

2. SCIAMACHY Daily Report for level 2 products

[2.1. General Info](#)

[2.2 Product Quality Indicators](#)

[2.3 ADF monitoring](#)

2.1 General Info

This report contains a daily analysis on parameters extracted from SCIAMACHY level 2 data (The SCI_OL__2P product).

2.1.1 Report summary

The table below shows general characteristics of the data that are included into this report.

Item	Value
Report version	1.6 (28-07-2008)
Time of report generation	20AUG2008 08:08:06
Data source version	SCIA-OL/3.01-R
Processing scope for products	23MAY2004 00:00:00 to 24MAY2004 00:00:00
Start time of first product within scope	22MAY2004 22:55:46
Stop time of last product within scope	24MAY2004 01:00:07
Total number of level 2 products	16
Number of level 2 products with errors	0

2.1.2 Summary per product

The following table shows a summary for each product used in this report.

Products are linked to a corresponding server directory for view/download. Note: Link access may be restricted by security settings of your internet browser or firewall.

#	Product name	Start time	Stop time	Prod err	Fit summary
0	SCI_OL__2PRDPA20040522_225546_000033122027_00073_11650_8008.N1	22MAY2004 22:55:46	22MAY2004 23:50:59	0	GOOD
1	SCI_OL__2PRDPA20040523_003622_000033252027_00074_11651_7983.N1	23MAY2004 00:36:22	23MAY2004 01:31:47	0	GOOD
2	SCI_OL__2PRDPA20040523_021657_000033122027_00075_11652_7879.N1	23MAY2004 02:16:57	23MAY2004 03:12:10	0	GOOD
3	SCI_OL__2PRDPA20040523_035733_000033252027_00076_11653_7972.N1	23MAY2004 03:57:33	23MAY2004 04:52:59	0	GOOD
4	SCI_OL__2PRDPA20040523_053809_000033122027_00077_11654_7969.N1	23MAY2004 05:38:09	23MAY2004 06:33:22	0	GOOD
5	SCI_OL__2PRDPA20040523_071845_000033252027_00078_11655_7934.N1	23MAY2004 07:18:45	23MAY2004 08:14:10	0	GOOD
6	SCI_OL__2PRDPA20040523_085920_000033122027_00079_11656_7958.N1	23MAY2004 08:59:20	23MAY2004 09:54:33	0	GOOD
7	SCI_OL__2PRDPA20040523_103956_000033252027_00080_11657_7897.N1	23MAY2004 10:39:56	23MAY2004 11:35:22	0	GOOD
8	SCI_OL__2PRDPA20040523_122032_000033122027_00081_11658_7860.N1	23MAY2004 12:20:32	23MAY2004 13:15:45	0	GOOD
9	SCI_OL__2PRDPA20040523_140107_000033252027_00082_11659_7888.N1	23MAY2004 14:01:07	23MAY2004 14:56:33	0	GOOD
10	SCI_OL__2PRDPA20040523_154143_000033122027_00083_11660_7929.N1	23MAY2004 15:41:43	23MAY2004 16:36:56	0	GOOD
11	SCI_OL__2PRDPA20040523_172205_000033162027_00084_11661_7845.N1	23MAY2004 17:22:05	23MAY2004 18:17:22	0	GOOD
12	SCI_OL__2PRDPA20040523_190214_000033682027_00085_11662_8002.N1	23MAY2004 19:02:14	23MAY2004 19:58:23	0	GOOD
13	SCI_OL__2PRDPA20040523_204331_000033252027_00086_11663_7889.N1	23MAY2004 20:43:31	23MAY2004 21:38:56	0	GOOD
14	SCI_OL__2PRDPA20040523_222406_000033122027_00087_11664_7952.N1	23MAY2004 22:24:06	23MAY2004 23:19:19	0	GOOD
15	SCI_OL__2PRDPA20040524_000442_000033252027_00088_11665_7858.N1	24MAY2004 00:04:42	24MAY2004 01:00:07	0	GOOD

2.2 Product Quality Indicators

2.2.1 Cloud parameters

This is a new section that shows information about the cloud parameters estimation, in particular cloud fractions and cloud top height. IMPORTANT NOTE: The contents and layout of this section are still being validated. Please use with caution.

General statistics:

Total number of cloud data DSRs: 144040

Total number of cloud data DSRs with good quality flag (=0): 144040 (100.0 %)

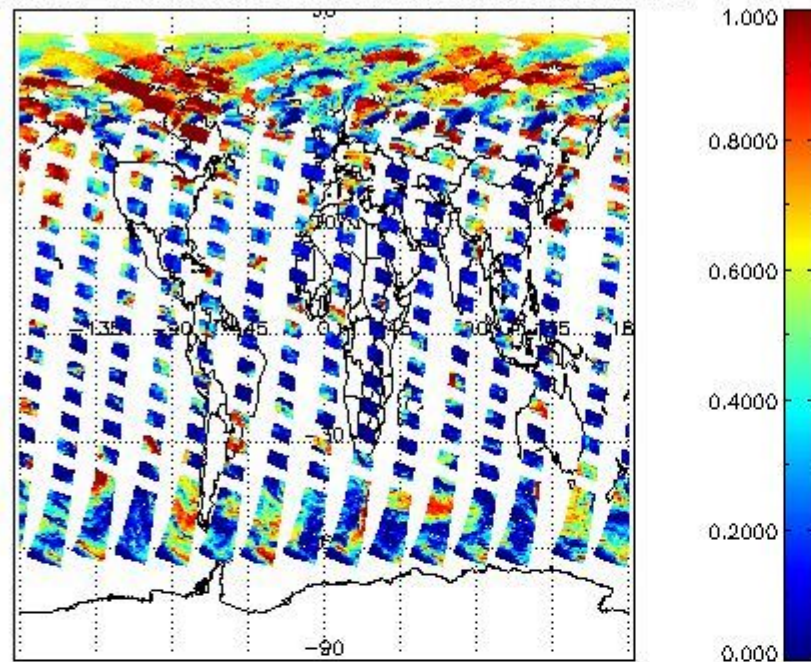
Parameter	#valid	Mean	Median	Min	Max	Stddev	Unit
QUALITY_FLAG	144040	0.0000	0.0000	0.0000	0.0000	0.0000	flag
INTEGR_TIME	144040	0.17058	0.12500	0.12500	0.25000	0.060166	s
CL_FRAC	144040	0.39933	0.37261	0.0000	1.0000	0.31889	-
CL_FRAC_ERR	144040	0.0000	0.0000	0.0000	0.0000	0.0000	rel. fraction
PMD_READ	144040	5.4585	4.0000	4.0000	8.0000	1.9253	
PMD_READ_CL[0]	144040	0.44209	0.0000	0.0000	8.0000	1.5696	-
PMD_READ_CL[1]	144040	1.0679	0.0000	0.0000	8.0000	2.1407	-
CL_TOP_HEIGHT	128318	3.2687	1.2510	0.0000	17.000	3.6611	km
CL_TOP_HEIGHT_ERR	0	---	---	---	---	---	---
CL_OPT_DEPTH	128318	60.847	87.231	0.0000	101.00	42.639	km
CL_OPT_DEPTH_ERR	0	---	---	---	---	---	---
CL_TYPE_FLAGS	144040	11100000	11100000	11100000	11100000	0.0000	flags. Bit definition = 0: low or high cloud; 1: ice or water cloud; 2: thick or thin cloud; 3-15: not used
CLOUD_FLAGS	144040	11001010	11000100	11000000	11100000	3269.1	flags
AERO_ABSO_IND	144040	0.69077	0.59273	-4.5972	14.030	0.99487	
AERO_IND_DIAG	144040	0.0000	0.0000	0.0000	0.0000	0.0000	
AERO_FLAGS	144040	01011000	00000000	00000000	11000000	24506.	flags

Time and geolocation plots:

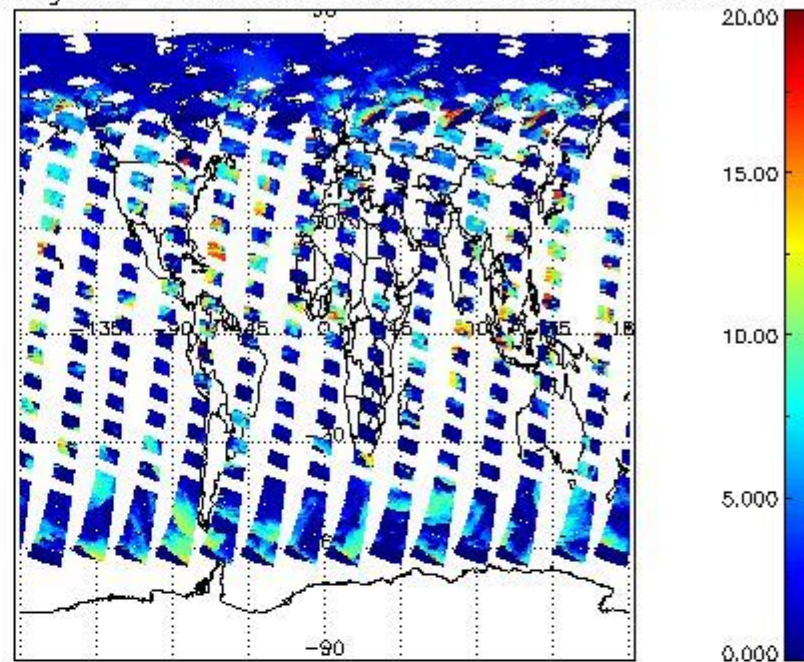
Plots are available for the following parameters:

Number	Data item ID
0	cl_frac
1	cl_top_height
2	cl_opt_depth
3	cloud_flags

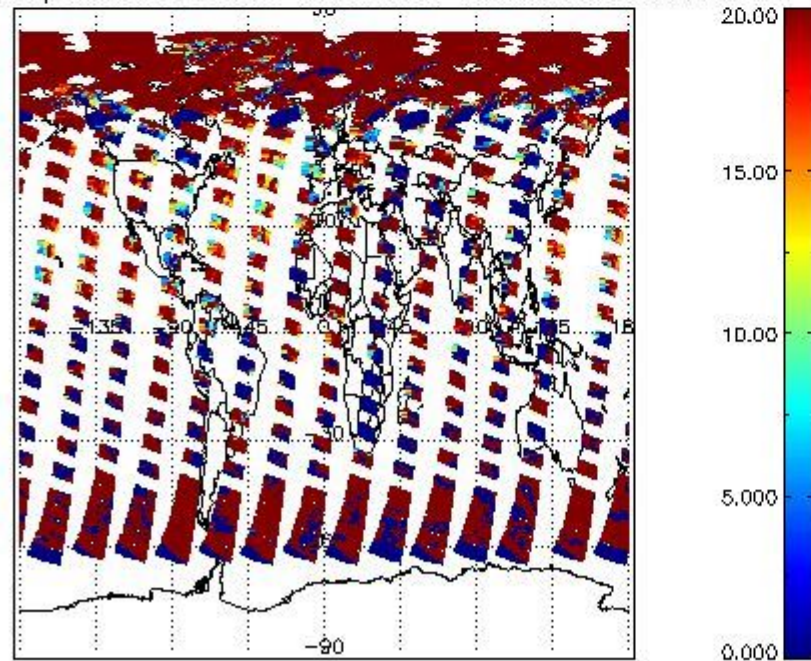
cL_frac for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



