

**New Brunswick**

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**Integrated Climate Bulletin  
Winter 2019-20 Review  
& Spring 2020 Outlook**

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**Meteorological Service of Canada  
Environment and Climate Change Canada  
March 2, 2020**



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# December 2019; Climate Summary

Station Name	TC ID	Station Type	Mean Temperature (°C)			Total Precip (mm)			
			Monthly Mean	Normal Mean	Diff from Normal	Monthly Total	Normal Total	Total as % of Normal	Diff from Normal as % of Normal
BAS CARAQUET	WXS	AU8	-4.5	-5.1	0.6				
BAS CARAQUET		DAILY				83.6	106.6	78	-22
BATHURST A	ZBF	NCA	-6.7	-6.0	-0.7				
BOUCTOUCHE CDA CS	ABT	AU8	-3.6	-5.1	1.5	102.5	101.1	101	1
CHARLO AUTO	ZCR	AU8	-7.0	-7.9	0.9	62.8	79.6	79	-21
MIRAMICHI RCS	ACQ	AU8	-4.9	-6.2	1.4	103.9	85.3	122	22
DOAKTOWN AUTO RCS	ADN	AU8	-4.9	-6.4	1.5	116.7	96.7	121	21
EDMUNDSTON	ERM	AU8	-9.2	-8.5	-0.6	64.4	80.6	80	-20
FREDERICTON INTL A	YFC	NCA	-4.1	-5.7	1.6				
FREDERICTON CDA CS	AFC	AU8	-4.0	-5.3	1.3	115.4	91.8	126	26
GAGETOWN AWOS A	YCX	AU5	-3.9	-4.4	0.5	69.5	98.4	71	-29
GRAND MANAN SAR CS	XGM	AU8	-1.5						
KOUCHIBOUGUAC	AKC	AU8	-4.3	-6.2	1.9				
MECHANIC SETTLEMENT	AMS	AU8	-5.0			220.3			
MISCOU ISLAND (AUT)	WMI	AU8	-3.7						
MONCTON INTL A	YQM	NCH	-3.6	-4.8	1.2	88.5	114.4	77	-23
OAK POINT		DAILY	-3.2	-4.4	1.2	167.8	98.4	170	70
POINT LEPREAU CS	WPE	AU8	-1.4	-3.4	2.0	154.3	132.0	117	17
RED PINES	ARP	AU8	-6.7	-7.2	0.5	114.2	87.4	131	31
SAINT JOHN A	YSJ	NCH	-3.1	-4.4	1.3	176.8	130.4	136	36
SUSSEX FOUR CORNERS	ASF	AU8	-3.3	-4.5	1.2	102.3	105.6	97	-3
WOODSTOCK		DAILY	-5.5	-7.0	1.5	128.4	103.2	124	24
WOODSTOCK NEWBRIDGE	EWD	AU8	-5.7	-7.0	1.3	119.4	103.2	116	16
<b>Average</b>			<b>-4.5</b>	<b>-5.8</b>	<b>1.1</b>	<b>117.1</b>	<b>100.9</b>	<b>109</b>	<b>9</b>
<b>Max</b>			<b>-1.4</b>	<b>-3.4</b>	<b>2.0</b>	<b>220.3</b>	<b>132.0</b>	<b>170</b>	<b>70</b>
<b>Min</b>			<b>-9.2</b>	<b>-8.5</b>	<b>-0.7</b>	<b>62.8</b>	<b>79.6</b>	<b>71</b>	<b>-29</b>



# January 2020; Climate Summary

Station Name	TC ID	Station Type	Mean Temperature (°C)			Total Precip (mm)			
			Monthly Mean	Normal Mean	Diff from Normal	Monthly Total	Normal Total	Total as % of Normal	Diff from Normal as % of Normal
AROOSTOOK		DAILY	-9.1	-12.6	3.5	89.6	98.7	91	-9
BAS CARAQUET	WXS	AU8	-7.7	-9.8	2.1	66.0	97.3	68	-32
BAS CARAQUET		DAILY				74.6	97.3	77	-23
BATHURST A	ZBF	NCA	-9.2	-10.8	1.6				
BOUCTOUCHE CDA CS	ABT	AU8	-6.4	-9.0	2.6	81.7	104.2	78	-22
CHARLO AUTO	ZCR	AU8	-9.1	-12.6	3.5	48.7	84.5	58	-42
MIRAMICHI RCS	ACQ	AU8	-7.7	-10.8	3.1	67.1	87.0	77	-23
DOAKTOWN AUTO RCS	ADN	AU8	-8.3	-10.7	2.4	71.5	105.6	68	-32
EDMUNDSTON	ERM	AU8	-11.2	-12.9	1.7	78.7	79.4	99	-1
FREDERICTON INTL A	YFC	NCA	-6.9	-9.4	2.6				
FREDERICTON CDA CS	AFC	AU8	-6.8	-9.4	2.6	71.2	101.9	70	-30
GAGETOWN AWOS A	YCX	AU5	-6.3	-8.6	2.2	52.5	104.6	50	-50
GRAND MANAN SAR CS	XGM	AU8	-3.1						
KOUCHIBOUGUAC	AKC	AU8	-7.4	-10.1	2.7				
MISCOU ISLAND (AUT)	WMI	AU8	-6.9						
MONCTON INTL A	YQM	NCH	-6.1	-8.9	2.7	96.6	103.3	94	-6
OAK POINT		DAILY	-5.5	-8.6	3.0	62.5	104.6	60	-40
POINT LEPREAU CS	WPE	AU8	-3.0	-7.1	4.0	56.4	126.6	45	-55
RED PINES	ARP	AU8	-9.4	-12.0	2.6	73.1	86.6	84	-16
SAINT JOHN A	YSJ	NCH	-4.9	-7.9	3.0	79.3	123.5	64	-36
SUSSEX FOUR CORNERS	ASF	AU8	-5.7	-8.5	2.8	76.9	108.8	71	-29
WOODSTOCK		DAILY	-7.8	-11.5	3.7	78.0	104.0	75	-25
WOODSTOCK NEWBRIDGE	EWD	AU8	-8.0	-11.5	3.5	70.9	104.0	68	-32
<b>Average</b>			<b>-7.1</b>	<b>-10.1</b>	<b>2.8</b>	<b>72.0</b>	<b>101.2</b>	<b>72</b>	<b>-28</b>
<b>Max</b>			<b>-3.0</b>	<b>-7.1</b>	<b>4.0</b>	<b>96.6</b>	<b>126.6</b>	<b>99</b>	<b>-1</b>
<b>Min</b>			<b>-11.2</b>	<b>-12.9</b>	<b>1.6</b>	<b>48.7</b>	<b>79.4</b>	<b>45</b>	<b>-55</b>



# February 2020; Climate Summary

Station Name	Station Type	Mean Temperature (°C)			Total Precip (mm)			Diff from Normal as % of Normal
		Monthly Mean	Normal Mean	Diff from Normal	Monthly Total	Normal Total	Total as % of Normal	
BAS CARAQUET	AU8	-8.1	-9.7	1.6	77.6	79.0	98	-2
BAS CARAQUET	DAILY				89.0	79.0	113	13
BATHURST A	NCA	-8.9	-9.4	0.5				
BOUCTOUCHE CDA CS	AU8	-7.1	-7.7	0.5	73.3	88.0	83	-17
CHARLO AUTO	AU8	-9.2	-10.9	1.7	39.2	66.9	59	-41
MIRAMICHI RCS	AU8	-8.5	-8.9	0.4				
DOAKTOWN AUTO RCS	AU8	-8.8	-8.9	0.1	81.6	77.3	106	6
EDMUNDSTON	AU8	-12.5	-11.3	-1.2	61.2	62.3	98	-2
FREDERICTON INTL A	NCA	-7.5	-7.9	0.3				
FREDERICTON CDA CS	AU8	-7.0	-7.5	0.4	67.0	70.1	96	-4
GAGETOWN AWOS A	AU5	-6.7	-6.6	-0.1	45.5	77.3	59	-41
GRAND MANAN SAR CS	AU8	-2.6						
KOUCHIBOUGUAC	AU8	-7.1	-8.6	1.5				
MECHANIC SETTLEMENT	AU8	-6.4			100.3			
MISCOU ISLAND (AUT)	AU8	-7.9						
MONCTON INTL A	NCH	-6.2	-7.6	1.3	87.0	90.9	96	-4
OAK POINT	DAILY	-5.0	-6.6	1.7	82.8	77.3	107	7
POINT LEPREAU CS	AU8	-2.4	-5.5	3.0	83.8	101.3	83	-17
RED PINES	AU8	-9.1	-9.9	0.8	74.0	59.6	124	24
SAINT JOHN A	NCH	-5.2	-7.1	1.8	66.7	91.0	73	-27
SUSSEX FOUR CORNERS	AU8	-6.0	-6.8	0.8	69.5	85.0	82	-18
WOODSTOCK	DAILY	-7.5	-9.5	1.9	76.6	71.6	107	7
WOODSTOCK NEWBRIDGE	AU8	-8.6	-9.5	0.9	66.0	71.6	92	-8
<b>Average</b>		<b>-7.2</b>	<b>-8.4</b>	<b>1.0</b>	<b>73.0</b>	<b>78.0</b>	<b>92</b>	<b>-8</b>
<b>Max</b>		<b>-2.4</b>	<b>-5.5</b>	<b>3.0</b>	<b>100.3</b>	<b>101.3</b>	<b>124</b>	<b>24</b>
<b>Min</b>		<b>-12.5</b>	<b>-11.3</b>	<b>-1.2</b>	<b>39.2</b>	<b>59.6</b>	<b>59</b>	<b>-41</b>



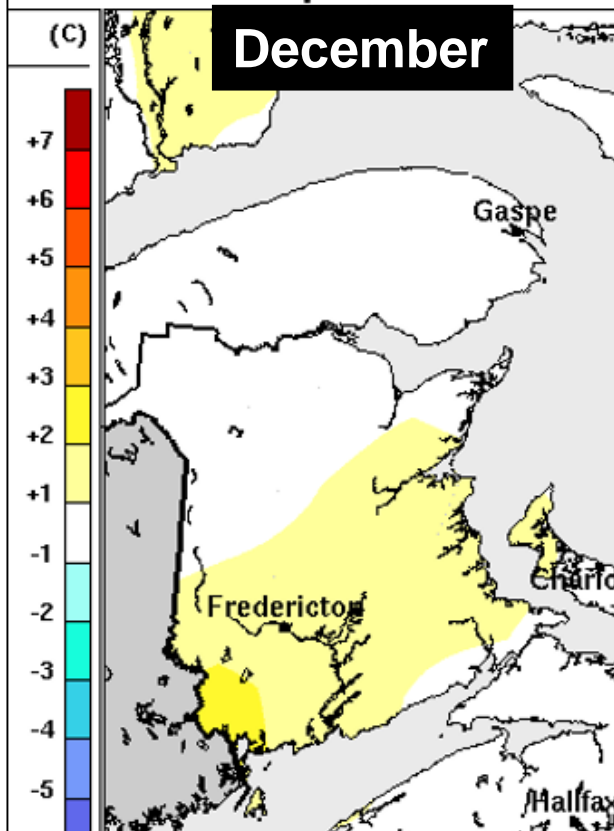
# Dec.-Jan.-Feb. 2019-20; Temperature departure from 1981-2010 mean

above normal (-0.7 to +2.0C)

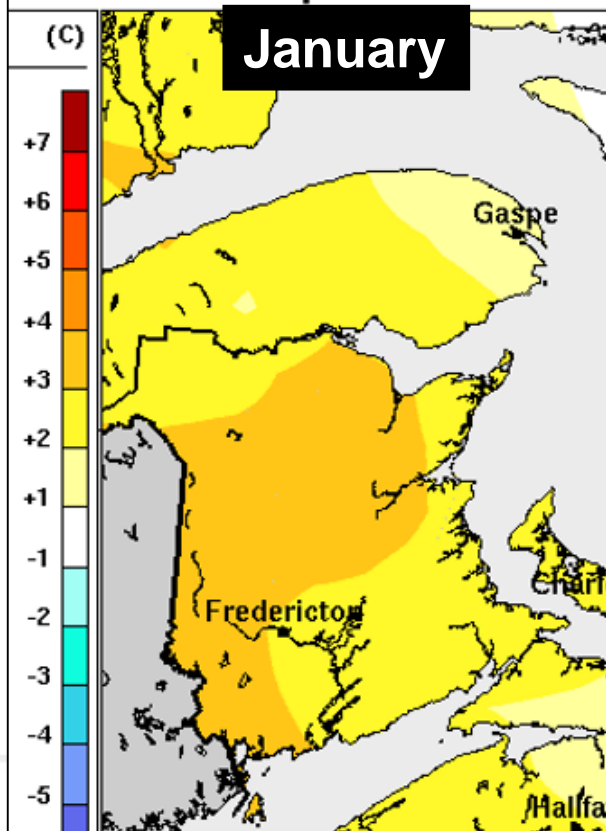
above normal (+1.6 to +4.0C)

above normal (-1.2 to +3.0C)

