TARANAKI REGIONAL COUNCIL MONTHLY RAINFALL AND RIVER REPORT FOR April 2022

Provisional Data Only. Note: some sites record a number of parameters

Table 1: Rainfall at 27 sites throughout the region

		Monthly					
Hydro_Sites	# days > 0.5 mm	Total Rainfall (mm)	% of typical month	Total to date (mm)	% of typical year to date	% of typical full year	Records Began
North Egmont at Visitors Centre	14	342.5	70.0	1544.0	94.2	23.0	1991
Dawson Falls	14	379.5	105.9	1641.5	147.5	*36.5	1933
Kahui Hut	17	280.5	72.2	1101.5	92.3	22.8	2006
Mangorei Upper	10	112.0	41.9	1061.5	128.7	29.7	2017
Hillsborough	5	61.0	37.5	529.5	107.8	30.0	2012
Brooklands Zoo at New Plymouth	5	46.6	33.6	451.4	110.1	29.3	2012
Mangati at SH3	4	61.8	44.3	461.0	120.5	33.3	2013
Motunui M39 at Weston W3	2	45.0	33.4	396.6	97.2	25.2	1998
Waiwhakaiho at Egmont Village	11	95.5	52.7	716.0	116.4	30.5	1991
Manganui at Everett Park	6	72.0	43.0	479.5	86.6	23.2	1987
Inglewood at Oxidation Ponds	7	99.0	60.3	587.5	104.6	25.5	2000
Patea at Stratford	9	54.5	39.1	587.5	126.8	30.4	1999
Mangaehu at Bridge	8	56.5	46.5	498.0	126.1	32.3	1999
Kotare at OSullivans	9	62.5	41.3	355.0	66.7	16.5	1998
Uruti at Kaka Rd	8	94.5	55.7	453.5	80.0	20.8	1991
Pohokura Saddle	11	59.0	38.8	371.0	74.7	19.0	1991
Stony at Mangatete Bridge	9	133.5	86.2	677.5	135.2	36.1	2004
Kapoaiaia at Lighthouse	8	99.4	97.3	835.6	246.0	68.8	1930
Taungatara at Eltham Rd	8	91.0	72.3	640.5	178.1	43.3	2005

Table 2: River Flow at 9 sites throughout the region

Summary of maximum, minimum and mean flow for the current reporting month and the same month for all preceding years of record.

Recorded flows (m3/sec)									
	Maximum		N	Minimum		Mean			
River and Site	April 2022	April all previous years	April 2022	April all previous years	April 2022	April all previous years	Years of record	Records Began	
Waitara at Bertrand Rd	143.08	915.73	6.78	4.59	14.79	48.81	42	1980	
Manganui at Everett Park	147.11	634.90	3.74	2.82	6.61	16.77	30	1992	
Waiwhakaiho at SH3	123.81	354.56	1.97	1.36	3.50	7.43	42	1980	
Waiongana at SH3a	4.09	134.51	0.52	0.28	0.76	2.45	42	1980	
Kapoaiaia at Lighthouse	33.06	50.10	0.09	0.20	0.29	1.06	36	1986	
Waingongoro at Eltham Rd	29.29	87.04	0.52	0.30	0.98	2.07	47	1975	
Punehu at Pihama*	18.72	45.11	0.31	0.22	0.58	1.18	52	1970	
Tawhiti at Duffy's Farm	2.96	8.72	0.28	0.08	0.43	0.54	36	1986	
Whenuakura at Nicholson Rd	14.83	180.10	2.73	1.62	3.76	9.06	39	1983	

Table 3: River Temperature at 10 sites throughout the region

Summary of maximum, minimum and mean river temperature for the current reporting month and the same month for all preceding years of record.

