



**OPTIONAL ANNUAL REPORT TEMPLATE**

|  |   |
|--|---|
| <b>Drinking-Water System Number:</b>   | 260002213                                   |
| <b>Drinking-Water System Name:</b>     | Ansnoeveldt Water Supply System             |
| <b>Drinking-Water System Owner:</b>    | Regional Municipality of York (York Region) |
| <b>Drinking-Water System Category:</b> | Small Municipal Residential                 |
| <b>Period being reported:</b>          | January 1, 2010 to December 31, 2010        |

|  |  |
|--|--|
| <p><b><u>Complete if your Category is Large Municipal Residential or Small Municipal Residential</u></b></p> <p><b>Does your Drinking-Water System serve more than 10,000 people? Yes [ ] No [ X ]</b></p> <p><b>Is your annual report available to the public at no charge on a web site on the Internet? Yes [ X ] No [ ]</b></p> <p><b>Location where Summary Report required under O. Reg. 170/03 Schedule 22 will be available for inspection.</b></p> <div style="border: 1px solid black; padding: 5px;"> <p>Regional Municipality of York<br/>             Administrative Building<br/>             Environmental Services Department<br/>             17250 Yonge Street<br/>             Newmarket, Ontario</p> </div> | <p><b><u>Complete for all other Categories.</u></b></p> <p><b>Number of Designated Facilities served:</b><br/> <input style="width: 100px; height: 20px;" type="text"/></p> <p><b>Did you provide a copy of your annual report to all Designated Facilities you serve? Yes [ ] No [ ]</b></p> <p><b>Number of Interested Authorities you report to:</b> <input style="width: 100px; height: 20px;" type="text"/></p> <p><b>Did you provide a copy of your annual report to all Interested Authorities you report to for each Designated Facility? Yes [ ] No [ ]</b></p> |
|--|--|

**Note: For the following tables below, additional rows or columns may be added or an appendix may be attached to the report**

**List all Drinking-Water Systems (if any), which receive all of their drinking water from your system:**

| <b>Drinking Water System Name</b> | <b>Drinking Water System Number</b> |
|-----------------------------------|-------------------------------------|
| Ansnoeveldt Distribution System   | 260034372                           |

**Did you provide a copy of your annual report to all Drinking-Water System owners that are connected to you and to whom you provide all of its drinking water? Yes [ X ] No [ ]**

**Indicate how you notified system users that your annual report is available, and is free of charge.**



- Public access/notice via the web**
- Public access/notice via Government Office**
- Public access/notice via a newspaper**
- Public access/notice via Public Request**
- Public access/notice via a Public Library**
- Public access/notice via other method** \_\_\_\_\_

**Describe your Drinking-Water System**

Ansnorveldt is a rural community. It is located centrally in the Holland Marsh on Dufferin Street, North of Highway #9 in the Township of King.

Water is supplied through two wells and services less than 60 homes, a school, church and a library. Water withdrawal from each of the wells is regulated by a Permit to Take Water issued by the Ministry of the Environment. York Region is the wholesale supplier of water to the community of Ansnorveldt and is responsible for the supply, production, treatment and storage of water.

Water treatment for the Ansnorveldt wells includes the addition of chlorine for disinfection. The water from the wells combine, it is treated then pumped into a shallow concrete reservoir. High lift pumps deliver the water to the distribution system.

The Township of King owns and operates the distribution system that delivers the water from the regional watermains to homes in Ansnorveldt.

**List all water treatment chemicals used over this reporting period**

Sodium Hypochlorite 12%

**Were any significant expenses incurred to?**

- Install required equipment
- Repair required equipment
- Replace required equipment

**Please provide a brief description and a breakdown of monetary expenses incurred**

Some of the following expenditures represent only part of the total project costs.



**Provide details on the notices submitted in accordance with subsection 18(1) of the Safe Drinking-Water Act or section 16-4 of Schedule 16 of O.Reg.170/03 and reported to Spills Action Centre**

| Incident Date    | Parameter       | Result | Unit of Measure | Corrective Action   | Corrective Action Date |
|------------------|-----------------|--------|-----------------|---|------------------------|
| August 4, 2010   | System Pressure | 5      | psi             | Caused by local power outage.   | August 4, 2010         |
| August 10, 2010  | System Pressure | 0      | Psi             | Power outage knocked out high lift pumps. Reset pumps restored pressure | August 10, 2010        |
| October 27, 2010 | System Pressure | 15     | psi             | Caused by local power outage  | October 27, 2010       |

