

Boonoo Boonoo Monitoring Point 3

| Analyte                 | Unit   | PQL   | Date Sampled          |                       |                       |                       |                       |                       |                         |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | Min Since<br>10/12/2013 | Mean Since<br>10/12/2013 | Max Since<br>10/12/2013 |
|-------------------------|--------|-------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-------------------------|--------------------------|-------------------------|
|                         |        |       | 10/12/2013            | 3/3/2014              | 25/07/14              | 9/9/2014              | 4/12/2014             | 10/03/2015            | 23/6/2015               | 15/09/2015            | 08/12/2015            | 15/03/2016            | 21/6/2016             | 8/11/2016             | 5/12/2016             | 28/03/2017            | 8/06/2017             | 7/09/2017             | 13/12/2017            | 3/04/2018             | 15/06/2018            | 28/09/2018            | 26/10/2018            | 19/06/2019            | 13/12/2019            | 1/04/2020             |                         |                          |                         |
|                         |        |       | Sample No.<br>13/2166 | Sample No.<br>14/0376 | Sample No.<br>14/1200 | Sample No.<br>14/1552 | Sample No.<br>14/2042 | Sample No.<br>15/0422 | Sample No.<br>15/0997-1 | Sample No.<br>15/1497 | Sample No.<br>15/1980 | Sample No.<br>16/0424 | Sample No.<br>16/0996 | Sample No.<br>16/1802 | Sample No.<br>16/1969 | Sample No.<br>17/0521 | Sample No.<br>17/0935 | Sample No.<br>17/1480 | Sample No.<br>17/2051 | Sample No.<br>18/0542 | Sample No.<br>18/0940 | Sample No.<br>18/1489 | Sample No.<br>18/1650 | Sample No.<br>19/1019 | Sample No.<br>19/2129 | Sample No.<br>20/0583 |                         |                          |                         |
| Water Level#            | m      | 0.1   | 1.6                   | 1.9                   | 1.95                  | 1.8                   | 2.5                   | 2                     | 2.05                    | 1.9                   | 2.3                   | 2.9                   | 1.4                   | 0.21                  | 2.8                   | 1.4                   | 2                     | 2.8                   | 2.2                   | 3                     | Dry                   | Dry                   | 3                     | Dry                   | Dry                   | Dry                   | 0.21                    | 2.090                    | 3                       |
| Temperature - field     | Deg. C | 0.1   | 17.9                  | 17.4                  | 11                    | 11                    | 17.4                  | 17.9                  | 11.8                    | 10.5                  | 16.5                  | 18.2                  | 12                    | 12.9                  | 16.3                  | 20.7                  | 11.4                  | 9.1                   | 177                   | 20                    | 0                     | 0                     | 16                    | 0                     | 0                     | 0                     | 0                       | 22.250                   | 177                     |
| Dissolved Oxygen        | mg/L   | 0.2   | 5.7                   | 6.1                   | 7.38                  | 7.15                  | 5                     | 6                     | 8.7                     | 5.6                   | 6.4                   | 5.5                   | 8.7                   | 6.3                   | 7.1                   | 6.8                   | 6.4                   | 9.94                  | 7.1                   | 8.3                   | 0                     | 0                     | 6.2                   | 0                     | 0                     | 0                     | 0                       | 6.519                    | 9.94                    |
| Alkalinity (as CaCO3)   | mg/L   | 20    | <20                   | <20                   | <20                   | <20                   | <20                   | <20                   | <20                     | <20                   | 25                    | <20                   | <20                   | <20                   | <20                   | <20                   | 662                   | <20                   | <20                   | <20                   | 0                     | 0                     | 28                    | 0                     | 0                     | 0                     | 0                       | 178.750                  | 662                     |
| Aluminium (Dissolved)   | mg/L   | 0.005 | 0.01                  | 0.008                 | 0.021                 | 0.264                 | 0.014                 | 0.15                  | 0.077                   | 0.033                 | 0.31                  | 0.15                  | 7.64                  | 1.16                  | 0.37                  | 0.93                  | 0.22                  | 0.11                  | 3.52                  | 0.56                  | 0                     | 0                     | 6.21                  | 0                     | 0                     | 0                     | 0                       | 1.088                    | 7.64                    |
| Ammonia-N               | mg/L   | 0.01  | 0.02                  | 0.09                  | 0.04                  | 0.09                  | <0.01                 | 0.04                  | 0.02                    | 0.01                  | 0.02                  | 0.01                  | 0.02                  | 0.01                  | <0.01                 | <0.01                 | 53.1                  | <0.01                 | <0.01                 | 0.1                   | 0                     | 0                     | 0.02                  | 0                     | 0                     | 0                     | 0                       | 3.573                    | 53.1                    |