Monthly River Temperatures (°C)										
	Maximum		Minimum		Mean					
River and Site	April 2022	April all previous years	April 2022	April all previous years	April 2022	April all previous years	Years of record	Records Began		
Kapoaiaia	20.91	21.12	11.95	8.60	16.00	14.86	23	1999		
Kapuni	19.56	21.50	9.69	7.40	14.51	13.68	23	1999		
Kaupokonui (Manaia)	20.43	21.70	10.36	3.00	15.20	14.53	*32	1979		
Mangaoraka	18.81	20.10	11.79	8.20	15.08	14.50	18	2004		
Patea (Skinner)	17.60	17.90	9.14	7.10	13.39	12.94	18	2004		
Timaru	17.62	18.00	11.21	9.71	14.29	13.63	9	2013		
Waingongoro (Eltham)	17.49	17.90	9.22	7.50	13.47	13.12	18	2000		
Waitara	19.94	20.36	12.55	7.07	15.62	14.82	36	1982		
Waiwhakaiho	16.51	17.30	9.77	6.74	12.82	12.50	32	1981		

^{*}Note: Short years of record reflect years without data.

Table 4: Air Temperature at 18 sites throughout the region

Summary of maximum, minimum and mean air temperature for the current reporting month and the same month for all preceding years of record.

Monthly Air Temperatures (°C)									
	м	aximum	N	linimum	Mean				
Site	April 2022	April all previous years	April 2022	April all previous years	April 2022	April all previous years	Years of record	Records Began	
Dawson Falls	18.72	20.79	2.56	0.69	10.26	9.62	6	2016	
Brooklands (NP)	25.19	26.00	6.72	3.09	16.06	15.47	10	2012	
Hillsborough	23.46	24.42	6.86	4.07	15.65	15.22	10	2012	
Inglewood	23.77	25.69	2.66	1.92	13.41	13.82	10	2012	
Cape Egmont	24.01	23.65	7.63	5.55	16.39	15.92	10	2012	
Kaupokonui (Manaia)	24.76	25.32	3.31	2.61	15.59	14.74	7	2015	
Mangati (Bell Block)	24.32	24.72	5.65	3.04	15.79	15.48	9	2013	
Mangorei (Bushline)	20.59	21.57	6.62	5.02	13.84	12.85	5	2017	
Motunui	24.12	22.48	5.52	5.38	15.31	14.71	5	2017	
Ngutuwera	24.31	24.52	5.83	2.61	14.88	13.91	4	2018	
North Egmont	20.71	18.80	2.48	0.26	10.44	9.85	7	2015	
Patea	25.16	25.80	3.69	4.28	15.27	15.04	10	2012	
Stratford	26.08	25.93	5.30	2.04	14.83	13.62	10	2012	
Mangatete Rd (Okato)	23.65	23.30	7.74	5.25	15.16	14.70	6	2016	
Te Kiri	22.80	24.38	4.95	3.23	14.74	14.21	7	2015	
Whareroa	24.36	23.73	0.51	-0.11	14.11	14.17	9	2013	
Uruti (Okoki)	22.06	22.08	6.76	2.69	14.40	13.10	4	2018	
Waitotara (Coast)	25.61	23.55	3.30	3.34	15.43	14.63	6	2016	

Table 5: Soil Moistures at 11 sites throughout the region

Summary of maximum, minimum and mean soil moisture for the current reporting month and the same month for all preceding years of record.

Monthly Soil Moisture Extremes (%)									
	Maximum		N	Minimum		Mean			
Site	April 2022	April all previous years	April 2022	April all previous years	April 2022	April all previous years	Years of record	Records Began	
Hillsborough	28.30	33.79	24.37	11.60	25.99	23.92	10	2012	
Kaka Rd (Okoki)	40.69	57.90	28.23	14.90	33.41	36.12	18	2004	
Kapoaiaia (Cape Egmont)	31.61	51.20	25.51	7.08	26.71	21.80	15	2005	
Kaupokonui (Manaia)	33.68	50.40	29.43	10.18	30.95	24.30	17	2005	
Kotare (Tongaporutu)	48.98	59.90	26.25	18.50	30.78	35.55	10	2012	
Mangatete Rd (Okato)	22.18	35.10	11.06	6.44	12.87	13.97	6	2016	
Motunui	23.84	38.30	21.31	13.63	22.64	24.98	13	2009	
Patea	27.41	44.80	23.97	9.90	24.82	24.13	16	2006	
Pohokura Saddle	47.45	58.20	29.66	17.44	37.51	35.22	16	2006	
Rimunui (Waitotara Valley)	28.95	56.35	24.18	8.13	25.65	26.70	16	2006	
Te Kiri	38.88	59.80	13.70	13.10	26.01	29.94	14	2008	