**Microbiological testing done under the Schedule 10, 11 or 12 of Regulation 170/03, during this reporting period.**

|              | Number of Samples | Range of E.Coli Or Fecal Results (min #)-(max #) | Range of Total Coliform Results (min #)-(max #) | Number of HPC Samples | Range of HPC Results (min #)-(max #) |
|--------------|-------------------|--|---|-----------------------|--------------------------------------|
| Raw          | 104               | 0  | 0   |                       |                                      |
| Treated      | 52                | 0  | 0   | 52                    | 1-130                                |
| Distribution |                   |  |   |                       |                                      |

**Operational testing done under Schedule 7, 8 or 9 of Regulation 170/03 during the period covered by this Annual Report.**

|   | Number of Grab Samples | Range of Results (min #)-(max #) |
|---|------------------------|----------------------------------|
| Turbidity (Treated)                         | 8760                   | 0.043 – 0.843                    |
| Turbidity (Raw)                             | 24                     | 0.29 – 0.83                      |
| Chlorine                                    | 8760                   | 0.374 – 3.680                    |
| Fluoride (If the DWS provides fluoridation) |                        |                                  |

*NOTE: For continuous monitors use 8760 as the number of samples.*

*NOTE: Record the unit of measure if it is not milligrams per litre.*

**Summary of additional testing and sampling carried out in accordance with the requirement of an approval, order or other legal instrument.**

| Date of legal instrument issued | Parameter | Date Sampled | Result | Unit of Measure |
|---------------------------------|-----------|--------------|--------|-----------------|
|                                 |           |              |        |                 |
|                                 |           |              |        |                 |



**Summary of Inorganic parameters tested during this reporting period or the most recent sample results**

**Note: See attached results for Inorganic parameters**

| Parameter | Sample Date | Result Value | Unit of Measure | Exceedance |
|-----------|-------------|--------------|-----------------|------------|
| Antimony  |             |              |                 |            |
| Arsenic   |             |              |                 |            |
| Barium    |             |              |                 |            |
| Boron     |             |              |                 |            |
| Cadmium   |             |              |                 |            |
| Chromium  |             |              |                 |            |
| Lead      |             |              |                 |            |
| Mercury   |             |              |                 |            |
| Selenium  |             |              |                 |            |
| Sodium    |             |              |                 |            |
| Uranium   |             |              |                 |            |
| Fluoride  |             |              |                 |            |
| Nitrite   |             |              |                 |            |
| Nitrate   |             |              |                 |            |

**Summary of lead testing under Schedule 15.1 during this reporting period**

(applicable to the following drinking water systems; large municipal residential systems, small municipal residential systems, and non-municipal year-round residential systems)

| Location Type | Number of Samples | Range of Lead Results<br>(min#) – (max #) | Number of Exceedances |
|---------------|-------------------|---|-----------------------|
| Plumbing      |                   |   |                       |
| Distribution  |                   |   |                       |

**Summary of Organic parameters sampled during this reporting period or the most recent sample results**

**Note: See attached results for Organic parameters (THM value in table below)**

| Parameter                            | Sample Date | Result Value | Unit of Measure | Exceedance |
|--------------------------------------|-------------|--------------|-----------------|------------|
| Alachlor                             |             |              |                 |            |
| Aldicarb                             |             |              |                 |            |
| Aldrin + Dieldrin                    |             |              |                 |            |
| Atrazine + N-dealkylated metabolites |             |              |                 |            |
| Azinphos-methyl                      |             |              |                 |            |
| Bendiocarb                           |             |              |                 |            |



