

THE DYER PARTNERSHIP  
ENGINEERS & PLANNERS, INC.

September 9, 2022

Andy Peters  
Public Works Division Manager  
City of Molalla

Re: 105 Ona Way  
Statement of Capacity

Dear Andy:

In accordance with OAR 340-052-0015(3)(c), this letter serves as a statement concerning the impact of the proposed 40 residential units at 105 Ona Way on the capacity and performance of the City of Molalla's (City) collection system, Wastewater Treatment Plant (WWTP), and effluent disposal facilities. OAR 340-052-0015(3)(c) states, "Plans for a common sewer or a sewerage system submitted by a person other than the owner or joint owner of the treatment works must be accompanied by a statement from the treatment works owner that he agrees to provide sewer service and has sewerage system and treatment capacity to do so."

The Dyer Partnership previously evaluated and summarized the capacity of the existing WWTP in the April 19, 2022 Technical Memorandum, "Wastewater Treatment Plant Upgrades – WWTP Performance Evaluation." The Technical Memorandum concluded that compliance with the National Pollutant Discharge Elimination System (NPDES) permit as modified by the Mutual Agreement and Order (MAO), with flows and load contributions from an additional 214 Equivalent Dwelling Units (EDUs), is attainable based on the following conditions:

1. Influent flows and loads remain consistent with 2018 through 2021 values.
2. City continues to implement collection system improvements projects to mitigate infiltration and inflow.
3. Proper operation and maintenance activities.
4. Ongoing solids removal from the lagoons.

The proposed development at 105 Ona Way consists of an additional 40 single family residential units. Based on the United States Census Bureau, the persons per household estimate was 2.72 people/home for the time period 2016 through 2020. Raw wastewater BOD<sub>5</sub> and TSS loads are anticipated to be consistent with typical residential strength wastewater ranges. The projected flows (estimated) from the additional 40 residential homes, calculated based on per capita flows from 2018 through 2021, are summarized in Table 1.

**TABLE 1  
ADDITIONAL FLOWS<sup>1</sup>**

| <b>Parameter</b> | <b>Value (MGD)</b> |
|------------------|--------------------|
| ADWF             | 0.0066             |
| AWWF             | 0.014              |
| MMDWF            | 0.0086             |
| MMWWF            | 0.02               |
| PDAF             | 0.059              |

The residential lots associated with the 105 Ona Way development will be served by a new public sanitary sewer main. With contemporary materials and construction techniques, it is not anticipated that the new sewer will contribute significantly to infiltration and inflow rates.

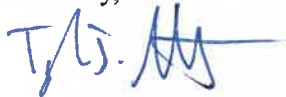
Since 2018, the City has completed several collection system improvement projects that have resulted in reduced infiltration and inflow, thereby freeing up capacity and improving the performance of the collection system and WWTP. The City has also removed biosolids from the lagoons, and addressed deficiencies with the tertiary treatment systems. Recent collection and treatment system improvements have facilitated better WWTP performance, and recovered capacity previously occupied by infiltration and inflow, solids within the lagoons, and tertiary system inefficiencies.

Based on 2018 through 2021 flows, and the 2007 WWTP Improvement design data, compliance with the NPDES permit as modified by the MAO, with flows and loads from an additional 40 EDUs, is attainable, also based on the conditions set forth in the “Wastewater Treatment Plant Upgrades – WWTP Performance Evaluation” and restated on the previous page.

In the event that per capita flows exceed those recorded during 2018 through 2021, or should precipitation be above average particularly during the months of May through October, the City may need to request an out-of-season discharge from the Oregon Department of Environmental Quality (DEQ). Above average rainfall will contribute to rain induced infiltration and inflow, which could negatively impact storage requirements within the existing lagoons, and prompt the need to discharge to the Molalla River during the summer months. In accordance with the City’s MAO, any out of season discharge not authorized by the NPDES permit that occur during the months of May, June, and October will be addressed per DEQ’s Enforcement Guidance Internal Management Directive.

Feel free to contact us if you have any questions.

Sincerely,



Tyler J. Molatore, P.E.  
The Dyer Partnership

1. ADWF – Average Dry Weather Flow, AWWF – Average Wet Weather Flow, MMDWF – Maximum Month Dry Weather Flow, MMWWF – Maximum Month Wet Weather Flow, and PDAF – Peak Day Average Flow.