DMI
Ministry of Climate and Energy

Technical Report 14-10

World Weather Records 1991-2000 and 2001-2010 - Denmark, The Faroe Islands and Greenland

John Cappelen

Copenhagen 2014

Colophon

Serial title:
Technical Report 14-10

Title:
World Weather Records 1991-2000 and 2001-2010

Subtitle:
- Denmark, The Faroe Islands and Greenland

Author(s):
John Cappelen

Other contributors:

Responsible institution:
Danish Meteorological Institute

Language:
English

Keywords:
World Weather Records WWR, WMO, climate summary, yearly, annual, mean, period 1991-2000, period 2001-2010, clino 1971-2000 and 1981-2010, air temperature, atmospheric pressure, accumulated precipitation, Denmark, The Faroe Islands, Greenland, DMI monthly climate data collection,

Url:
http://www.dmi.dk/fileadmin/Rapporter/TR/tr14-10

ISSN:
1399-1388

Version:

Website:
www.dmi.dk

Content:

Abstract

A number of climatological data series are published in this report. These are monthly-/annual values and decadal averages for the periods 1991-2000 and 2001-2010 plus 30 years "clino" averages for the periods 1971-2000 and 1981-2010 for 5 locations in Denmark, 1 at the Faroe Islands and 9 in Greenland. The data series is the Danish data contribution to a WMO publication "World Weather Records 2001-2010".

Resumé

Nærværende rapport præsenterer en række danske klimaserier. Det inkluderer måneds-/årsværdier og dekadegennemsnit for perioderne 1991-2000 og 2001-2010 samt 30 års "clino" gennemsnit for perioderne 1971-2000 and 1981-2010 for 5 danske, 1 færøsk og 9 grønlandske lokaliteter. Data serierne er det danske bidrag til WMO publikationen "World Weather Records 2001-2010".

1. Introduction

This report presents a number of climatological data series. These are monthly-/annual values and decadal averages for the periods 1991-2000 and 2001-2010 plus 30 years "clino" averages for the periods 1971-2000 and 1981-2010 for 5 locations in Denmark, 1 at the Faroe Islands and 9 in Greenland based on DMI Monthly Climate Data Collections [1], [2] and [3].

The data series is the Danish data contribution to a WMO publication "World Weather Records/WWR 2001-2010".

The report (pdf-format) and the matching data set can be downloaded from the publication part of DMI web pages (www.dmi.dk).

See also a DMI Technical Report presenting decadal climate summary 1901-2010 for the same selected stations in Denmark, the Faroe Islands and Greenland [4], also based on DMI Monthly Climate Data Collection. The parameters included here are mean temperature, highest and lowest temperature and highest 24 hour precipitation. For the same stations also temperature rankings 2001-2010 are presented. This decadal climate summary and the temperature ranking was the Danish contribution to the WMO report "Decadal Global Climate Summary/DGCS 2001-2010.