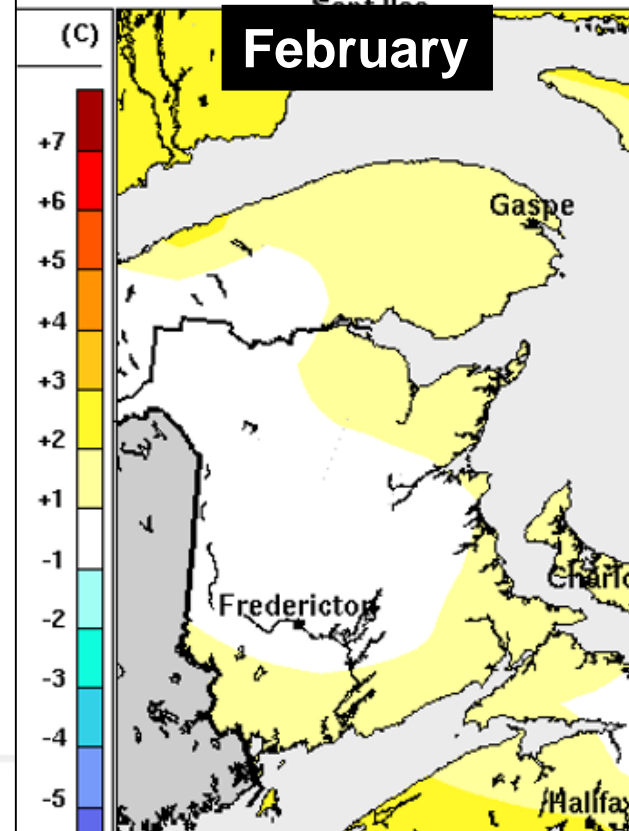
Temperature Anomaly: 201912  
Anomalie de température: 201912



Temperature Anomaly: 202001  
Anomalie de température: 202001



Temperature Anomaly: 202002  
Anomalie de température: 202002



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# Dec.-Jan.-Feb. 2019-20; Precipitation departure from 2002-2018 mean

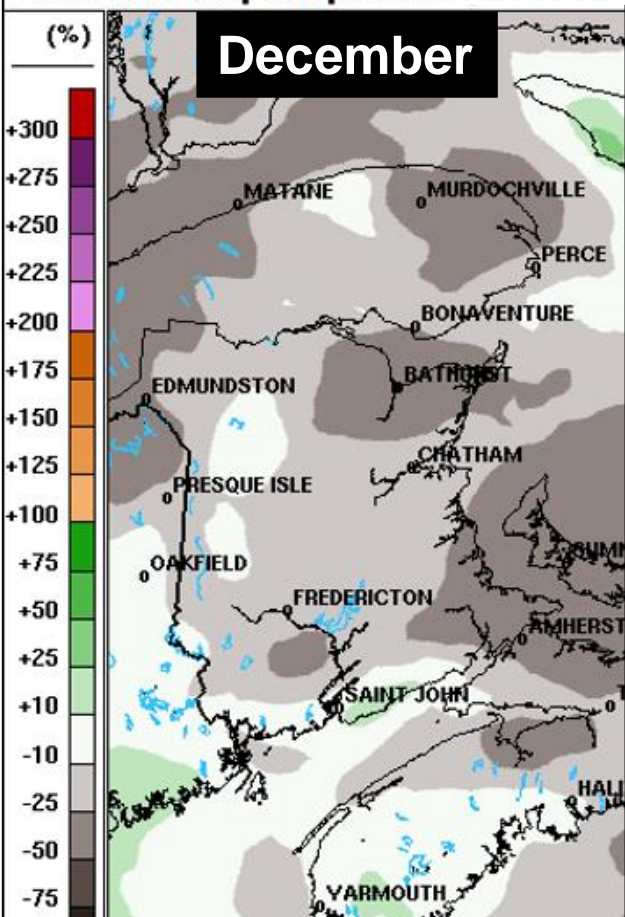
Below normal

Slightly above normal northwest,  
Near normal/below normal elsewhere

Slightly below normal north/south,  
slightly above normal central

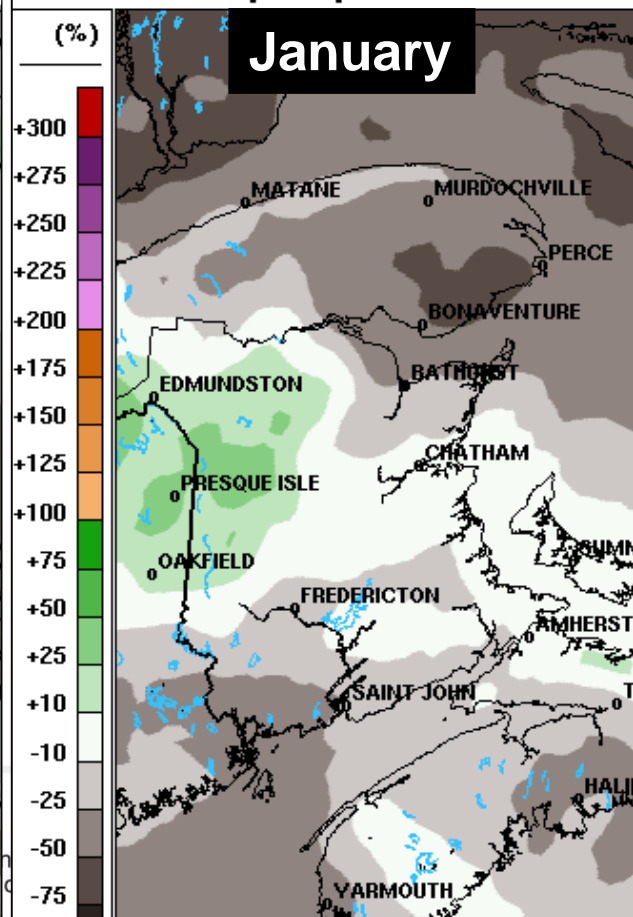
Precipitation Anomaly (% of normal)  
Anomalie de précipitation : 201912

December



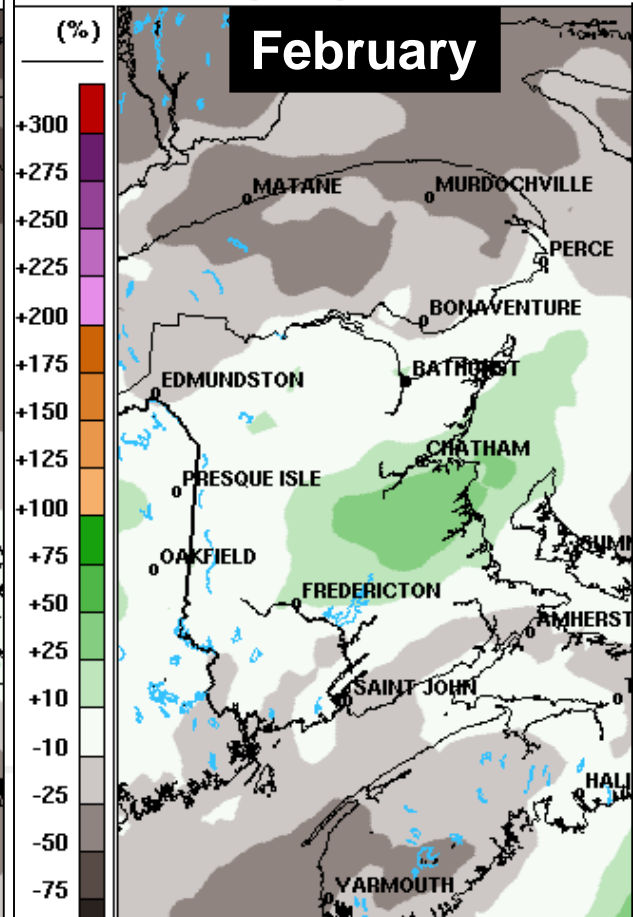
Precipitation Anomaly (% of normal)  
Anomalie de précipitation : 202001

January



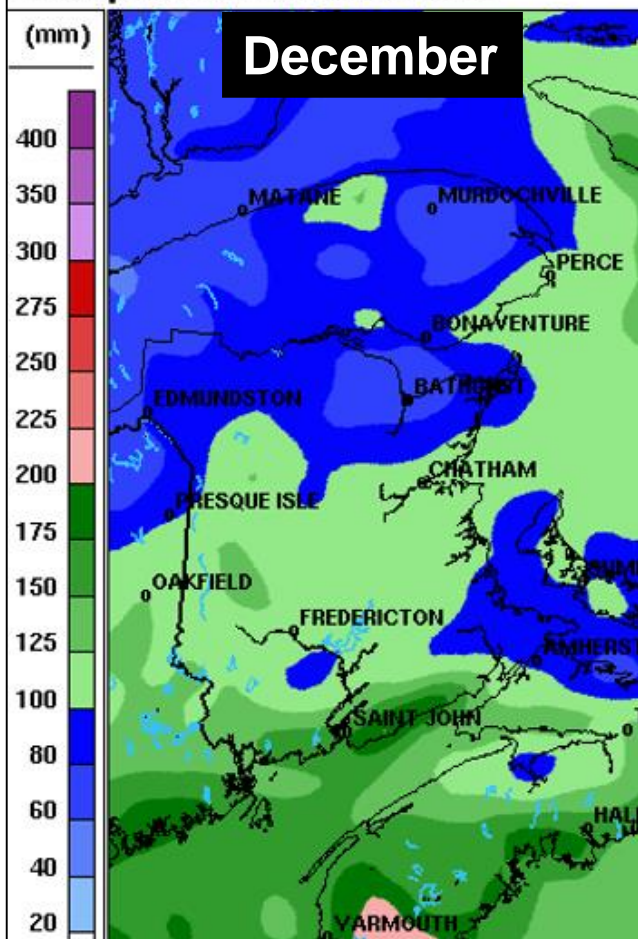
Precipitation Anomaly (% of normal)  
Anomalie de précipitation : 202002

February

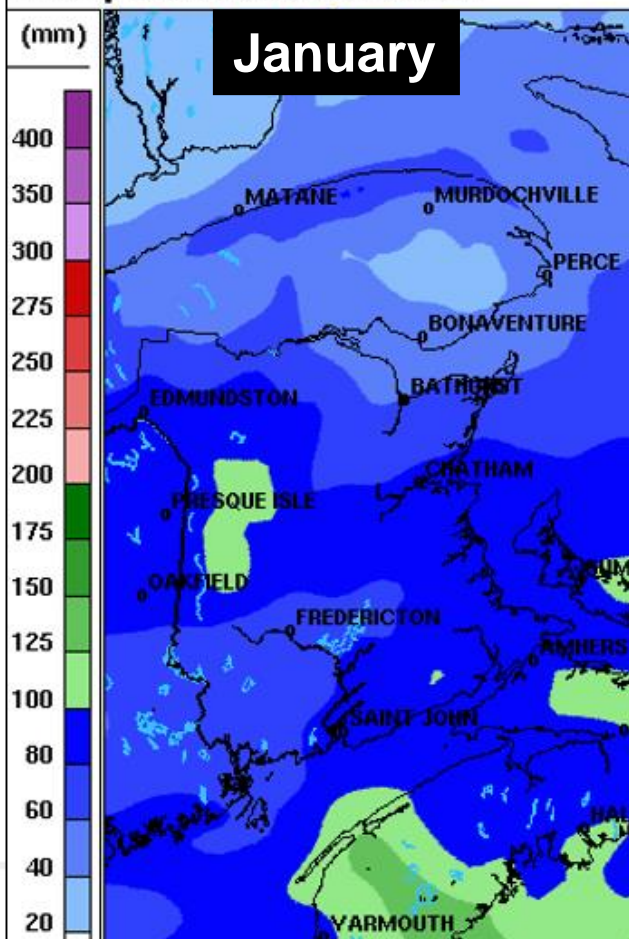


# Dec.-Jan.-Feb. 2019-20; Total precipitation

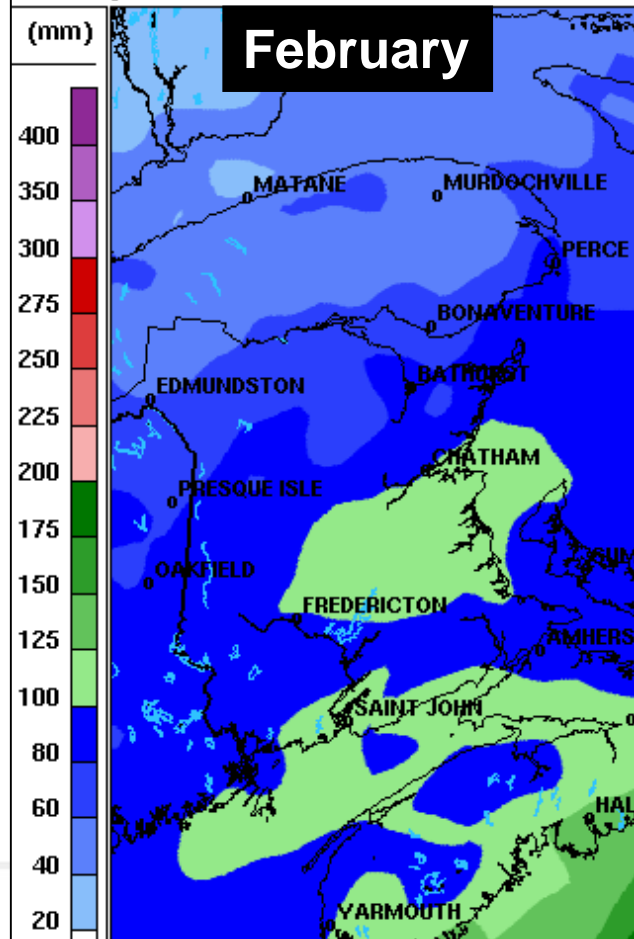
Total precipitation: 201912  
Précipitation totale: 201912