|   |  |       |      |  |
|---|--|-------|------|--|
| Benzene   |  |       |      |  |
| Benzo(a)pyrene  |  |       |      |  |
| Bromoxynil  |  |       |      |  |
| Carbaryl  |  |       |      |  |
| Carbofuran  |  |       |      |  |
| Carbon Tetrachloride  |  |       |      |  |
| Chlordane (Total)   |  |       |      |  |
| Chlorpyrifos  |  |       |      |  |
| Cyanazine   |  |       |      |  |
| Diazinon  |  |       |      |  |
| Dicamba   |  |       |      |  |
| 1,2-Dichlorobenzene   |  |       |      |  |
| 1,4-Dichlorobenzene   |  |       |      |  |
| Dichlorodiphenyltrichloroethane (DDT) + metabolites                   |  |       |      |  |
| 1,2-Dichloroethane  |  |       |      |  |
| 1,1-Dichloroethylene (vinylidene chloride)                            |  |       |      |  |
| Dichloromethane   |  |       |      |  |
| 2,4 Dichlorophenol  |  |       |      |  |
| 2,4-Dichlorophenoxy acetic acid (2,4-D)                               |  |       |      |  |
| Diclofop-methyl   |  |       |      |  |
| Dimethoate  |  |       |      |  |
| Dinoseb   |  |       |      |  |
| Diquat  |  |       |      |  |
| Diuron  |  |       |      |  |
| Glyphosate  |  |       |      |  |
| Heptachlor + Heptachlor Epoxide                                       |  |       |      |  |
| Lindane (Total)   |  |       |      |  |
| Malathion   |  |       |      |  |
| Methoxychlor  |  |       |      |  |
| Metolachlor   |  |       |      |  |
| Metribuzin  |  |       |      |  |
| Monochlorobenzene   |  |       |      |  |
| Paraquat  |  |       |      |  |
| Parathion   |  |       |      |  |
| Pentachlorophenol   |  |       |      |  |
| Phorate   |  |       |      |  |
| Picloram  |  |       |      |  |
| Polychlorinated Biphenyls(PCB)  |  |       |      |  |
| Prometryne  |  |       |      |  |
| Simazine  |  |       |      |  |
| THM<br>(NOTE: show latest annual average)<br>Ansnorveldt Wells #1 & 2 |  | 0.047 | Mg/L |  |



|  |  |  |  |  |
|--|--|--|--|--|
| Temephos                                     |  |  |  |  |
| Terbufos                                     |  |  |  |  |
| Tetrachloroethylene                          |  |  |  |  |
| 2,3,4,6-Tetrachlorophenol                    |  |  |  |  |
| Triallate                                    |  |  |  |  |
| Trichloroethylene                            |  |  |  |  |
| 2,4,6-Trichlorophenol                        |  |  |  |  |
| 2,4,5-Trichlorophenoxy acetic acid (2,4,5-T) |  |  |  |  |
| Trifluralin                                  |  |  |  |  |
| Vinyl Chloride                               |  |  |  |  |

York Region monitors another group of disinfection by-products called haloacetic acids (HAAs). There are no limits set for HAAs in Ontario Drinking Water Standards.

| Haloacetic acid        | Wells #1 and #2<br>Mg/L<br>June 30 |
|------------------------|------------------------------------|
| Bromochloroacetic acid | 0.005                              |
| Dibromoacetic acid     | 0.006                              |
| Dichloroacetic acid    | 0.004                              |
| Monobromoacetic acid   | 0.004                              |
| Monochloroacetic acid  | 0.02                               |
| Trichloroacetic acid   | 0.004                              |

“<” indicates the result is below the Method Detection Limit

List any Inorganic or Organic parameter(s) that exceeded half the standard prescribed in Schedule 2 of Ontario Drinking Water Quality Standards.

| Parameter | Result Value | Unit of Measure | Date of Sample |
|-----------|--------------|-----------------|----------------|
|           |              |                 |                |
|           |              |                 |                |

(Only if DWS category is large municipal residential, small municipal residential, large municipal non residential, non municipal year round residential, large non municipal non residential)



Inorganics Test Results

| Reading                | Units | ODWS  |      | 18/01/2010 | 12/04/2010 | 21/07/2010 | 25/10/2010 |
|------------------------|-------|-------|------|------------|------------|------------|------------|
| Antimony as Sb         | mg/L  | 0.006 | IMAC | 0.0004     | 0.0002     | 0.0005     | 0.0006     |
| Arsenic as As          | mg/L  | 0.025 | IMAC | 0.0004     | 0.0004     | 0.0003     | 0.0003     |
| Barium as Ba           | mg/L  | 1     | MAC  |            | 0.134      |            |            |
| Boron as B             | mg/L  | 5     | IMAC |            | 0.155      |            |            |
| Cadmium as Cd          | mg/L  | 0.005 | MAC  | 0.0001     | < 0.0001   | < 0.0001   | < 0.0001   |
| Chromium as Cr         | mg/L  | 0.05  | MAC  | < 0.0001   | < 0.0001   | < 0.0001   | 0.0001     |
| Fluoride as F          | mg/L  | 1.5   | MAC  | 0.271      | 0.222      | 0.22       | 0.2        |
| Lead as Pb             | mg/L  | 0.01  | MAC  | 0.0002     | 0.0002     | 0.0001     | < 0.0001   |
| Mercury as Hg          | mg/L  | 0.001 | MAC  |            | < 0.00002  |            |            |
| Nitrate + Nitrite as N | mg/L  | 10    | MAC  | 0.02       | 0.02       | 0.012      | 0.013      |
| Nitrate as N           | mg/L  | 10    | MAC  | 0.019      | 0.015      | 0.012      | 0.013      |
| Nitrite                | mg/L  | 1     | MAC  | < 0.002    | < 0.002    | < 0.002    | < 0.002    |
| Selenium as Se         | mg/L  | 0.01  | MAC  | 0.0009     | 0.001      | 0.0009     | 0.001      |
| Sodium as Na           | mg/L  | 200   | AO   | 40.6       | 40.1       | 40.6       | 39.4       |
| Uranium as U           | mg/L  | 0.02  | MAC  |            | < 0.0001   |            |            |