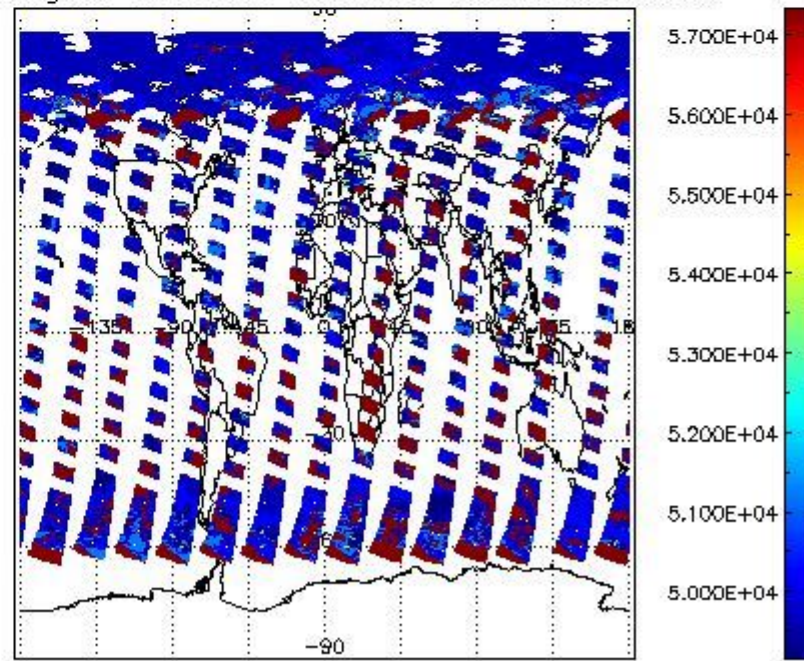
cL_top_height for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



cL_opt_depth for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



cloud_flags for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



2.2.2 Nadir

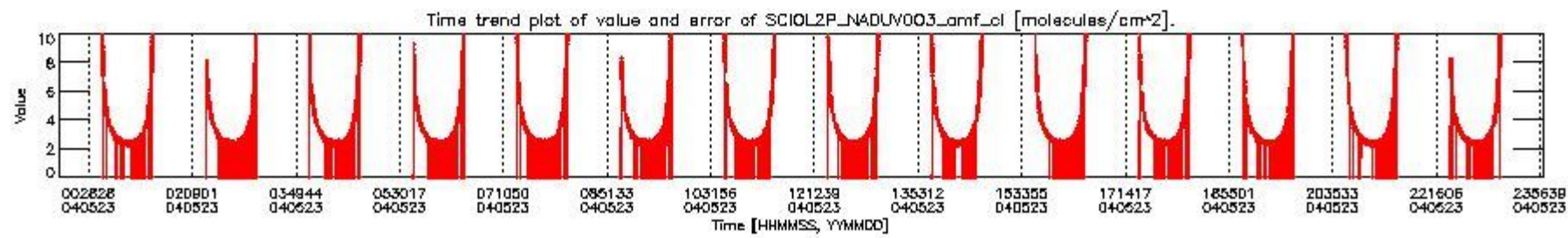
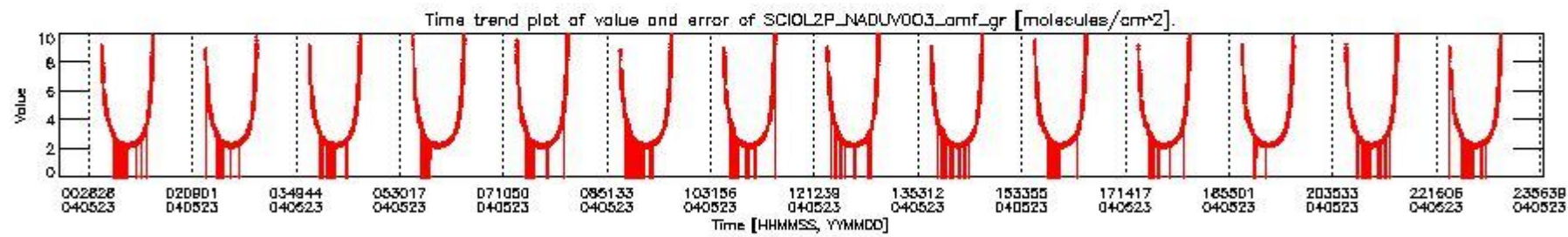
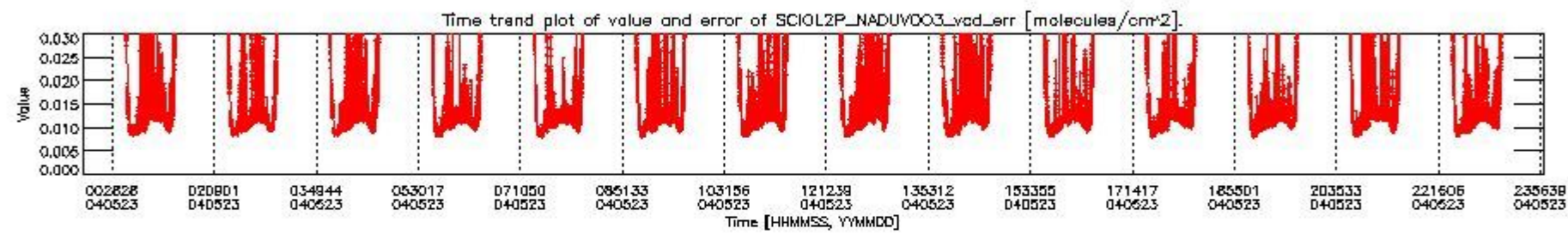
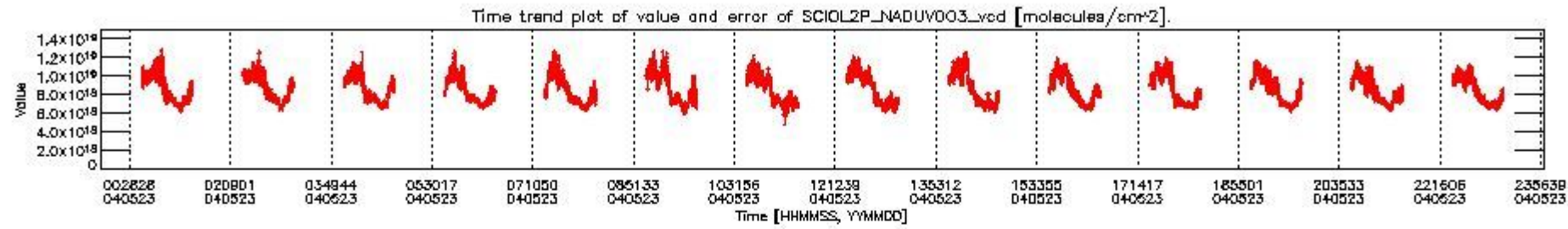
This section shows information about product quality of nadir measurements, in particular the quality of retrieved species.

The following data items are currently included into this section:

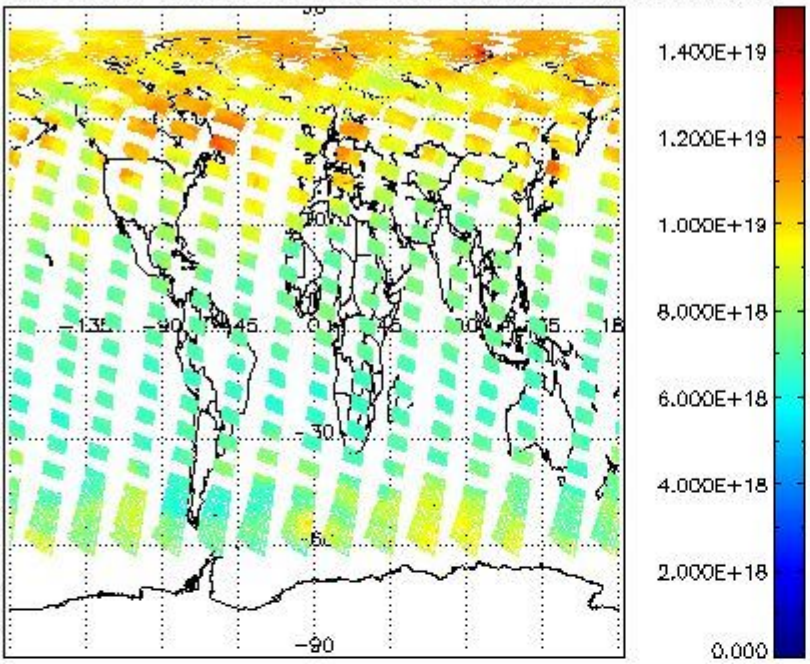
Number	Data item ID
0	SCIOL2P_NADUV003_vcd
1	SCIOL2P_NADUV003_vcd_err
2	SCIOL2P_NADUV003_amf_gr

3	SCIOL2P_NADUV003_amf_cl
4	SCIOL2P_NADUV1NO2_vcd
5	SCIOL2P_NADUV1NO2_vcd_err
6	SCIOL2P_NADUV1NO2_amf_gr
7	SCIOL2P_NADUV1NO2_amf_cl

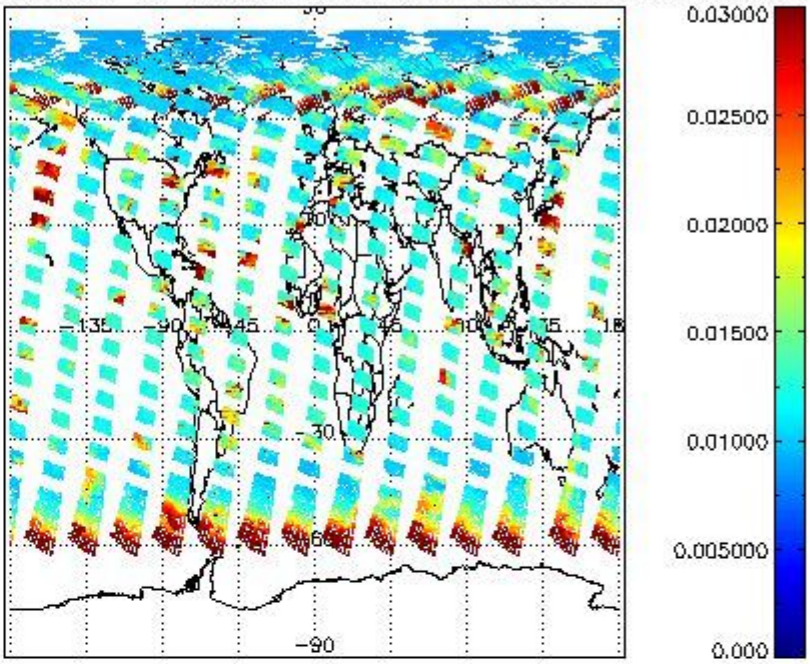
Data is presented both in time trend plots and world map plots, in order to show variations with time and geolocation. The vertical dotted lines in the time trend plots indicate orbits. The orbit times on the X-axis are estimated sensing_start time as suggested by the product sensing_start time in the MPH.