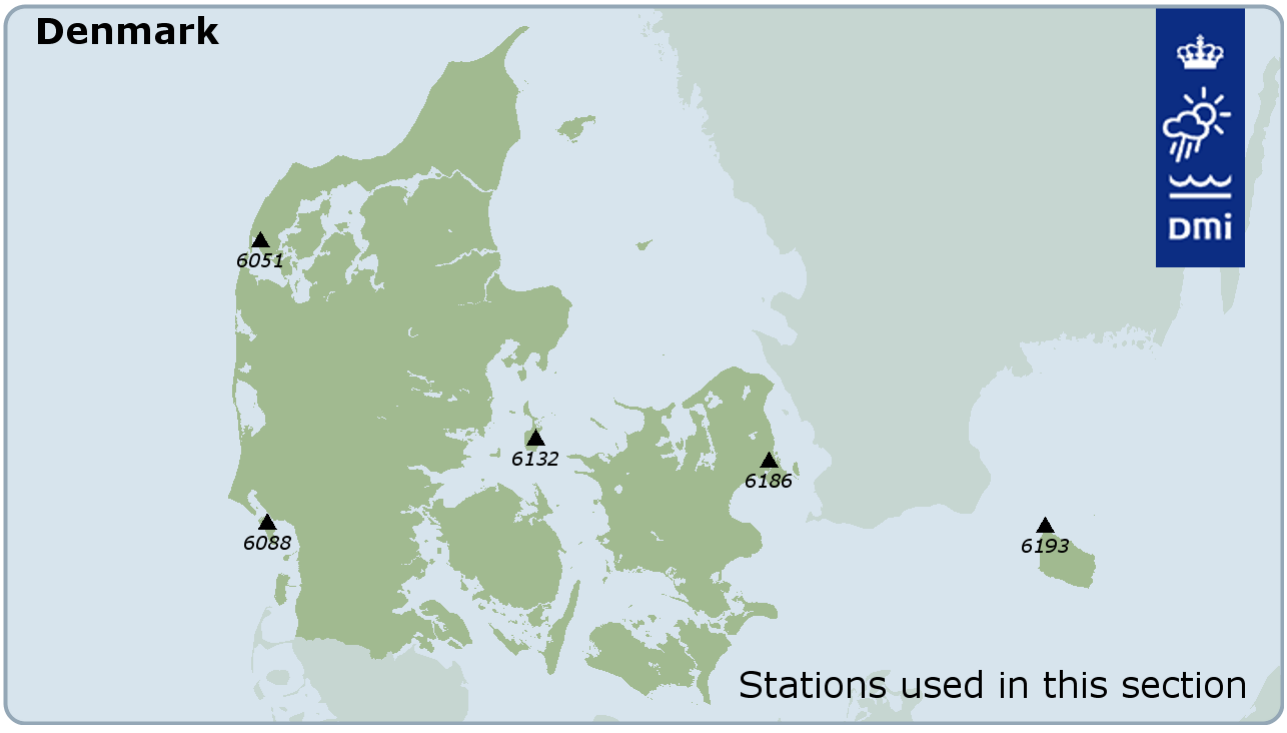
2. Data overview

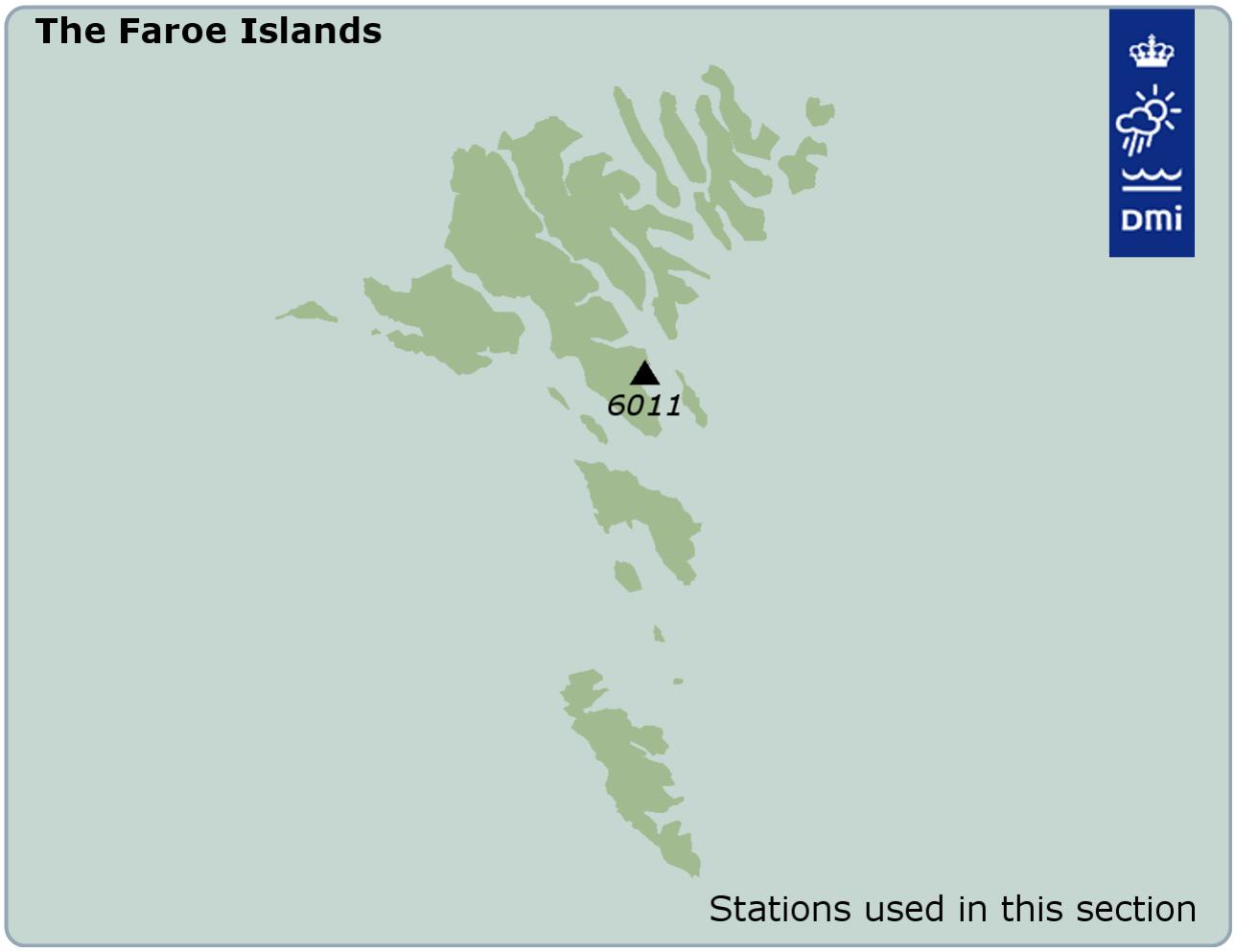
2.1 Station Overview

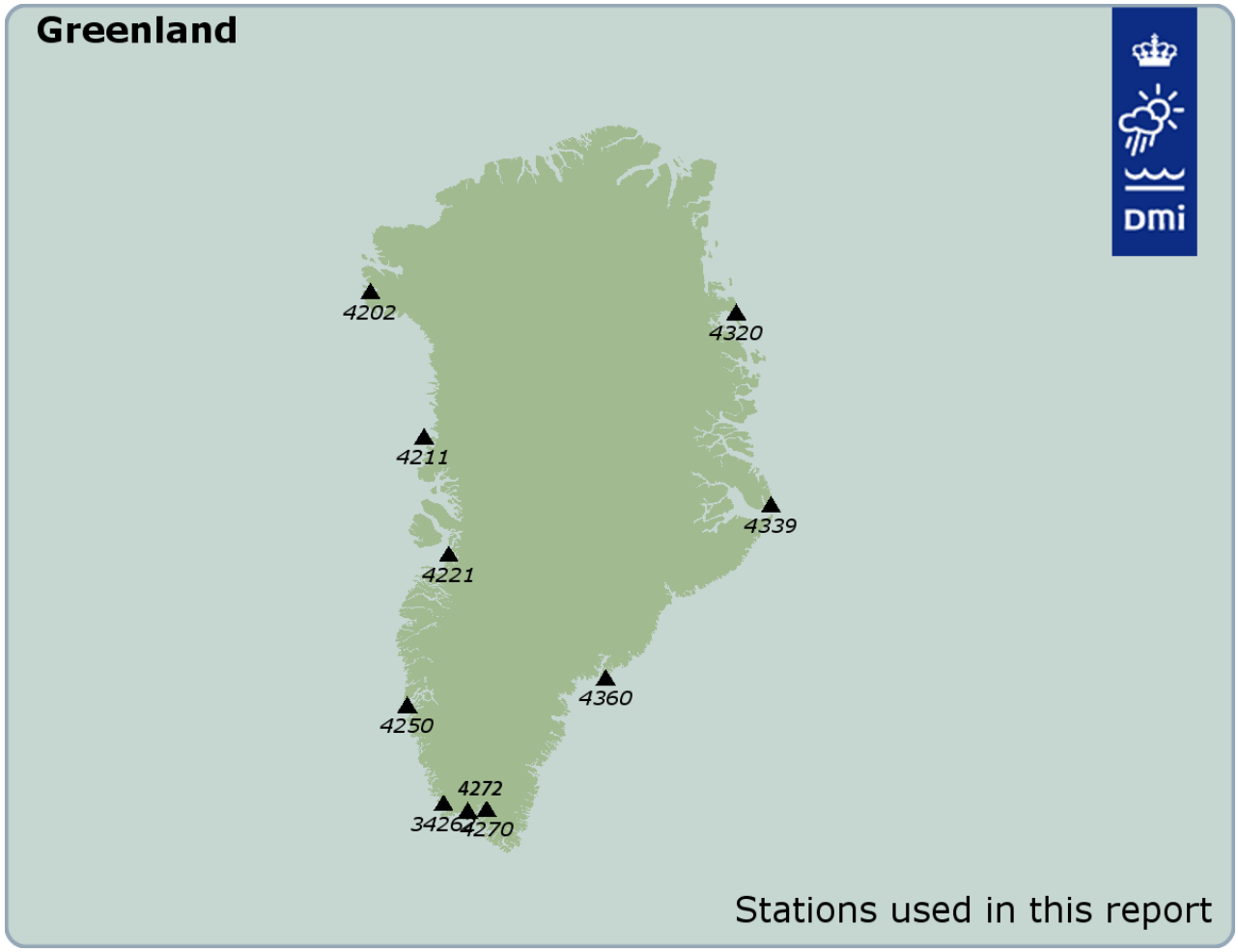
Country	Station number	Station	Latitude	Longitude	Stat height (above msl)	Bar height (above msl)
DK	06051	Vestervig (pressure from 6052)	5646N	0819E	18	3,6
DK	06088	Nordby (pressure 6080, 6081 and 6096)	5527N	0824E	4	8,9
DK	06132	Tranebjerg (pressure from 6159)	5550N	1073E	16	15,8
DK	06186	Landbohøjskolen (Kbh) (pressure 6180)	5541N	1233E	7	5,0
DK	06193	Hammer Odde Fyr	5518N	1446E	8	9,4
FR	06011	Tórshavn	6201N	0646E	54	55,9
GR	04202	Pituffik (only temperature)	7632N	6845W	77	
GR	04211	Upernavik	7347N	5608W	126	130,0
GR	04221	Ilulissat	6914N	5104W	29	34,0
GR	04250	Nuuk	6411N	5144W	80	83,7
GR	04270	Narsarsuaq	6110N	4525W	34	31,0
GR	04272	Qaqortoq (only temperature)	6043N	4603W	57	
GR	04320	Danmarkshavn	7647N	1840W	11	12,0
GR	04339	Ittoqqortoormiit	7029N	2157W	70	71,5
GR	04360	Tasiilaq	6537N	3738W	54	55,9

Table 1. Primary stations used in this report. See maps below for the locations. The maps are from [1], [2] and [3], where the source of the "World Weather Records" datasets are published as long monthly time series.

Please notice that 34262 Ivittuut is included in the Greenland map, despite it is not a part of this report. The mean monthly temperature series from 34262 Ivittuut is adjusted to Narsarsuaq series in the data set [2] and can be used as a joined long time series. 34339 Scoresbysund, located the same place as 4339 Ittoqqortoormiit and therefore not shown on the map, is also not a part of this report, but part of [2]. It is not adjusted to 4339! More details can be seen in [1,2,3] and chapter 3 Station History.