"<": indicates the result is below Method Detection Limit  
 ODWS: Ontario Drinking Water Standard  
 MAC: Ontario Drinking Water Standard - Health Related (Maximum Acceptable Concentration)  
 AO: Ontario Drinking Water Standard - Non Health Related (Aesthetic Objective)  
 mg/L: milligrams per litre, parts permillion (ppm)



Organics Test Results

| Reading                                     | Units | ODWS    | 18/01/2010 | 12/04/2010 | 21/07/2010 | 11/08/2010 | 25/10/2010 |
|---|-------|---------|------------|------------|------------|------------|------------|
| (DDT) + Metabolites                         | mg/L  | 0.03    | MAC        |            | < 0.000008 |            |            |
| 1,1-dichloroethylene (vinylidene chloride)  | mg/L  | 0.014   | MAC        | < 0.0003   | < 0.0003   | < 0.0003   | < 0.0003   |
| 1,2-(o-dcb) Dichlorobenzene                 | mg/L  | 0.2     | MAC        | < 0.0001   | < 0.0001   | < 0.0001   | < 0.0001   |
| 1,2-Dichloroethane                          | mg/L  | 0.005   | IMAC       | < 0.0001   | < 0.0001   | < 0.0001   | < 0.0001   |
| 1,4-(p-dcb) Dichlorobenzene                 | mg/L  | 0.005   | MAC        | < 0.0001   | < 0.0001   | < 0.0001   | < 0.0001   |
| 2,3,4,6-Tetrachlorophenol                   | mg/L  | 0.1     | MAC        |            |            | < 0.0005   |            |
| 2,4,5-trichlorophenoxyacetic acid (2,4,5-T) | mg/L  | 0.28    | MAC        |            |            | < 0.0005   |            |
| 2,4,6-Trichlorophenol                       | mg/L  | 0.005   | MAC        |            |            | < 0.0005   |            |
| 2,4-Dichlorophenol                          | mg/L  | 0.9     | MAC        |            |            | < 0.0007   |            |
| 2,4-dichlorophenoxyacetic acid (2,4-D)      | mg/L  | 0.1     | IMAC       |            |            | < 0.0008   |            |
| Alachlor                                    | mg/L  | 0.005   | IMAC       |            |            | < 0.0004   |            |
| Aldicarb                                    | mg/L  | 0.009   | MAC        |            |            |            | < 0.0045   |
| Aldrin + Dieldrin                           | mg/L  | 0.0007  | MAC        |            |            | < 0.000006 |            |
| Atrazine + N-dealkylated metabolites        | mg/L  | 0.005   | IMAC       |            |            | < 0.0002   |            |
| Azinphos-methyl                             | mg/L  | 0.02    | MAC        |            |            | < 0.0003   |            |
| Bendiocarb                                  | mg/L  | 0.04    | MAC        |            |            |            | < 0.003    |
| Benzene                                     | mg/L  | 0.005   | MAC        | < 0.0001   | < 0.0001   | < 0.0001   | < 0.0001   |
| Benzo(a)pyrene                              | mg/L  | 0.00001 | MAC        |            |            | < 0.00001  |            |
| Bromoxynil                                  | mg/L  | 0.005   | IMAC       |            |            | < 0.0004   |            |
| Carbaryl                                    | mg/L  | 0.09    | MAC        |            |            |            | < 0.003    |
| Carbofuran                                  | mg/L  | 0.09    | MAC        |            |            |            | < 0.003    |
| Carbon Tetrachloride                        | mg/L  | 0.005   | MAC        | < 0.0002   | < 0.0002   | < 0.0002   | < 0.0002   |
| Chlordane (Total)                           | mg/L  | 0.007   | MAC        |            |            | < 0.000006 |            |
| Chlorpyrifos                                | mg/L  | 0.09    | MAC        |            |            | < 0.0002   |            |
| Cyanazine                                   | mg/L  | 0.01    | IMAC       |            |            | < 0.0003   |            |
| Diazinon                                    | mg/L  | 0.02    | MAC        |            |            | < 0.0002   |            |
| Dicamba                                     | mg/L  | 0.12    | MAC        |            |            | < 0.0004   |            |
| Dichloromethane                             | mg/L  | 0.05    | MAC        | < 0.0005   | < 0.0005   | < 0.0005   | < 0.0005   |
| Diclofop-methyl                             | mg/L  | 0.009   | MAC        |            |            | < 0.0004   |            |
| Dimethoate                                  | mg/L  | 0.02    | IMAC       |            |            | < 0.0003   |            |
| Dinoseb                                     | mg/L  | 0.01    | MAC        |            |            | < 0.0005   |            |
| Diquat                                      | mg/L  | 0.07    | MAC        |            |            |            | < 0.001    |
| Diuron                                      | mg/L  | 0.15    | MAC        |            |            | < 0.003    |            |
| Glyphosate                                  | mg/L  | 0.28    | IMAC       |            |            | < 0.025    |            |
| Heptachlor + Heptachlor Epoxide             | mg/L  | 0.003   | MAC        |            |            | < 0.000008 |            |
| Lindane                                     | mg/L  | 0.004   | MAC        |            |            | < 0.000005 |            |
| Malathion                                   | mg/L  | 0.19    | MAC        |            |            | < 0.0002   |            |
| Methoxychlor                                | mg/L  | 0.9     | MAC        |            |            | < 0.000009 |            |
| Metolachlor                                 | mg/L  | 0.05    | IMAC       |            |            | < 0.0002   |            |
| Metribuzin                                  | mg/L  | 0.08    | MAC        |            |            | < 0.0003   |            |
| Monochlorobenzene                           | mg/L  | 0.08    | MAC        | < 0.0001   | < 0.0001   | < 0.0001   | < 0.0001   |
| Paraquat                                    | mg/L  | 0.01    | IMAC       |            |            |            | < 0.001    |
| Parathion                                   | mg/L  | 0.05    | MAC        |            |            | < 0.0002   |            |