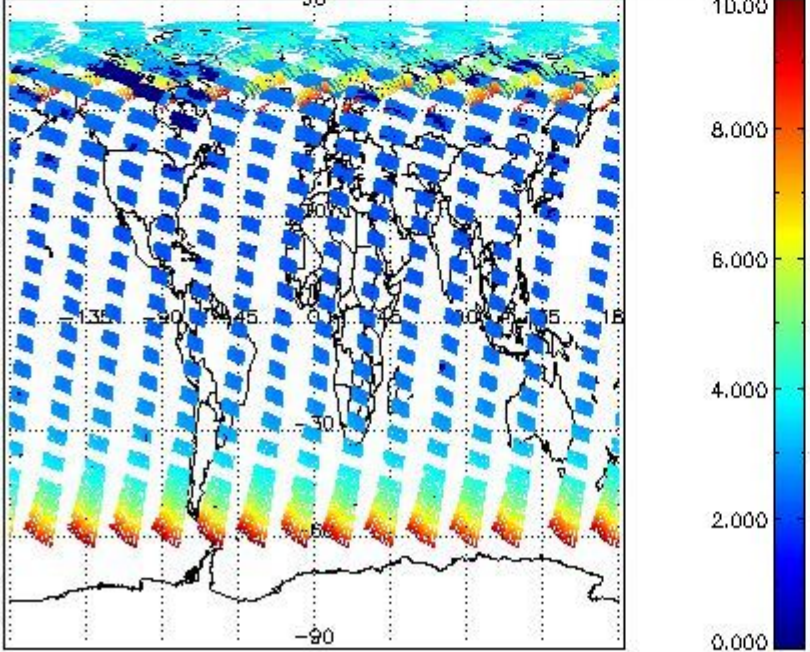
SCIOL2P_NADUV003_vcd for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



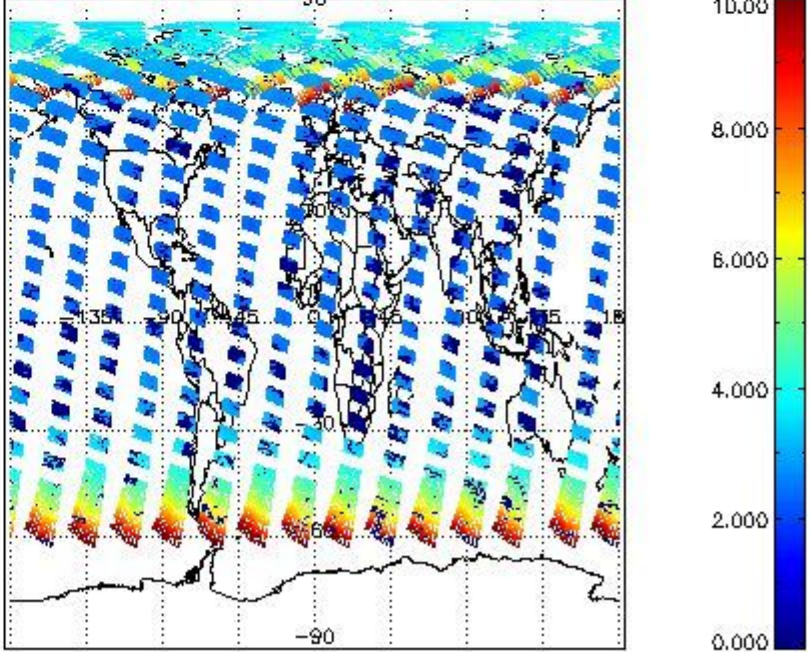
SCIOL2P_NADUV003_vcd_err for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

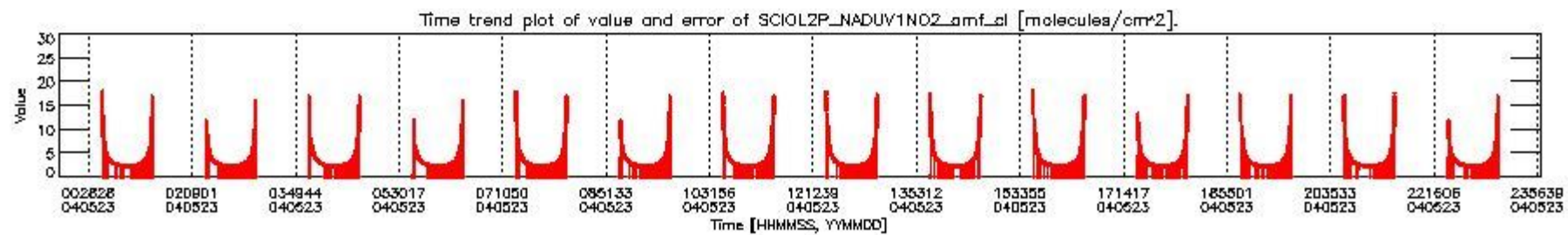
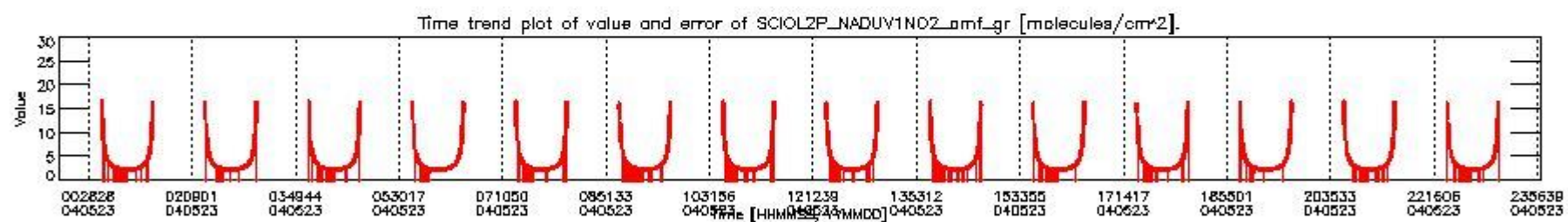
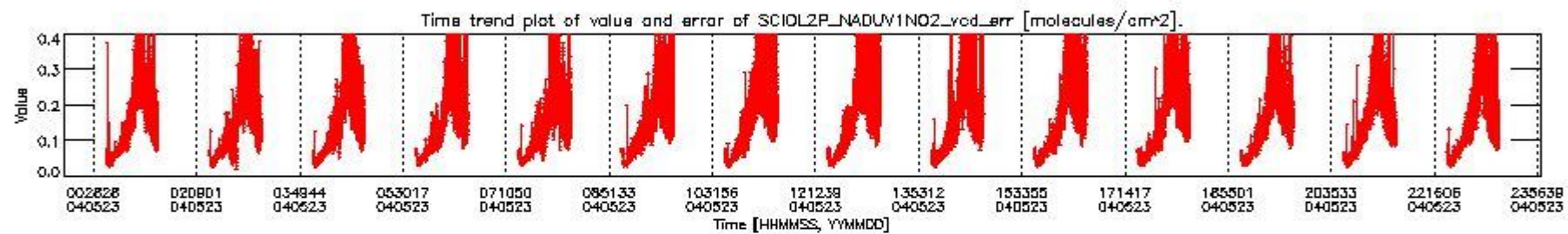
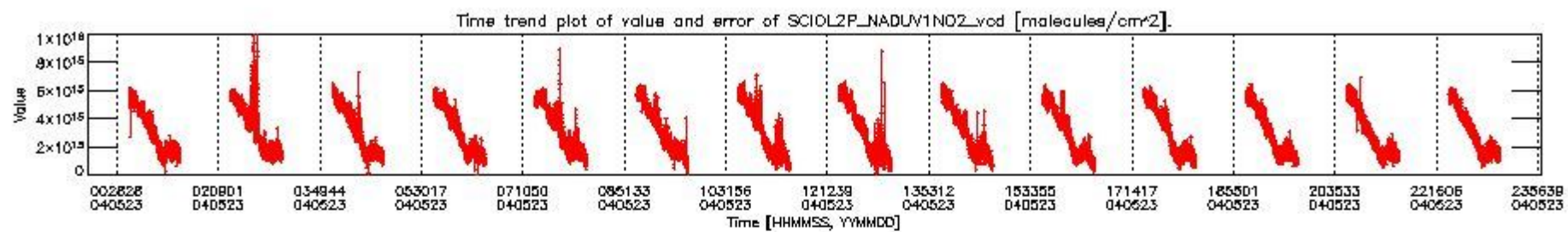


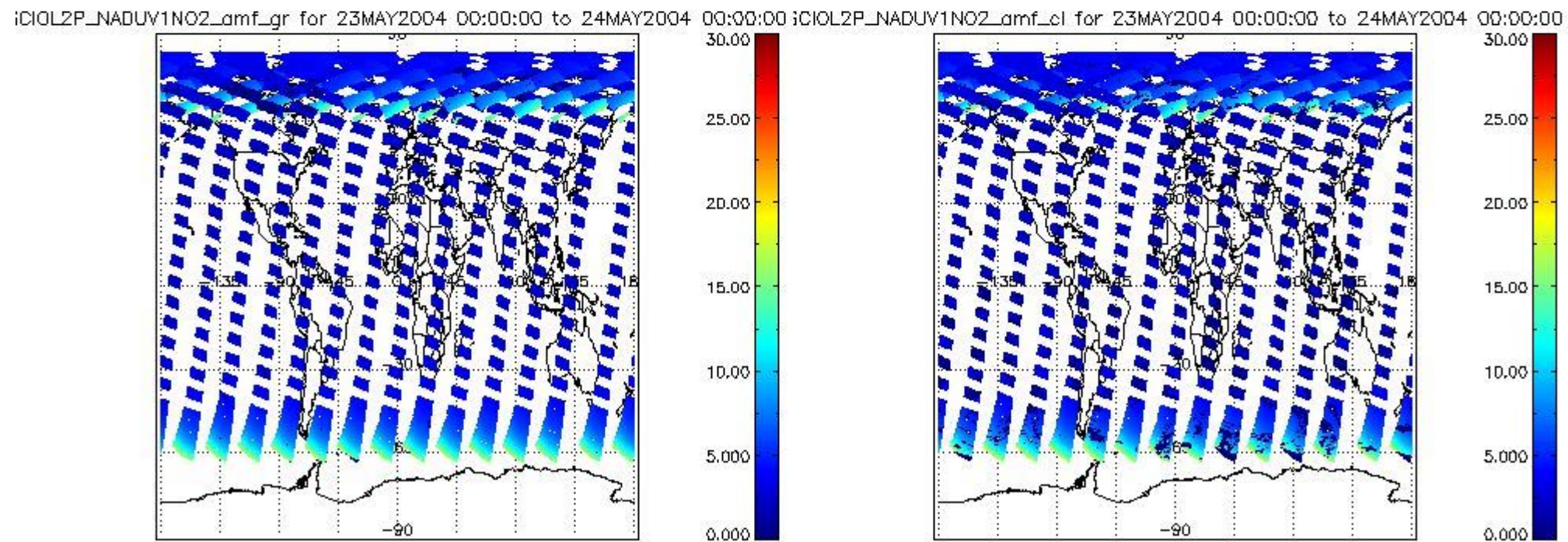
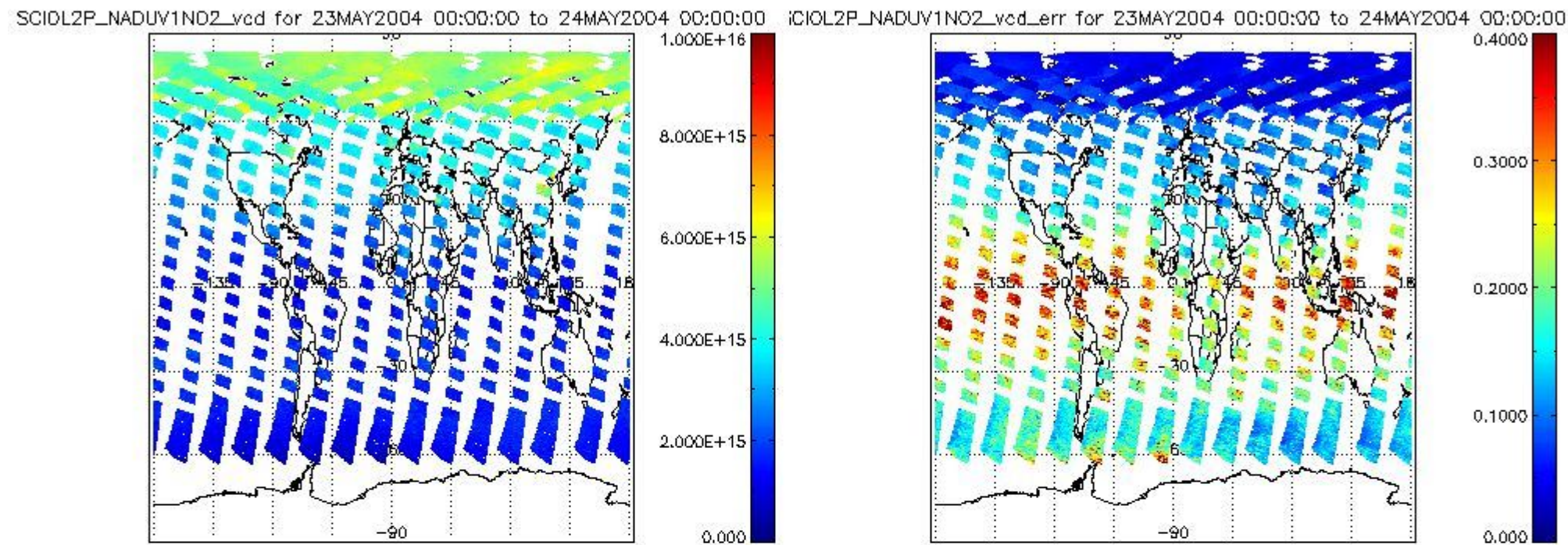
SCIOL2P_NADUV003_amf_gr for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