Total precipitation: 202001  
Précipitation totale: 202001



Total precipitation: 202002  
Précipitation totale: 202002



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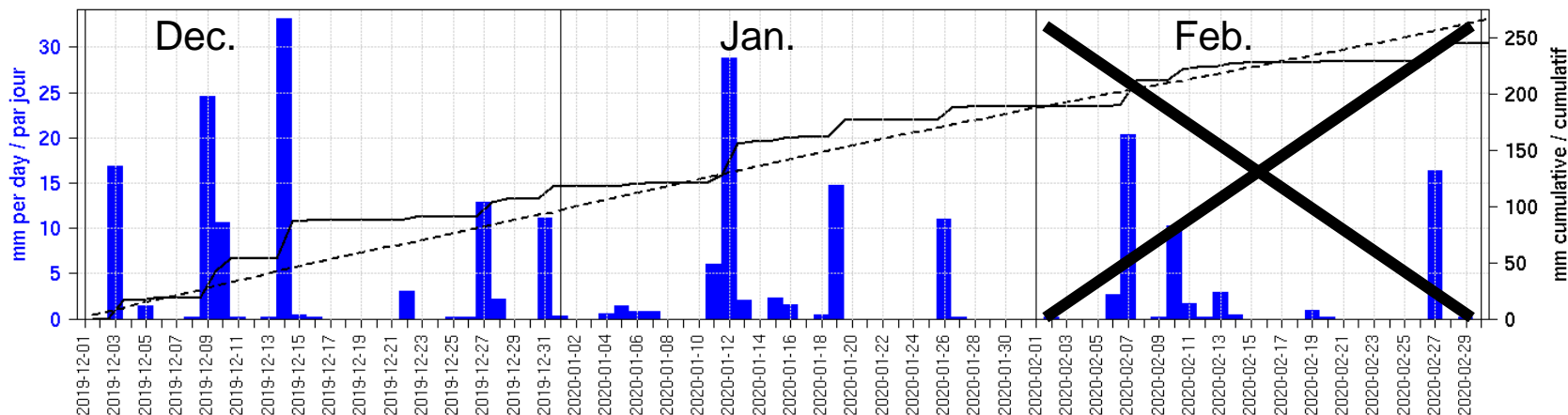
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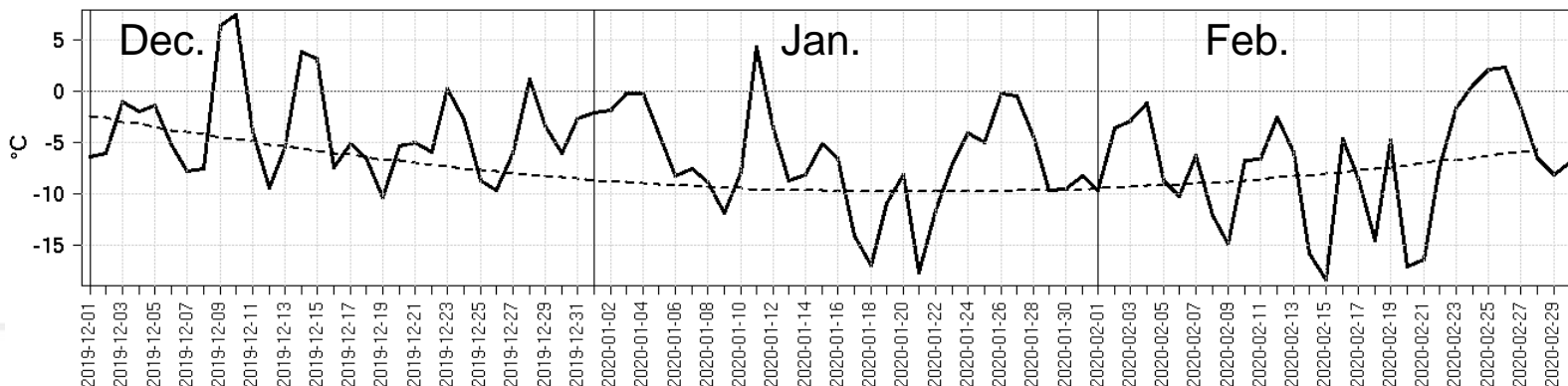
# 2019-20 Temperature and precipitation – (D,J,F) for Fredericton

Note: Precipitation graph for February contains erroneous data

Daily Total Precipitation (bars), Cumulative (line) and Cumulative Long-Term Mean (dashed line)  
Précipitation totale quotidienne (barres), Cumulative (trait) et Cumulative moyenne à long terme (tirreté)  
Fredericton, NB (45.94N 66.63W)



Daily Mean Temperature (line), Long-Term Mean (dashed line) and Categories based on Standard Deviations (blue and red)  
Température quotidienne moyenne (trait), Moyenne à long terme (tirreté) et Catégories basées sur des écart-types (bleu et rouge)  
Fredericton, NB (45.94N 66.63W)



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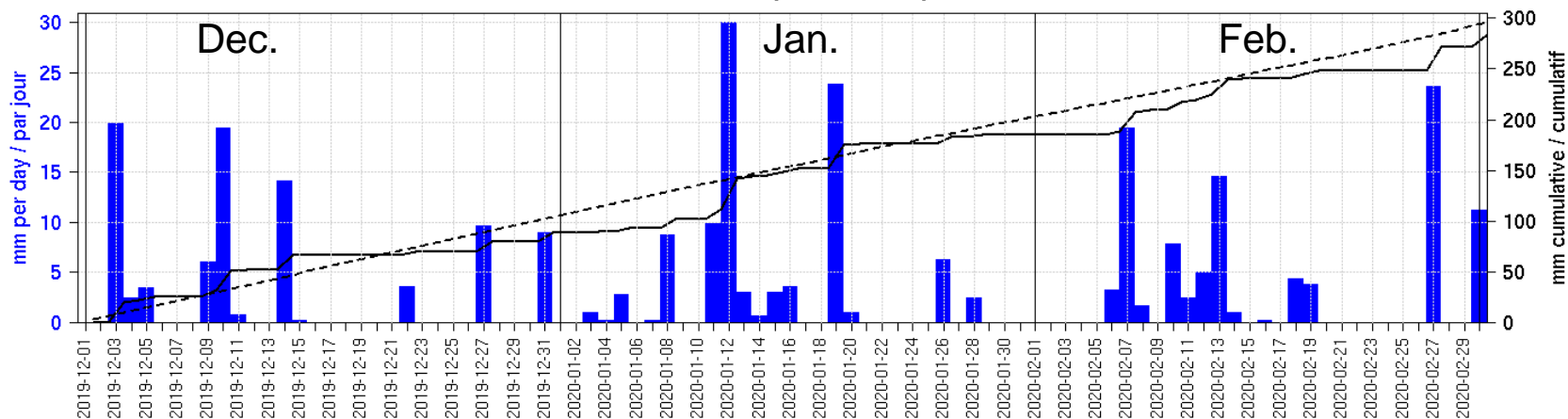
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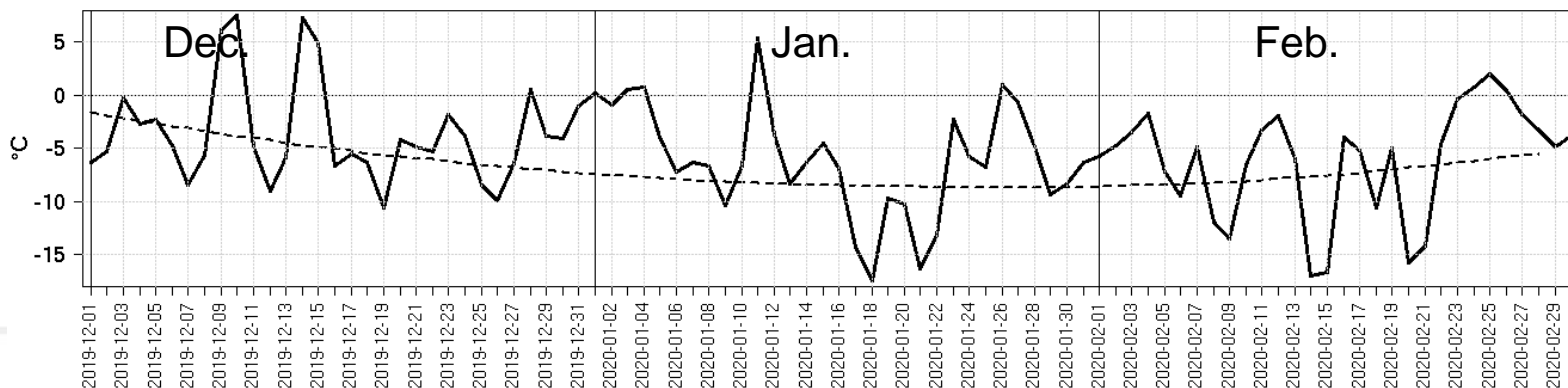


# 2019-20 Temperature and precipitation – (D,J,F) for Moncton

Daily Total Precipitation (bars), Cumulative (line) and Cumulative Long-Term Mean (dashed line)  
Précipitation totale quotidienne (barres), Cumulative (trait) et Cumulative moyenne à long terme (tirré)é)  
Moncton, NB (46.08N 64.76W)

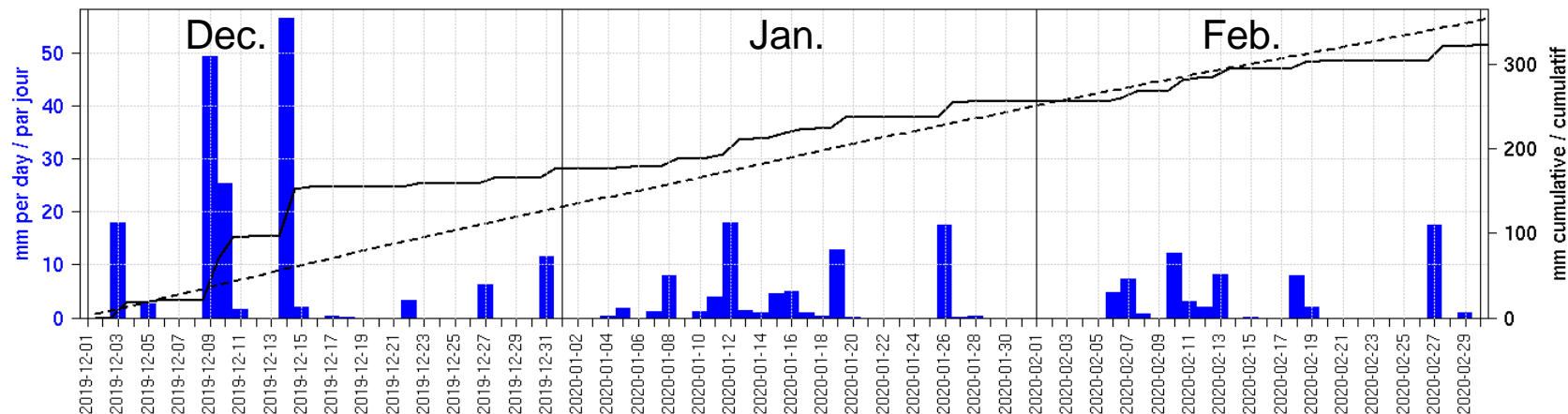


Daily Mean Temperature (line), Long-Term Mean (dashed line) and Categories based on Standard Deviations (blue and red)  
Température quotidienne moyenne (trait), Moyenne à long terme (tirré)é) et Catégories basées sur des écart-types (bleu et rouge)  
Moncton, NB (46.08N 64.76W)

