

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	17DEC2009 03:07:39
Data source version	SCIA-OL/3.01-R
Processing scope for products	29NOV2009 00:00:00 to 30NOV2009 00:00:00
Start time of first product within scope	28NOV2009 23:48:21
Stop time of last product within scope	30NOV2009 00:12:24
Total number of level 2 products	15
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__2PRDPA20091128_234821_000033812084_00374_40508_5502.N1	28NOV2009 23:48:21	29NOV2009 00:44:43	0	GOOD
1	SCI_OL__2PRDPA20091129_012857_000033252084_00375_40509_5503.N1	29NOV2009 01:28:57	29NOV2009 02:24:23	0	GOOD
2	SCI_OL__2PRDPA20091129_030933_000033812084_00376_40510_5504.N1	29NOV2009 03:09:33	29NOV2009 04:05:55	0	GOOD
3	SCI_OL__2PRDPA20091129_045010_000033942084_00377_40511_5505.N1	29NOV2009 04:50:10	29NOV2009 05:46:44	0	GOOD
4	SCI_OL__2PRDPA20091129_063046_000033812084_00378_40512_5506.N1	29NOV2009 06:30:46	29NOV2009 07:27:07	0	GOOD
5	SCI_OL__2PRDPA20091129_081122_000033942084_00379_40513_5508.N1	29NOV2009 08:11:22	29NOV2009 09:07:56	0	GOOD
6	SCI_OL__2PRDPA20091129_095158_000033812084_00380_40514_5509.N1	29NOV2009 09:51:58	29NOV2009 10:48:19	0	GOOD
7	SCI_OL__2PRDPA20091129_113234_000033842084_00381_40515_5510.N1	29NOV2009 11:32:34	29NOV2009 12:28:59	0	GOOD
8	SCI_OL__2PRDPA20091129_131310_000033882084_00382_40516_5511.N1	29NOV2009 13:13:10	29NOV2009 14:09:38	0	GOOD
9	SCI_OL__2PRDPA20091129_145346_000033912084_00383_40517_5515.N1	29NOV2009 14:53:46	29NOV2009 15:50:18	0	GOOD
10	SCI_OL__2PRDPA20091129_163422_000033262084_00384_40518_5516.N1	29NOV2009 16:34:22	29NOV2009 17:29:49	0	GOOD
11	SCI_OL__2PRDPA20091129_181454_000033522084_00385_40519_5507.N1	29NOV2009 18:14:54	29NOV2009 19:10:46	0	GOOD
12	SCI_OL__2PRDPA20091129_195556_000033102084_00386_40520_5517.N1	29NOV2009 19:55:56	29NOV2009 20:51:07	0	GOOD
13	SCI_OL__2PRDPA20091129_213611_000033342084_00387_40521_5512.N1	29NOV2009 21:36:11	29NOV2009 22:31:46	0	GOOD
14	SCI_OL__2PRDPA20091129_231647_000033372084_00388_40522_5513.N1	29NOV2009 23:16:47	30NOV2009 00:12:24	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: 150020

Total number of cloud data DSRs with good quality flag (=0): 150020 (100.0 %)

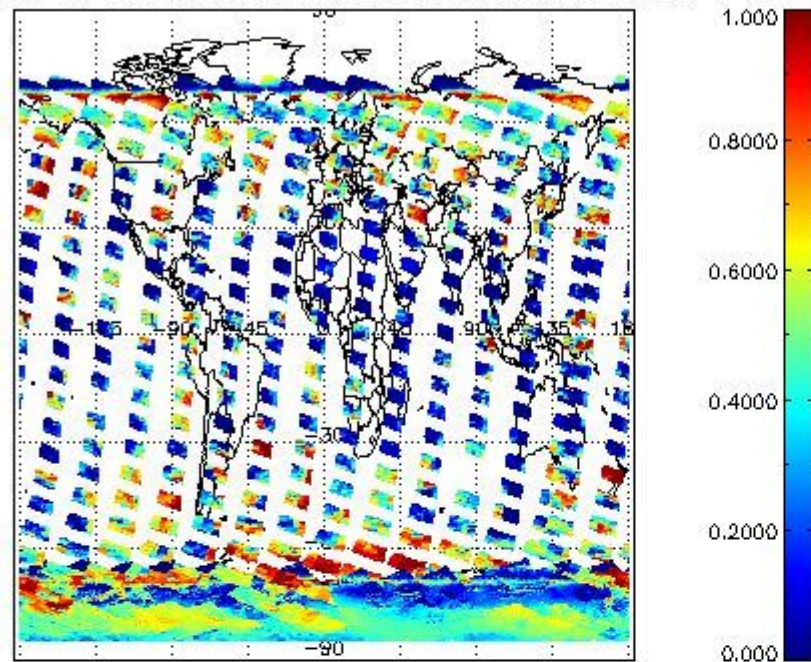
Parameter	#valid	Mean	Median	Min	Max	Stddev	Unit
QUALITY_FLAG	150020	0.0000	0.0000	0.0000	0.0000	0.0000	flag
INTEGR_TIME	150020	0.17331	0.12500	0.12500	0.25000	0.060868	s
CL_FRAC	150020	0.37787	0.37630	0.0000	1.0000	0.27828	-
CL_FRAC_ERR	150020	0.0000	0.0000	0.0000	0.0000	0.0000	%
PMD_READ	150020	5.5459	4.0000	4.0000	8.0000	1.9478	
PMD_READ_CL[0]	150020	0.18307	0.0000	0.0000	8.0000	0.96194	-
PMD_READ_CL[1]	150020	1.1138	0.0000	0.0000	8.0000	2.3012	-
CL_TOP_HEIGHT	127540	4.0315	3.2120	0.0000	17.000	3.7283	km
CL_TOP_HEIGHT_ERR	0	---	---	---	---	---	---
CL_OPT_DEPTH	127540	54.514	46.730	0.0000	101.00	40.848	km
CL_OPT_DEPTH_ERR	0	---	---	---	---	---	---
CL_TYPE_FLAGS	150020	11100000	11100000	11100000	11100000	0.0000	flags
CLOUD_FLAGS	150020	11001011	11000100	11000000	11100000	3363.0	flags
AERO_ABSO_IND	150020	4.1383	4.9442	0.0000	17.886	2.8052	
AERO_IND_DIAG	150020	0.0000	0.0000	0.0000	0.0000	0.0000	
AERO_FLAGS	150020	01011010	00000000	00000000	11000000	24538.	flags

Time and geolocation plots:

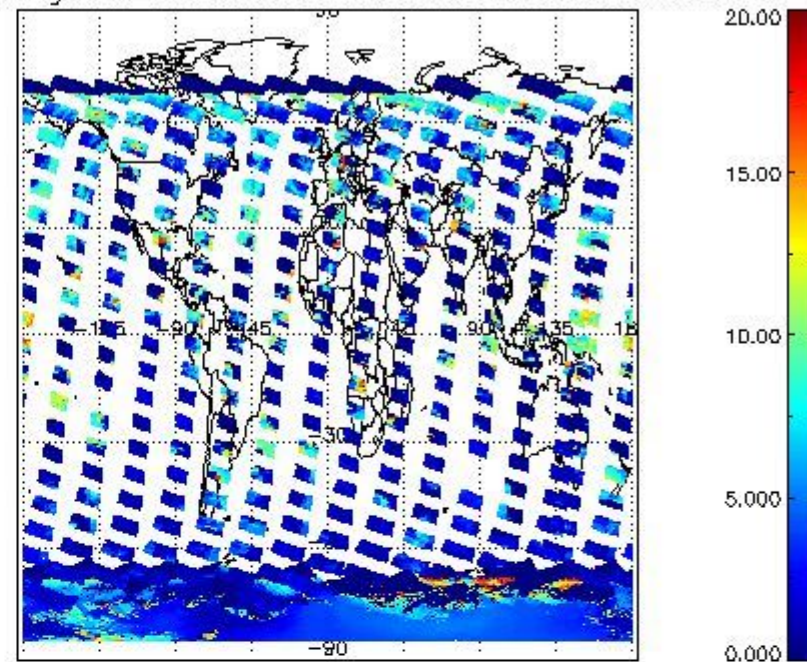
Plots are available for the following parameters:

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

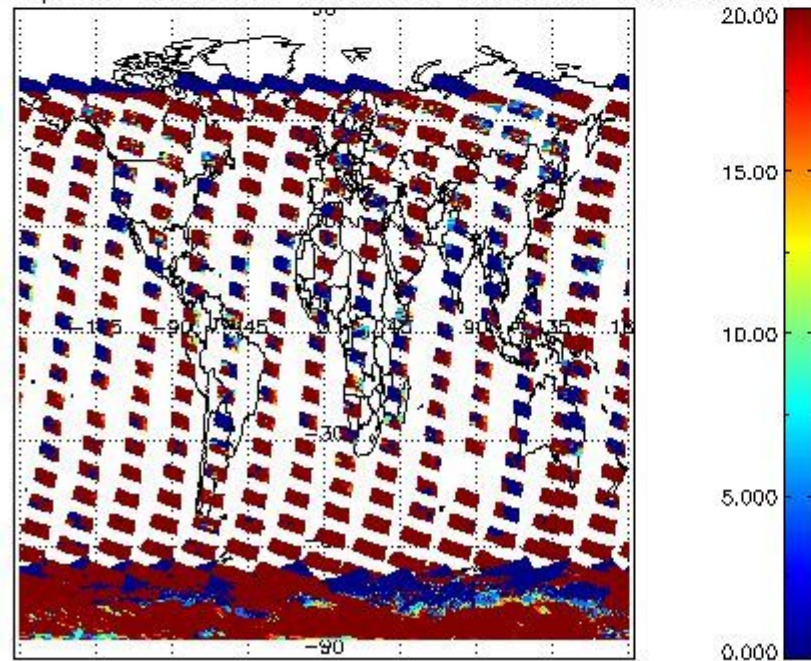
cLfrac for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



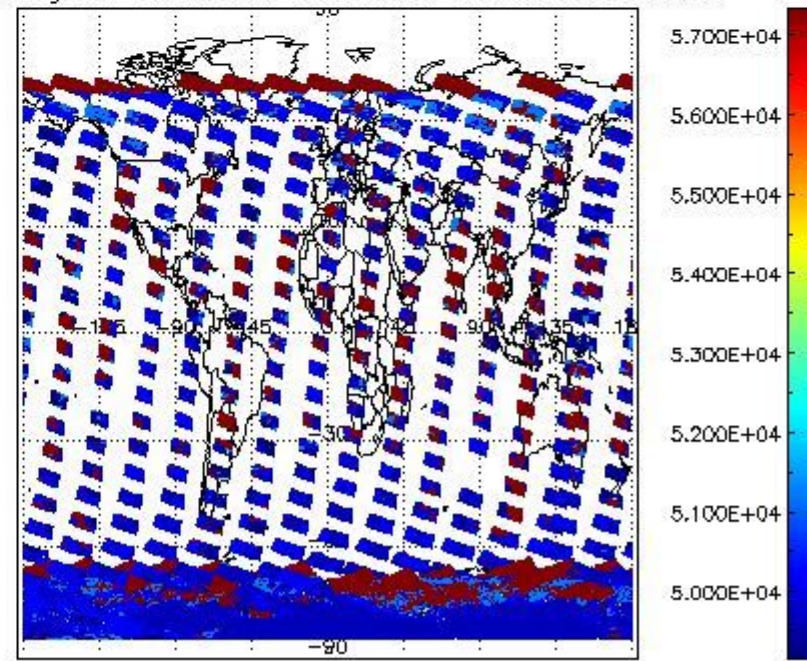
cL_top_height for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



cLopt_depth for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



cloud_flags for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



2.2.2 Nadir

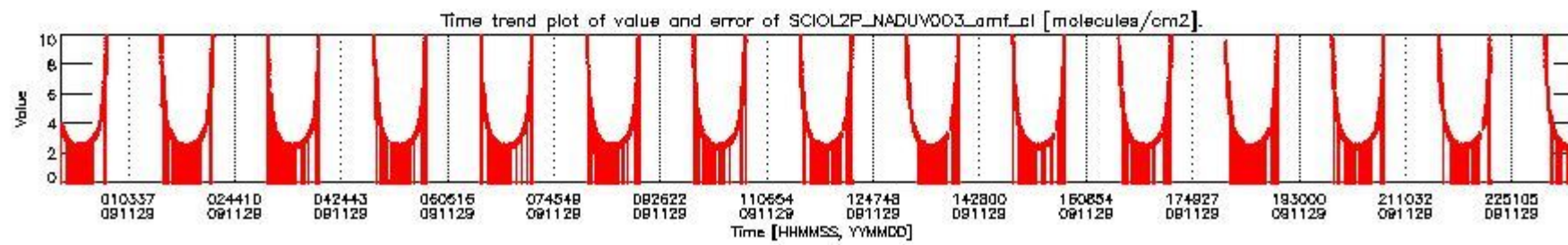
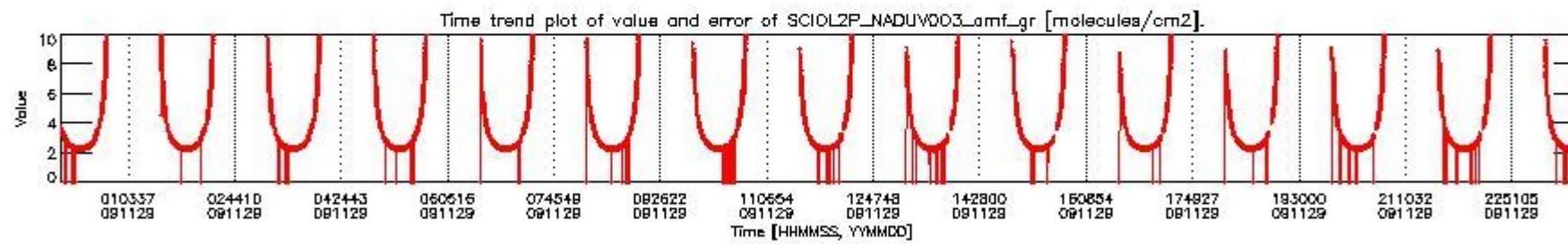
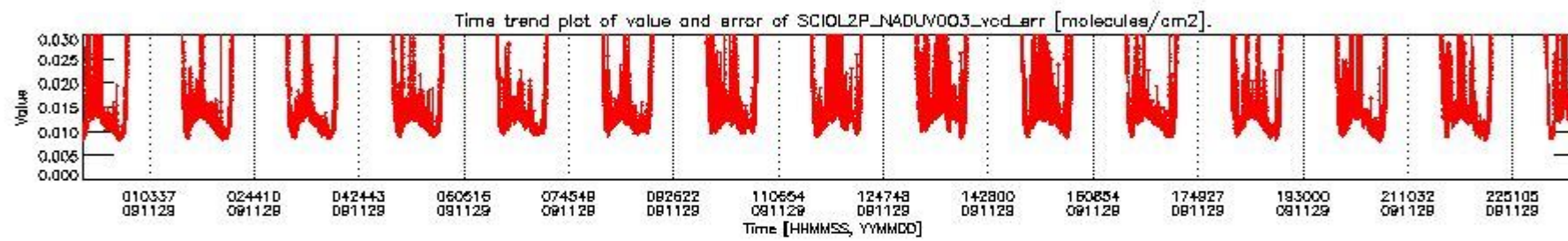
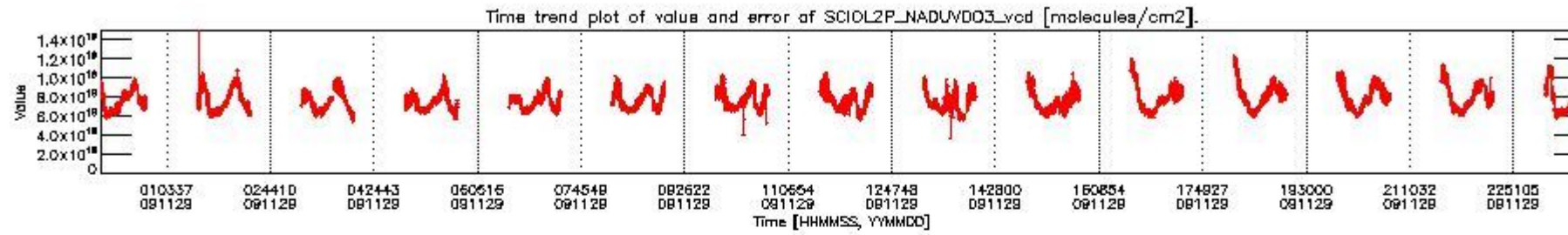
This section shows information about product quality of nadir measurements, in particular the quality of retrieved species.