SCIOL2P_NADUV003_amf_cl for 23MAY2004 00:00:00 to 24MAY2004 00:00:00







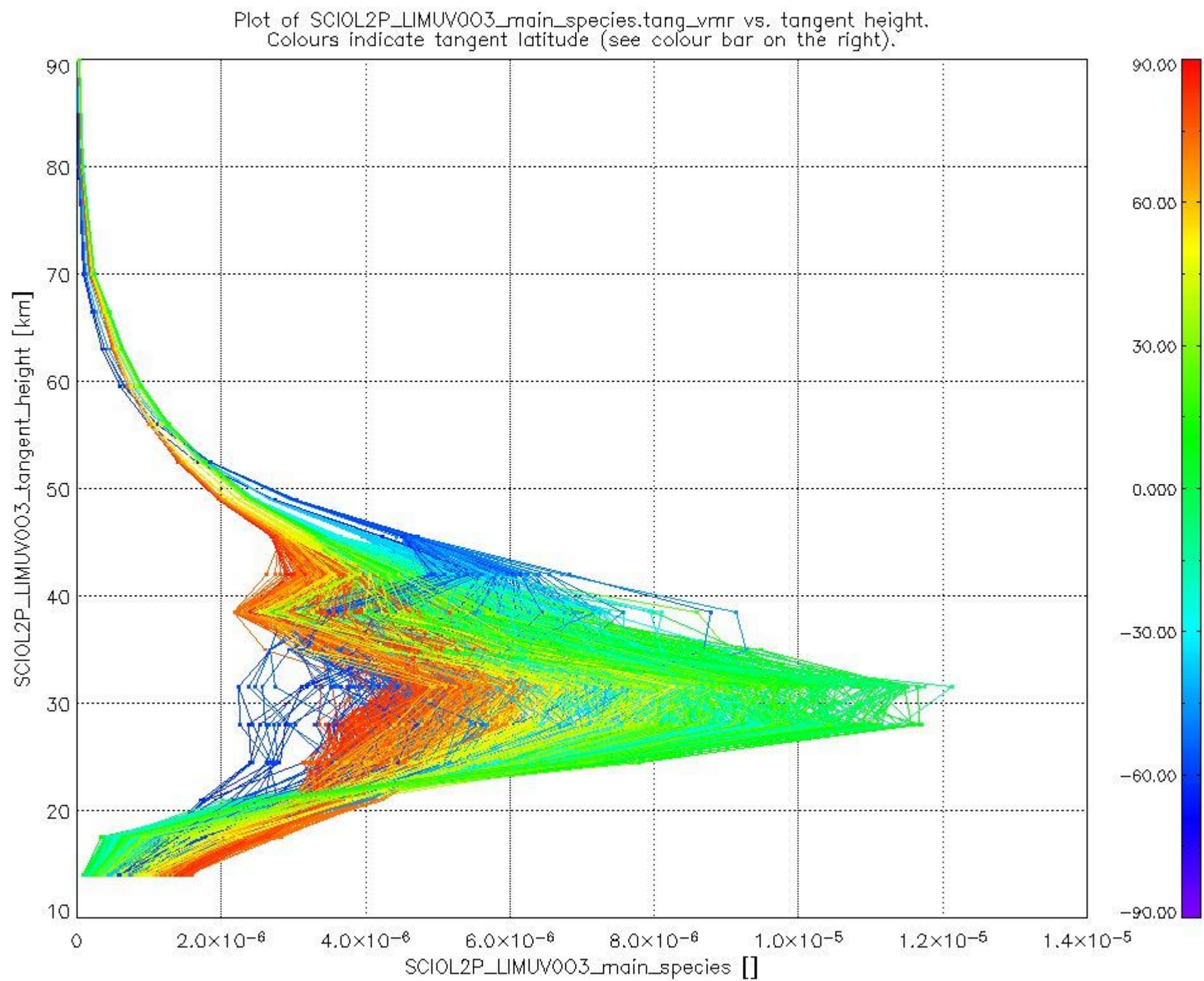
2.2.3 Limb

This section shows information about product quality of the limb retrievals, in particular the quality of retrieved species.

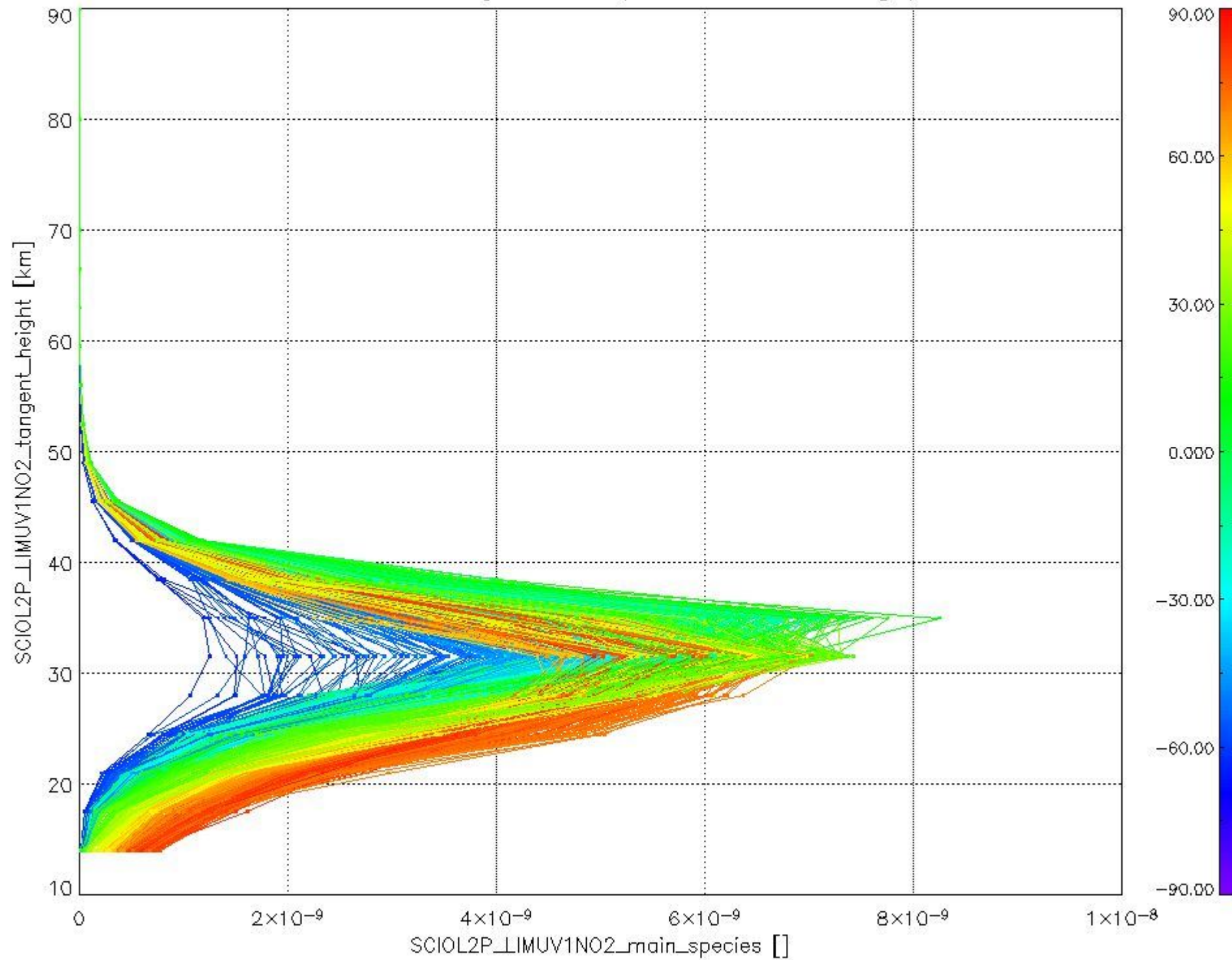
The following data items are currently included into this section:

Number	Data item ID
0	SCIOL2PLIMUV003_main_species
1	SCIOL2PLIMUV1NO2_main_species

The following plots shows for each species the tangent volume mixing ratio vs. tangent height. Colours indicate tangent latitude.



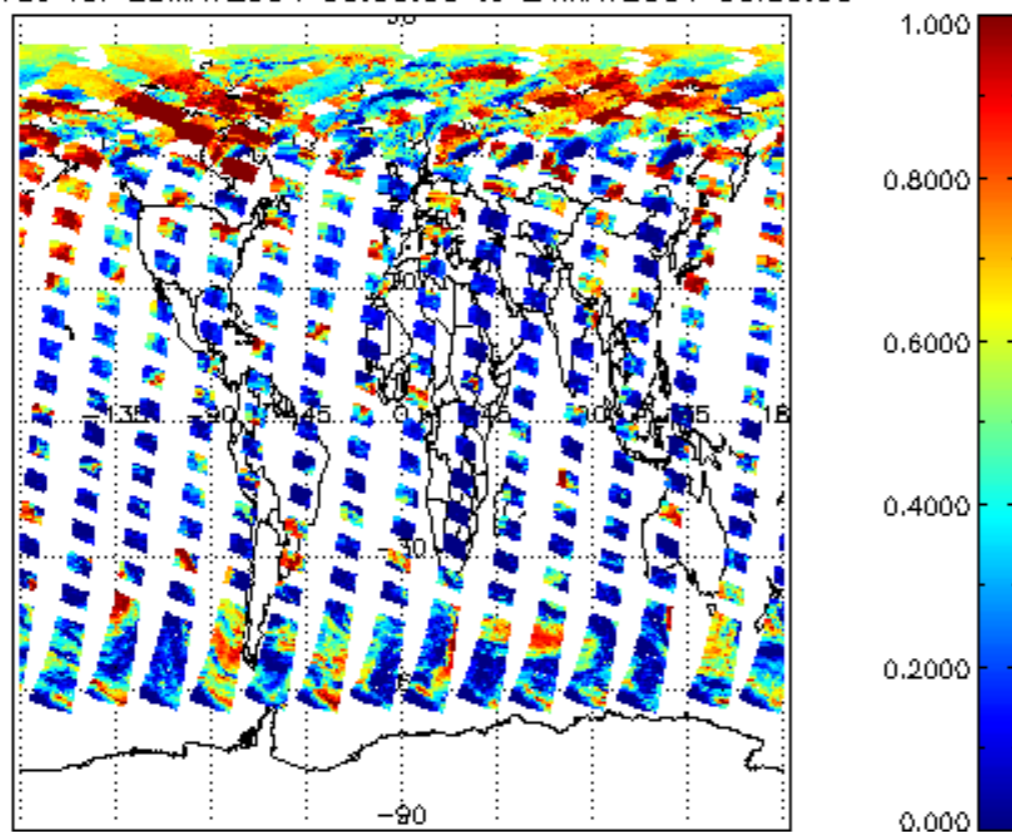
Plot of SCIOL2P_LIMUV1NO2_main_species.tang_vmr vs. tangent height.
Colours indicate tangent latitude (see colour bar on the right).