The Faroe Islands
6011
Stations used in this section


Greenland
4202
4320
4211
4339
4221
4360
4250
4272
3426
4270
Stations used in this report

2.2 Data Dictionary

DMI No	WWR No	Element	Unit
101	4	Mean temperature	°C
111	6	Mean of daily maximum temperature	°C
121	7	Mean of daily minimum temperature	°C
401	3	Mean atmospheric pressure	hPa
601	5	Accumulated precipitation	mm

Table 2. Elements used in this report.

3. Station History

By convention a time series is named after the most recent primary station delivering the data. Below is presented an overview back in time of the positions and relocations and starting and (if any) closing dates of the long station time series, which forms the backbone of the data sets included in this report [1], [2] and [3]. Also presented in the tables are any positions or relocations and starting and closing dates of other stations forming part of the series and therefore referred to in the description of the data series. More metadata on the series/stations may be found in [1,2,3,5].

Table 3. Station history from [1], [2] and [3]. The most recent primary stations are grey shaded. First year of data appearance is included for every station.

6051 Vestervig from 1874

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
21100	Vestervig	01-JUN-1873	30-JUN-1879	clima_man	32V	6291160	459820	82100	564600	47
21100	Vestervig	01-JUL-1879	18-SEP-1883	clima_man	32V	6292610	458640	81900	564600	25
21100	Vestervig	19-SEP-1883	16-AUG-1892	clima_man	32V	6291380	458510	81900	564600	18
21100	Vestervig	17-AUG-1892	30-JUN-1924	clima_man	32V	6291395	458670	81900	564600	22
21100	Vestervig	01-JUL-1924	12-APR-1937	clima_man	32V	6291410	458210	81900	564600	17
21100	Vestervig	13-APR-1937	31-MAR-1946	clima_man	32V	6291225	458420	81900	564600	27
21100	Vestervig	01-APR-1946	01-JAN-2000	clima_man	32V	6291500	458550	81900	564600	18
21100	Vestervig	02-JAN-2000	01-APR-2011	precip_man	32V	6291500	458550	81900	564600	18
21100	Vestervig	02-OCT-2002		snow_man	32V	6291500	458550	81900	564600	18
21100	Vestervig	17-FEB-2000		clima_aut	32V	6291500	458550	81900	564600	18
21120	Erslev	01-JUN 1987	30-JUN 1993	precip_man	32V	6299280	483340	84400	565000	20
21120	Erslev	01-JUL 1993	01-APR-2011	precip_man	32V	6299090	483590	84400	565000	26
24020	Bovbjerg Fyr	01-MAR-1989	01-AUG-1999	precip_man	32V	6263740	445950	80700	563100	41
6019	Silstrup	22-MAR-2002		synop_dk	32V	6309770	478234	83800	565600	41
6051	Vestervig	11-SEP-2003		synop_dk	32V	6291500	458550	81900	564600	18
6052	Thyborøn	01-JAN-1961	06-FEB-1985	synop_dk	32V	6285030	452360	81300	564200	3
6052	Thyborøn	07-FEB-1985	21-NOV-2000	synop_dk	32V	6284510	452410	81300	564200	2
6052	Thyborøn	22-NOV-2000		synop_dk	32V	6285229	452016	81300	564200	2
6030	FSN Aalborg	01-JAN-1953		synop_dk	32V	6328631	551614	95100	570600	3
6041	Skagen Fyr	01-JAN-1953	13-DEC-2000	synop_dk	32V	6400730	597240	103800	574400	3
6041	Skagen Fyr	14-DEC-2000		synop_dk	32V	6400740	597229	103800	574400	3
6058	Hvide Sande	01-JAN-1989	06-NOV-2001	synop_dk	32V	6206680	445780	80900	560000	3
6058	Hvide Sande	07-NOV-2001		synop_dk	32V	6207425	446531	80900	560000	2
6060	FSN Karup	01-JAN-1953		synop_dk	32V	6238950	507130	90700	561800	52

6088 Nordby from 1872

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
25140	Nordby	01-SEP-1871	30-APR-1892	clima_man	32U	6144290	462050	82400	552700	4
25140	Nordby	01-MAY-1892	30-NOV-1899	clima_man	32U	6144695	462190	82400	552700	4
25140	Nordby	01-DEC-1899	29-FEB-1904	clima_man	32U	6144290	462050	82400	552700	4
25140	Nordby	01-MAR-1904	29-FEB-1928	clima_man	32U	6144260	462040	82400	552700	4
25140	Nordby	01-MAR-1928	04-APR-1936	clima_man	32U	6144940	462170	82400	552700	4
25140	Nordby	05-APR-1936	15-DEC-1944	clima_man	32U	6144610	462055	82400	552700	5
25140	Nordby	16-DEC-1944	20-NOV-1955	clima_man	32U	6144790	462400	82400	552700	3
25140	Nordby	21-NOV-1955	22-AUG-1960	clima_man	32U	6145210	462330	82400	552700	5
25140	Nordby	23-AUG-1960	10-SEP-1979	clima_man	32U	6144210	461780	82400	552600	6
25140	Nordby	11-SEP-1979	13-JAN-1994	clima_man	32U	6144230	461760	82400	552600	6
25140	Nordby	14-JAN-1994	14-FEB-1996	clima_man	32U	6145165	462375	82400	552700	3
25140	Nordby	15-FEB-1996	01-JAN-2000	clima_man	32U	6145060	462120	82400	552700	4
25140	Nordby	02-JAN-2000	01-JAN-2009	precip_man	32U	6145060	462120	82400	552700	4
25140	Nordby	07-FEB-2000		clima_aut	32U	6145060	462120	82400	552700	4
25140	Nordby	02-JAN-2000	01-OCT-2002	snow_man	32U	6145060	462120	82400	552700	4
25135	Langli	01-JUL-1987	01-SEP-1999	precip_man	32U	6152210	456890	81900	553100	3
25135	Langli	02-JUN-2000	01-DEC-2000	precip_man	32U	6152210	456890	81900	553100	3
25145	Sønderho	01-JUN-1988	23-AUG-1999	precip_man	32U	6134345	466300	82800	552100	4
25145	Sønderho	24-AUG-1999	01-APR-2009	precip_man	32U	6134432	466300	82800	552100	4
25171	Esbjerg R/A V	04-JAN-1979	06-JUN-1985	precip_aut	32U	6149460	464000	82600	552900	3
25171	Esbjerg R/A V	26-AUG-1985	15-JAN-1989	precip_aut	32U	6149500	464120	82600	552900	3
25171	Esbjerg R/A V	16-JAN-1989	06-AUG-1990	precip_aut	32U	6149440	464035	82600	552900	3
25171	Esbjerg R/A V	07-AUG-1990	23_MAY-2012	precip_aut	32U	6149430	464030	82600	552900	3

25171	Esbjerg R/A V	24-MAY-2012		precip_aut	32U	6149500	464020	82600	552900	3
25172	Hjerting	01-DEC-1985	09-JUN-1986	precip_man	32U	6152591	460557	82300	553100	9
25172	Hjerting	10-JUN-1986	01-JAN-2007	precip_man	32U	6152596	460558	82300	553100	9
6088	Nordby	23-JUL-2003	04-JUL-2007	synop_dk	32U	6145042	462144	82400	552700	4
6088	Nordby	05-JUL-2007		synop_dk	32U	6145060	462119	82400	552700	4
6080	Esbjerg Lufthavn	01-JAN-1959	31-MAR-1971	synop_dk	32U	6151640	467420	82900	553000	25
6080	Esbjerg Lufthavn	01-APR-1971	30-SEP-1984	synop_dk	32U	6153140	471550	83300	553100	29
6080	Esbjerg Lufthavn	01-OCT-1984		synop_dk	32U	6153850	472500	83400	553200	24
25348	Vester Vedsted	06-MAY-1986		clima_aut	32U	6127450	478170	84000	551800	3
6081	Blåvandshuk Fyr	01-JAN-1959	31-DEC-1971	synop_dk	32U	6157430	442240	80500	553300	13
6081	Blåvandshuk Fyr	18-SEP-1980		synop_dk	32U	6157450	442210	80500	553300	13
6093	Vester Vedsted	11-DEC-2003		synop_dk	32U	6127450	478170	84000	551800	3
6096	Rømø/Juvre	02-MAY-1982	06-APR-2000	synop_dk	32U	6116310	472070	83400	551100	4
6096	Rømø/Juvre	07-APR-2000		synop_dk	32U	6116290	472065	83400	551100	6
6058	Hvide Sande	01-JAN-1989	06-NOV-2001	synop_dk	32V	6206680	445780	80900	560000	3
6058	Hvide Sande	07-NOV-2001		synop_dk	32V	6207425	446531	80900	560000	2
25045	Outrup	1-OCT-2004	14-NOV-2006	snow_man	32U	6175575	458141	82000	554300	17
25045	Outrup	15-NOV-2006	24-OCT-2012	snow_man	32U	6175311	458776	82100	554300	15
25045	Outrup	25-OCT-2012		snow_man	32U	6175662	458165	82002	554325	18