| Arsenic (Dissolved)     | mg/L   | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                  | 0.008                 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0.005                 | <0.005                | <0.005                | <0.005                | 0                     | 0                     | <0.005                | 0                     | 0                     | 0                     | 0                       | 0.004                    | 0.008                   |
| Cadmium (Dissolved)     | mg/L   | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                  | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0                     | 0                     | <0.005                | 0                     | 0                     | 0                     | 0                       | 0.000                    | 0                       |
| Calcium                 | mg/L   | 0.1   | 0.7                   | 0.6                   | 0.9                   | 2.2                   | 0.9                   | 1.4                   | 1                       | 3.6                   | 3.7                   | 4.4                   | 1.7                   | 3.4                   | 3.5                   | 2                     | 38.2                  | 1.7                   | 2.5                   | 1.7                   | 0                     | 0                     | 1.4                   | 0                     | 0                     | 0                     | 3.775                   | 38.2                     |                         |
| Chloride                | mg/L   | 2     | 8.51                  | 7.74                  | 8.32                  | 14.31                 | 8                     | 13                    | 11                      | 33                    | 32                    | 30                    | 7                     | 27                    | 34                    | 8                     | 321                   | 20                    | 14                    | 20                    | 0                     | 0                     | 1.1                   | 0                     | 0                     | 0                     | 0                       | 30.899                   | 321                     |
| Chromium (Total)        | mg/L   | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                  | <0.005                | <0.005                | 0.018                 | <0.005                | <0.005                | 0.01                  | <0.005                | 0.047                 | <0.005                | <0.005                | <0.005                | 0                     | 0                     | <0.005                | 0                     | 0                     | 0                     | 0                       | 0.019                    | 0.047                   |
| Cobalt (Dissolved)      | mg/L   | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                  | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0.005                 | <0.005                | 0.005                 | <0.005                | 0                     | 0                     | <0.005                | 0                     | 0                     | 0                     | 0                       | 0.003                    | 0.005                   |
| Electrical Conductivity | µS/cm  | 1     | 64.6                  | 56.5                  | 58.1                  | 86                    | 75                    | 69.4                  | 71                      | 10                    | 150                   | 130                   | 73                    | 123                   | 113                   | 74.3                  | 2350                  | 91.6                  | 83.6                  | 96.9                  | 0                     | 0                     | 51.6                  | 0                     | 0                     | 0                     | 0                       | 191.380                  | 2350                    |
| Copper (Dissolved)      | mg/L   | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                  | 0.025                 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0                     | 0                     | 0.013                 | 0                     | 0                     | 0                     | 0                       | 0.013                    | 0.025                   |
| Iron (Total)            | mg/L   | 0.005 | 0.068                 | 0.112                 | 0.377                 | 1.78                  | 0.81                  | 1.4                   | 0.09                    | 2.38                  | 1.74                  | 15                    | 5.38                  | 3.7                   | 14.1                  | 0.89                  | 0.43                  | 4.4                   | 2.9                   | 2.1                   | 0                     | 0                     | 3.9                   | 0                     | 0                     | 0                     | 0                       | 3.078                    | 15                      |
| Lead (Dissolved)        | mg/L   | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                  | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0.007                 | <0.005                | 0.018                 | <0.005                | <0.005                | 0                     | 0                     | 0.006                 | 0                     | 0                     | 0                     | 0                       | 0.008                    | 0.018                   |