The following data items are currently included into this section:

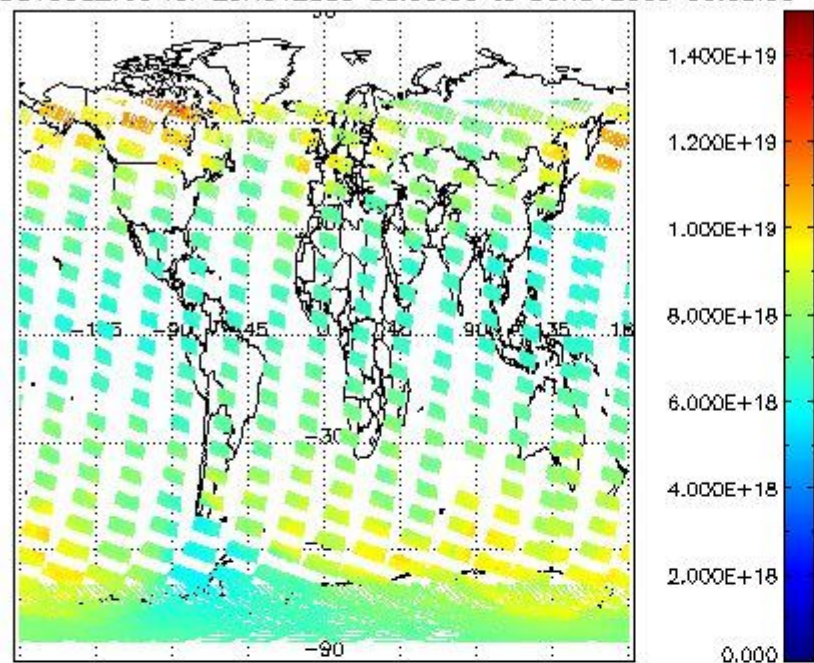
Number	Data item ID
0	SCIOL2P_NADUV003_vcd
1	SCIOL2P_NADUV003_vcd_err
2	SCIOL2P_NADUV003_amf_gr

3	SCIOL2P_NADUV003_amf_cl
4	SCIOL2P_NADUV1NO2_vcd
5	SCIOL2P_NADUV1NO2_vcd_err
6	SCIOL2P_NADUV1NO2_amf_gr
7	SCIOL2P_NADUV1NO2_amf_cl

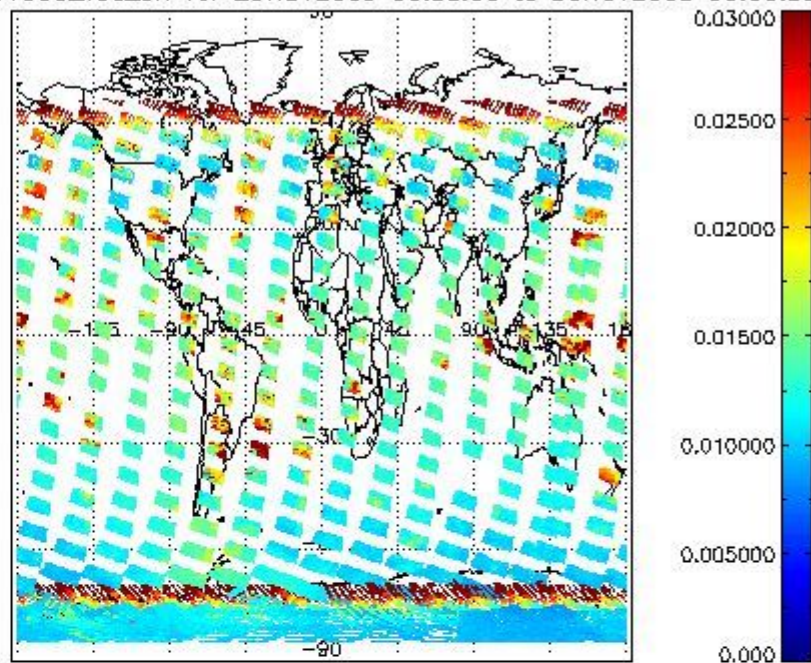
Data is presented both in time trend plots and world map plots, in order to show variations with time and geolocation. The vertical dotted lines in the time trend plots indicate orbits. The orbit times on the X-axis are estimated sensing_start time as suggested by the product sensing_start time in the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



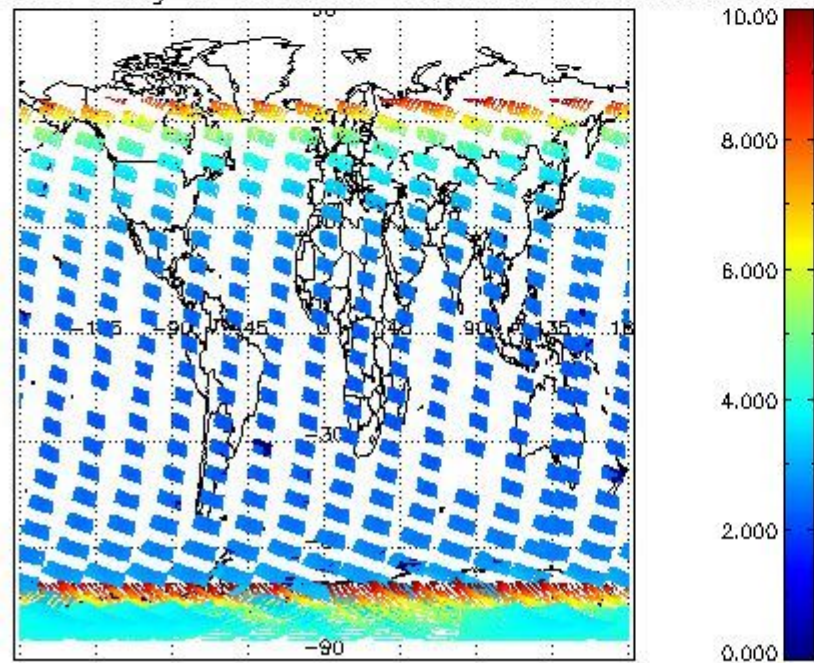
SCIOL2P_NADUV003_vcd for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



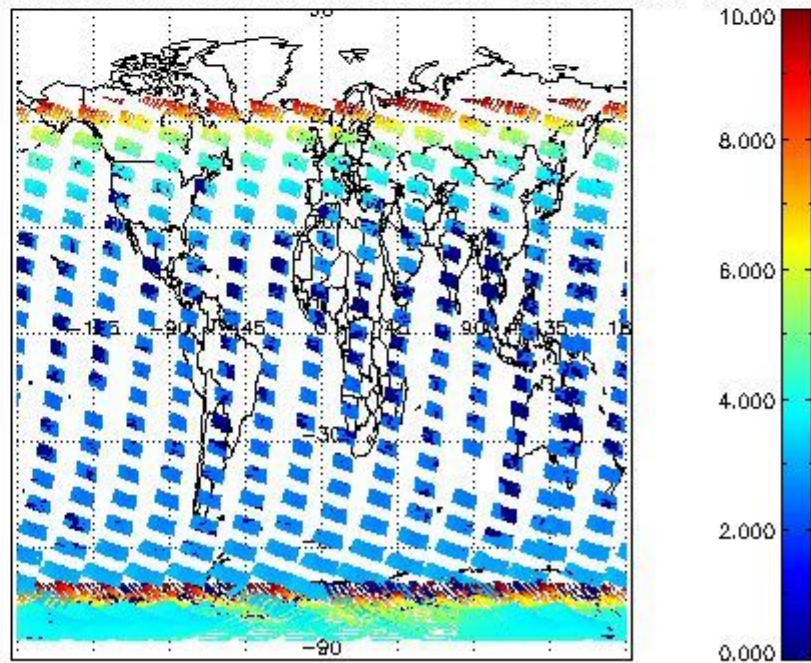
SCIOL2P_NADUV003_vcd_err for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

