write a property value protection plan into a zoning ordinance. Kevon said, property protection is essentially a tax and cannot be legislated in a zoning ordinance. Also, your ordinance should require the developers to pay for all third party testing and engineering.

Jerry asked, if the township makes any money from the wind turbines. Kevon believes that at the township level it's just about \$1,000 per turbine, per year. However, Clay would be in a better position to do the calculation. Clay said, wind turbines were reclassified as industrial personal property and exempt from paying 18 mills school operating tax and exempt from paying 6 mills State education tax. They are subject to debt retirement tax and 1/2 of the IFT, if they are under IFT. L. Colletta was surprised

that a township like Lake, that is autonomous, has to give the County the majority of the revenue.

Motion by Clay, to add budget preparation to the agenda, seconded by Nicole. All ayes. Motion carried.

The following is the Planning Commission's 2014 fiscal year budget recommendations:

Salary:	\$6,000.00
Supplies:	750.00
Consulting:	6,000.00
Legal:	3,000.00
Mileage:	500.00
Publications:	1,500.00
Education:	750.00
Total	<hr/> \$18,500.00

PC set the following regular meeting schedule for April 2014 through March 2015:

Planning Commission will meet on the 4th Wednesday of the month at 7:00 pm. With the exception of November and December 2014 which will be on the 3rd Wednesday.

Motion by Clay, to accept the proposed dates and times, seconded by Nicole. All ayes. Motion carried.

Motion by Jerry to schedule a PC workshop on Wednesday, March 5, 2014 at 7:00 pm, seconded by Bob. All ayes. Motion carried.

Motion by Clay to advise the Board of Trustees about need to fill vacancy on the Planning Commission, seconded by Bob. All ayes. Motion carried.

Future agenda items:

1. Prepare Annual Report
2. Election of Officers
3. Review by-laws
4. Capitol Improvement Plan

Motion by Clay to adjourn, seconded by Nicole. All ayes. Motion carried.

Meeting adjourned at 9:09 pm.

Minutes prepared by:
Maryanne Williams
Deputy Clerk