## <u>UTILITIES COMMITTEE MINUTES</u> <u>OF MARCH 9, 2020</u>

Municipal Council of the City of Vermilion Municipal Complex, 685 Decatur Street, Vermilion, Ohio 44089

<u>In Attendance</u>: Vermilion City Council: Steve Herron, President of Council; Monica

Stark, Council at Large; Emily Skahen, Ward One; Frank Loucka, Ward Two; Steve Holovacs, Ward Three; Barb Brady, Ward Four; Brian Holmes, Ward Five; Gwen Fisher, Certified Municipal Clerk.

Administration: Jim Forthofer, Mayor; Amy Hendricks, Finance Director; Chris Howard,

City Engineer; C. Hartung, Police Chief; Tony Valerius, Service

Director

<u>Call to Order</u>: Frank Loucka, Chairman, RESOLVED THAT this Utilities Committee

comprised of the committee of the whole does now come to order.

TOPIC ONE: Review Vermilion-on-the-Lake Sanitary Sewer System Flow

<u>Meters</u>

Last month, City Council received a Report of Observations and Summary of the Project Description. To summarize, the City placed eight Hach Flow Meters on Rowland Road, Aldrich Road, Harcourt Road, Woodridge Road, Fairfax Road, Parkland Blvd, Cummings Road, and Overlook Road.

C. Howard said he didn't receive any further questions or comments from City Council, but he did receive an email from resident Homer Taft of which he addressed below:

Question #1: Does the rain data come from Cleveland or some other place, it doesn't seem to line with the good number of the peaks?

Engineer's Response: The rainfall data was from NOAA, which is the National Oceanic and Atmospheric Administration. This is what you use when you do rainfall data. A lot of people have rain gauges in their yard, but it could be blocked by trees, wind and buildings, so usually they use NOAA because it's accepted flow data for rainfall and it measures over a 24-hour period (12 am to 12pm).

Question #2: Can the peaks that are dramatic be explained by anything other than the rain events? It seems there are some gauges that measure high when there's not a rain indication or increase over days.

Engineer's Response: Realizing that the rainfall data is one factor in the increase of I/I, you do have ground water that gets into the system and obviously the water is running towards the lake and you have sandy soils in some of the VOL area, so another contributing factor is the ground water that gets into the system, so that takes time to get into the actual network.

Question #3: It seems there are some flow meters that register at little or no increase sometimes when others are more frequently increased in unison. In addition, there appears to be point charts, so would it look differently if we did it by time during each day and chart it accordingly?

Engineer's Response: The NOAA rainfall data is based on rainfall events within a 24-hour period. The meters were recorded for 160 calendar days. When a storm event occurs at night it gets prorated over two days because your rainfall from the NOAA stops at midnight. The meters read every 15 minutes and if they look at the chart they would come up with the same answer. They just prorated per day to make it simpler to read, but they could break it down.

Question #4: Could we turn all the meters for each day against the respective flow at 100% of peak flow calculation?

Engineer's Response: This would go back to the same response as before.

Question #5: I conclude that Cummings, Rowland, Aldrich and Overlook may be the lowest for the further investigation, but could there be other issues even on streets not yet indicated? I rather assume the measurements would be the increasing flows on Edgewater at the intersections of different streets for these meters (isolated streets) and do not measure the water currently.

Engineer's Response: The City didn't measure Edgewater. They just measured eight streets that tied into Edgewater. They were getting a starting point to try to figure out I/I, and they thought these were the worst streets. They know that probably every street down there has I/I, so he thinks moving forward to the next step would be to camera the laterals and see what's getting in, and then move forward with options on repairing those laterals. Currently, the ordinance reads that anything up to the right of way is the City's responsibility and anything beyond is the private property.

C. Howard reported the City put flow meters at other eight locations and this contract will expire at the end of the month. Currently, he didn't feel it was beneficial to move the meters anywhere else until the City figures out what they're going to do to address the data they have. They can spend another \$50,000 in relocating the flow meters, but he didn't think it was beneficial at this time as they should start solving the problem.

F. Loucka asked if it would be the priority to take the two highest ones and camera that area to start off with. C. Howard said they can do that, and they could look at Rowland and Cummings. B. Brady suggested Harcourt and Aldrich. F. Loucka said as far as the data they should start with Rowland and Cummings.

Homer Taft of 3972 Edgewater thanked City Engineer Chris Howard for his work and for responding to his questions. He thanked Mr. Valerius, C. Howard, the building department and everybody for seemingly having made some impact in the neighborhood with some enforcement of some connections of storm water to

sanitary sewers. Hopefully, the city can continue this. He said he understands the data is coming from NOAA but doesn't understand where the data is being collected from. If it's Cleveland Hopkins it's a long way away. If it's another data point, then that's a different answer, so he is trying to understand where the rainfall data is being collected because he understands it's from a specific point. C. Howard said fair enough and he will investigate this. H. Taft said his guess it's Cleveland Hopkins, so the rain patterns would be different. As to Mr. Loucka's comment, he would say that from what he saw in the reports he would strongly encourage the City to look at Rowland for the supposed capacity way over; Aldrich which is high and Cummings. He would include Aldrich in particular; it's where they see problems in the neighborhood (generally at Harcourt, Woodridge and everything up to Fairfax) and then they don't see much problems until you get a good deal further down. You certainly get a significant problem down at Lansing, at least as far as overflows. He thinks the City needs to investigate that end of the street, so he would hope at the very least the City would consider finding out where all the water is going; laterals and otherwise – all the connections on those three streets.

B. Brady said the only difference is that they add the YMCA into the mix because there is a lot of hard-surface area and the water is going somewhere. Anybody that has been down there the water from the YMCA disappears. It goes into a storm sewer that is deeper than the ditches and it goes away. She knows the Service Director has said they put dye in, but did they investigate the hole; the bottom of the storm sewer is below the ditch and there are no storm sewers on Aldrich, so where is the water going. T. Valerius said there is storm sewers in front of the YMCA and the dye ended up in the ditches. B. Brady said it has to come up then to get into the ditches because if you look into the storm sewer, the storm sewer goes down 6' and the ditches are at ground level. T. Valerius noted that the dye made it all the way to Edgewater. B. Brady said there is something wrong. T. Valerius said the crews even popped the sanitary manholes downstream and didn't see anything. B. Brady said it doesn't make sense.

H. Taft said he has observed the water on the west side of Aldrich at the ditch when there were heavy rains, and the ditch at the east side of the road was full and flowing quickly, and there was virtually nothing coming under Rowland. There was a lot of water by the time you got to the end of that ditch, so very little water is coming from south of Rowland into that ditch. He thinks the inverts of those catch basins may below where that ditch is; maybe it goes over to Rowland. He doesn't think it goes into that ditch but into the sewer. He said they need to do a thorough and complete video inspection, and supposedly they're having some change at the YMCA, and they could be causing themselves a lot more fun and headaches, so he really thinks the City needs to find this out now.

C. Howard said he will get a price for televising the laterals. He asked Council which streets they want to address; Rowland, Aldrich, Cummings, or just the top four. Council said the top four. C. Howard said they can decide how to proceed based on the price.

F. Loucka adjourned the meeting after no further discussion came before the committee.
The next meeting is scheduled for April 13, 2020 at 7:00 p.m.
Gwen Fisher, Certified Municipal Clerk