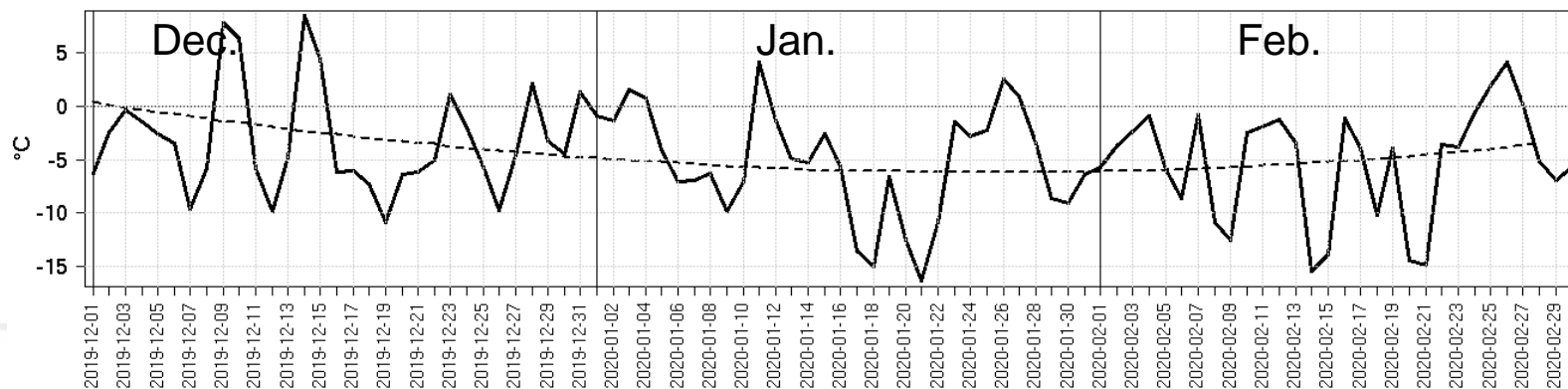


# 2019-20 Temperature and precipitation – (D,J,F) for Saint John

Daily Total Precipitation (bars), Cumulative (line) and Cumulative Long-Term Mean (dashed line)  
Précipitation totale quotidienne (barres), Cumulative (trait) et Cumulative moyenne à long terme (tirreté)  
Saint John, NB (45.26N 66.07W)

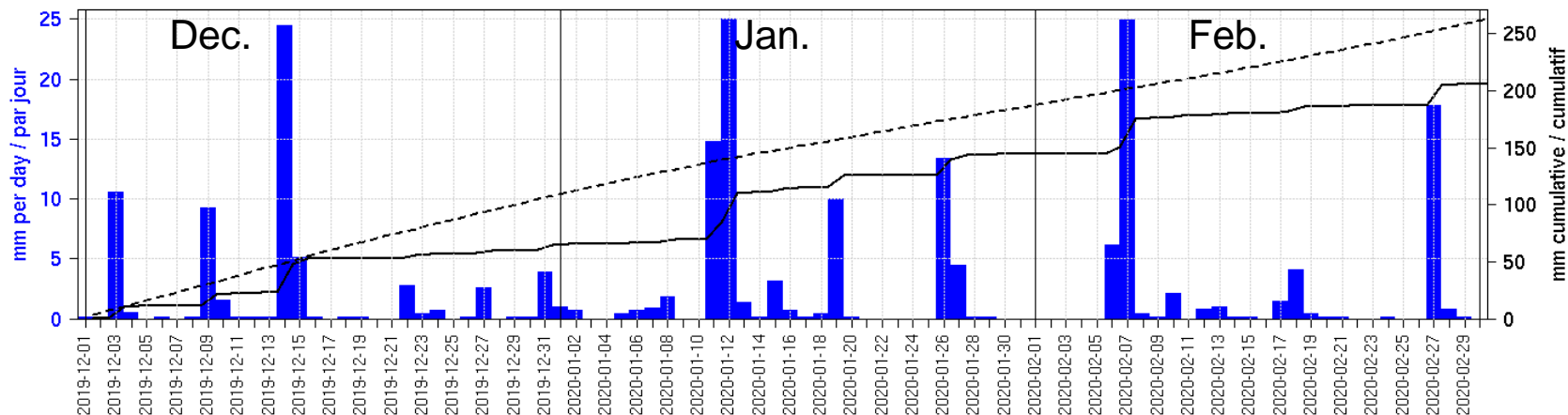


Daily Mean Temperature (line), Long-Term Mean (dashed line) and Categories based on Standard Deviations (blue and red)  
Température quotidienne moyenne (trait), Moyenne à long terme (tirreté) et Catégories basées sur des écarts-types (bleu et rouge)  
Saint John, NB (45.26N 66.07W)

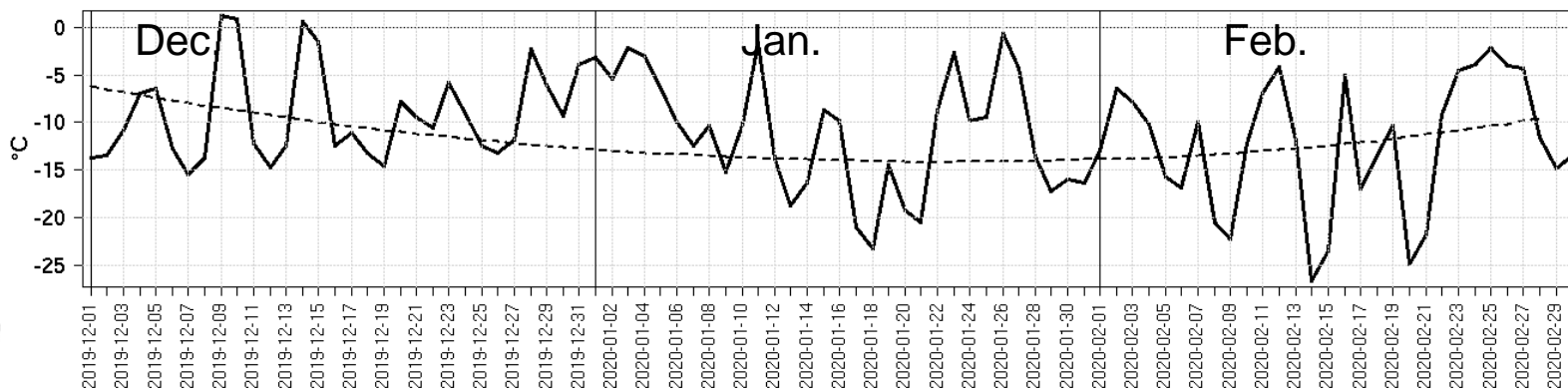


# 2019-20 Temperature and precipitation – (D,J,F) for Edmundston

Daily Total Precipitation (bars), Cumulative (line) and Cumulative Long-Term Mean (dashed line)  
Précipitation totale quotidienne (barres), Cumulative (trait) et Cumulative moyenne à long terme (tirreté)  
Edmundston, NB (47.37N 68.33W)



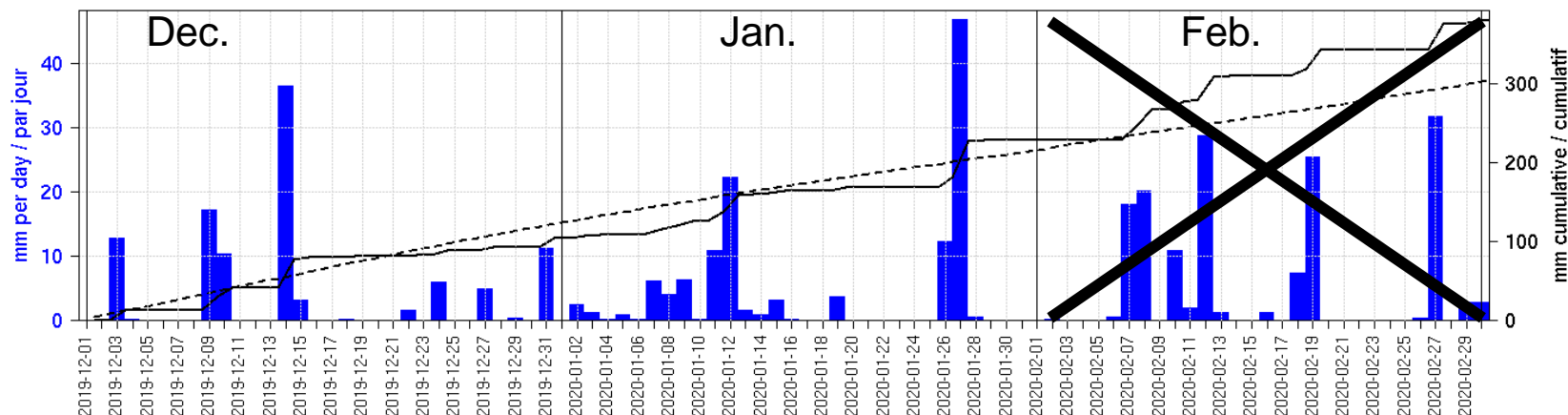
Daily Mean Temperature (line), Long-Term Mean (dashed line) and Categories based on Standard Deviations (blue and red)  
Température quotidienne moyenne (trait), Moyenne à long terme (tirreté) et Catégories basées sur des écarts-types (bleu et rouge)  
Edmundston, NB (47.37N 68.33W)



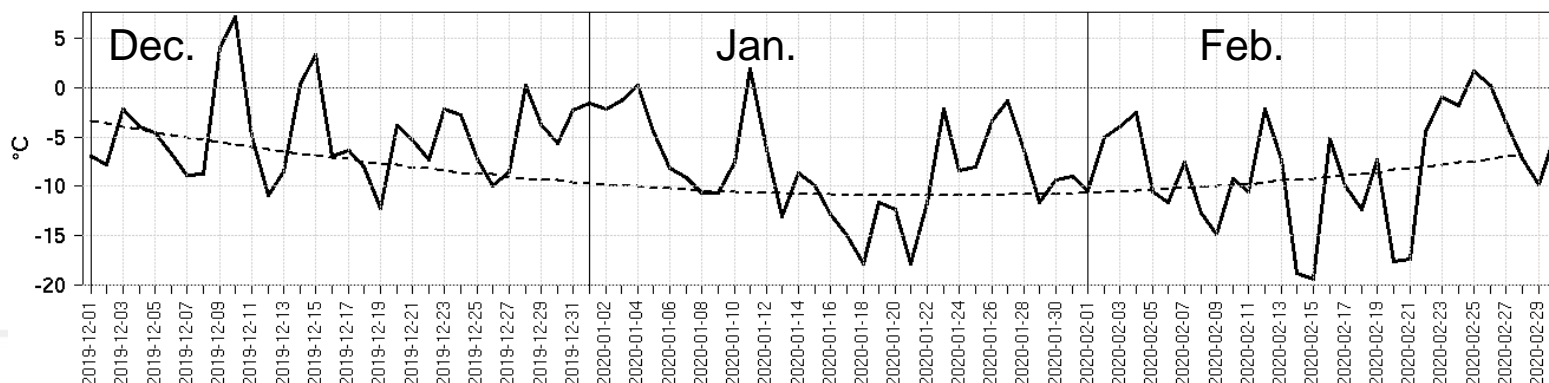
# 2019-20 Temperature and precipitation – (D,J,F) for Miramichi

Note: Precipitation graph for February contains erroneous data

Daily Total Precipitation (bars), Cumulative (line) and Cumulative Long-Term Mean (dashed line)  
Précipitation totale quotidienne (barres), Cumulative (trait) et Cumulative moyenne à long terme (tirreté)  
Miramichi, NB (47.02N 65.50W)



Daily Mean Temperature (line), Long-Term Mean (dashed line) and Categories based on Standard Deviations (blue and red)  
Température quotidienne moyenne (trait), Moyenne à long terme (tirreté) et Catégories basées sur des écart-types (bleu et rouge)  
Miramichi, NB (47.02N 65.50W)