6132 Tranebjerg from 1872

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
27080	Tranebjerg	01-DEC-1872	28-FEB-1877	clima_man	32U	6188790	600080	103600	555000	15
27080	Tranebjerg	01-MAR-1877	31-MAR-1884	clima_man	32U	6188885	599720	103500	555000	17
27080	Tranebjerg	01-APR-1884	31-MAY-1918	clima_man	32U	6188890	599630	103500	555000	17
27080	Tranebjerg	01-JUN-1918	30-APR-1950	clima_man	32U	6188850	599630	103500	555000	17
27080	Tranebjerg	01-MAY-1950	31-OCT-1972	clima_man	32U	6188910	599730	103600	555000	15
27080	Tranebjerg	01-NOV-1972	01-FEB-2000	clima_man	32U	6190400	600010	103600	555100	11
27080	Tranebjerg	02-FEB-2000	29-FEB-2000	precip_man	32U	6190400	600010	103600	555100	11
27080	Tranebjerg	15-FEB-2000	29-FEB-2000	clima_aut	32U	6190400	600010	103600	555100	11
27080	Tranebjerg	01-MAR-2000	10-AUG 2003	clima_aut	32U	6190468	600052	103600	555100	12
27080	Tranebjerg Øst	20-AUG-2003		clima_aut	32U	6188815	601610	103700	555000	16
6132	Tranebjerg Øst	20-AUG-2003		synop_dk	32U	6188815	601610	103700	555000	16
27080	Tranebjerg	01-MAR-2000	01-AUG-2001	precip_man	32U	6190468	600052	103600	555100	12
27082	Tranebjerg Øst	02-AUG-2001	17-NOV-2009	precip_man	32U	6188800	601435	103700	555000	18
27082	Tranebjerg Øst	18-NOV-2009	01-APR-2011	precip_man	32U	6188798	601458	103700	555000	18
5165	Tranebjerg Øst	18-NOV-2010	25-SEP-2011	synop_dk	32U	6188800	601458	103711	554958	18
5165	Tranebjerg Øst	26-SEP-2011		synop_dk	32U	6188796	601457	103711	554958	18
27082	Tranebjerg Øst	01-OCT-2004	01-APR-2011	snow_man	32U	6188800	601435	103700	555000	18
27082	Tranebjerg Øst	02-APR-2011		snow_man	32U	6188798	601458	103700	555000	18
27070	Langør	01-JUN-1871	31-MAY-1880	precip_man	32U	6197690	602720	103900	555500	3
27070	Langør	01-JUN-1880	31-MAY-1928	precip_man	32U	6198330	602320	103800	555500	4
27070	Langør	01-JAN-1929	31-OCT-1946	precip_man	32U	6198480	601270	103700	555500	3
27070	Langør	01-NOV-1946	31-DEC-1959	precip_man	32U	6198480	601820	103800	555500	2
27070	Langør	01-JAN-1960	31-MAY-1977	precip_man	32U	6198480	601270	103700	555500	3
27070	Langør	01-JUN-1977	29-FEB-1996	precip_man	32U	6198480	601820	103800	555500	2
27070	Langør	01-MAR-1996	01-MAY-1997	precip_man	32U	6198435	601255	103700	555500	3
27090	Ørnslund	01-JAN-1864	30-SEP-1881	precip_man	32U	6182900	600180	103600	554700	11
27090	Ørnslund	01-OCT-1881	31-DEC-1958	precip_man	32U	6183200	599650	103500	554700	6
27090	Brattingsborg	01-MAY-1958	31-DEC-1970	precip_man	32U	6183400	599477	103500	554700	6
27090	Brattingsborg	01-JAN-1971	01-JUN-2004	precip_man	32U	6183332	599485	103500	554700	6
28180	Blangstedgaard	01-JUL-1885	31-DEC-1982	clima_man	32U	6138250	591690	102700	552300	15
6159	Røsnæs Fyr	01-JAN-1959	14-NOV-2001	synop_dk	32U	6179330	617414	105200	554500	15
6159	Røsnæs Fyr	15-NOV-2001		synop_dk	32U	6179323	617440	105200	554500	14
6073	Sletter Hage Fyr	15-MAY-2001		synop_dk	32V	6217948	594242	103100	560600	3
6120	Odense Lufth.	01-JAN-1959	30-JUN-1975	synop_dk	32U	6148495	584135	102000	552800	16
6120	Odense Lufth.	01-JUL-1975		synop_dk	32U	6148648	584180	102000	552900	15
6169	Gniben	01-JAN-1961	31-JUL-1974	synop_dk	32V	6209380	642270	111700	560000	4
6169	Gniben	01-AUG-1974	31-MAR-1979	synop_dk	32V	6209340	642190	111700	560000	10
6169	Gniben	01-APR-1979	14-FEB-1983	synop_dk	32V	6209560	642140	111700	560100	13
6169	Gniben	15-FEB-1983		synop_dk	32V	6209569	642133	111700	560100	13

6186 Københavns Landbohøjskole from 1768

This station has been subject to urban change. Back in time the surroundings were rural whereas today the park of Landbohøjskolen with the synoptic station is surrounded by the city of Copenhagen. Observations in Copenhagen started 1751 in the tower "Rundetårn", but the first 16 years the thermometer was situated inside a room in a little observatory near the top of the tower. In the beginning of 1767 the thermometer was situated outside the observatory facing north and from 1768 the observations were taken 4 times a day. Therefore the series presented in this report starts 1768.

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
30380	Landbohøjskolen	01-JAN-1860	01-JUL-1997	clima_man	33U	6173560	345420	123200	554100	9
6186	Landbohøjskolen	29-NOV-1995	12-JUN-1997	synop_dk	33U	6173560	345420	123200	554100	9
6186	Landbohøjskolen	13-JUN-1997		synop_dk	33U	6174090	345670	123300	554100	7
6180	Københavns Lufthavn	01-JAN-1953	30-JUN-1955	synop_dk	33U	6167070	352740	124000	553800	2
6180	Københavns Lufthavn	01-JUL-1955	30-JUN-1959	synop_dk	33U	6167170	352110	123900	553800	3
6180	Københavns Lufthavn	01-JUL-1959	13-JUL-1971	synop_dk	33U	6166370	352440	123900	553700	3
6180	Københavns Lufthavn	14-JUL-1971	15-JUN-1983	synop_dk	33U	6165550	351570	123900	553700	4
6180	Københavns Lufthavn	16-JUN-1983		synop_dk	33U	6165840	351770	123900	553700	5
6183	Drogden Fyr	01-JAN-1961		synop_dk	33U	6157060	355647	124300	553200	6
30340	Københavns Toldbod	01-JAN-1886	31-DEC-1949	fuess	33U	6174250	349070	123600	554100	20
30340	Københavns Toldbod	01-JAN-1950	30-JUN-1976	fuess	33U	6174240	349110	123600	554100	20
30340	Københavns Toldbod	01-JAN-1978	30-JUN-1997	fuess	33U	6174240	349110	123600	554100	20
30340	Københavns Toldbod	01-MAY-1968	03-APR-2005	casella	33U	6174240	349110	123600	554100	20
30341	Københavns Toldbod	20-FEB-2004		clima_aut	33U	6174240	349110	123600	554100	20
30370	Botanisk Have	01-JAN-1971	01-APR-2011	precip_man	33U	6174200	347570	123500	554100	6
5735	Botanisk Have	14-JAN-2010	28-NOV-2011	synop_dk	33U	6174196	347575	123431	554118	6
5735	Botanisk Have	28-NOV-2011	23-JUL-2012	synop_dk	33U	6174199	347574	123431	554118	6
5735	Botanisk Have	24-JUL-2012		synop_dk	33U	6174194	347557	123430	554118	6
30370	Botanisk Have	01-OCT-2004	01-APR-2011	snow_man	33U	6174200	347570	123500	554100	6
30370	Botanisk Have	02-APR-2011		snow_man	33U	6174193	347579	123500	554100	6
30372	Rundetårn	01-JAN-1751	31-DEC-1817	clima_man	33U	6173480	347655	123437	554055	7*)
30371	Gl. Botanisk Have	01-JAN-1818	31-DEC-1859	clima_man	33U	6173160	348485	123525	554045	3