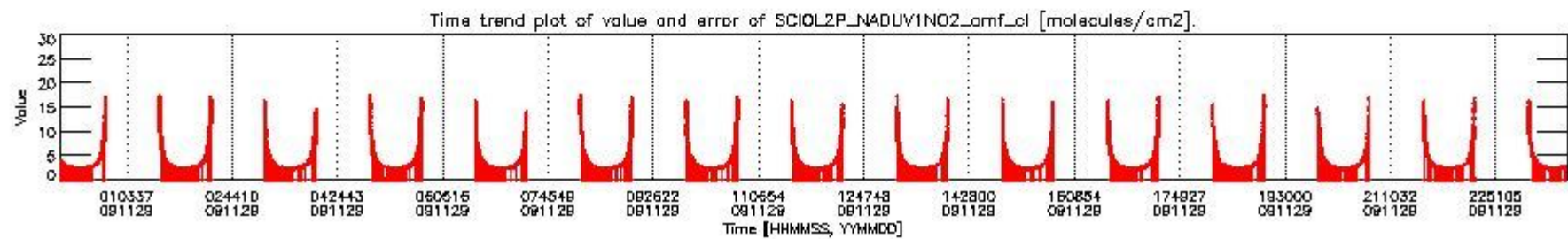
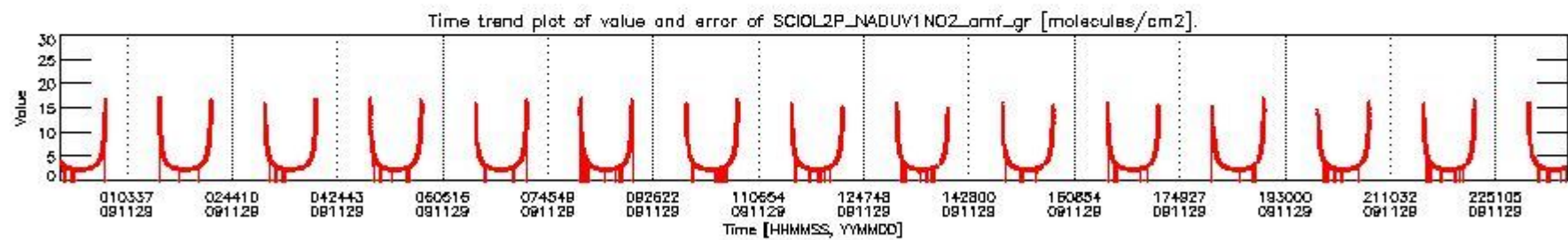
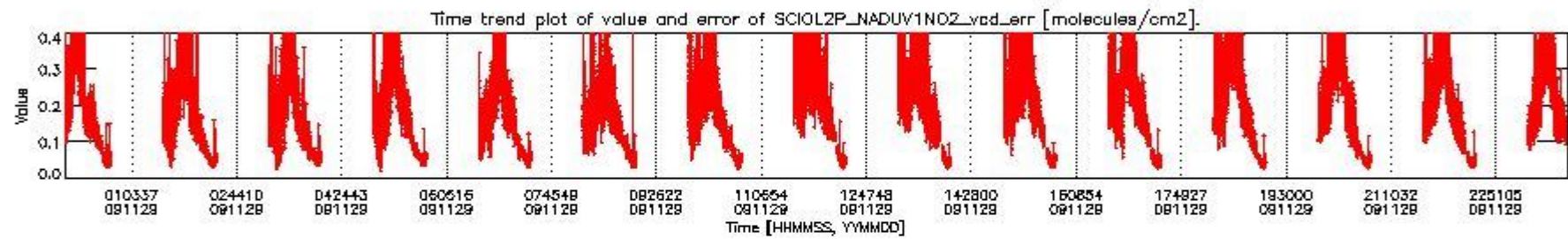
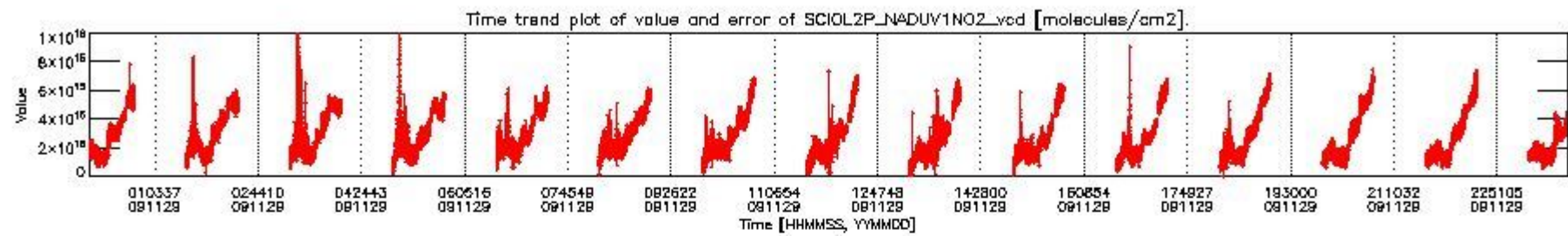