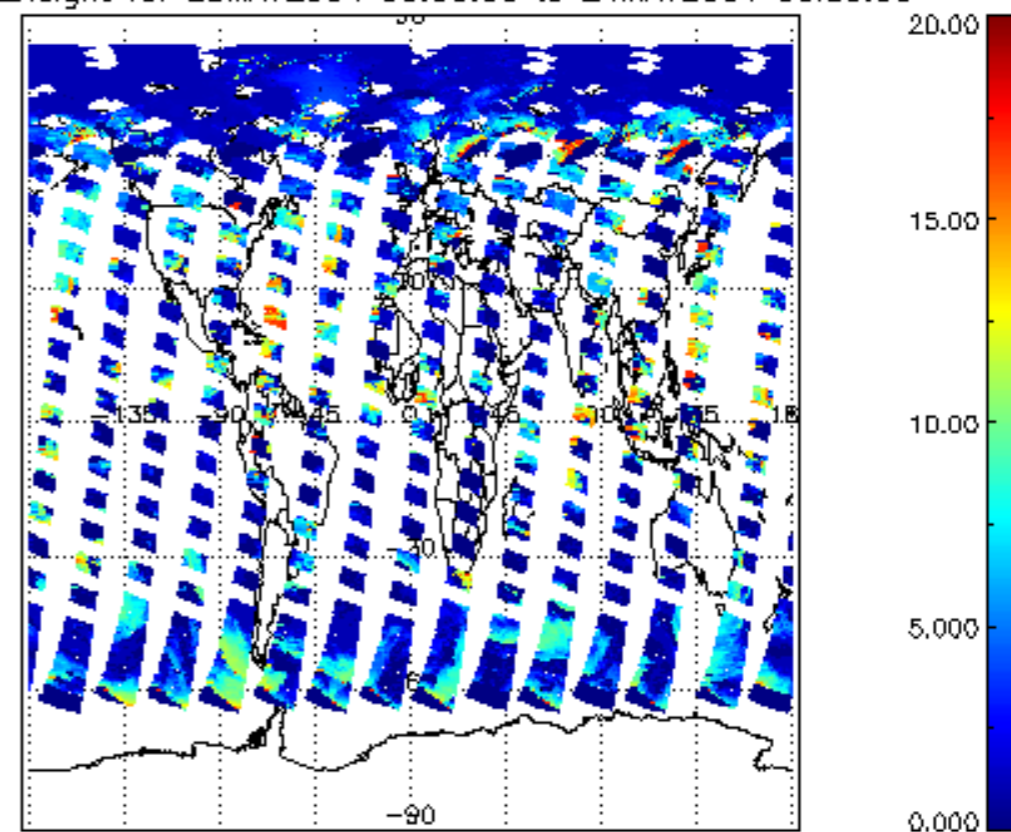
2.3 ADF monitoring

Number	ADF
	IN_ (INITIALISATION_FILE)
0	SCI_IN__AXNPDE20070629_092400_20070720_000000_20991231_235959
	ECF (ECMWF_FILE)
1	NOT USED

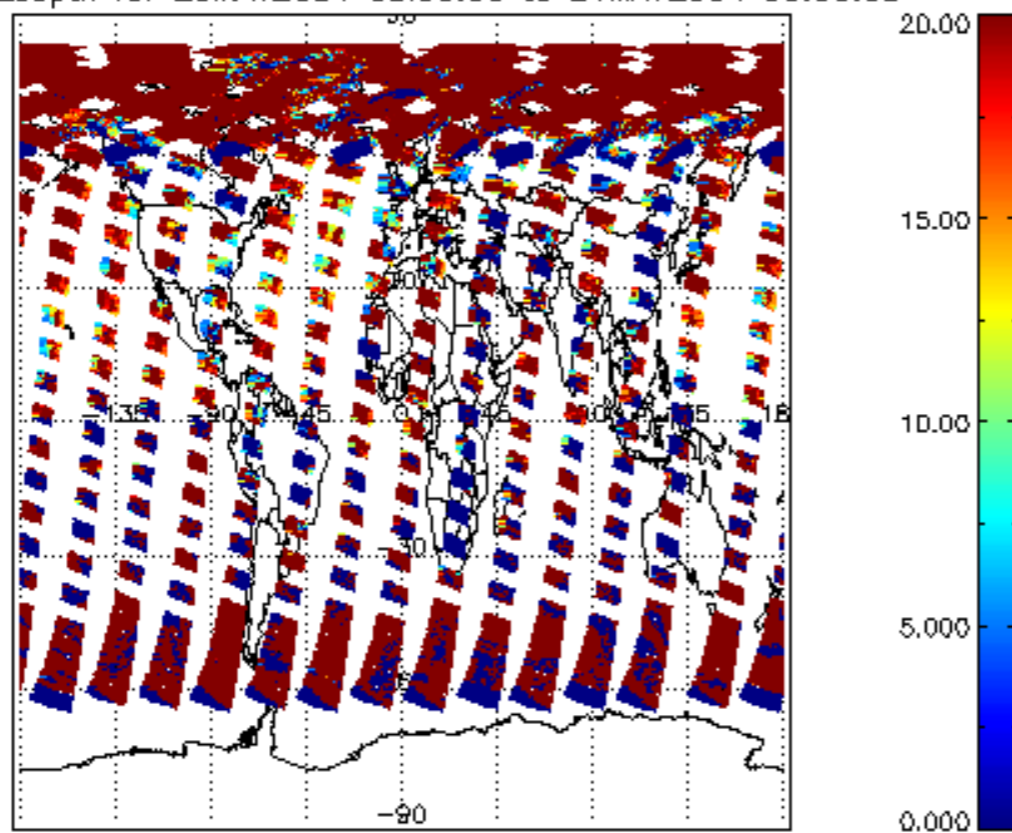
cl_frac for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



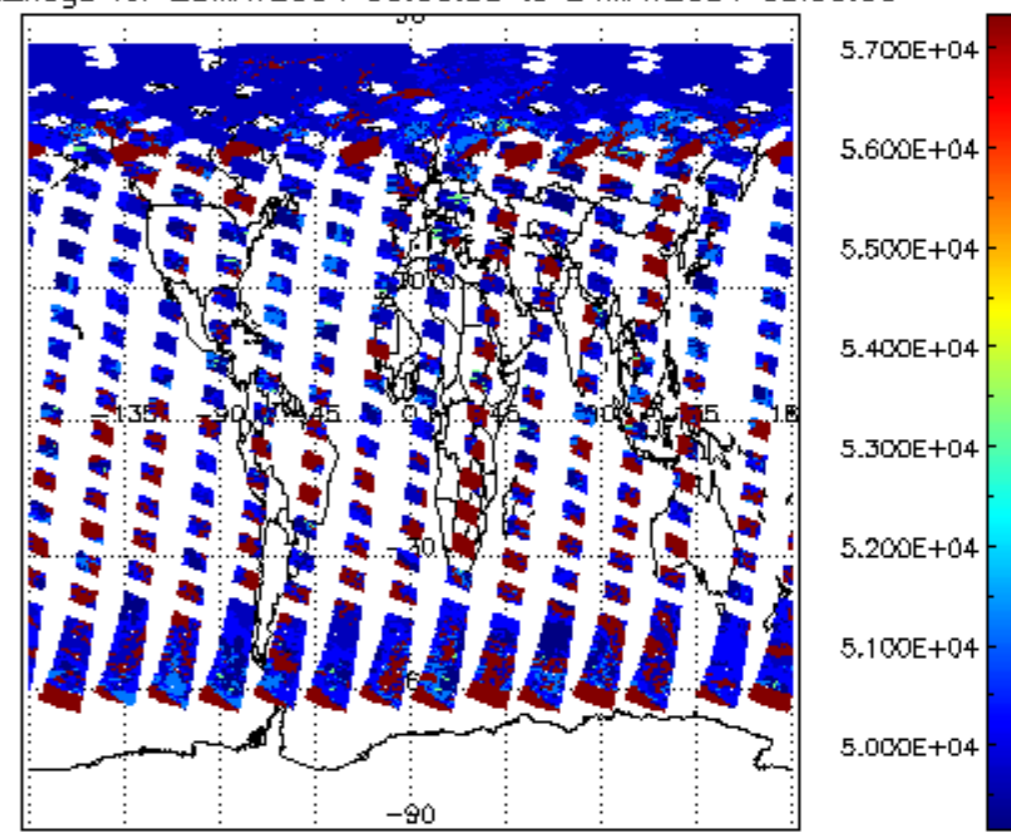
cl_top_height for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