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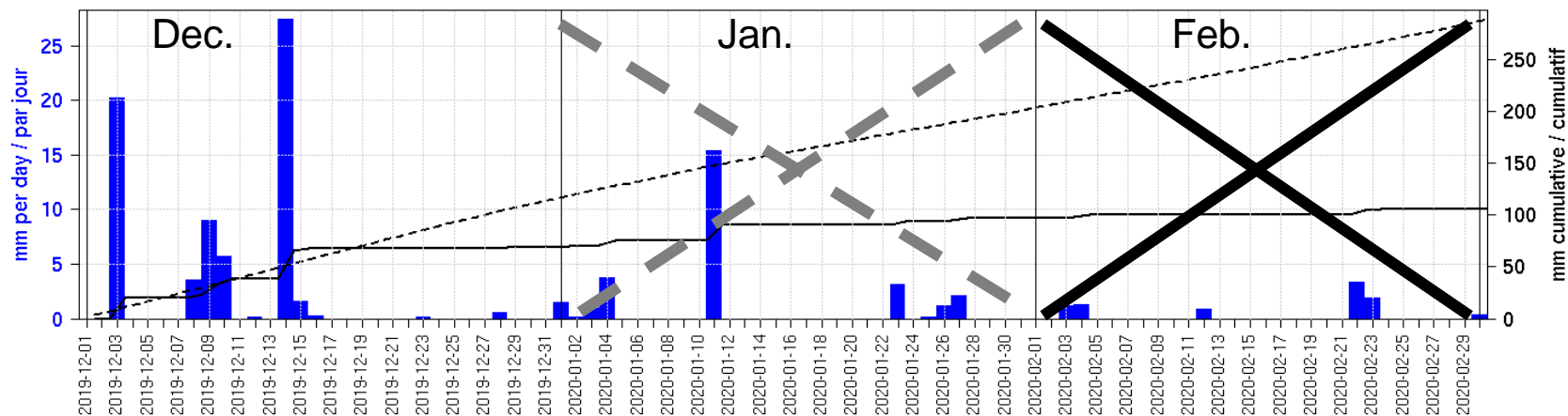
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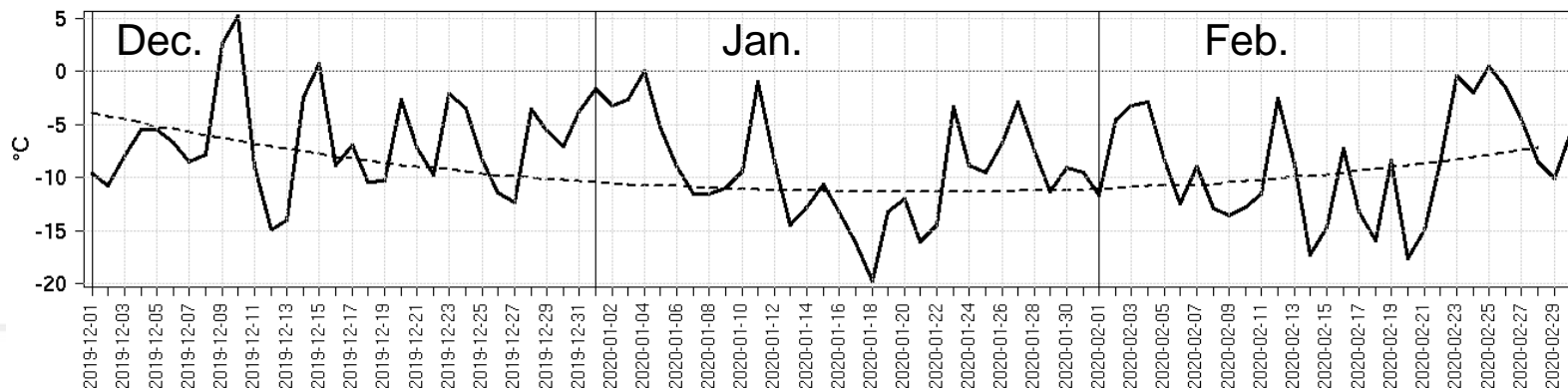
# 2019-20 Temperature and precipitation – (D,J,F) for Bathurst

Note: Precipitation graph for January/ February contains erroneous data

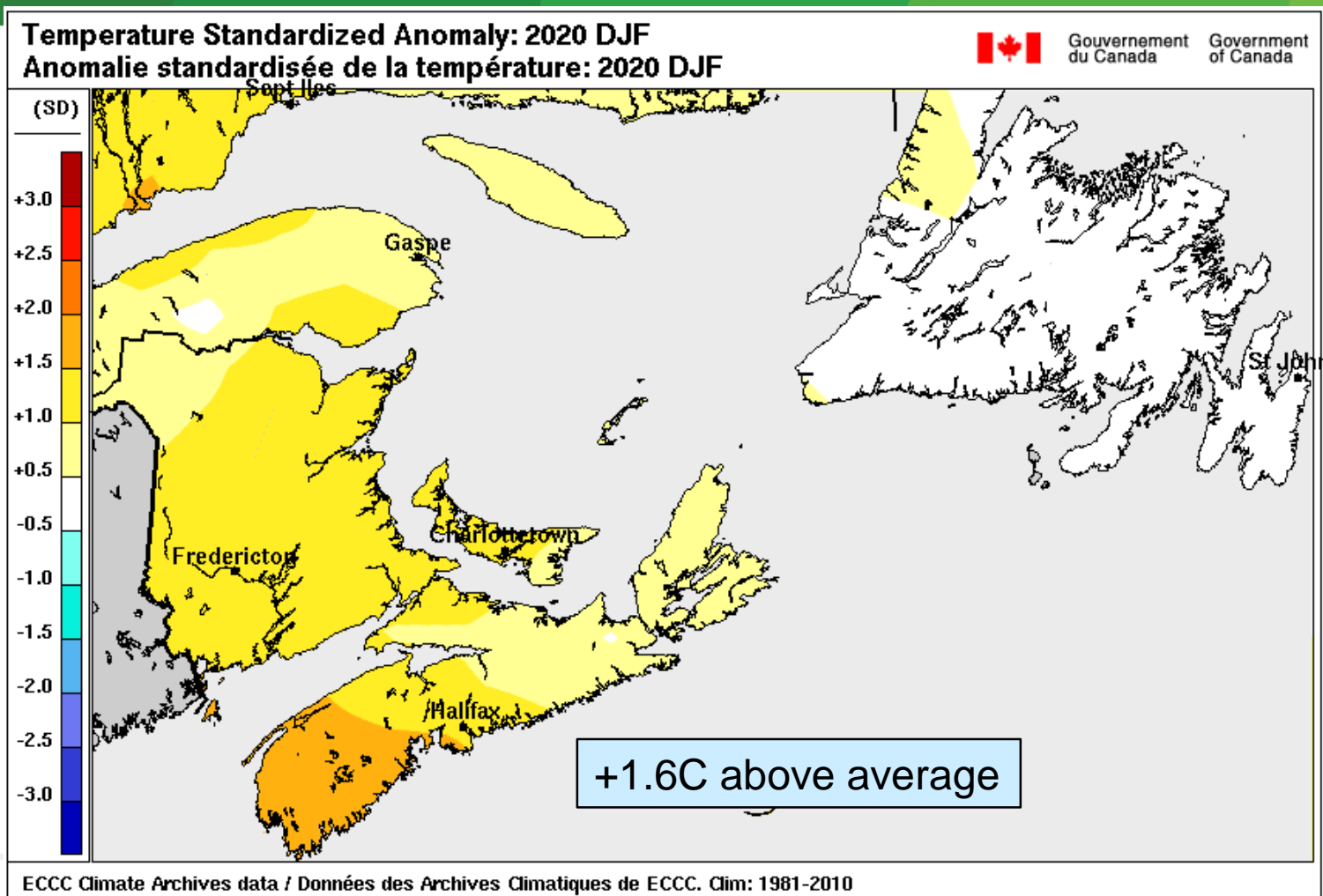
Daily Total Precipitation (bars), Cumulative (line) and Cumulative Long-Term Mean (dashed line)  
Précipitation totale quotidienne (barres), Cumulative (trait) et Cumulative moyenne à long terme (tirreté)  
Bathurst, NB (47.59N 65.64W)



Daily Mean Temperature (line), Long-Term Mean (dashed line) and Categories based on Standard Deviations (blue and red)  
Température quotidienne moyenne (trait), Moyenne à long terme (tirreté) et Catégories basées sur des écarts-types (bleu et rouge)  
Bathurst, NB (47.59N 65.64W)



# Winter 2019-20 (D,J,F) Temperature Departure from 1981-2010 mean

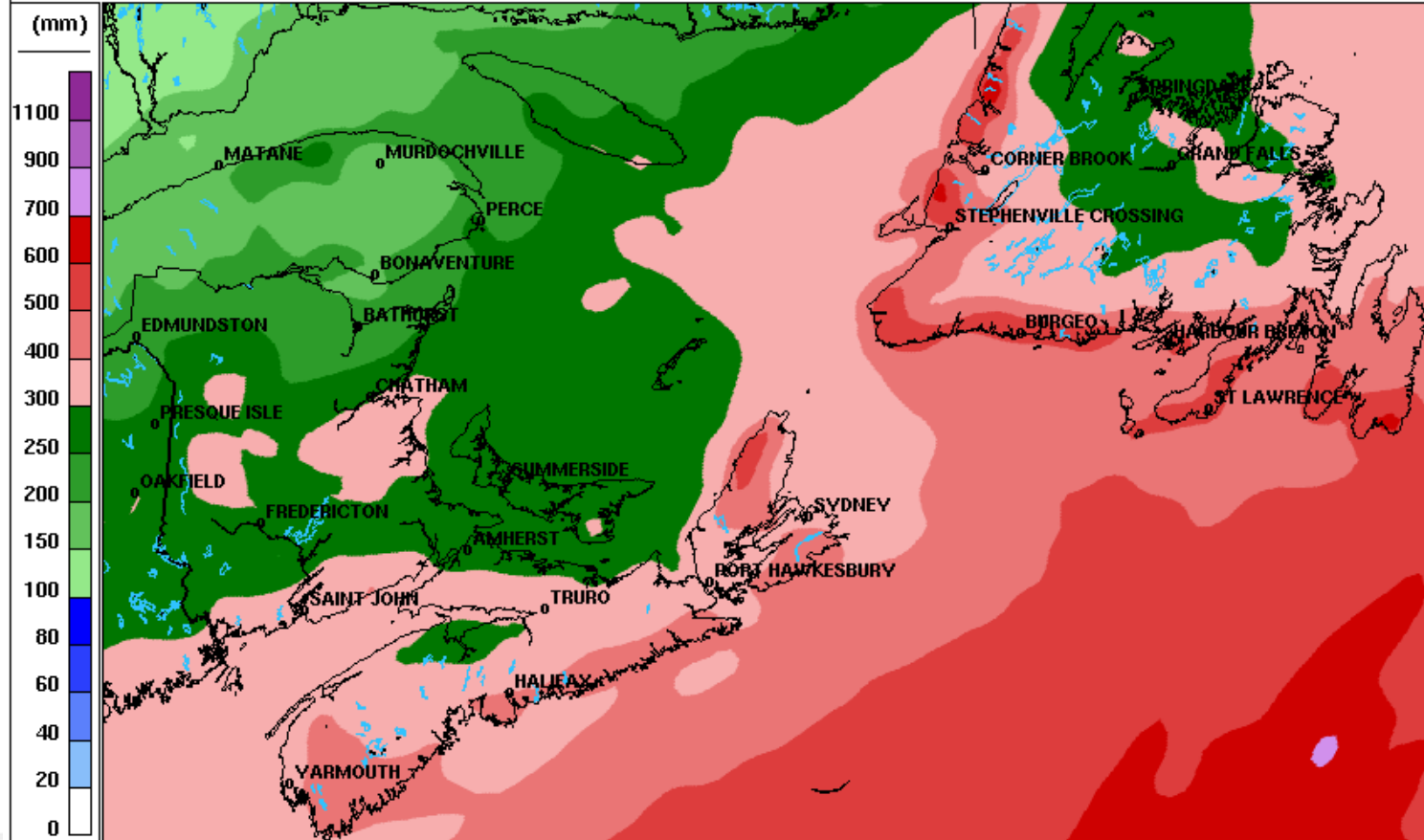


# Winter 2019-20 (D,J,F) Total precipitation

Total precipitation: 2020 DJF  
Précipitation totale: 2020 DJF



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ECCC NWP model gridded data / Données sur grille de modèle de PNT de ECCC