*) The ground level of the tower is 7 m above MSL. The thermometer was situated app. 43 m above MSL.

6193 Hammer Odde Fyr/Lighthouse from 1873

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
32030	Sandvig	11-NOV-1872	31-AUG-1953	clima_man	33U	6127090	486180	144700	551700	13
32030	Sandvig	01-SEP-1953	30-JUN-1966	clima_man	33U	6127105	486140	144700	551700	13
32030	Sandvig	01-AUG-1966	30-NOV-1972	clima_man	33U	6127010	485840	144700	551700	12
32025	Hammeren Fyr	01-JAN-1880	31-JUL-1962	clima_man	33U	6126930	484770	144600	551700	77
32020	Hammer Odde Fyr	01-MAR-1953	30-JUN-1974	clima_man	33U	6128190	485630	144600	551800	7
32020	Hammer Odde Fyr	01-JUL-1974	30-JUN-1987	clima_man	33U	6128170	485710	144700	551800	11
6191	Christiansø Fyr	01-JAN-1961	31-MAR-2000	synop_dk	33U	6130820	511970	151100	551900	13
32080	Klemensker	01-DEC-2002	01-DEC-2004	snow_man	33U	6114671	488062	144900	551100	111
32080	Klemensker	02-DEC-2004	01-AUG-2010	snow_man	33U	6114234	488024	144900	551000	108
32175	Østerlars	15-JAN-2005	20-MAY-2008	snow_man	33U	6113107	498094	145800	551000	94
32175	Østerlars	21-MAY-2008	01-APR-2011	snow_man	33U	6113129	498051	145800	551000	94
32175	Østerlars	02-APR-2011		snow_man	33U	6113129	498051	145800	551000	94
6193	Hammer Odde Fyr	05-OCT-1977	29-AUG-2001	synop_dk	33U	6128170	485710	144700	551800	11
6193	Hammer Odde Fyr	30-AUG-2001		synop_dk	33U	6128175	485583	144600	551800	8
6190	Bornholms Lufthavn	01-JAN-1959	31-MAY-1977	synop_dk	33U	6102830	483820	144500	550400	13
6190	Bornholms Lufthavn	01-JUN-1977		synop_dk	33U	6102560	484070	144500	550400	15
6199	Dueodde N Fyr	01-JAN-1959	30-SEP-1962	synop_dk	33U	6095230	504720	150400	550000	16
6199	Dueodde Fyr Syd	01-OCT-1962	30-JUN-1977	synop_dk	33U	6094150	504810	150500	550000	6

6011 Tórshavn from 1873

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
33071	Tórshavn skole	01-JAN-1871	31-DEC-1871	clima_man	29V	6877520	616750	-64600	620100	9
33071	Tórshavn skole	01-OCT-1872	31-JUL-1907	clima_man	29V	6877520	616750	-64600	620100	9
33071	Tórshavn skole	01-AUG-1907	31-MAR-1925	clima_man	29V	6877560	616920	-64600	620100	24
33060	Hoyvik	01-JUN-1921	31-DEC-1981	clima_man	29V	6879770	617460	-64500	620200	20
33060	Hoyvik	01-FEB-1983	31-MAR-1983	clima_man	29V	6879770	617460	-64500	620200	20
33100	Vagur	01-NOV-1903	30-NOV-1922	precip_man	29V	6817750	616350	-64900	612800	15
33100	Vagur	02-JUN-1999	01-OCT-2011	precip_man	29V	6817549	619270	-64500	612800	43
6011	Tórshavn	01-JAN-1953	30-JUN-1962	synop_dk	29V	6878110	616530	-64600	620100	35
6011	Tórshavn	01-JUL-1962	31-DEC-1992	synop_dk	29V	6878170	616530	-64600	620100	43
6011	Tórshavn	01-JAN-1993		synop_dk	29V	6879010	617080	-64600	620100	54

4202 Pituffik (Thule Air Base) from 1948

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
4200	Dundas	01-JAN-1961	23-JUN-1981	synop_gr				-684800	763400	21
4200	Dundas	02-NOV-1981	30-DEC-1981	synop_gr				-684800	763400	21
4200	Dundas	01-MAR-1982	29-MAY-1982	synop_gr				-684800	763400	21
4200	Dundas	01-JUL-1982	31-AUG-1983	synop_gr				-684800	763400	21
4202	Pituffik*)	01-JAN-1974	27-NOV-2006	synop_gr				-684500	763200	77

*) From Nov 2006 the monthly data are obtained from Thule AB (Pituffik), personal communication.

4211 Mittarfik Upernavik (Airport) from 1873

The station 4209 Upernavik AWS was an automatic station, which explains the lack of manually observations in the period, where 4210 Upernavik was closed.

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34210	Upernavik	01-SEP-1873	31-DEC-1960	clima_man				-560700*)	724700*)	19*)
4210	Upernavik	01-JAN-1958	31-JAN-1987	synop_gr				-561000	724700	63
4209	Upernavik AWS	30-AUG-1984	26-SEP-1995	synop_gr				-561000	724700	63
4210	Upernavik	08-SEP-1995	16-AUG-2004	synop_gr				-561000	724700	120
4211	Mittarfik Upernavik	23-OCT-2000		synop_gr				-560800	724700	126
4202	Pituffik	01-JAN-1974	27-NOV-2006	synop_gr				-684500	763200	77
4216	Ilulissat	01-JAN-1961	30-SEP-1991	synop_gr				-510300	691300	39
4216	Ilulissat	01-OCT-1991	31-AUG-1992	synop_gr				-510300	691300	39
4221	Mittarfik Ilulissat	14-AUG-1991		synop_gr				-510358	691425	29

*) The number and positions of locations/relocations during the period are not certain.