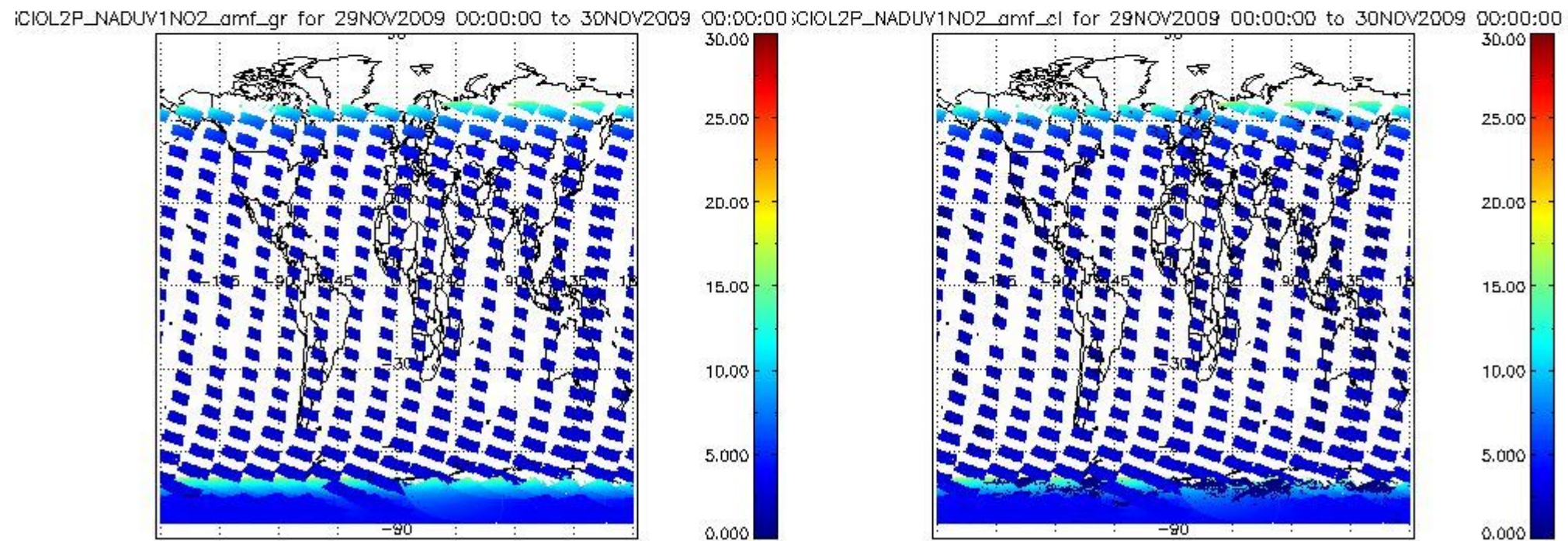
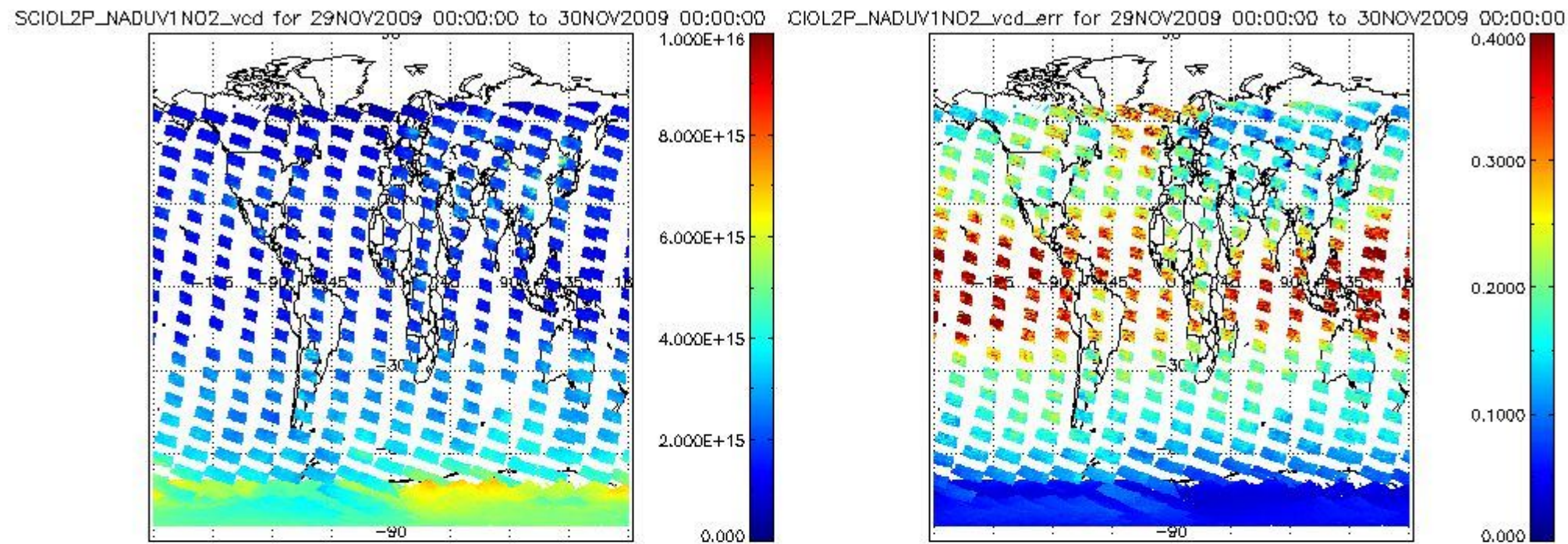
SCIOL2P_NADUV003_amf_gr for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