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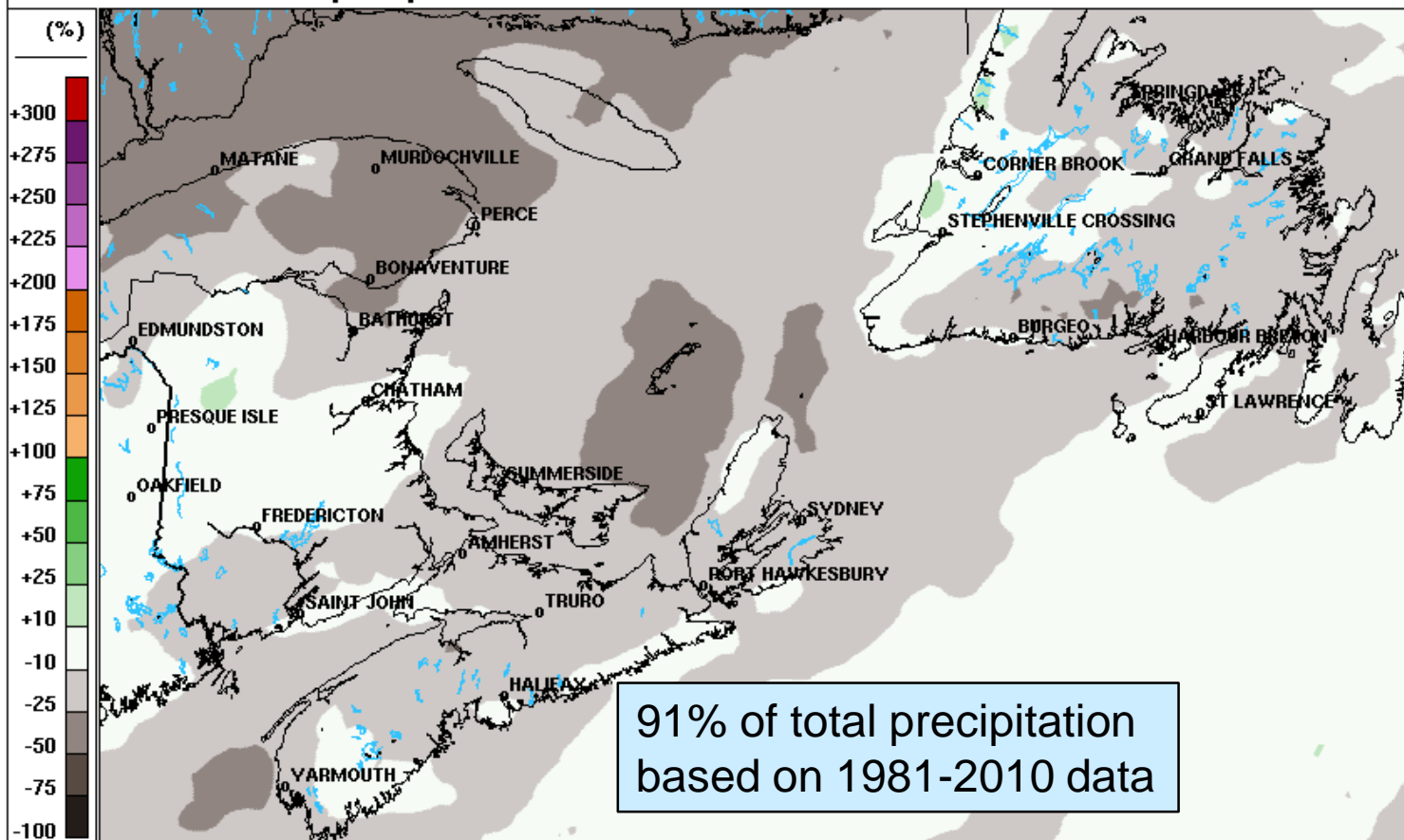
# Winter 2019-20 (D,J,F) Precipitation departure from 2002-2018 mean

Precipitation Relative Anomaly: 2020 DJF  
Anomalie relative de précipitation: 2020 DJF



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ECCC NWP model gridded data / Données sur grille de modèle de PNT de ECCC. Clim: 2002-2018



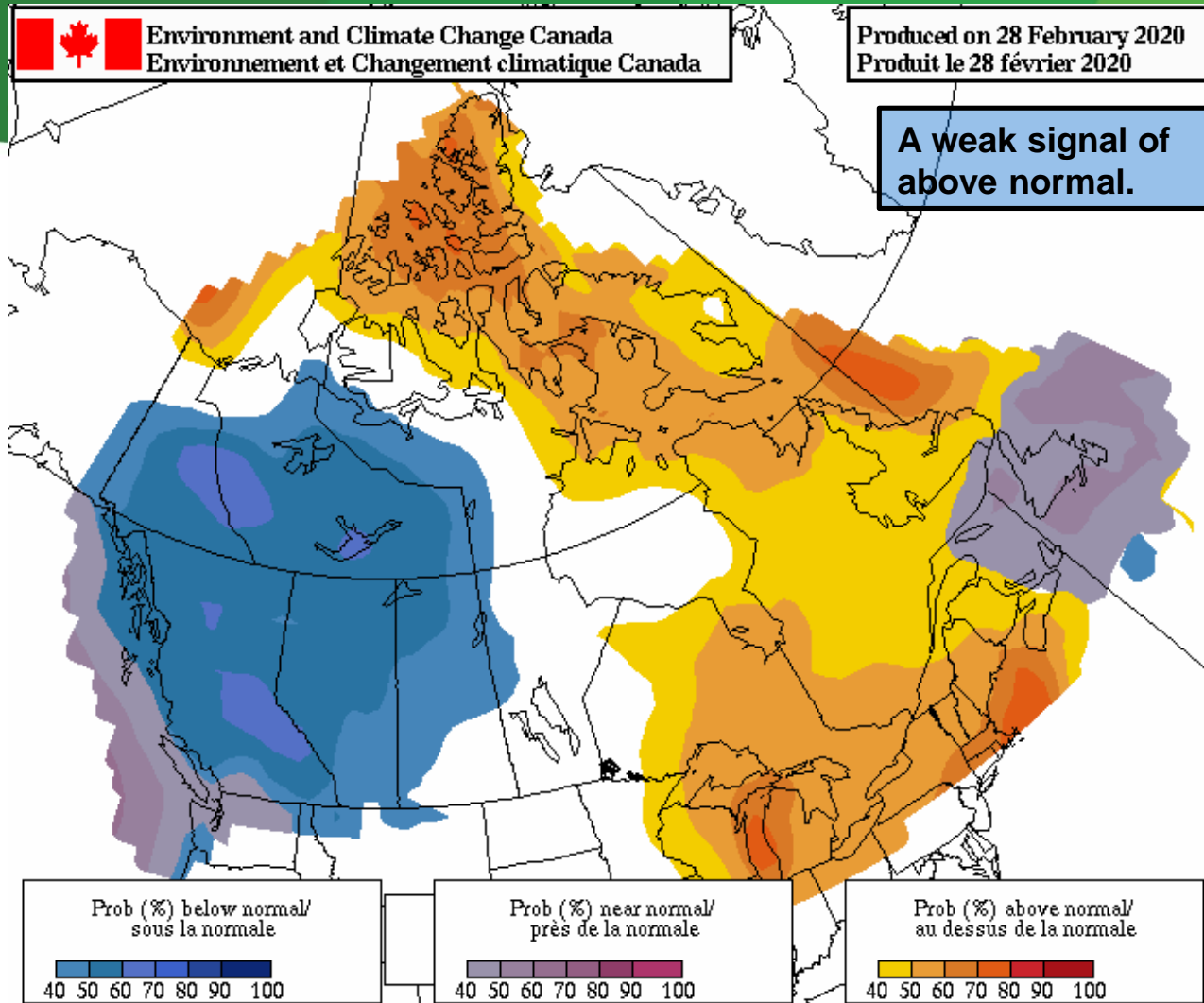
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# Outlook – Spring 2020 (M,A,M)



**Forecast probability of Temperature  
above, below and near normal (calibrated)**  
**Period: March-April-May 2020**  
Based on 3 equiprobable categories  
from 1981-2010 climatology

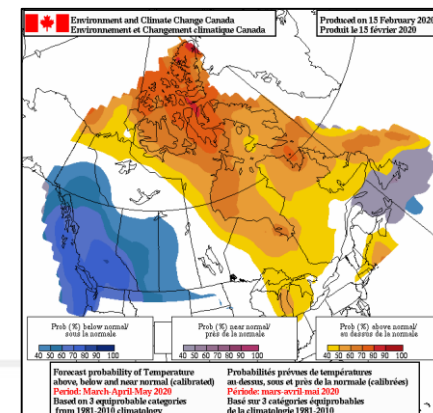
**Probabilités prévues de températures  
au-dessus, sous et près de la normale (calibrées)**  
**Période: mars-avril-mai 2020**  
Basé sur 3 catégories équiprobables  
de la climatologie 1981-2010

## Temperature

**March  
April  
May**

**NB (M, A, M)  
Normal; 10/-1C**

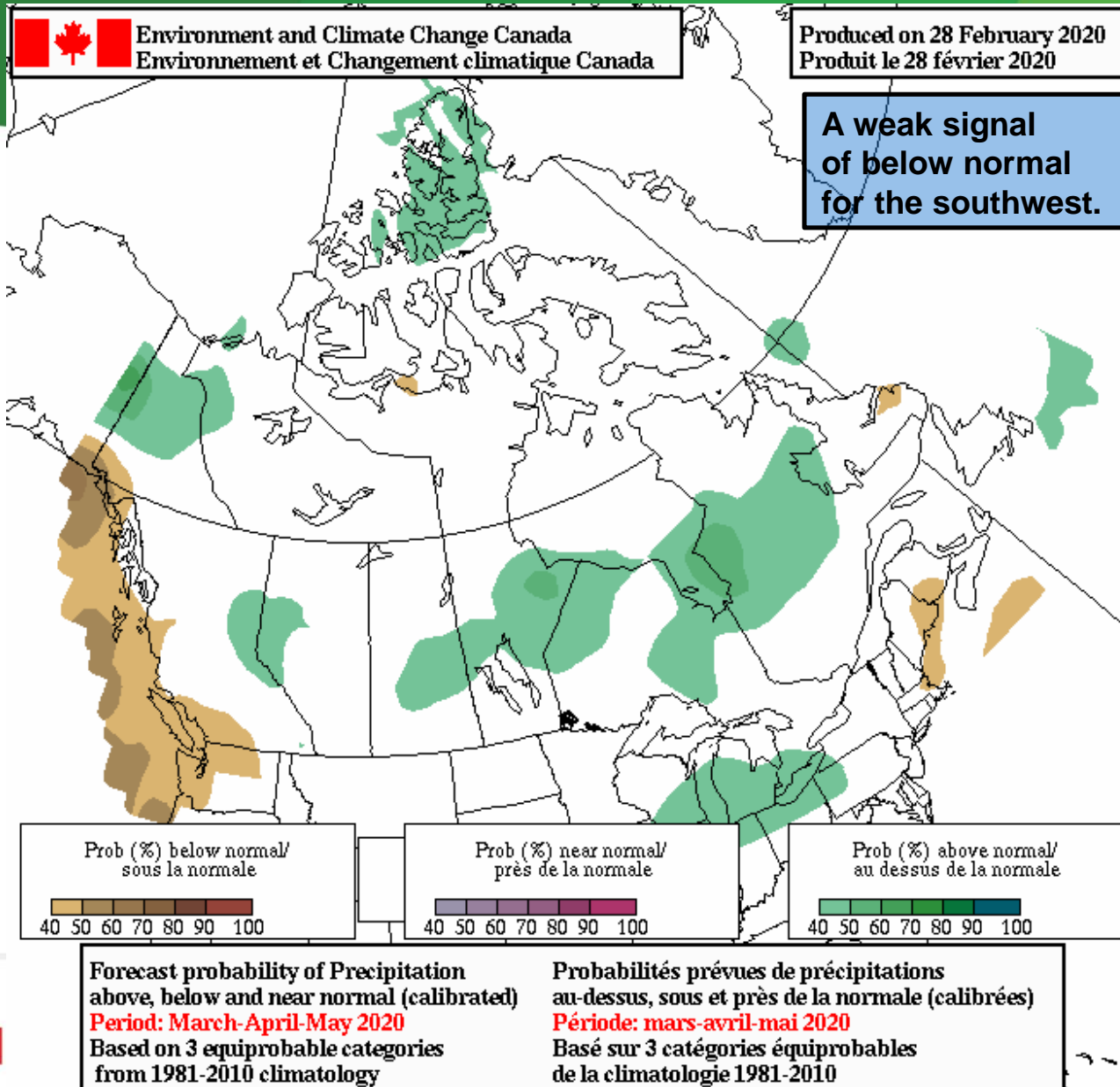
**Produced February 15**



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# Outlook – Spring 2020 (M,A,M)