4221 Mittarfik Ilulissat (Airport) from 1807 (Danish name: Jakobshavn Lufthavn/Airport)

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34212	Uummannaq	01-OCT-1829*)	?*)	clima_man				*)	*)	*)
34210	Upernavik	01-AUG-1807*)	?*)	clima_man				*)	*)	*)
34216	Ilulissat	01-NOV-1835*)	?*)	clima_man				*)	*)	*)
34216	Ilulissat	01-JUL-1873	28-FEB-1962	clima_man				-510300	691300	39
34218	Qeqertarsuaq	01-AUG-1807*)	?*)	clima_man				*)	*)	*)
4212	Uummannaq	01-JAN-1961	14-AUG-1989	synop_gr				-520700	704000	39
4212	Uummannaq Heli	15-JAN-2004	30-JUN-2006	synop_gr				-520700	714000	2
4216	Ilulissat	01-JAN-1961	30-SEP-1991	synop_gr				-510300	691300	39
4216	Ilulissat	01-OCT-1991	31-AUG-1992	synop_gr				-510300	691300	39
4218	Qeqertarsuaq	01-JAN-1962	30-JUN-1980	synop_gr				-533100	691400	24
4219	Qeqertarsuaq Heli	21-JAN-2004		synop_gr				-533200	691500	11
4221	Mittarfik Ilulissat	01-JAN-1984	13-AUG-1991	metar				-510358	691425	29
4221	Mittarfik Ilulissat	14-AUG-1991		metar				-510358	691425	29
4221	Mittarfik Ilulissat	14-AUG-1991		synop_gr				-510358	691425	29
4220	Aasiaat	01-JAN-1958		synop_gr				-525106	684229	43

*) The number, start, end and positions of locations/relocations during the period are not known or certain.

4250 Nuuk (Danish name: Godthåb) from 1784

In the late 1990's the manual precipitation gauge at 4250 Nuuk was replaced with an automatic rain gauge. This arrangement did not function satisfactory for climatic purposes at that time and therefore a supplementary manual gauge was started 2 February 1999 as station 34250 Nuuk. At this manual precipitation station 34250 Nuuk the precipitation was observed every day at 21 UTC for the previous 24 hours. The manual station 34250 was closed 1 September 2012.

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34247	Qoornoq	01-JAN-1874*)	?*)	clima_man				*)	*)	*)
04247	Qoornoq	03-JAN-1966	31-DEC-1969	synop_gr				-510300	643200	
34250	Nuuk	01-SEP-1784*)	?*)	clima_man				*)	*)	*)
34250	Nuuk	01-JAN-1874*)	31-DEC-1960	clima_man				-514330*)	641030*)	20*)
4250	Nuuk	01-JAN-1958	31-AUG-1991	synop_gr				-514500	641000	54
4250	Nuuk	01-SEP-1991		synop_gr				-514351	641100	80
34250	Nuuk	02-FEB-1999	01-SEP-2012	precip_man				-514500	641000	54
4221	Mittarfik Ilulissat	14-AUG-1991		synop_gr				-510358	691425	29
4230	Sisimiut	01-JAN-1961	22-JUN-2001	synop_gr				-534000	665500	12
4254	Mittarfik Nuuk	01-AUG-1985		metar				-514100	641200	86
4254	Mittarfik Nuuk	01-NOV-2000		synop_gr				-514100	641200	86
4270	Mittarfik Narsarsuaq	01-JAN-1961		synop_gr				-452500	611000	34

*) The number, start, end and positions of locations/relocations during the period are not known or certain.

34262 Ivittuut (Danish name: Ivigtut) from 1873

The parameter monthly mean temperature is adjusted to 4270 Mittarfik Narsarsuaq.

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34262	Ivittuut	01-JAN-1875	31-DEC-1966	clima_man				-481100*)	611200*)	30*)

*) The number and positions of locations/relocations during the period are not certain.

4270 Mittarfik Narsarsuaq (Airport) from 1961

A manual gauge was started in January 2009 as station 34270 Mittarfik Narsarsuaq. At this the precipitation is observed every day at 12 UTC for the previous 24 hours. The parameter monthly mean temperature can be joined with 34262 Ivittuut.

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
4270	Mittarfik Narsarsuaq	01-JAN-1961		synop_gr				-452500	611000	34
34270	Mittarfik Narsarsuaq	22-JAN-2009		precip_man				-452600	610900	4
4271	Narsarsuaq Radiosonde	07-JUL-2011		synop_gr				-452624	610927	4

4272 Qaqortoq (Danish name: Julianehåb) from 1807

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34260	Paamiut	01-AUG-1828*)	?*)	clima_man				*)	*)	*)
34262	Ivittuut	01-JAN-1875	31-DEC-1966	clima_man				-481100*)	611200*)	30*)
34272	Qaqortoq	01-OCT-1807*)	?*)	clima_man				*)	*)	*)
34283	Nanortalik	01-AUG-1883*)	?*)	clima_man				*)	*)	*)
4260	Paamiut	01-JAN-1958	21-SEP-1992	synop_gr				-494300	620000	15
4260	Paamiut Heliport	22-SEP-1992	06-DEC-2007	synop_gr				-494000	620000	13
4260	Mitt. Paamiut	07-DEC-2007		synop_gr				-494000	620100	36
4270	Mitt. Narsarsuaq	01-JAN-1961		synop_gr				-452500	611000	34
4272	Qaqortoq	01-JAN-1961	08-SEP-2003	synop_gr				-460300	604300	32
4272	Qaqortoq	09-SEP-2003		synop_gr				-460256	604256	57
4273	Qaqortoq Heliport	17-MAR-2004		synop_gr				-460200	604300	18

*) The number, start, end and positions of locations/relocations during the period are not known or certain.

4320 Danmarkshavn from 1949

A manual measurement was started in January 2009 as station 34320 Danmarkshavn. At this the precipitation is observed every day at 12 UTC for the previous 24 hours.

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
4320	Danmarkshavn	05-NOV-1948	31-DEC-1957	synop_gr				-184000	764600	14
4320	Danmarkshavn	01-JAN-1958		synop_gr				-184005	764610	11
34320	Danmarkshavn	01-JAN-2009		precip_man				-184000	764600	11

34339 Scoresbysund (Greenland name: Ittoqqortoormiit) from 1924

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34339	Scoresbysund*)	01-NOV-1923	31-DEC-1946	clima_man				-215800	702900	17
34339	Scoresbysund*)	01-JAN-1947	30-APR-1948	clima_man				-215800	702900	24
34339	Scoresbysund*)	01-MAY-1948	31-OCT-1948	clima_man				-215800	702900	41
34339	Scoresbysund*)	01-NOV-1948	30-SEP-1949	clima_man				-215800	702900	51

*) The relocations during the period are not certain.

4339 Ittoqqortoormiit (Danish name: Scoresbysund. Previous: Illoqqortoormiut) from 1949

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34340	Uunarteq (Kap Tobin)	01-OCT-1948	31-DEC-1960	project				-215800	702500	42
4340	Uunarteq (Kap Tobin)	01-OCT-1949	31-OCT-1980	synop_gr				-215800	702500	42
4340	Uunarteq (Kap Tobin)	05-SEP-1985	10-JUN-1990	synop_gr				-215800	702500	41
4339	Ittoqqortoormiit	01-NOV-1980	16_AUG-2005	synop_gr				-215700	702900	65
4339	Ittoqqortoormiit	17_AUG-2005		synop_gr				-215704	702904	70
4341	Mittarfik Nerlerit Inaat	01-NOV-2000		synop_gr				-223900	704500	14

4360 Tasiilaq (Danish name: Ammassalik. Previous name: Angmagssalik) from 1895

No.	Name	Start	End	Type	UTM	Northings	Eastings	Longitude	Latitude	Elev.
34360	Tasiilaq	13-OCT-1894	31-SEP-1959	clima_man				-373800*)	653600*)	50*)
4360	Tasiilaq	01-JAN-1958	31-MAR-1982	synop_gr				-373800	653600	36
4360	Tasiilaq	01-APR-1982	14-AUG-2005	synop_gr				-373800	653600	50
4360	Tasiilaq	15-AUG-2005		synop_gr				-373812	653640	54
4361	Mittarfik Kulusuk	28-NOV-2000		synop_gr				-370900	653500	35

*) The number and positions of locations/relocations during the period are not certain.