| Magnesium               | mg/L   | 0.1   | 0.5                   | 0.5                   | 0.6                   | 1.3                   | 0.6                   | 0.9                   | 0.6                     | 2                     | 2.1                   | 3.3                   | 1                     | 1.9                   | 2.7                   | 1.6                   | 16.5                  | 1.4                   | 1.6                   | 1.2                   | 0                     | 0                     | 1.1                   | 0                     | 0                     | 0                     | 0                       | 2.070                    | 16.5                    |
| Manganese (Total)       | mg/L   | 0.005 | 0.006                 | 0.007                 | 0.015                 | 0.054                 | 0.015                 | 0.033                 | 0.009                   | 0.12                  | 0.11                  | 0.13                  | 0.016                 | 0.11                  | 0.15                  | 0.081                 | 0.1                   | 0.092                 | 0.12                  | 0.063                 | 0                     | 0                     | 0.067                 | 0                     | 0                     | 0                     | 0                       | 0.065                    | 0.15                    |
| Mercury (dissolved)*    | ug/L   | 0.05  | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.058                  | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | <0.05                 | 0                     | 0                     | <0.05                 | 0                     | 0                     | 0                     | 0                       | 0.000                    | 0                       |

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|---------------------------|------|-------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-------------------------|--------------------------|-------------------------|
|                           |      |       | 10/12/2013            | 3/3/2014              | 25/07/14              | 9/9/2014              | 4/12/2014             | 10/03/2015            | 23/6/2015               | 15/09/2015            | 08/12/2015            | 15/03/2016            | 21/6/2016             | 8/11/2016             | 5/12/2016             | 28/03/2017            | 8/06/2017             | 7/09/2017             | 13/12/2017            | 3/04/2018             | 15/06/2018            | 28/09/2018            | 26/10/2018            | 19/06/2019            | 13/12/2019            | 1/04/2020             |                         |                          |                         |
|                           |      |       | Sample No.<br>13/2166 | Sample No.<br>14/0376 | Sample No.<br>14/1200 | Sample No.<br>14/1552 | Sample No.<br>14/2042 | Sample No.<br>15/0422 | Sample No.<br>15/0997-1 | Sample No.<br>15/1497 | Sample No.<br>15/1980 | Sample No.<br>16/0424 | Sample No.<br>16/0996 | Sample No.<br>16/1802 | Sample No.<br>16/1969 | Sample No.<br>17/0521 | Sample No.<br>17/0935 | Sample No.<br>17/1480 | Sample No.<br>17/2051 | Sample No.<br>18/0542 | Sample No.<br>18/0940 | Sample No.<br>18/1489 | Sample No.<br>18/1650 | Sample No.<br>19/1019 | Sample No.<br>19/2129 | Sample No.<br>20/0583 |                         |                          |                         |
| Nickel (Dissolved)        | mg/L | 0.005 | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0.008                 | <0.005                  | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | <0.005                | 0.015                 | <0.005                | <0.005                | <0.005                | 0                     | 0                     | <0.005                | 0                     | 0                     | 0                     | 0                     | 0                       | 0.008                    | 0.015                   |
| Nitrogen - Nitrate-N      | mg/L | 0.05  | 0.31                  | 0.49                  | 0.23                  | 0.13                  | 0.25                  | 0.12                  | 0.18                    | <0.05                 | <0.05                 | 0.07                  | 1.3                   | <0.05                 | <0.05                 | 0.28                  | <0.05                 | <0.05                 | 0.21                  | 0.1                   | 0                     | 0                     | <0.05                 | 0                     | 0                     | 0                     | 0                       | 0.282                    | 1.3                     |
| Nitrogen - Nitrite-N      | mg/L | 0.01  | <0.01                 | <0.01                 | <0.01                 | 0.01                  | <0.01                 | <0.01                 | <0.01                   | <0.01                 | <0.01                 | <0.01                 | 0.03                  | <0.01                 | <0.01                 | <0.01                 | 0.03                  | <0.01                 | <0.01                 | 0.03                  | 0                     | 0                     | <0.01                 | 0                     | 0                     | 0                     | 0                       | 0.020                    | 0.03                    |
| Nitrogen - Total Kjeldahl | mg/L | 0.1   | 0.2                   | 0.1                   | 0.1                   | 1                     | 0.2                   | 0.6                   | 0.7                     | 0.2                   | <0.1                  | 2                     | 1.1                   | 0.7                   | 0.4                   | 1.8                   | 53.1                  | 0.5                   | 1                     | 0.3                   | 0                     | 0                     | 0.8                   | 0                     | 0                     | 0                     | 0                       | 3.411                    | 53.1                    |