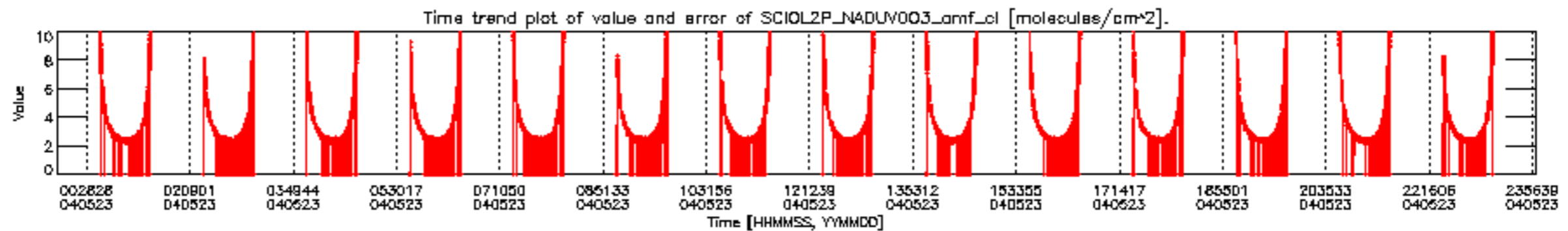
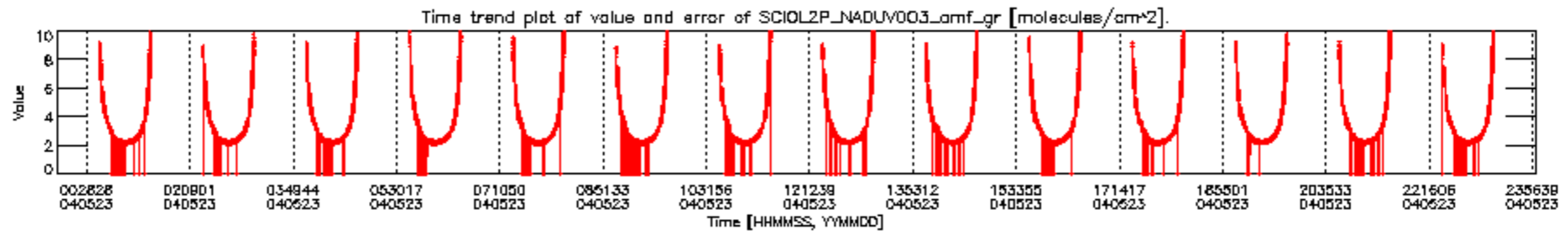
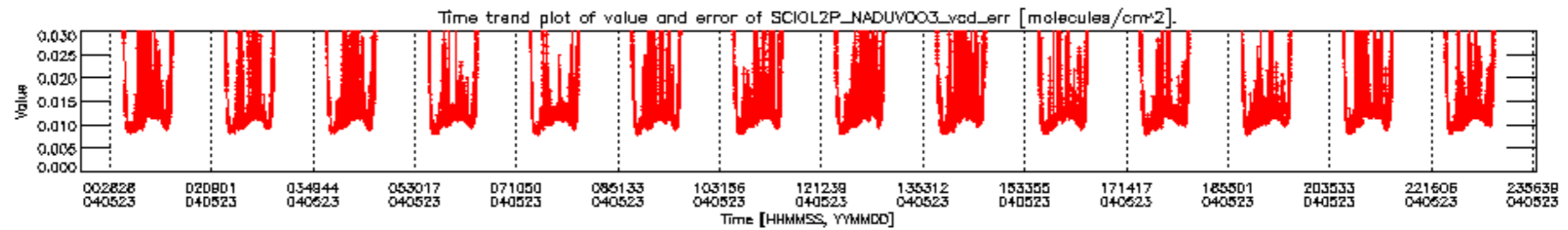
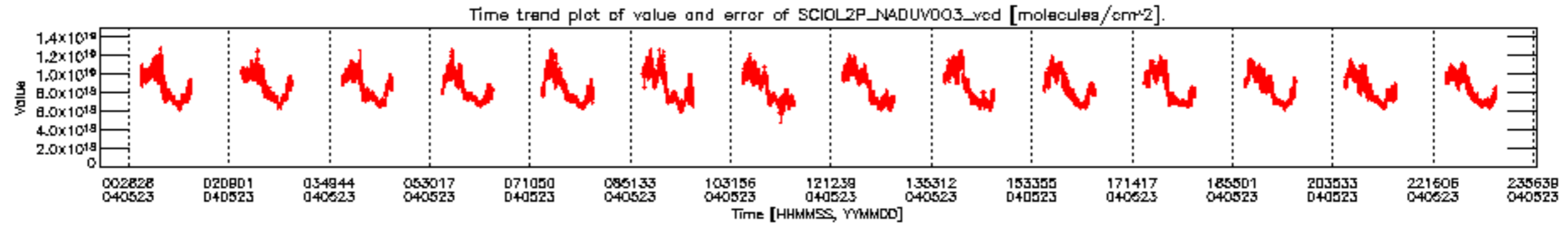


cl_opt_depth for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

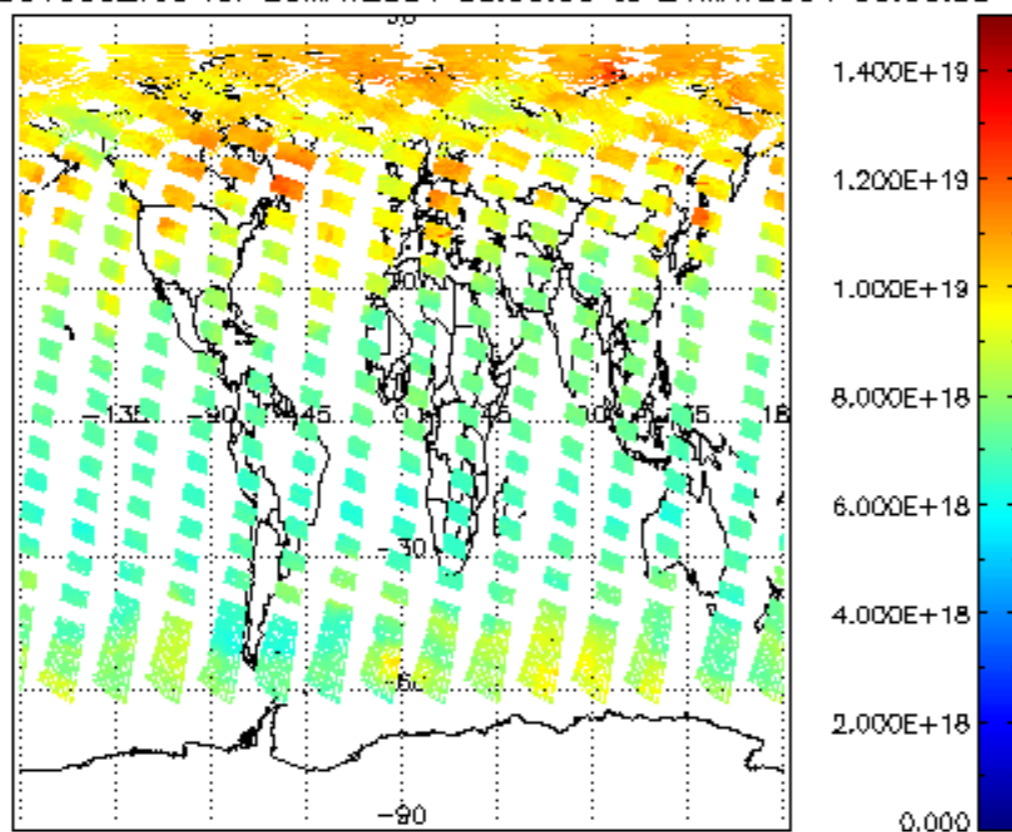


cloud_flags for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

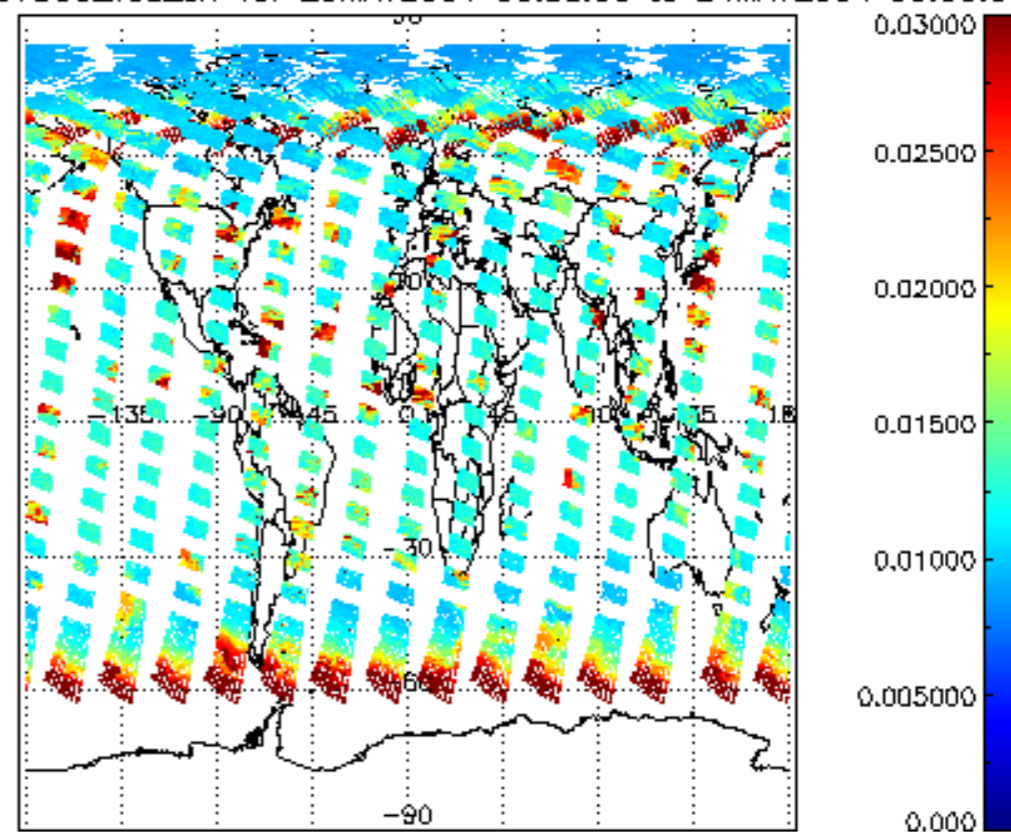




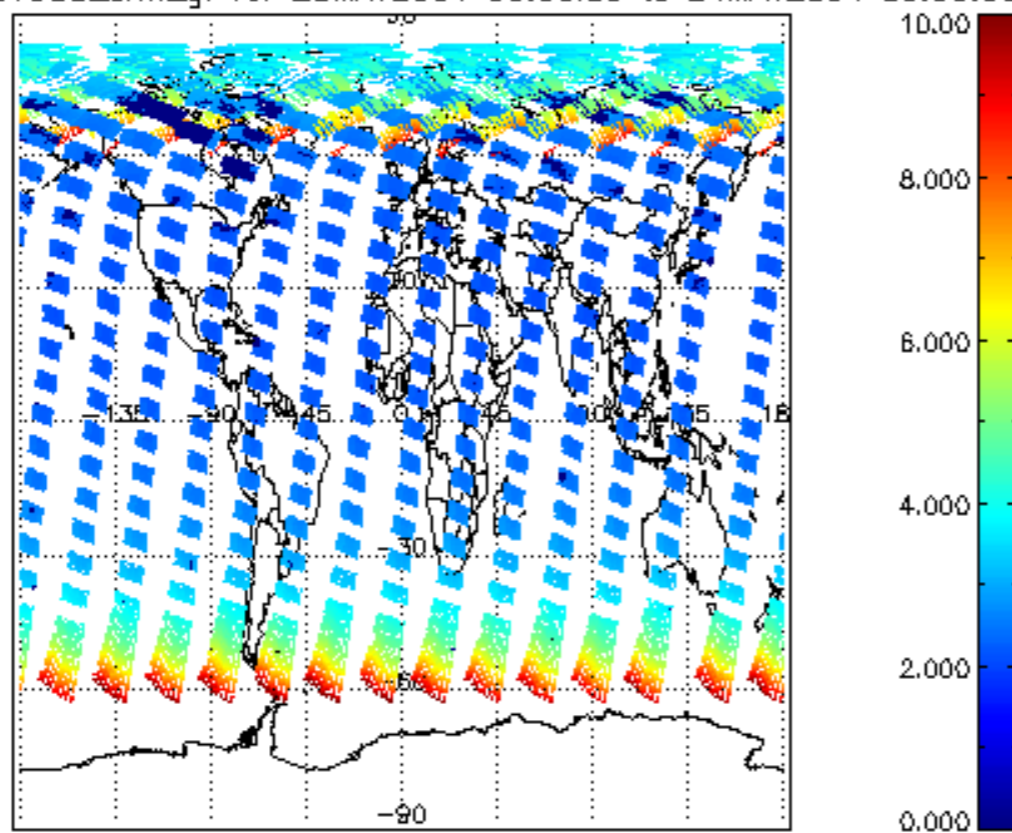
SCIOL2P_NADUV003_vcd for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