SCIOL2P_NADUV003_amf_cl for 29NOV2009 00:00:00 to 30NOV2009 00:00:00







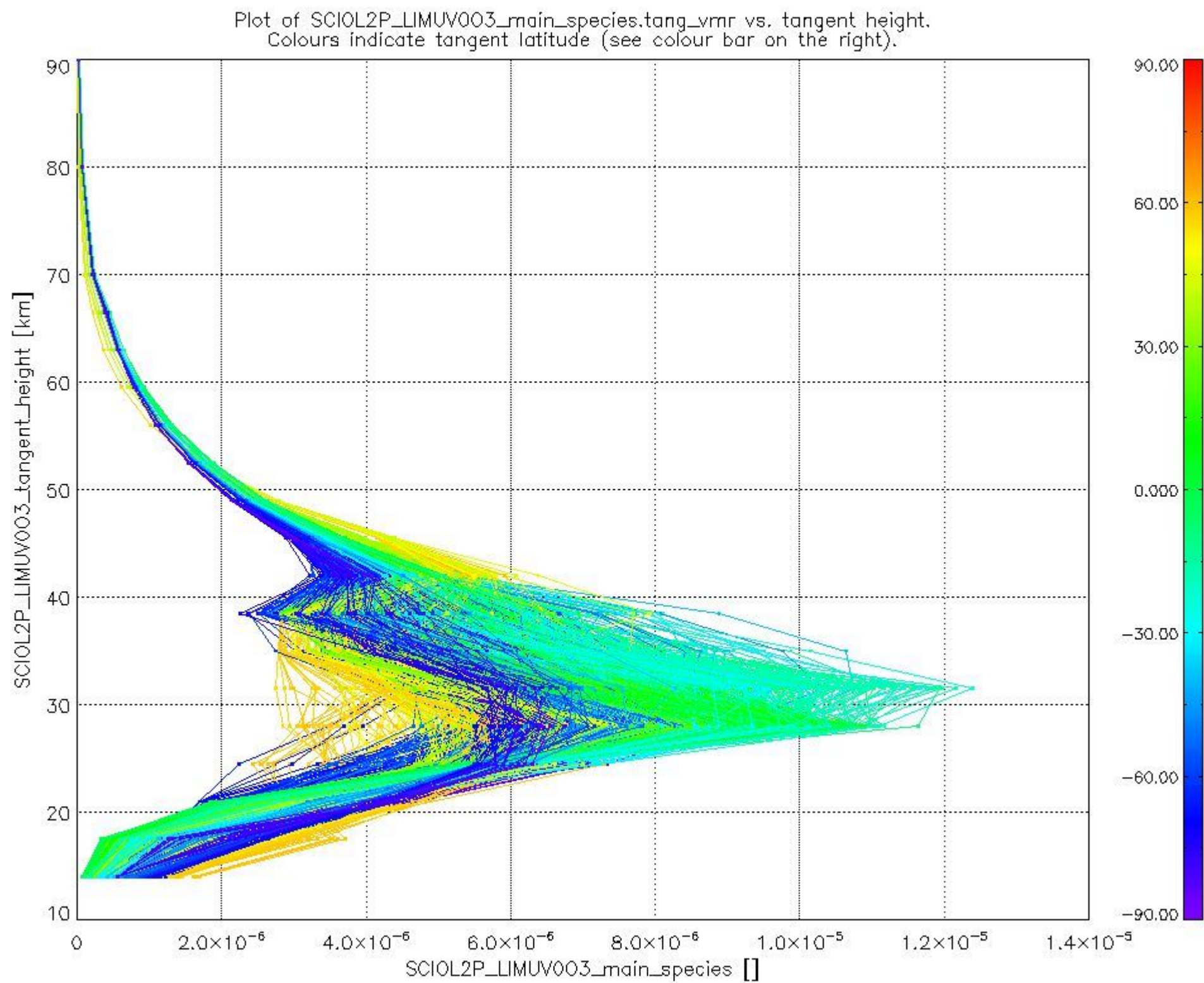
2.2.3 Limb

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

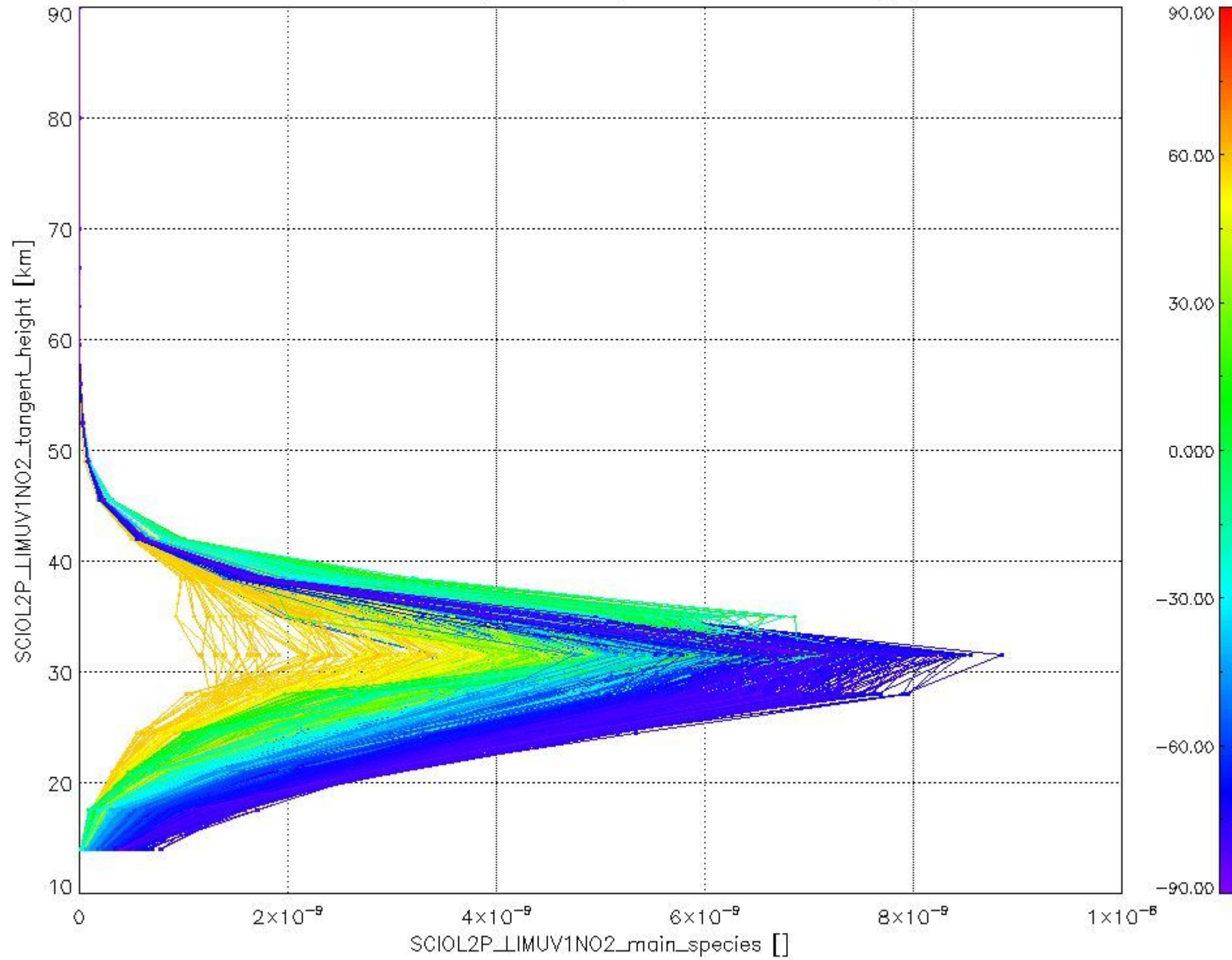
The following data items are currently included into this section:

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.



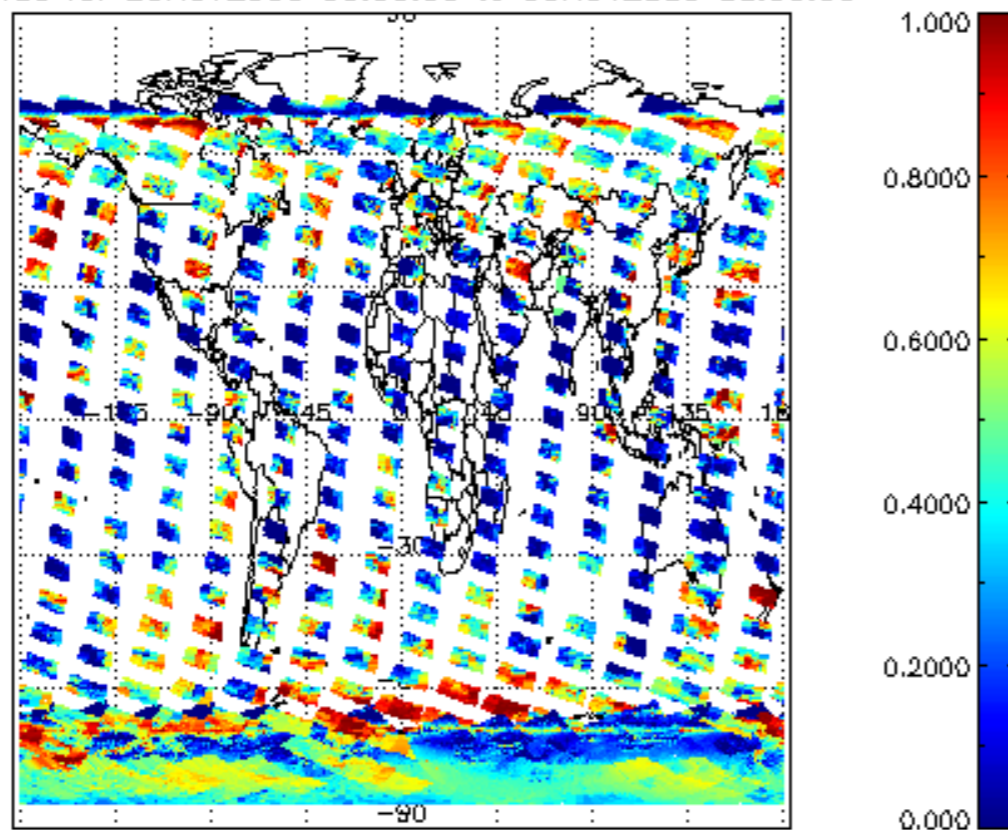
Plot of SCIOL2P_LIMUV1NO2_main_species.tang_vmr vs. tangent height.
Colours indicate tangent latitude (see colour bar on the right).