| pH                        | pH   | 0.1   | 5.5                   | 5.6                   | 5.65                  | 5.6                   | 5.4                   | 5.8                   | 5.6                     | 5.5                   | 5.6                   | 5.2                   | 5.5                   | 5.5                   | 5.4                   | 5.5                   | 8.1                   | 5.5                   | 5.6                   | 5.7                   | 0                     | 0                     | 5.5                   | 0                     | 0                     | 0                     | 0                       | 5.388                    | 8.1                     |
| Potassium                 | mg/L | 0.1   | 1.5                   | 1.2                   | 1.7                   | 3.9                   | 1.6                   | 2.5                   | 1.6                     | 2.2                   | 3.7                   | 6.4                   | 2.2                   | 3.7                   | 6.4                   | 3.9                   | 117                   | 2.8                   | 3.5                   | 2.5                   | 0                     | 0                     | 2.3                   | 0                     | 0                     | 0                     | 0                       | 8.530                    | 117                     |
| Redox Potential#          | mV   | -500  | 316                   | 302                   | 286                   | 363                   | 189                   | 208                   | 220                     | 222                   | 159                   | 282                   | 381                   | 346                   | 427                   | 331                   | 144                   | 328                   | 212                   | 193                   | 0                     | 0                     | 210                   | 0                     | 0                     | 0                     | 0                       | 255.950                  | 427                     |
| Sodium                    | mg/L | 0.15  | 8.8                   | 7.1                   | 9.9                   | 11.8                  | 9                     | 11                    | 10                      | 18                    | 19                    | 20                    | 11                    | 15.8                  | 16.8                  | 7.9                   | 288                   | 12.9                  | 10.6                  | 15.5                  | 0                     | 0                     | 7                     | 0                     | 0                     | 0                     | 0                       | 25.505                   | 288                     |
| Sulphate#                 | mg/L | 2     | <2                    | <2                    | <2                    | <2                    | <2                    | <2                    | <2                      | <1                    | 3                     | 1                     | 8                     | 3.2                   | 5.1                   | 7.1                   | 1.4                   | 4.1                   | 3.6                   | 1.6                   | 0                     | 0                     | 5.6                   | 0                     | 0                     | 0                     | 0                       | 3.642                    | 8                       |
| Total Organic Carbon*     | mg/L | 1     | 2                     | <1                    | 2                     | 2                     | 2                     | 1                     | <1                      | 2                     | 5                     | 29                    | 15                    | 6                     | 11                    | 21                    | 98                    | 17                    | 7                     | 6                     | 0                     | 0                     | 9                     | 0                     | 0                     | 0                     | 0                       | 13.056                   | 98                      |
| Zinc (Total)              | mg/L | 0.005 | 0.018                 | 0.008                 | 0.013                 | 0.013                 | 0.007                 | 0.024                 | 0.016                   | 0.017                 | 0.056                 | 0.12                  | 0.034                 | 0.038                 | 0.12                  | 0.32                  | 0.032                 | 0.061                 | 0.082                 | 0.078                 | 0                     | 0                     | 0.095                 | 0                     | 0                     | 0                     | 0                       | 0.058                    | 0.32                    |
| PAHs in water*            | µg/L | 1     | [ND]                  | [ND]                  | [ND]                  | <5                    | [ND]                  | ND                    | ND                      | <5                    | <5                    | ND                    | ND                    | ND                    | ND                    | ND                    | ND                    | ND                    | ND                    | ND                    | 0                     | 0                     | ND                    | 0                     | 0                     | 0                     | 0                       | 0.000                    | 0                       |
| TRH C10-C14*              | µg/L | 50    | <50                   |                       | <50                   | <50                   |                       | ND                    | <50                     | <50                   | <50                   | <50                   | <50                   | <50                   | <50                   | ND                    | 63                    | ND                    | ND                    | ND                    | 0                     | 0                     | ND                    | 0                     | 0                     | 0                     | 0                       | 31.500                   | 63                      |