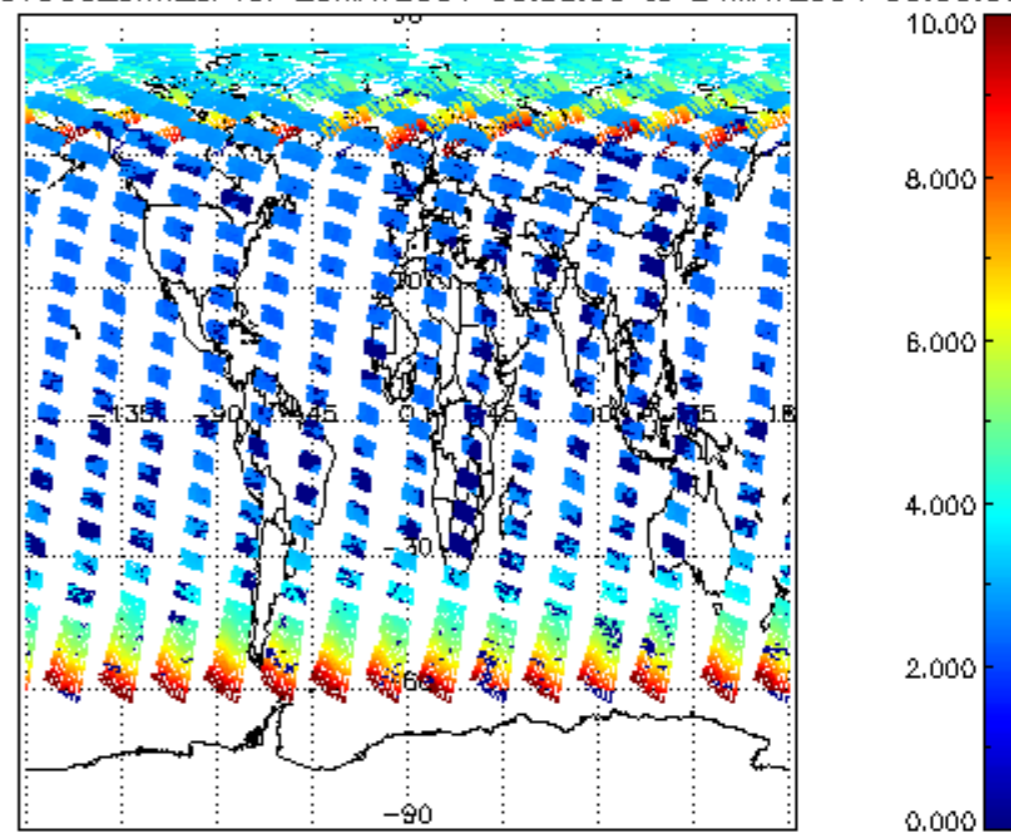
SCIOL2P_NADUV003_vcd_err for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

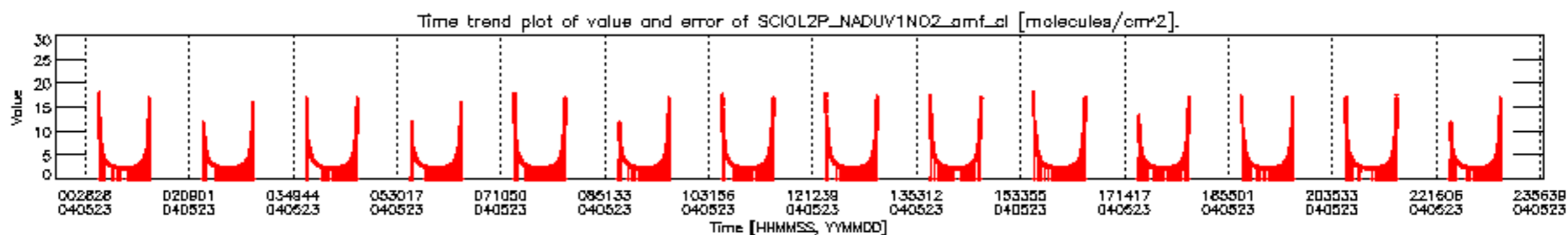
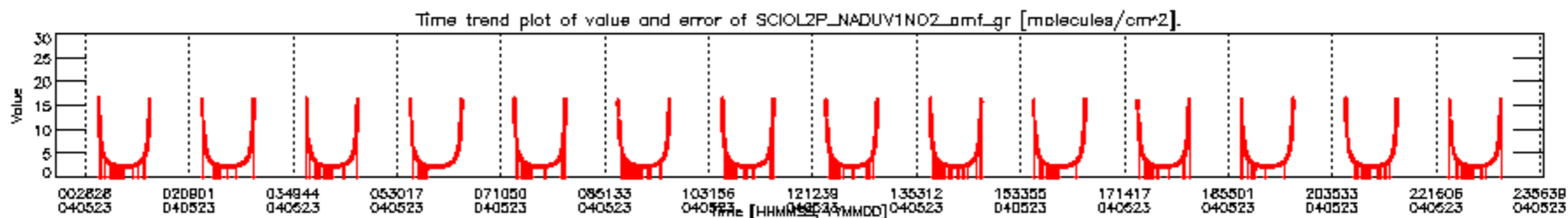
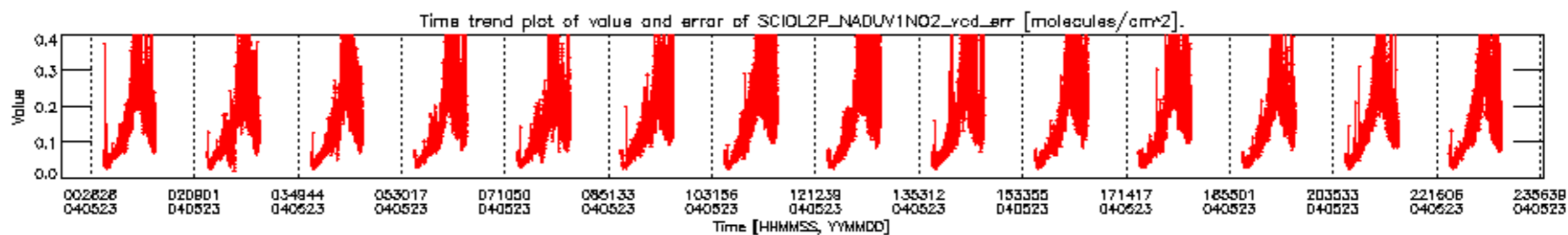
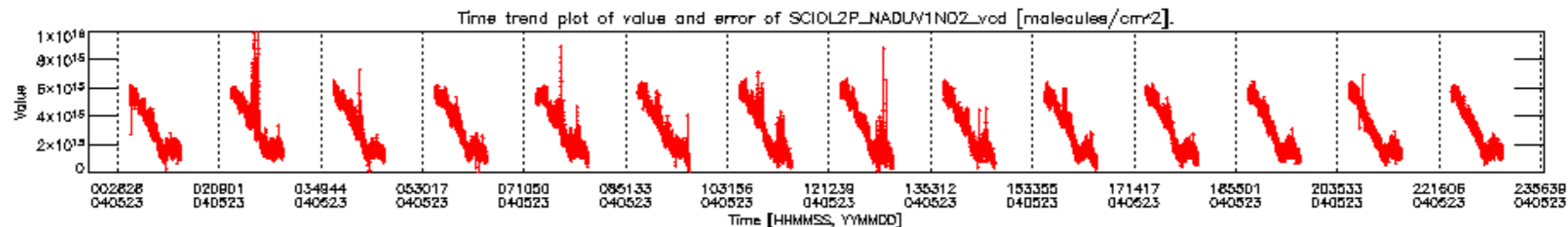