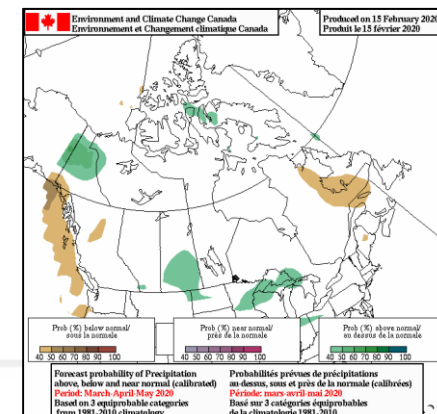


## Precipitation

March  
April  
May

NB (M, A, M)  
Normal; ~275 mm

Produced February 15

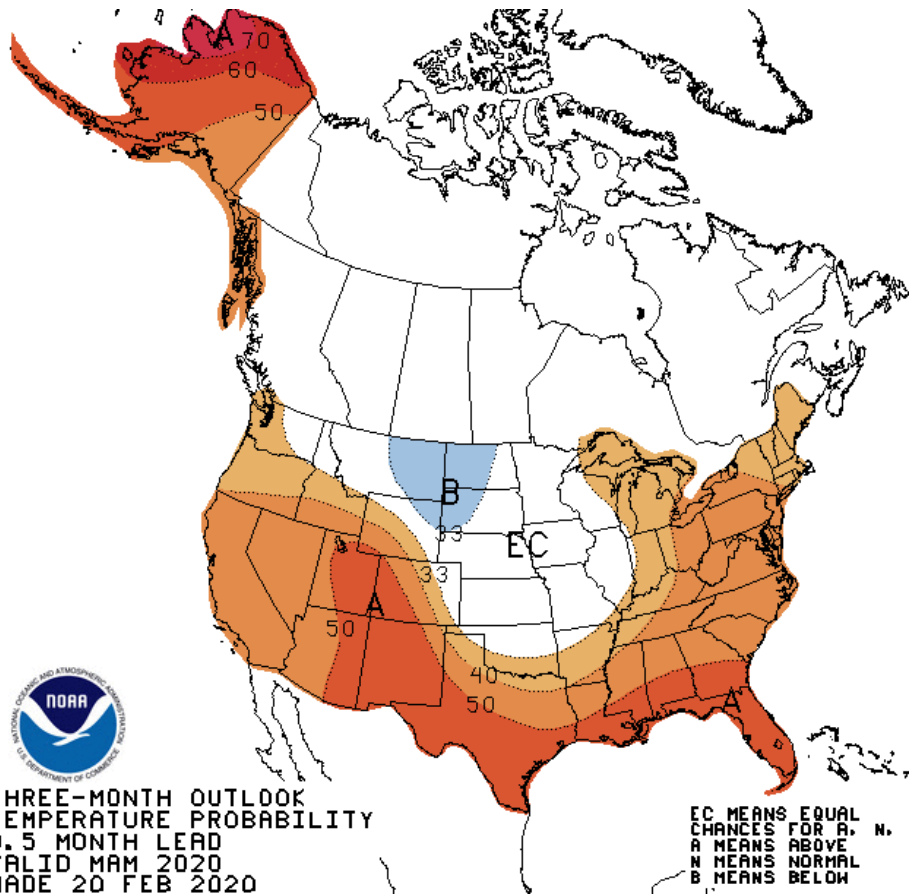


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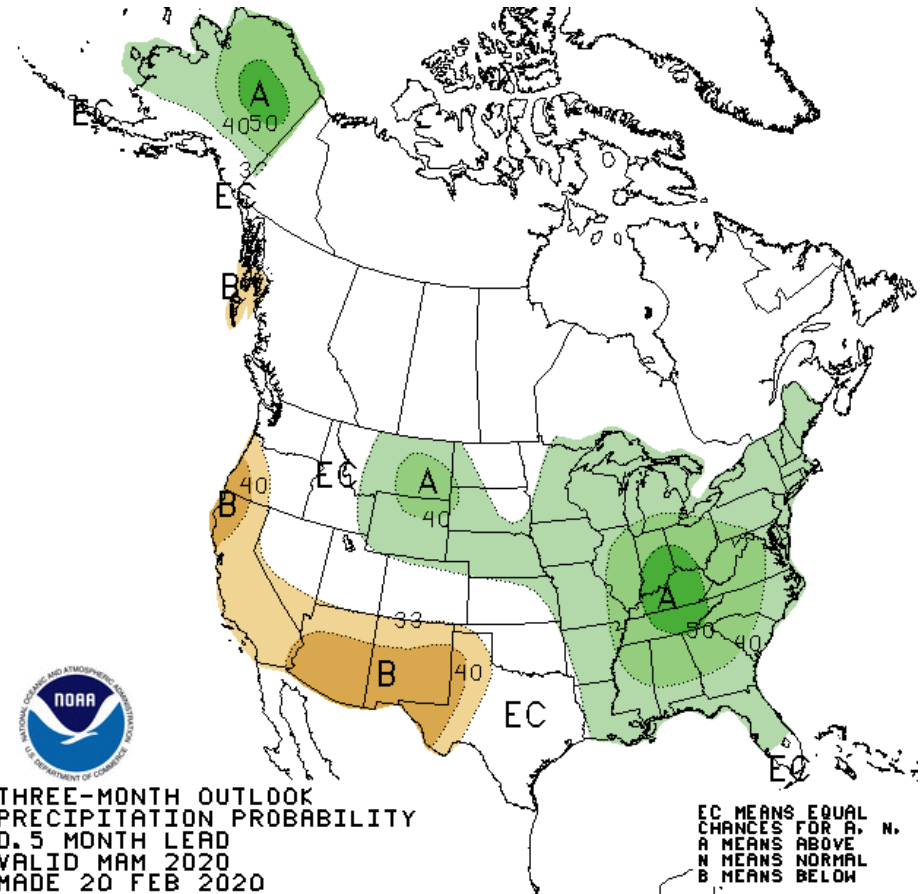


# March – April - May

## Temperature



## Precipitation



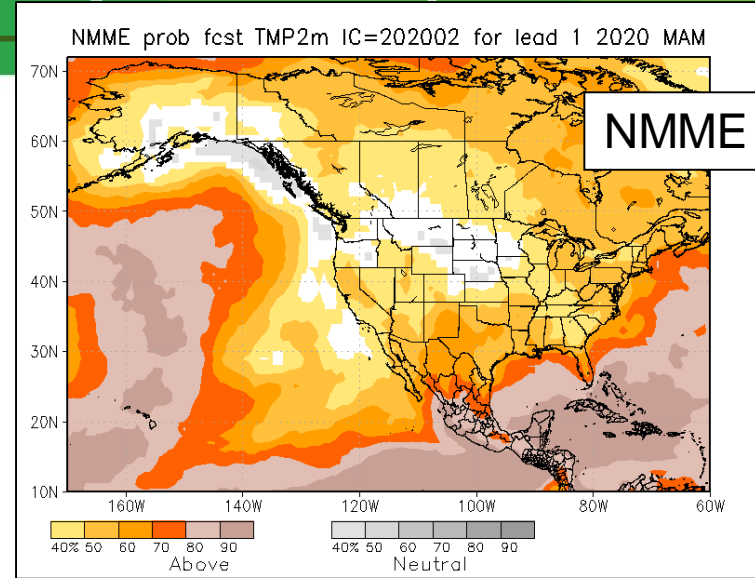
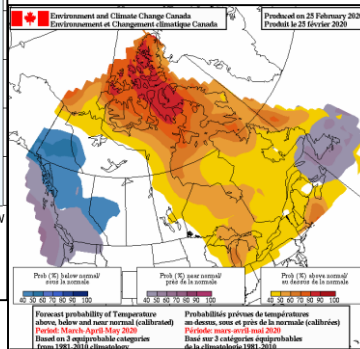
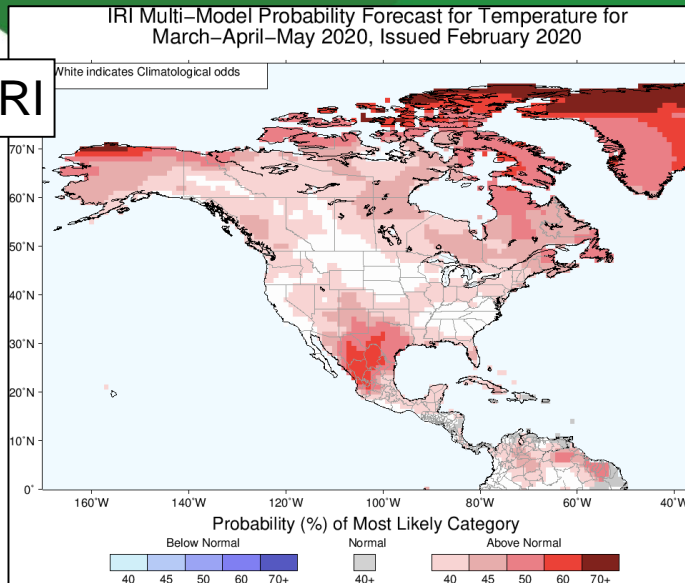
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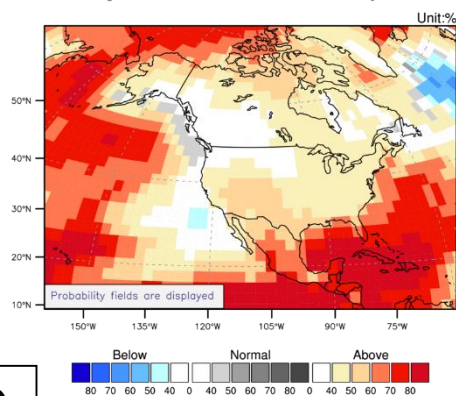
# Spring 2020 Probabilistic Forecast from foreign models (temperature)

IRI



NMME

Temperature at 2m for March-May 2020



APEC

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The most recent

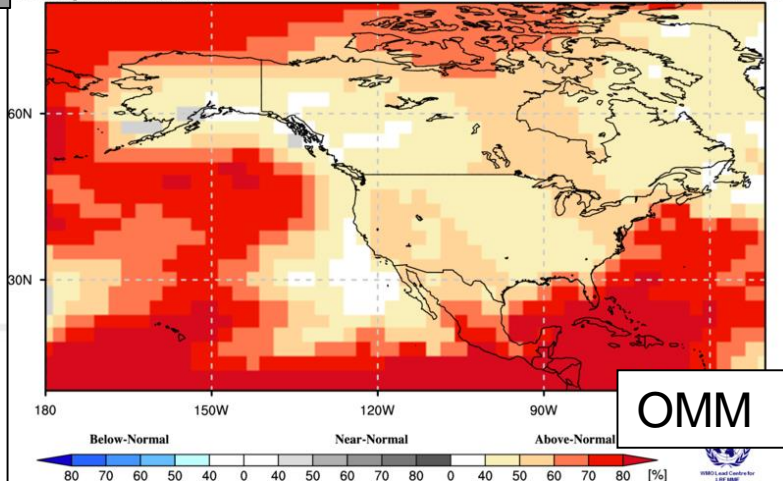
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Probabilistic Multi-Model Ensemble Forecast

CPTEC,ECMWF,Exeter,Melbourne,Montreal,Moscow,Offenbach,Seoul,Tokyo,Toulouse,Washington

2m Temperature : MAM2020

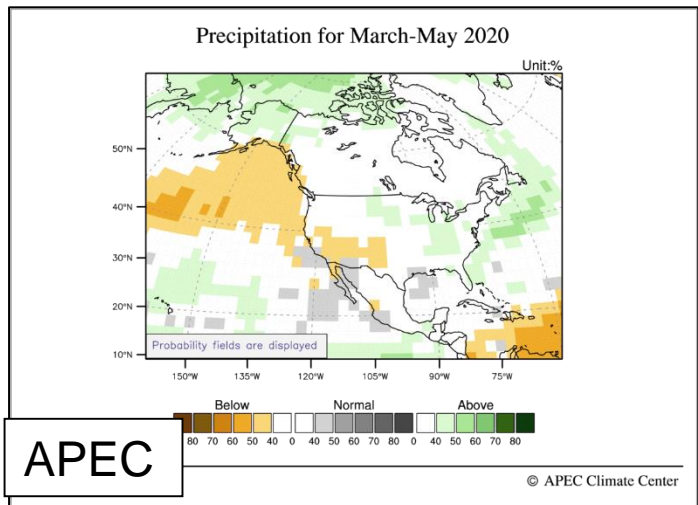
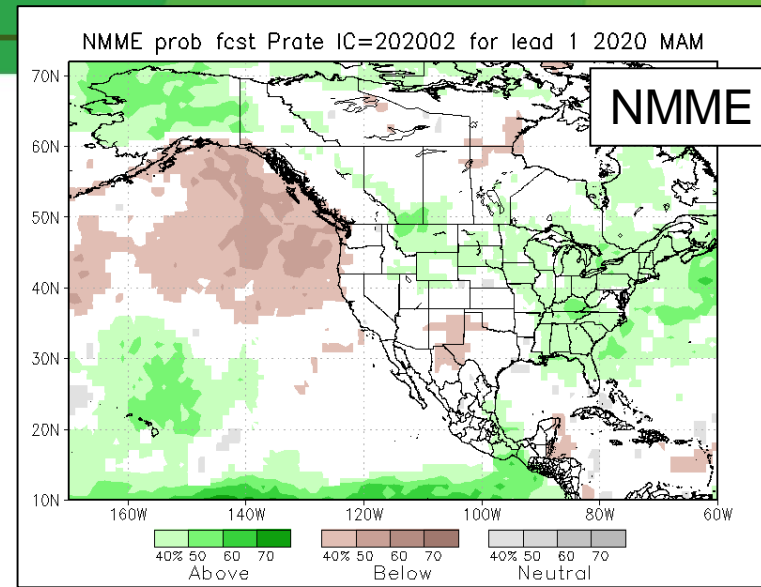
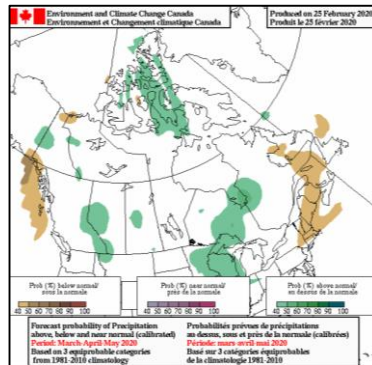
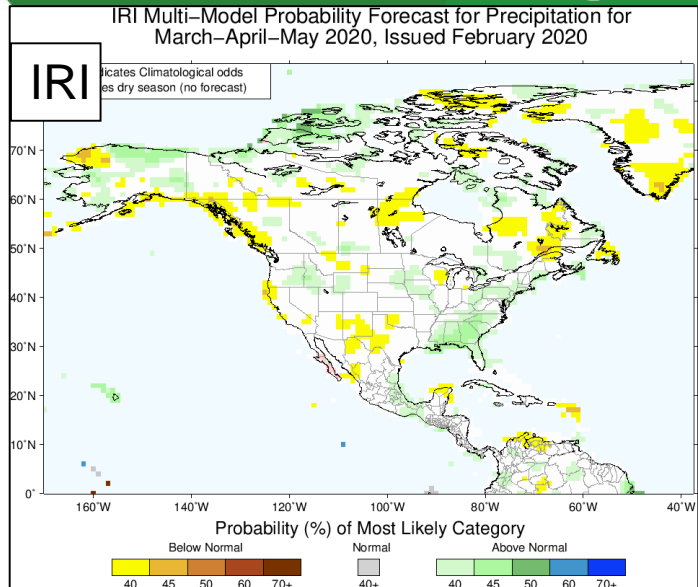
(issued on Feb2020)