| TRH C15-C28*              | µg/L | 100   | 220                   |                       | <100                  | <100                  |                       | ND                    | <100                    | <100                  | <100                  | 220                   | <100                  | <100                  | <100                  | ND                    | 120                   | ND                    | ND                    | ND                    | 0                     | 0                     | ND                    | 0                     | 0                     | 0                     | 0                       | 140.000                  | 220                     |
| TRH C29-C36*              | µg/L | 100   | <100                  |                       | <100                  | <100                  |                       | ND                    | <100                    | <100                  | <100                  | <100                  | <100                  | <100                  | <100                  | ND                    | <100                  | ND                    | ND                    | ND                    | 0                     | 0                     | ND                    | 0                     | 0                     | 0                     | 0                       | 0.000                    | 0                       |
| TRH C10-C36*              | µg/L | 100   |                       | [ND]                  |                       |                       |                       |                       | <100                    |                       |                       |                       |                       |                       |                       | ND                    |                       |                       |                       |                       | 0                     | 0                     | <100                  | 0                     | 0                     | 0                     | 0                       | 0.000                    | 0                       |
| Suspended Solids          | mg/L | 1     |                       |                       |                       |                       |                       |                       |                         |                       |                       |                       |                       |                       |                       | 19                    |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                         |                          |                         |
| Alkalinity - Hydroxide    | mg/L | 0     |                       |                       |                       | 0                     | 0                     | 0                     | 0                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 0                     | 0                     |                       | 0                     | 0                     | 0                     | 0                       | 0.000                    | 0                       |
| Chromium (VI)             | mg/L | 0.05  |                       |                       | <0.05                 |                       |                       |                       |                         |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 0                     | 0                     |                       | 0                     | 0                     | 0                     | <0.05                   | <0.05                    | <0.05                   |
| OC/OP in Water*           | ug/L | 0.2   | <0.2                  | <0.2                  |                       | <0.2                  |                       |                       |                         |                       |                       |                       |                       |                       |                       |                       | <0.2                  |                       |                       |                       | 0                     | 0                     |                       | 0                     | 0                     | 0                     | <0.2                    | <0.2                     | <0.2                    |
| Date Obtained             |      |       | 11/12/2013            | 4/03/2014             | 28/07/2014            | 10/09/2014            | 4/12/2014             | 30/03/2015            | 6/07/2015               | 28/09/2015            | 8/12/2015             | 15/03/2016            | 21/06/2016            | 8/11/2016             | 12/05/2016            | 28/03/2017            | 8/06/2017             | 7/09/2017             | 13/12/2017            | 3/04/2018             | 15/06/2018            | 28/09/2018            | 26/10/2018            | 19/09/2019            | 13/12/2019            | 1/04/2020             |                         |                          |                         |
| Date Published            |      |       |                       |                       | 23/09/2014            | 6/01/2015             | 7/04/2015             | 8/08/2015             | 29/09/2015              | 21/12/2015            | 31/03/2016            | 5/07/2016             | 21/11/2016            | 20/12/2016            | 11/04/2017            | 26/06/2017            | 20/09/2017            | 22/12/2017            | 12/04/2018            | 29/06/2018            | 16/10/2018            | 9/11/2018             | 10/07/2019            | 8/01/2020             | 14/04/2020            |                       |                         |                          |                         |