SCIOL2P_NADUV003_amf_gr for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

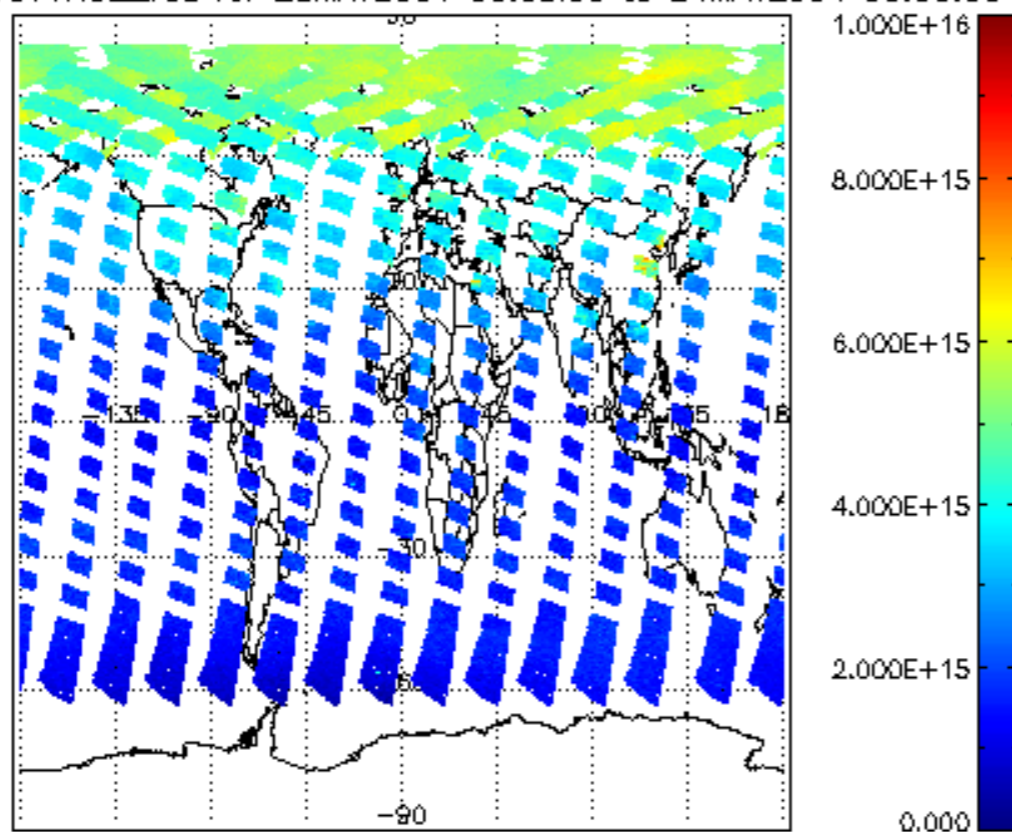


SCIOL2P_NADUV003_amf_cl for 23MAY2004 00:00:00 to 24MAY2004 00:00:00

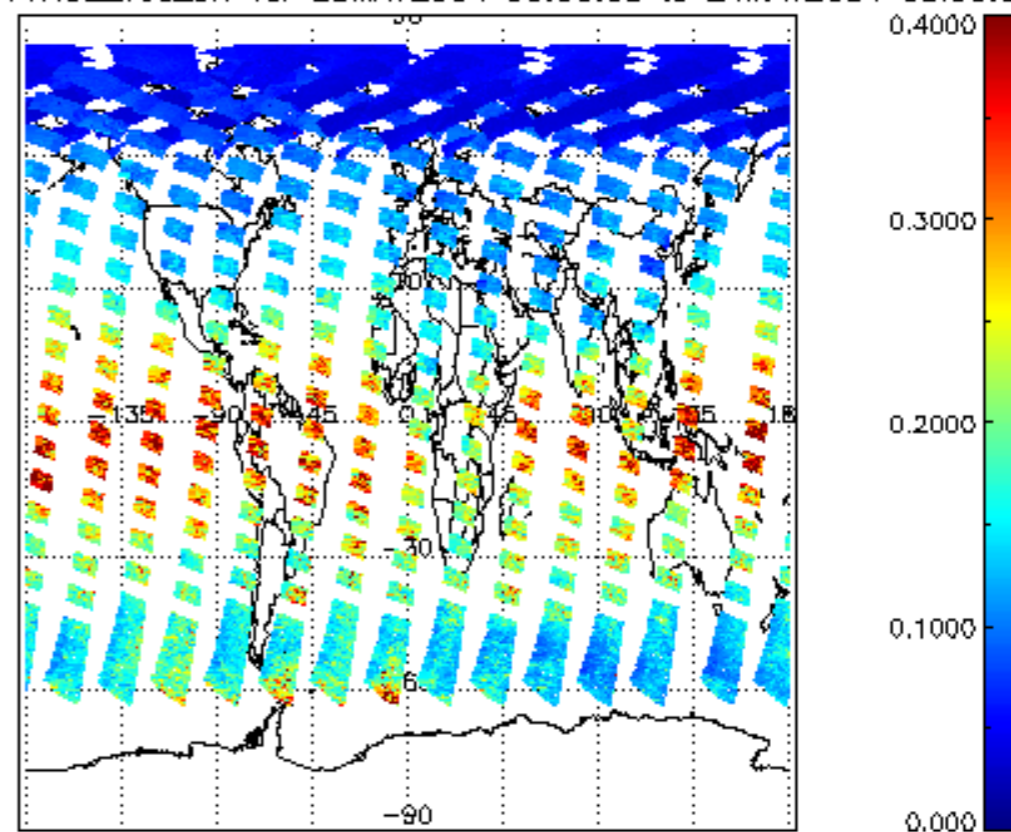




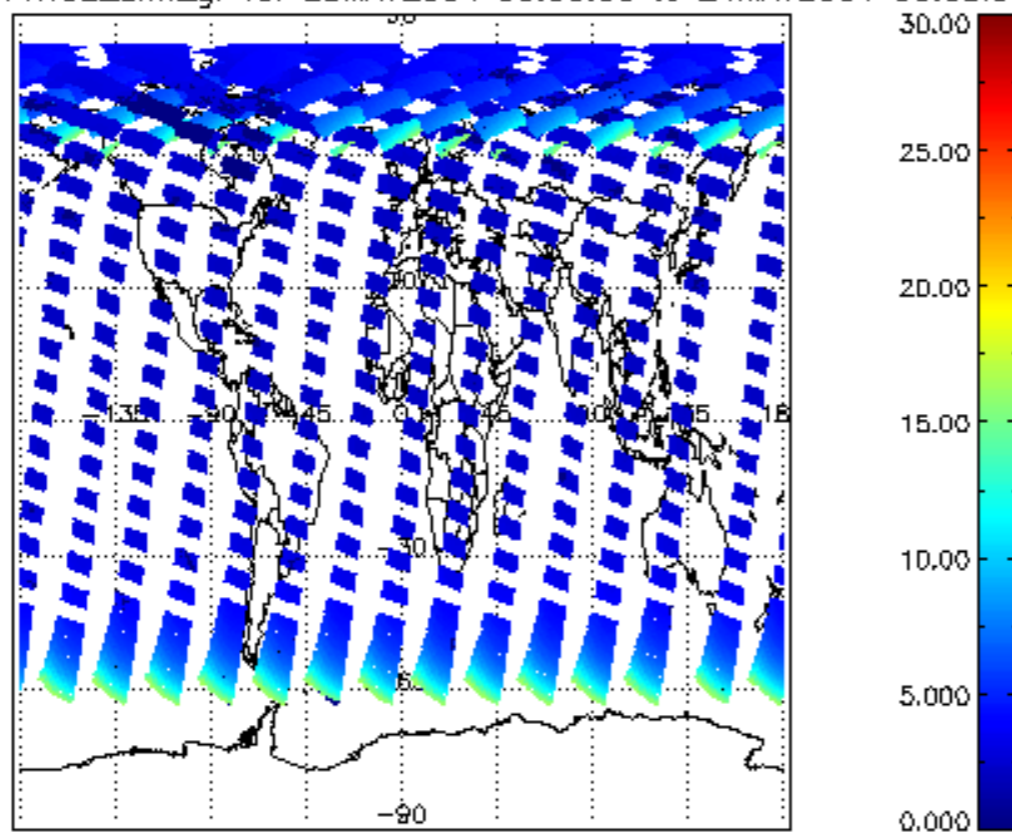
SCIOL2P_NADUV1NO2_vcd for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



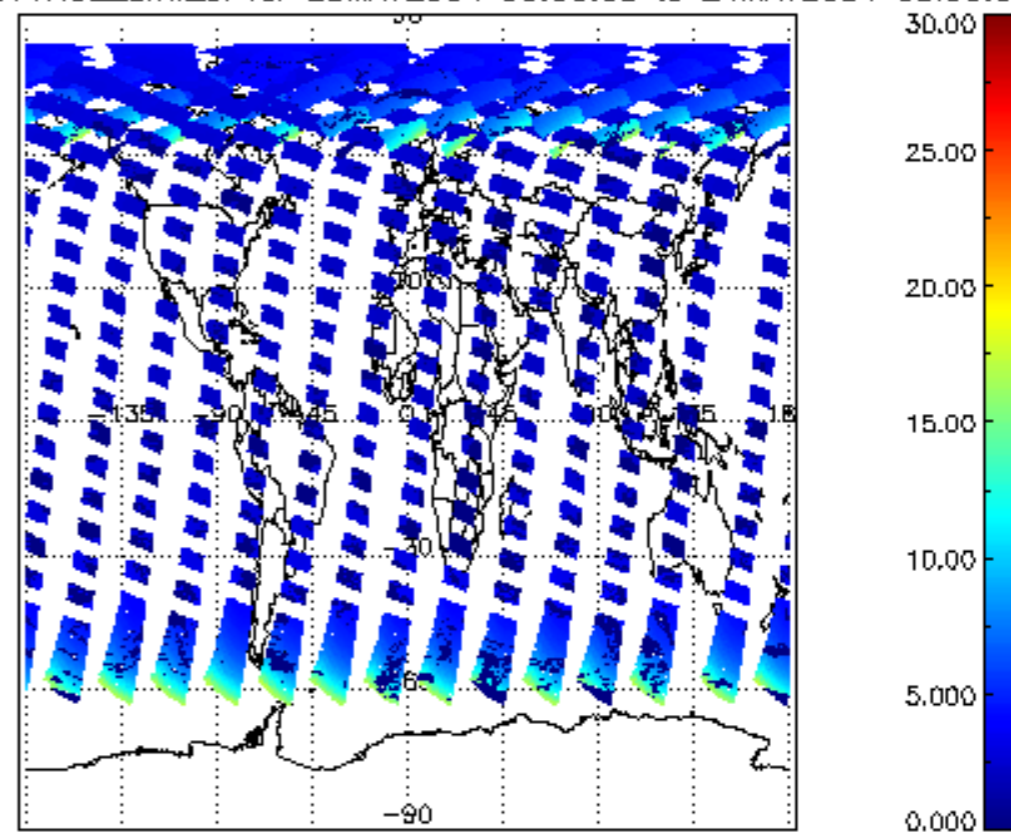
iCIOL2P_NADUV1NO2_vcd_err for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



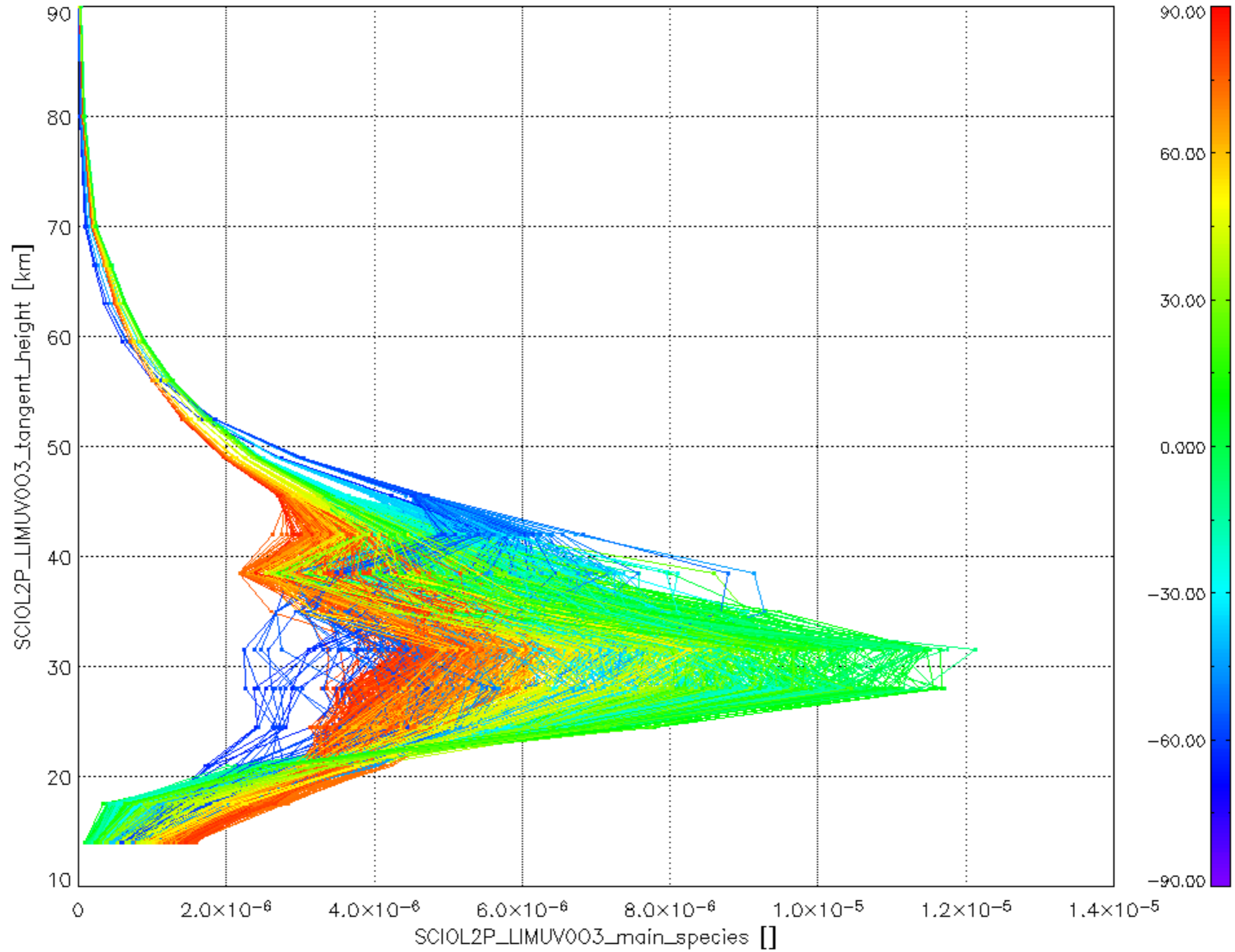
iCIOL2P_NADUV1NO2_amf_gr for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



iCIOL2P_NADUV1NO2_amf_cl for 23MAY2004 00:00:00 to 24MAY2004 00:00:00



Plot of SCIOL2P_LIMUV003_main_species.tang_vmr vs. tangent height.
 Colours indicate tangent latitude (see colour bar on the right).



Plot of SCIOL2P_LIMUV1NO2_main_species.tang_vmr vs. tangent height.
 Colours indicate tangent latitude (see colour bar on the right).