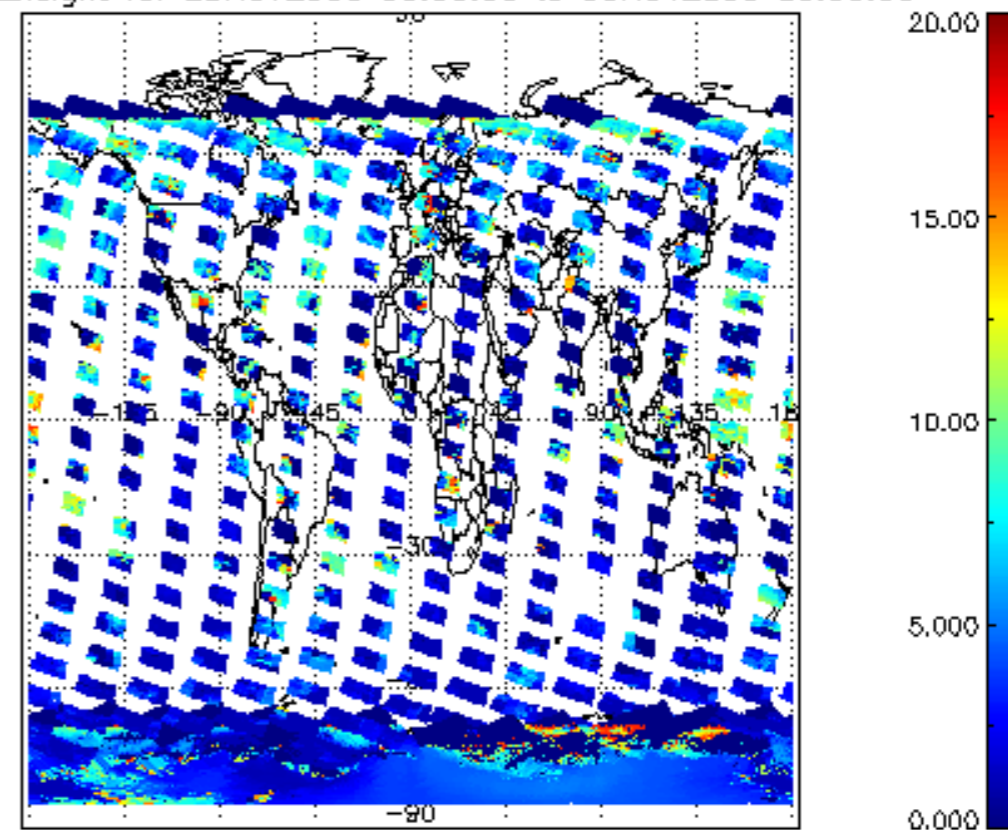
2.3 ADF monitoring

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

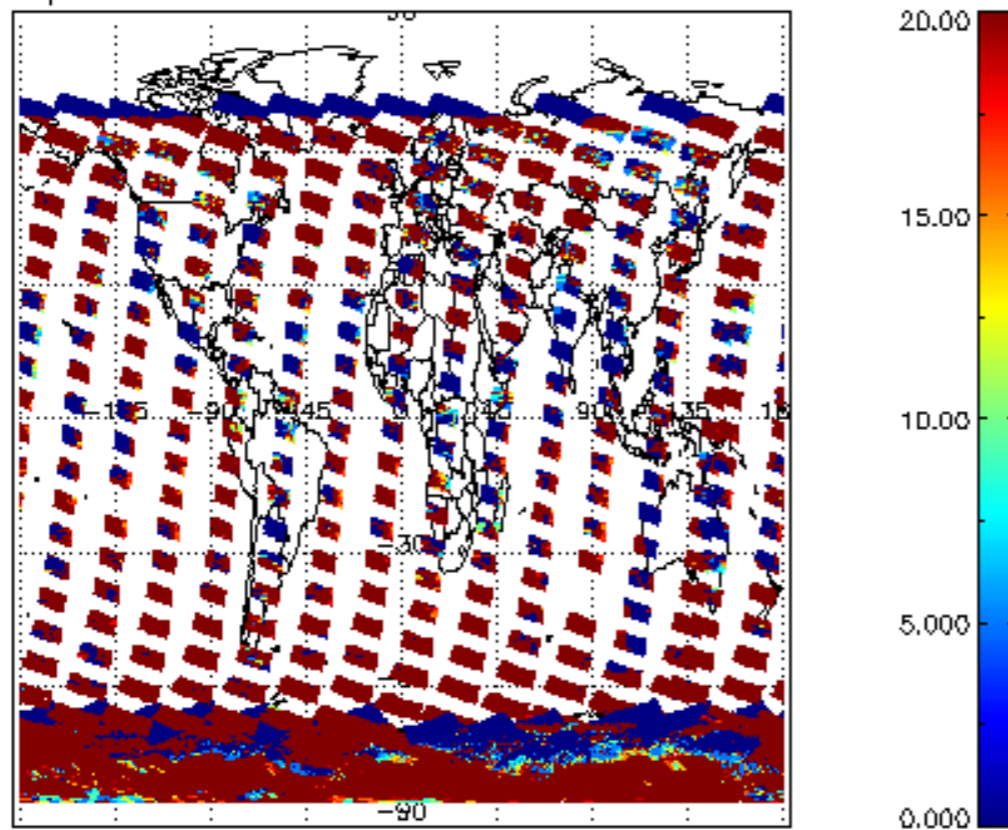
cLfrac for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



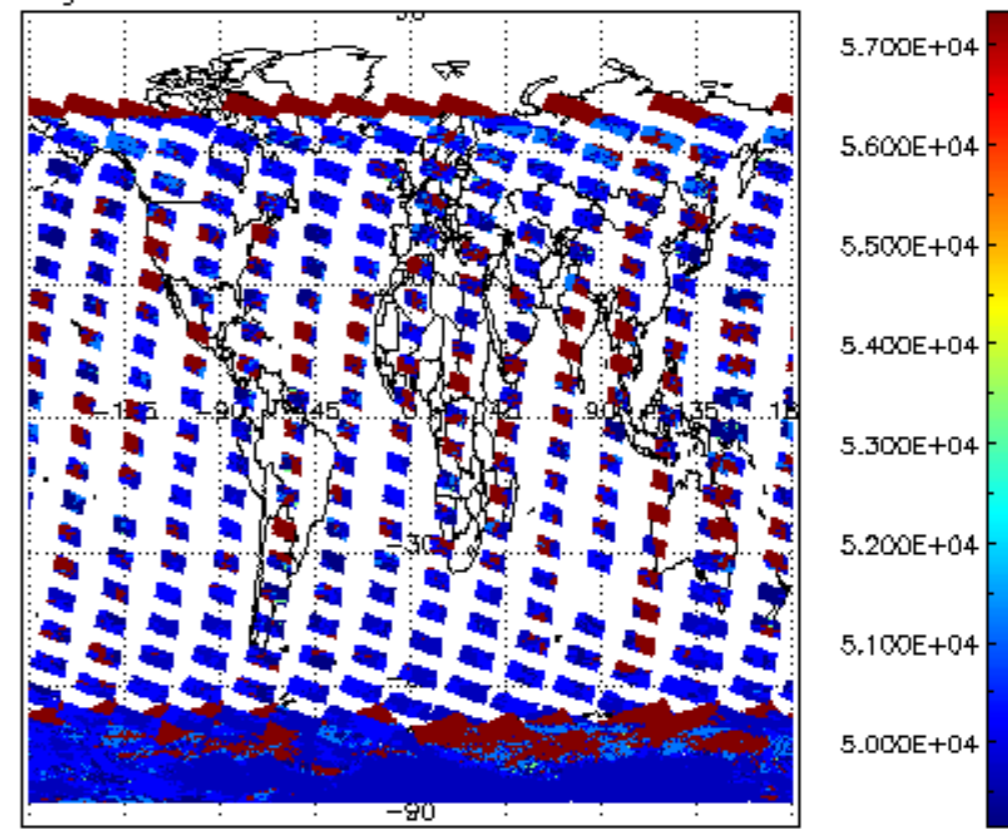
cL_top_height for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