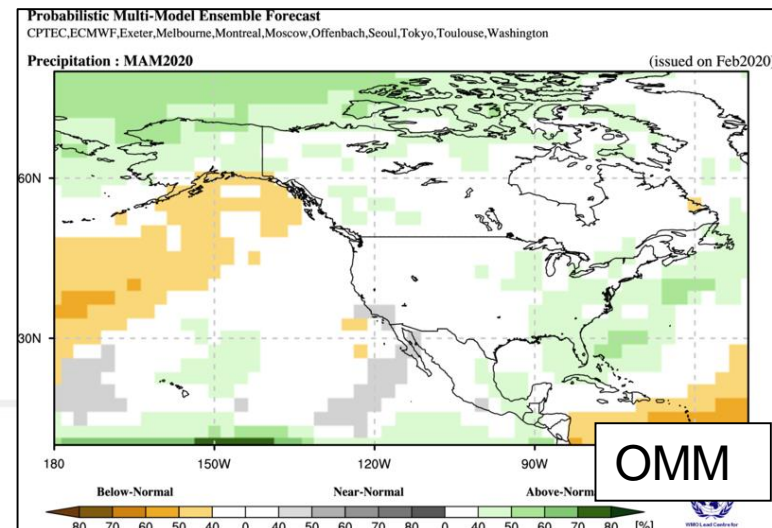
OMM



# Spring 2020 Probabilistic Forecast from foreign models (precipitation)



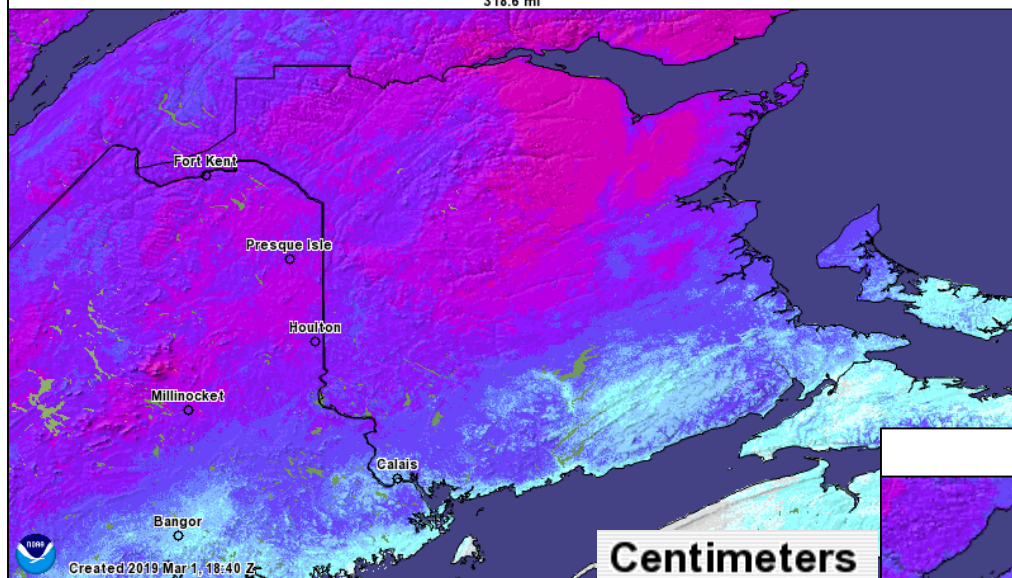
The most recent



# Additional Information

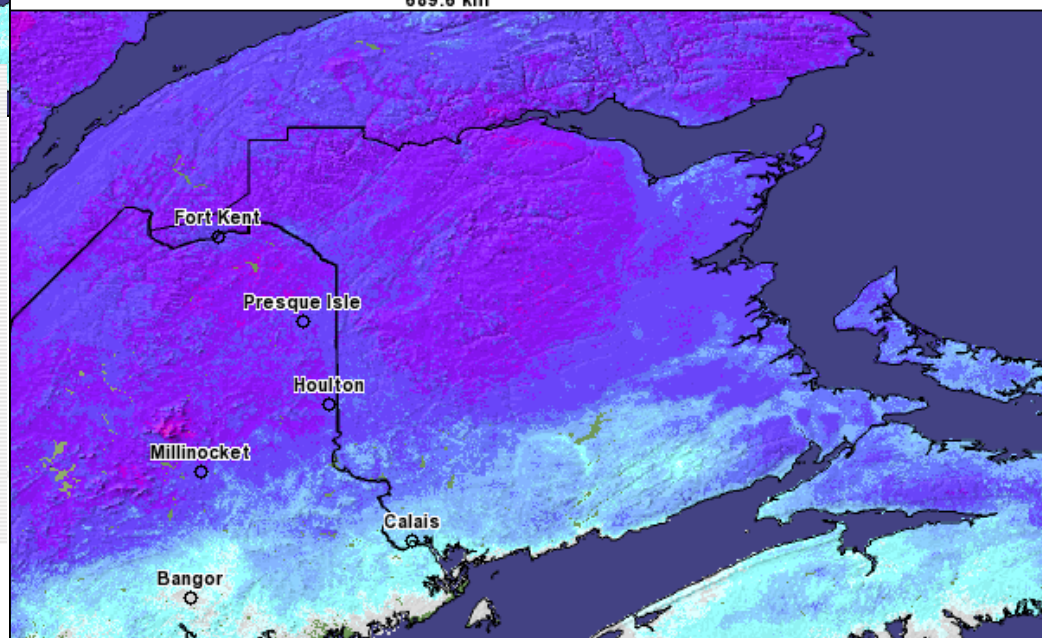
NOAA Model Snow Depth comparison from March 1<sup>st</sup> 2019 & March 1<sup>st</sup> 2020

Modeled Snow Depth for 2019 March 1, 12:00 UTC  
318.6 mi

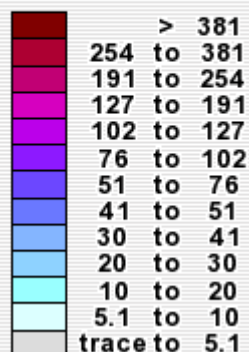


This year

Modeled Snow Depth for 2020 March 1, 12:00 UTC  
689.6 km



Centimeters  
of depth



Last year



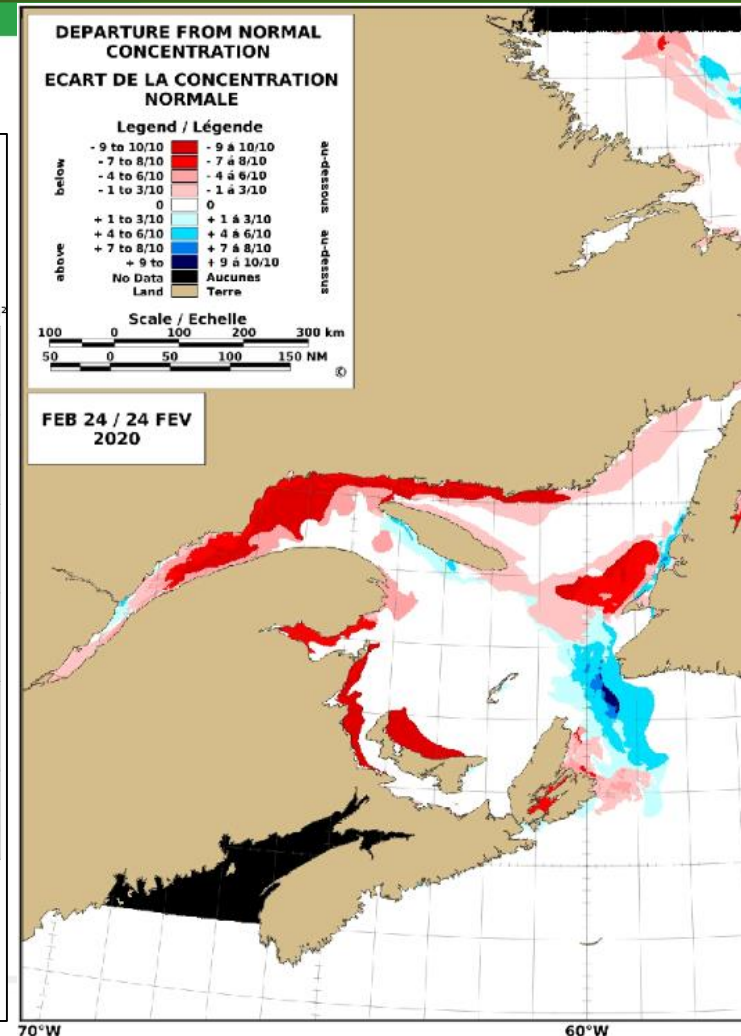
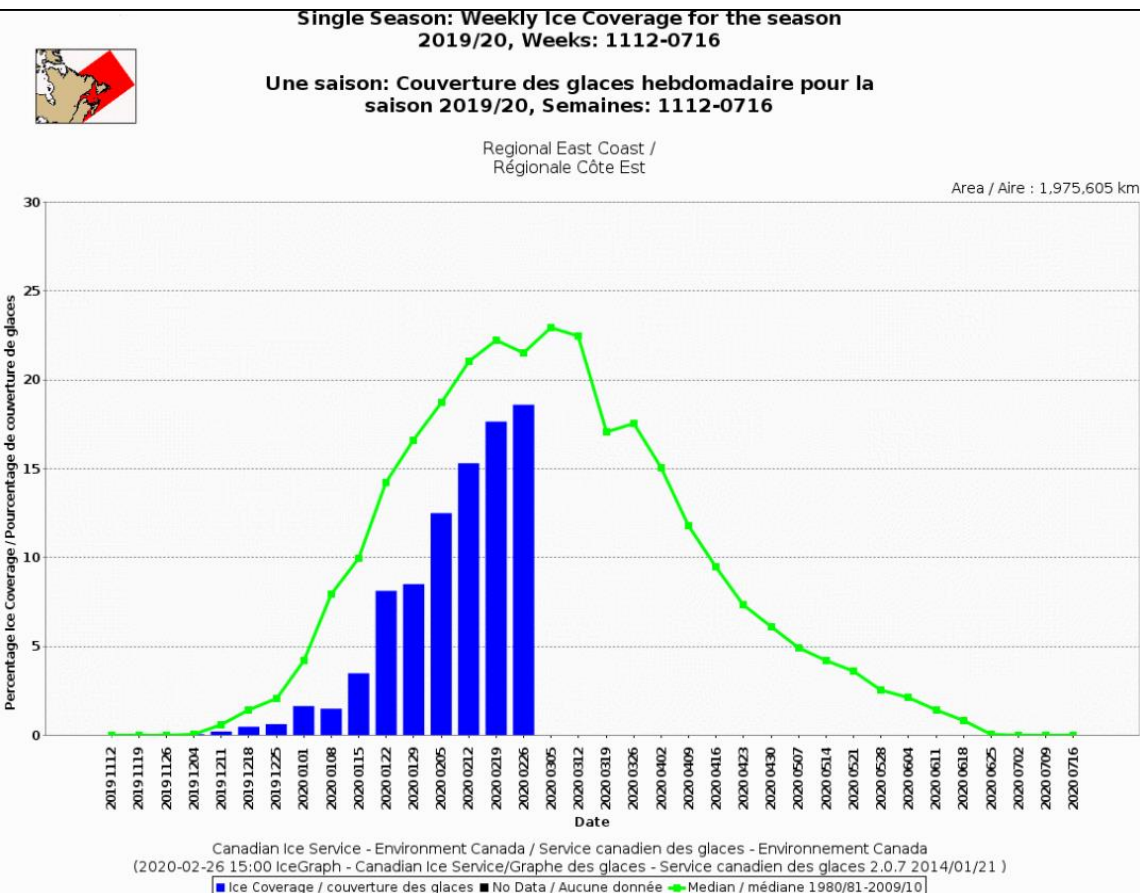
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# Additional Information

The Gulf of St Lawrence sea ice has a significant impact on albedo.



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# Contact

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Canada Weather Pages

[www.weather.gc.ca](http://www.weather.gc.ca)



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