

Table 1.43 Future Climate IDF Curves for Churchill Falls A (8501132) – 2011-2040
Time Horizon

Minimum Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	4.6	6.0	7.0	7.8	8.1	9.0	9.9
10-min	6.2	8.3	9.6	11.0	11.4	12.7	14.0
15-min	7.4	9.9	11.5	13.1	13.6	15.1	16.6
30-min	9.4	12.2	14.0	15.8	16.3	18.1	19.8
1-hr	11.0	13.6	15.2	16.8	17.4	18.9	20.5
2-hr	13.9	16.3	17.9	19.3	19.8	21.3	22.7
6-hr	20.9	26.0	29.3	32.6	33.6	36.8	39.9
12-hr	29.4	34.8	38.5	41.9	43.0	46.4	49.8
24-hr	36.5	42.5	46.5	50.3	51.5	55.2	58.9
Median Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	5.2	7.4	8.6	9.9	10.4	11.7	13.0
10-min	7.2	10.3	12.0	13.9	14.6	16.4	18.3
15-min	8.5	12.3	14.4	16.7	17.5	19.8	22.0
30-min	10.6	14.9	17.3	19.9	20.7	23.3	25.9
1-hr	12.2	16.1	18.2	20.6	21.4	23.8	26.1
2-hr	15.0	18.6	20.6	22.9	23.6	25.8	27.9
6-hr	22.4	29.6	34.0	38.1	39.5	43.9	48.2
12-hr	31.0	38.6	43.1	47.6	49.1	53.7	58.3
24-hr	38.4	47.0	52.1	57.2	58.9	64.1	69.3
Maximum Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	6.5	8.5	9.8	11.4	12.0	13.7	15.3
10-min	8.9	11.9	13.9	16.3	17.1	19.6	22.0
15-min	10.7	14.1	16.5	19.3	20.3	23.3	26.2
30-min	13.0	17.0	19.7	22.9	24.0	27.3	30.6
1-hr	14.4	18.0	20.4	23.3	24.3	27.4	30.4
2-hr	17.0	20.4	22.7	25.4	26.3	29.1	31.9
6-hr	25.3	32.7	37.7	42.4	43.9	49.3	54.7
12-hr	34.2	41.8	46.8	52.0	53.8	59.5	65.2
24-hr	42.1	50.8	56.5	62.4	64.5	71.0	77.5

Table 1.44 Future Climate IDF Curves for Churchill Falls A (8501132) – 2041-2070
Time Horizon

Minimum Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	5.2	7.0	8.2	9.3	9.7	10.8	11.9
10-min	7.0	9.7	11.5	13.1	13.7	15.3	16.9
15-min	8.4	11.6	13.7	15.6	16.3	18.2	20.1
30-min	10.5	14.1	16.4	18.7	19.4	21.5	23.7
1-hr	12.0	15.4	17.5	19.5	20.1	22.1	24.1
2-hr	14.9	18.0	19.9	21.8	22.4	24.3	26.1
6-hr	22.3	28.6	32.7	36.6	37.9	41.7	45.5
12-hr	30.9	37.5	41.8	45.9	47.3	51.3	55.3
24-hr	38.3	45.7	50.6	55.2	56.7	61.2	65.7
Median Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	5.8	8.0	9.5	10.8	11.2	12.5	13.8
10-min	7.9	11.2	13.4	15.3	15.9	17.8	19.7
15-min	9.4	13.4	16.0	18.2	18.9	21.2	23.4
30-min	11.7	16.1	19.1	21.6	22.4	24.9	27.5
1-hr	13.1	17.2	19.9	22.2	22.9	25.2	27.5
2-hr	15.9	19.7	22.1	24.3	25.0	27.1	29.3
6-hr	23.7	31.4	36.5	41.4	42.9	47.4	51.9
12-hr	32.4	40.4	45.8	50.7	52.3	56.9	61.6
24-hr	40.0	49.2	55.3	60.9	62.7	68.0	73.2
Maximum Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	6.6	9.2	11.0	12.5	13.1	14.8	16.4
10-min	9.1	13.0	15.6	17.9	18.7	21.2	23.6
15-min	10.8	15.5	18.6	21.3	22.2	25.2	28.1
30-min	13.2	18.5	22.0	25.1	26.1	29.4	32.7
1-hr	14.5	19.4	22.5	25.3	26.3	29.3	32.3
2-hr	17.2	21.7	24.6	27.2	28.1	30.9	33.7
6-hr	25.6	34.6	41.1	46.8	48.6	54.0	59.3
12-hr	34.4	43.9	50.7	56.4	58.2	63.7	69.4
24-hr	42.4	53.2	61.1	67.6	69.7	76.1	82.5

**Table 1.45 Future Climate IDF Curves for Churchill Falls A (8501132) – 2071-2100
Time Horizon**

Minimum Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	5.1	6.6	7.5	8.5	8.8	9.7	10.6
10-min	6.9	9.1	10.5	11.9	12.3	13.6	15.0
15-min	8.3	10.8	12.5	14.1	14.7	16.2	17.8
30-min	10.3	13.2	15.1	17.0	17.6	19.3	21.1
1-hr	11.9	14.5	16.3	18.0	18.5	20.1	21.7
2-hr	14.8	17.2	18.8	20.4	20.9	22.4	23.9
6-hr	22.1	27.4	31.0	34.4	35.5	38.8	42.1
12-hr	30.7	36.3	40.0	43.6	44.7	48.2	51.7
24-hr	38.1	44.3	48.4	52.4	53.6	57.5	61.3
Median Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	6.1	8.4	10.0	11.5	12.0	13.4	14.8
10-min	8.4	11.8	14.2	16.4	17.1	19.2	21.2
15-min	10.0	14.1	16.9	19.5	20.3	22.8	25.2
30-min	12.3	16.9	20.1	23.1	24.0	26.8	29.5
1-hr	13.7	17.9	20.8	23.5	24.4	26.9	29.4
2-hr	16.5	20.3	23.0	25.5	26.3	28.7	31.0
6-hr	24.5	32.4	37.9	43.1	44.7	49.8	54.8
12-hr	33.3	41.6	47.1	52.4	54.1	59.3	64.5
24-hr	41.0	50.5	57.0	63.2	65.1	71.2	77.2
Maximum Projected Precipitation Amount (mm)							
Duration	Return Interval (years)						
	2	5	10	20	25	50	100
5-min	7.3	10.0	11.9	13.7	14.3	16.2	18.0
10-min	10.1	14.1	16.9	19.7	20.5	23.3	25.9
15-min	12.0	16.8	20.1	23.4	24.4	27.6	30.8
30-min	14.6	20.0	23.7	27.4	28.6	32.2	35.8
1-hr	15.8	20.7	24.1	27.5	28.6	31.9	35.2
2-hr	18.4	23.0	26.1	29.2	30.2	33.3	36.4
6-hr	27.2	37.0	43.5	49.8	51.8	58.1	64.4
12-hr	36.1	46.3	53.0	59.7	61.8	68.4	74.9
24-hr	44.3	56.1	63.8	71.5	73.9	81.5	89.0