Fields of Opportunities

STATE OF IOWA

TERRY E. BRANSTAD, GOVERNOR
KIM REYNOLDS, LT. GOVERNOR

DEPARTMENT OF NATURAL RESOURCES
CHUCK GIPP, DIRECTOR

September 30, 2014

Jason Craft, P.E.
City Engineer
611 S. 3rd St.
P.O. Box 2958
Clinton, IA 52733-2958

RE: Beaver Channel Interceptor Repairs
Clinton Wastewater #6-23-26-0-01

Dear Mr. Craft:

I have received and reviewed your e-mail of 9-12-2014 concerning the Beaver Channel Interceptor. This office and the Attorney General's office are in agreement with the city that the two "bottlenecks" should be eliminated to restore the original flow capacity of this trunk line.

We also note that with cleaning of this line (already completed) and eliminating the 2 bottlenecks, no other repairs on this line are necessary or being planned by the city at this time.

If you have any questions, feel free to contact me at this office.

Sincerely,

FIELD SERVICES & COMPLIANCE BUREAU

Paul Brandt

Paul Brandt
Environmental Specialist Senior

J:/pbrandt/ww/Clinton-0914-cso-ltr

xc: Records Section, DNR, Des Moines
File - Clinton Municipal

Environmental Services Division, Field Office #6, 1023 W. Madison, Washington, Iowa 52353-1623 Tel 319-653-2135 Fax 319-653-2856
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515-281-5918 TDD 515-242-5967 FAX 515-281-6794 www.iowadnr.gov

Brandt, Paul [DNR]

From: Jason Craft <jasoncraft@cityofclintoniowa.us>
Sent: Friday, September 12, 2014 4:53 PM
To: Brandt, Paul [DNR]
Cc: Dan Riney; Bob Milroy; Jane McAllister; Jessica Kinser; Dechant, David M.
Subject: Beaver Channel Interceptor Status - CLINTON IOWA
Attachments: Bottleneck #1.pdf; Bottleneck #2 Existing.pdf; Bottleneck #2.pdf

Follow Up Flag: Follow up
Flag Status: Flagged

Paul,

The purpose of this email is to update you on the status of the Beaver Channel Interceptor, as it pertains to our Consent Decree and Long Term Control Plan Implementation Schedule.

a. *The City shall commence no later than June 1, 2012, and complete no later than June 30, 2014, preliminary inspection, cleaning, televising, repairing, and quantifying flow for the Beaver Slough Trunk Sewer;*

d. *The City shall decide and notify the IDNR no later than March 1, 2014, of the City's decision whether to build a new Beaver Slough Trunk Sewer and submit to IDNR a proposed schedule for approval in writing. The approved schedule shall be enforceable as part of this Amendment to Consent Order, Judgment and Decree;*

- **The City has completed preliminary inspection and substantially completed cleaning of the sewer.**
- **Cleaning of the 54" sewer was completed earlier by July 31, 2014. Some delays were experienced due to the extreme winter weather and contractor delays.**
- **Also completed was a television report, which proved to us that substantial repairs are unnecessary. This will all be outlined in our Annual Report.**
- **Quantification of flow is underway. We have a meter placed on the Interceptor Sewer, which shows maximum flows of 7,000 gpm or less. The known capacity of the Beaver Channel Interceptor Sewer in approximately 20,000 gpm. This indicates a substantially less than full flow.**

This maximum flow of 35% of the max capacity is due to the following:

The meter is placed in a stretch of pipe directly between two "Bottlenecks", which were previously disclosed to the DNR and the Attorney General in an earlier letter. We intend to shift focus from "slip-lining" a section of the Interceptor Sewer to the re-establishment of Interceptor Capacity at these "Bottlenecks". The bottlenecks are caused by two locations in the original interceptor that have been removed and replaced with dual pipe set ups (A section of 48" pipe and 54" pipe have been replaced with 2 - 30" equivalent elliptical pipe and 2 – 36" diameter pipes, respectively). These were constructed to allow for perpendicular sewer construction above the interceptor in two areas with clearance issues. Silt and other debris have a tendency to plug one of the two pipes in each of these locations, causing a drastic reduction in capacity to the Beaver Channel Interceptor. It is of great importance to the City of Clinton that these two

bottleneck situations are fixed. At the same time, there is no apparent reason to slip line any portion of the interceptor at this time. That said, we have reallocated our resources to the re-establishment of capacity and Bottleneck elimination of the two mentioned areas along the Beaver Channel Interceptor.

The City has made the decision NOT to build the parallel Beaver Channel Interceptor. This decision was made shortly after submittal of the 2013 Annual Compliance Report. Further, the City believes it will only be necessary to restore the capacity of the Interceptor. We had previously indicated in a letter to the DNR and Attorney General that Bottlenecks would be repaired by 2017. Upon reallocation of the set aside resources for repair of the Interceptor, we will be able to construct this project much sooner than originally anticpated.

Attached you will find a rough conceptual sketch of the work that needs to be done to remove the two points of constriction. We intend to construct this project either next summer or next winter. We will likely need 3-4 weeks of low river levels combined with dry weather. The project will be bid out over this coming winter (likely February, 2015), and construction will be completed no later than March 1, 2016. If good summer weather and low river levels are experienced this summer, the project will be done substantially sooner.

Further, another positive intended consequence of this re-establishment of as-built Interceptor capacity, combined with the before mentioned cleaning, is the likelihood for less CSO events at 1st Avenue Pump Station to decrease. Though this may not be noticed immediately; after completion of the 1st Avenue Pumping Station Project in 2017/2018, we will surely see a drastic reduction in total CSO volume due to the reestablishment of Interceptor Capacity.

As stated above, there are no necessary repairs to the Interceptor Sewer at this time. The City instead wishes to allocate resources toward the reestablishment of bottlenecks along the Beaver Channel Interceptor.

Please review the attachments. If you would like to schedule a conference call at any time, I am available to discuss. Please let us know if the DNR concurs with our judgment that it is in the best interest of everyone to switch gears here and go down the correct path towards limiting CSOs.

Please acknowledge receipt of email.

Respectfully,

Jason Craft, P.E.
City Engineer
City of Clinton, Iowa
563-244-3423