Organics Test Results

| Reading                                 | Units | ODWS  |      | 18/01/2010 | 12/04/2010 | 21/07/2010 | 11/08/2010 | 25/10/2010 |
|---|-------|-------|------|------------|------------|------------|------------|------------|
| Pentachlorophenol                       | mg/L  | 0.06  | MAC  |            |            | < 0.0004   |            |            |
| Phorate                                 | mg/L  | 0.002 | IMAC |            |            | < 0.0002   |            |            |
| Picloram                                | mg/L  | 0.19  | IMAC |            |            | < 0.0007   |            |            |
| Polychlorinated Biphenyls (PCBs)        | mg/L  | 0.003 | IMAC |            |            | < 0.00002  |            |            |
| Prometryne                              | mg/L  | 0.001 | IMAC |            |            | < 0.0002   |            |            |
| Simazine                                | mg/L  | 0.01  | IMAC |            |            | < 0.0002   |            |            |
| Temephos                                | mg/L  | 0.28  | IMAC |            |            | < 0.003    |            |            |
| Terbufos                                | mg/L  | 0.001 | IMAC |            |            | < 0.0002   |            |            |
| Tetrachloroethylene (perchloroethylene) | mg/L  | 0.03  | MAC  | < 0.0003   | < 0.0003   | < 0.0003   |            | < 0.0003   |
| Triallate                               | mg/L  | 0.23  | MAC  |            |            |            | < 0.004    |            |
| Trichloroethene                         | mg/L  | 0.005 | MAC  | < 0.0001   | < 0.0001   | < 0.0001   |            | < 0.0001   |
| Trifluralin                             | mg/L  | 0.045 | IMAC |            |            | < 0.000006 |            |            |
| Vinyl Chloride                          | mg/L  | 0.002 | MAC  | < 0.0002   | < 0.0002   | < 0.0002   |            | < 0.0002   |

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 AO: Ontario Drinking Water Standard - Non Health Related (Aesthetic Objective)  
 mg/L: milligrams per litre, parts permillion (ppm)