Table 6: Soil Temperature at 11 sites throughout the region

Summary of maximum, minimum and mean soil temperature for the current reporting month and the same month for all preceding years of record.

Monthly Soil Temperatures (°C)									
	Maximum		Minimum		Mean				
Site	April 2022	April all previous years	April 2022	April all previous years	April 2022	April all previous years	Years of record	Records Began	
Hillsborough	18.99	19.60	14.83	13.34	16.68	16.15	10	2012	
Kaka Rd (Okoki)	19.15	19.90	15.44	9.90	17.04	15.50	18	2004	
Kapoaiaia (Cape Egmont)	20.97	20.66	14.89	11.90	18.67	16.38	17	2005	
Kaupokonui (Manaia)	18.60	21.10	14.30	11.30	16.64	15.59	17	2005	
Kotare (Tongaporutu)	19.27	20.16	14.06	10.80	16.25	15.29	10	2012	
Mangatete Rd (Okato)	19.50	20.30	12.54	11.60	16.43	15.54	5	2016	
Motunui	18.91	19.51	14.58	12.20	16.65	15.39	13	2009	
Patea	19.99	21.60	13.27	10.00	16.52	15.46	16	2006	
Pohokura Saddle	19.33	19.05	13.60	12.10	16.06	15.15	16	2006	
Rimunui (Waitotara Valley)	21.70	21.50	13.50	11.00	17.40	16.41	16	2006	
Te Kiri	18.80	19.27	13.50	10.10	16.07	15.12	14	2008	

General Comments:

Rainfall for April was generally well below the long-term average, ranging from 27% to 72%, with an average of 50% of normal, so half the normal rain for April. Rainfall was higher around the Maunga and ring plain, and Cape Egmont received 84% of normal rain. Most of the rain fell in two events on 6 and 22 April. Te Maunga recorded between 67% and 79% of normal.

Year to date rainfall is sitting between 67% and 213% with an average of 113% of normal. Eight sites are now tracking below normal. Only the southern and western sites are around 150% or more of typical rainfall to date. Despite the dry month Cape Egmont remains at over 200% of normal to date and has already received 60% of a typical years rain in only 4 months.

Mean river flows for April are also well below normal, with an average of 43% of normal. All flows were notably lower than in March.

Mean water temperatures were between 0.32° C to 1.1° C above the typical monthly values, this is partly due to very low river flows. Nighttime low water temperatures were between 1.5° C and 7.3° C above historic lows. Peak temperatures were all below historic highs.

The average air temperature for the region, excluding Te Maunga, was 15.05°C, which was 0.58°C higher than the long term April average. Various sites recorded new maximum April air temperatures with Waitotara 2.06°C greater than the historic peak since 2016.

Despite lack of rain and warmer temperatures, mean soil moistures were on average approximately equal (+0.06%) to the long-term average for April. Eastern sites were generally below average, and western sites above average. Cape Egmont and Manaia were 5% and 6% above average. Tongaporutu and Te Kiri were around 5% and 4% below average.

Soil temperatures were generally 1.1°C above the average for April, Hillsborough was only 0.53°C above average, but Cape Egmont was 2.29°C above average. Nighttime minimumsoil temperatures were on average 2.75°C above average, but maximum Apriltemperatures were only 0.2°C and 0.31°C above the recorded peaks at Rimunui and Kapoaiaia.