4. Data files

Data are included in this report as three (3) Excel files, one for each of the countries Denmark, The Faroe Islands and Greenland: **dk_wwr.xlsx, fr_wwr.xlsx, gr_wwr.xlsx**

The format is:
Station Metadata section:

Field 1:	Blank	
Field 2:	WMO number	
Field 3:	Record type	1= Station Metadata Record
Field 4:	Latitude	N= Northern
Field 5:	Longitude	E= Eastern, W= Western
Field 6:	Country	
Field 7:	Station name	
Field 8:	Height of station above sea level (meters)	
Field 9:	Height of barometer above sea level (0.1 meters)	

Data records:

Field 1:	Blank	
Field 2:	WMO number	
Field 3:	Element code	3= Mean sea level pressure in 0.1 hPa 4= Mean daily air temperature in 0.1°C 5= Accumulated precipitation in 0.1 mm 6= Mean daily maximum temperature in 0,1°C 6= Mean daily minimum temperature in 0,1°C
Field 4:	Year	
Field 5:	Rec type	blank=Monthly and Annual data 1=Decadal average (NB! Year = 2000 or 2010) 2=Clino (1971-2000 or 1981-2010) average (NB! Year = 2000 or 2010)
Field 6:	Jan	Value for January
Field 7:	Feb	Value for February
Field 8:	Mar	Value for March
Field 9:	Apr	Value for April
Field 10:	May	Value for May
Field 11:	Jun	Value for June
Field 12:	Jul	Value for July
Field 13:	Aug	Value for August
Field 14:	Sep	Value for September
Field 15:	Oct	Value for October
Field 16:	Nov	Value for November
Field 17:	Dec	Value for December
Field 18:	Annual	Annual value

Note: If a monthly value is missing, the yearly value is not calculated. The corresponding fields are left blank. Please also notice that:

1) 4202 Pituffik and 4272 Qaqortoq only have monthly mean temperatures in the dataset.
2) 4211 Upernavik only have accumulated precipitation up to 1980. The clino 1971-2000 for accumulated precipitation are therefore only calculated on data 1971-1980!
3) 4221 Ilulissat only have accumulated precipitation up to 1984. The clino 1971-2000 for accumulated precipitation are therefore only calculated on data 1971-1984!

References

[1] John Cappelen (ed) (2014): Denmark – DMI Historical Data Collection 1768-2013 – with Danish Abstracts. DMI Technical Report 14-02, Copenhagen.

[2] John Cappelen (ed) (2014): Greenland – DMI Historical Data Collection 1784-2013 – with Danish Abstracts. DMI Technical Report 14-04, Copenhagen.

[3] John Cappelen (ed) (2014): The Faroe Islands – DMI Historical Data Collection 1873-2013 – with Danish Abstracts. DMI Technical Report 14-05, Copenhagen.

[4] Cappelen, J. (2011) Decadal Climate Summary 1901-2010 and Temperature Ranking 2001-2010 - Denmark, The Faroe Islands and Greenland. DMI Technical Report 11-14, Copenhagen.

[5] Laursen, E. V. (2003): Metadata, Selected Climatological and Synoptic Stations, 1750-1996. DMI Technical Report 03-24, Copenhagen.

Previous reports

Previous reports from the Danish Meteorological Institute can be found on:
http://www.dmi.dk/laer-om/generelt/dmi-publikationer/

Appendix 1. Example of the tables “World Weather Records 1991-2000 and 2001-2010”.

6193 Hammer Odde Fyr, Denmark.

Station Metadata section:

Field 1:	Blank	
Field 2:	WMO number	
Field 3:	Record type	1= Station Metadata Record
Field 4:	Latitude	N= Northern
Field 5:	Longitude	E= Eastern, W= Western
Field 6:	Country	
Field 7:	Station name	
Field 8:	Height of station above sea level (m)	
Field 9:	Height of barometer above sea level (0.1 m)	

Data records:

Field 1:	Blank	
Field 2:	WMO number	
Field 3:	Element code	3= Mean sea level pressure in 0.1 hPa 4= Mean daily air temperature in 0.1°C 5= Accumulated precipitation in 0.1 mm 6= Mean daily maximum temperature in 0,1°C 6= Mean daily minimum temperature in 0,1°C
Field 4:	Year	
Field 5:	Rec type	blank=Monthly and Annual data 1=Decadal average (NB! Year = 2000 or 2010) 2=Clino (1971-2000 or 1981-2010) average (NB! Year = 2000 or 2010)
Field 6-18:	Monthly/annual values	

Note: If a monthly value is missing, the yearly value is not calculated. The corresponding fields are left blank.

WMO number	Rec type	Latitude	Longitude	Country					Stat name						Station H	Barom H
6193	1	5518N	1446E	Denmark					Hammer Odde Fyr						8	94
WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	4	1991		30	2	36	54	79	121	172	175	146	101	62	43	85
6193	4	1992		31	32	43	61	111	167	186	178	139	81	59	37	94
6193	4	1993		24	17	28	55	107	139	152	152	118	88	39	35	80
6193	4	1994		30	-4	30	60	86	131	196	183	138	90	69	46	88
6193	4	1995		12	36	31	48	90	140	175	193	143	127	50	8	88
6193	4	1996		-1	-19	1	56	73	133	146	174	129	109	65	14	73
6193	4	1997		5	26	34	46	87	140	177	213	152	92	57	36	89
6193	4	1998		34	39	29	57	103	139	152	153	141	98	31	18	83
6193	4	1999		24	11	32	58	90	148	184	178	167	102	63	36	91
6193	4	2000		27	34	34	72	118	147	155	166	141	125	82	50	96
6193	4	2000	1	22	17	30	57	94	141	170	177	141	101	58	32	87
6193	4	2000	2	15	10	24	50	93	138	166	171	137	100	59	32	83
WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	4	2001		26	17	22	55	110	140	188	178	136	123	64	22	90
6193	4	2002		29	43	46	60	104	152	175	200	166	92	56	14	95
6193	4	2003		6	-7	23	49	113	152	178	184	151	87	70	46	88
6193	4	2004		-4	17	32	63	98	132	152	183	145	104	60	42	85
6193	4	2005		35	6	9	61	104	139	182	160	158	120	68	32	90
6193	4	2006		-6	1	5	47	97	155	212	182	166	132	80	70	95
6193	4	2007		50	19	48	73	116	158	160	173	135	99	59	40	94
6193	4	2008		36	42	39	61	118	153	178	174	143	109	72	38	97
6193	4	2009		18	7	27	71	104	127	178	182	152	81	71	18	86
6193	4	2010		-18	-7	14	52	77	129	195	175	140	93	55	-13	74
6193	4	2010	1	17	14	27	59	104	144	180	179	149	104	66	31	89
6193	4	2010	2	17	12	26	55	98	140	172	174	141	103	61	31	86
WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	6	1991		45	18	55	81	103	146	195	203	171	118	75	57	106
6193	6	1992		45	47	61	91	139	193	216	211	155	98	73	51	115
6193	6	1993		43	30	47	76	133	168	181	179	131	108	52	48	100
6193	6	1994		43	9	49	89	109	164	225	207	157	108	81	61	109
6193	6	1995		29	51	48	69	116	168	198	221	159	145	69	23	108
6193	6	1996		11	-1	10	85	96	163	172	192	145	128	79	31	93
6193	6	1997		22	45	54	71	113	169	199	239	176	107	72	49	110
6193	6	1998		47	53	52	83	129	167	177	176	156	113	46	35	103
6193	6	1999		40	26	55	84	119	178	211	202	190	118	77	52	113
6193	6	2000		41	48	49	98	153	178	177	191	157	143	96	63	116
6193	6	2000	1	37	33	48	83	121	169	195	202	160	119	72	47	107
6193	6	2000	2	29	25	42	74	121	168	193	197	158	117	73	46	103
WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	6	2001		38	36	37	82	142	167	213	204	157	140	80	39	111
6193	6	2002		42	58	64	86	131	179	201	223	186	109	70	28	115
6193	6	2003		21	13	49	75	150	179	203	207	171	102	83	60	109
6193	6	2004		14	32	51	94	124	156	174	208	163	118	76	53	105
6193	6	2005		46	21	27	89	138	172	211	180	184	144	81	46	112
6193	6	2006		8	12	24	75	126	185	242	206	189	147	97	79	116
6193	6	2007		64	31	69	103	147	183	185	193	153	114	72	51	114
6193	6	2008		48	55	58	84	152	181	206	197	160	124	86	50	117
6193	6	2009		31	19	44	107	135	151	208	207	174	95	83	34	107
6193	6	2010		-3	7	37	88	105	160	229	198	157	111	67	3	97
6193	6	2010	1	31	28	46	88	135	171	207	202	169	120	80	44	110
6193	6	2010	2	31	27	44	81	126	168	198	199	161	120	75	45	106

WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	7	1991		14	-18	19	35	61	101	149	155	124	83	45	25	66
6193	7	1992		15	15	23	37	87	144	159	154	120	60	40	20	73
6193	7	1993		6	-1	12	35	87	116	128	130	101	70	25	20	61
6193	7	1994		13	-22	11	39	68	106	171	161	118	69	52	30	68
6193	7	1995		-4	23	12	29	67	118	152	166	125	103	29	-9	68
6193	7	1996		-21	-40	-13	26	52	108	123	156	107	90	50	-6	53
6193	7	1997		-17	2	8	23	62	115	154	187	128	73	36	21	66
6193	7	1998		19	24	7	35	82	119	132	136	127	82	16	1	65
6193	7	1999		8	-6	12	39	68	122	161	156	148	87	48	20	72
6193	7	2000		13	20	19	48	94	124	136	145	122	108	69	34	78
6193	7	2000	1	5	0	11	35	73	117	147	155	122	83	41	16	67
6193	7	2000	2	-1	-6	6	28	70	114	143	148	117	81	42	15	63

WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	7	2001		14	-4	5	32	84	116	163	157	118	105	46	3	70
6193	7	2002		13	27	26	39	86	131	154	183	144	71	41	-1	76
6193	7	2003		-9	-28	1	28	87	129	157	163	132	68	55	28	68
6193	7	2004		-22	2	16	42	79	113	135	163	126	87	43	28	68
6193	7	2005		22	-9	-8	35	80	116	158	143	136	97	52	16	70
6193	7	2006		-23	-13	-13	27	75	129	182	158	146	113	62	58	75
6193	7	2007		34	4	31	47	94	140	141	154	117	81	43	27	76
6193	7	2008		22	28	20	43	91	130	151	155	127	92	56	23	78
6193	7	2009		2	-4	10	44	78	106	153	158	131	63	58	0	67
6193	7	2010		-36	-23	-5	28	59	104	166	156	121	69	42	-34	54
6193	7	2010	1	2	-2	8	37	81	121	156	159	130	85	50	15	70
6193	7	2010	2	1	-4	8	33	75	117	148	153	122	84	44	14	66

WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	3	1991		10209	10195	10173	10166	10161	10098	10170	10165	10136	10171	10114	10204	10164
6193	3	1992		10242	10166	10104	10102	10214	10179	10156	10117	10183	10085	10079	10197	10152
6193	3	1993		10142	10237	10197	10155	10166	10130	10103	10151	10129	10168	10252	10008	10153
6193	3	1994		10053	10205	10087	10120	10156	10140	10194	10127	10106	10152	10170	10128	10137
6193	3	1995		10100	10038	10086	10133	10152	10144	10162	10153	10098	10200	10160	10216	10137
6193	3	1996		10259	10146	10220	10190	10122	10163	10136	10179	10160	10151	10062	10167	10163
6193	3	1997		10237	10109	10193	10141	10151	10115	10160	10186	10171	10115	10137	10128	10154
6193	3	1998		10129	10148	10171	10071	10158	10130	10082	10128	10128	10068	10177	10150	10128
6193	3	1999		10109	10055	10121	10120	10179	10167	10163	10124	10143	10150	10183	10020	10128
6193	3	2000		10149	10115	10124	10105	10168	10154	10088	10161	10169	10130	10075	10092	10128
6193	3	2000	1	10163	10141	10148	10130	10163	10142	10141	10149	10142	10139	10141	10131	10144
6193	3	2000	2	10140	10153	10142	10135	10160	10138	10138	10147	10143	10145	10127	10121	10141

WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	3	2001		10152	10139	10093	10108	10159	10128	10142	10147	10087	10154	10145	10178	10136
6193	3	2002		10163	10036	10149	10180	10153	10143	10134	10161	10185	10105	10113	10231	10146
6193	3	2003		10108	10251	10240	10182	10166	10145	10146	10145	10188	10111	10174	10130	10166
6193	3	2004		10080	10139	10196	10159	10124	10131	10136	10123	10148	10124	10150	10131	10137
6193	3	2005		10106	10167	10155	10168	10147	10159	10128	10146	10186	10217	10143	10125	10154
6193	3	2006		10277	10140	10112	10119	10143	10199	10198	10077	10157	10113	10113	10169	10151
6193	3	2007		10046	10110	10154	10201	10097	10113	10082	10133	10139	10233	10110	10191	10134
6193	3	2008		10127	10190	10004	10127	10195	10144	10144	10098	10190	10118	10092	10175	10134
6193	3	2009		10146	10115	10110	10188	10186	10143	10113	10165	10180	10155	10062	10094	10138
6193	3	2010		10183	10062	10130	10186	10123	10145	10155	10110	10139	10147	10048	10103	10128
6193	3	2010	1	10139	10135	10134	10162	10149	10145	10138	10131	10160	10148	10115	10153	10142
6193	3	2010	2	10140	10146	10138	10144	10156	10140	10141	10139	10146	10143	10130	10132	10141

WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	5	1991		641	276	154	372	578	1024	265	333	137	363	567	498	5208
6193	5	1992		159	390	575	358	168	0	441	946	503	847	890	372	5649
6193	5	1993		624	207	160	132	135	204	665	486	1051	888	303	983	5838
6193	5	1994		849	359	764	247	190	555	0	600	1419	413	342	808	6546
6193	5	1995		776	600	235	397	433	416	385	309	789	238	285	462	5325
6193	5	1996		39	337	192	232	1484	459	924	350	497	303	689	288	5794
6193	5	1997		11	606	158	207	662	193	379	220	464	643	253	339	4135
6193	5	1998		586	290	542	475	180	628	872	420	703	1117	916	561	7290
6193	5	1999		472	356	430	430	595	640	134	578	427	571	620	1345	6598
6193	5	2000		378	382	469	282	138	923	371	356	711	331	659	420	5420
6193	5	2000	1	454	380	368	313	456	504	444	460	670	571	552	608	5780
6193	5	2000	2	480	320	372	300	349	435	481	425	604	553	594	559	5473

WMO Number	elem type	year	rec type	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	annual
6193	5	2001		358	597	323	477	151	665	222	1072	1129	316	429	472	6211
6193	5	2002		702	817	335	227	325	354	768	557	422	1383	561	285	6736
6193	5	2003		405	218	96	321	364	279	314	424	602	618	530	400	4571
6193	5	2004		707	200	294	299	103	323	698	1207	638	918	475	393	6255
6193	5	2005		411	583	520	33	292	194	517	680	223	277	333	495	4558
6193	5	2006		317	597	469	315	563	289	72	2842	376	509	843	519	7711
6193	5	2007		771	620	357	152	402	587	1608	274	495	136	317	602	6321
6193	5	2008		500	251	631	415	224	211	415	1234	582	1438	369	429	6699
6193	5	2009		255	392	364	5	630	541	278	99	327	431	801	595	4718
6193	5	2010		386	739	253	80	611	168	214	565	411	441	1662	654	6184
6193	5	2010	1	481	501	364	232	367	361	511	895	521	647	632	484	5996
6193	5	2010	2	507	411	377	275	381	442	497	593	597	604	579	554	5818