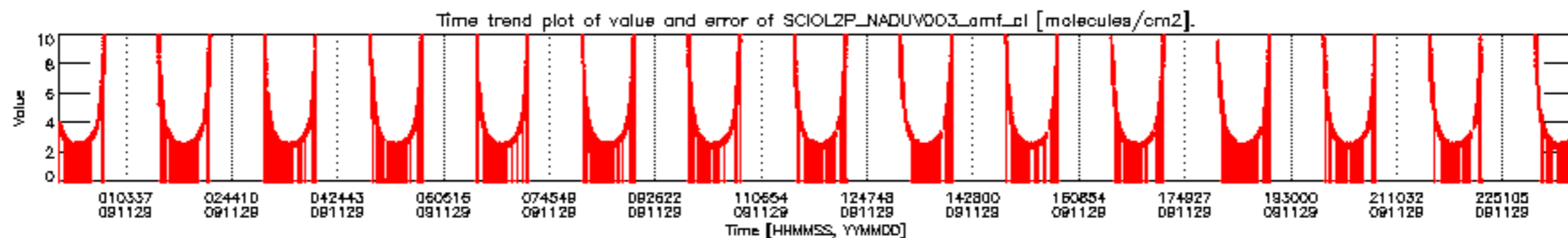
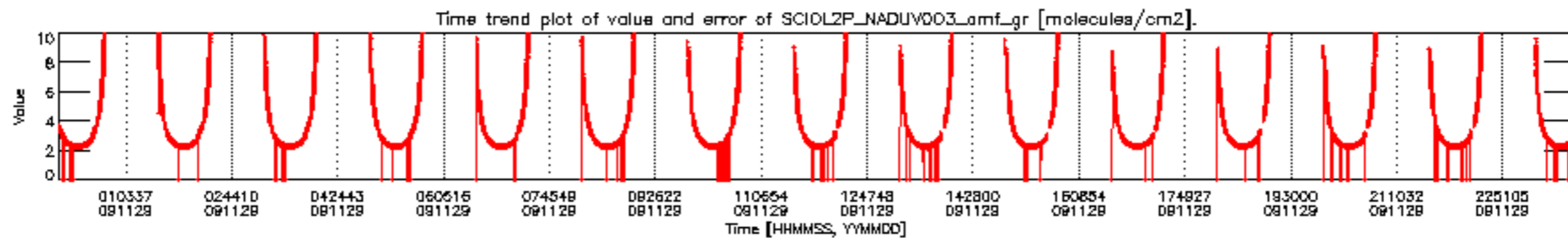
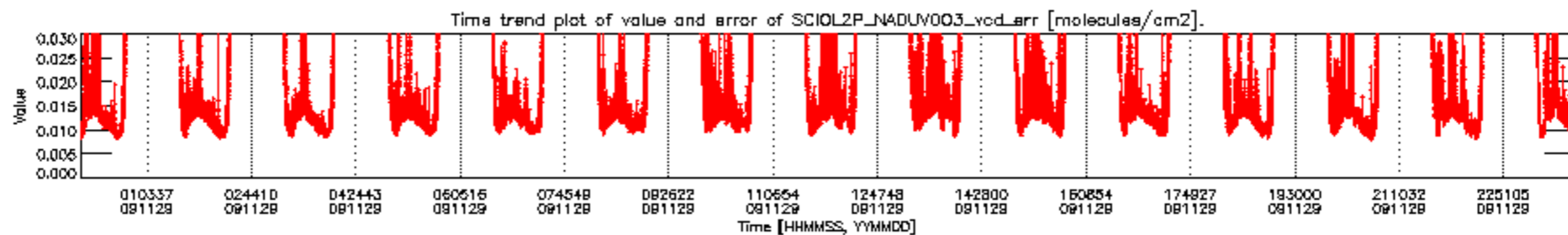
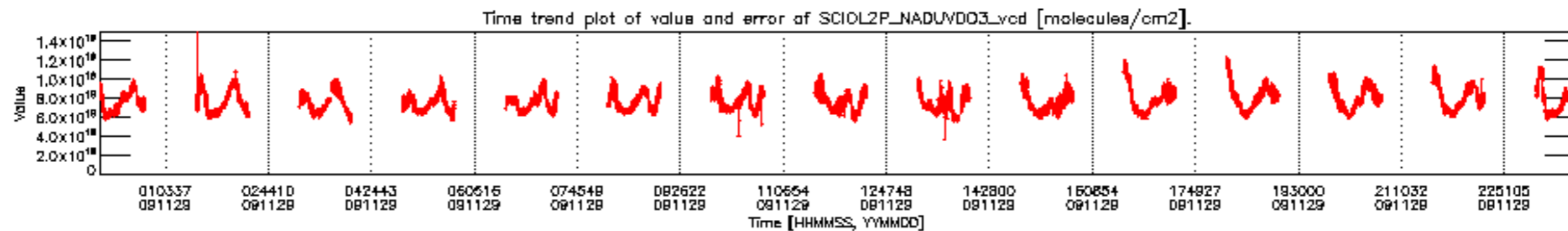


cL_opt_depth for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

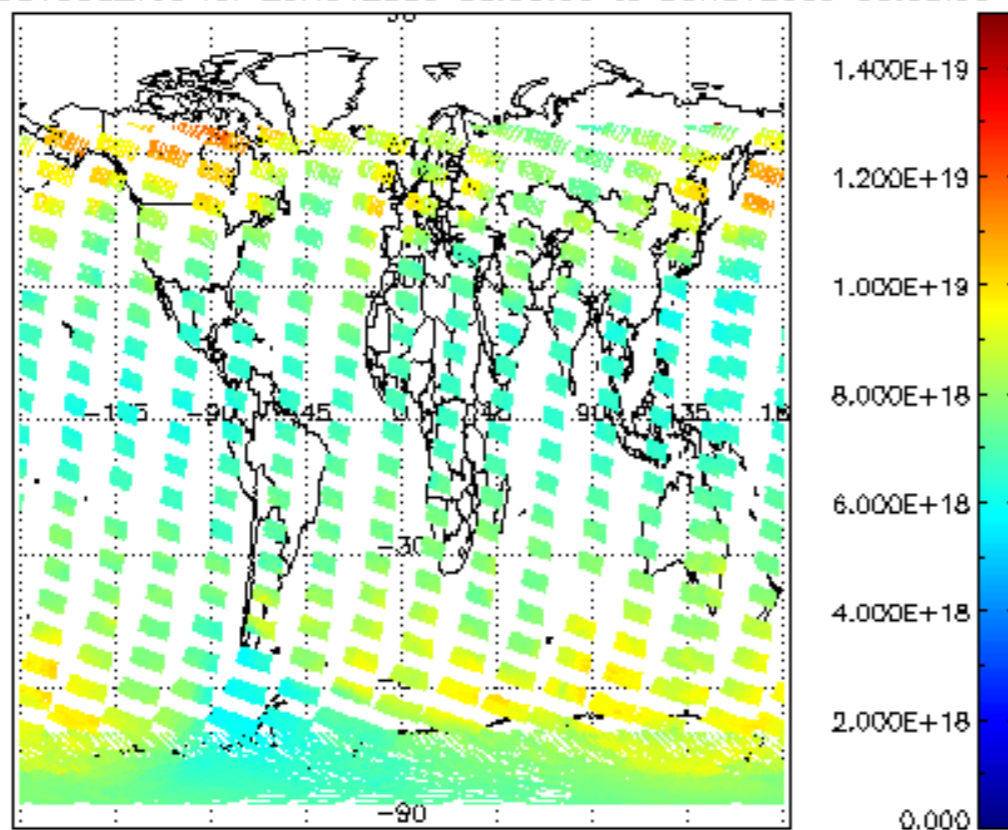


cloud_flags for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

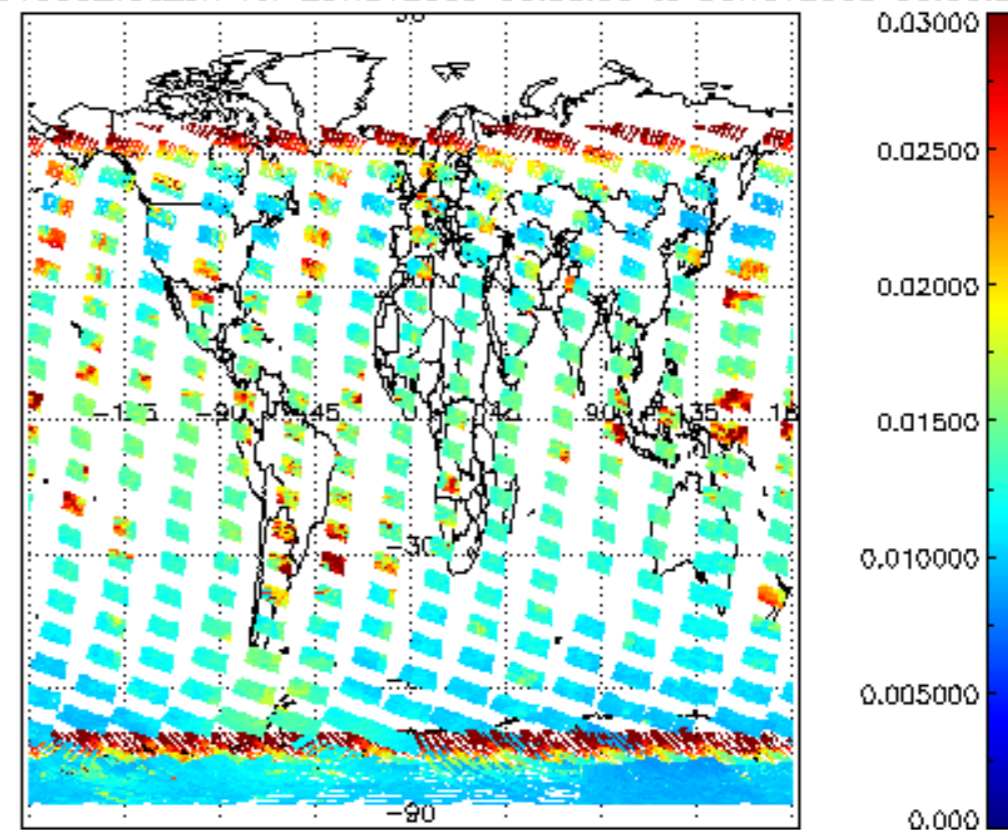




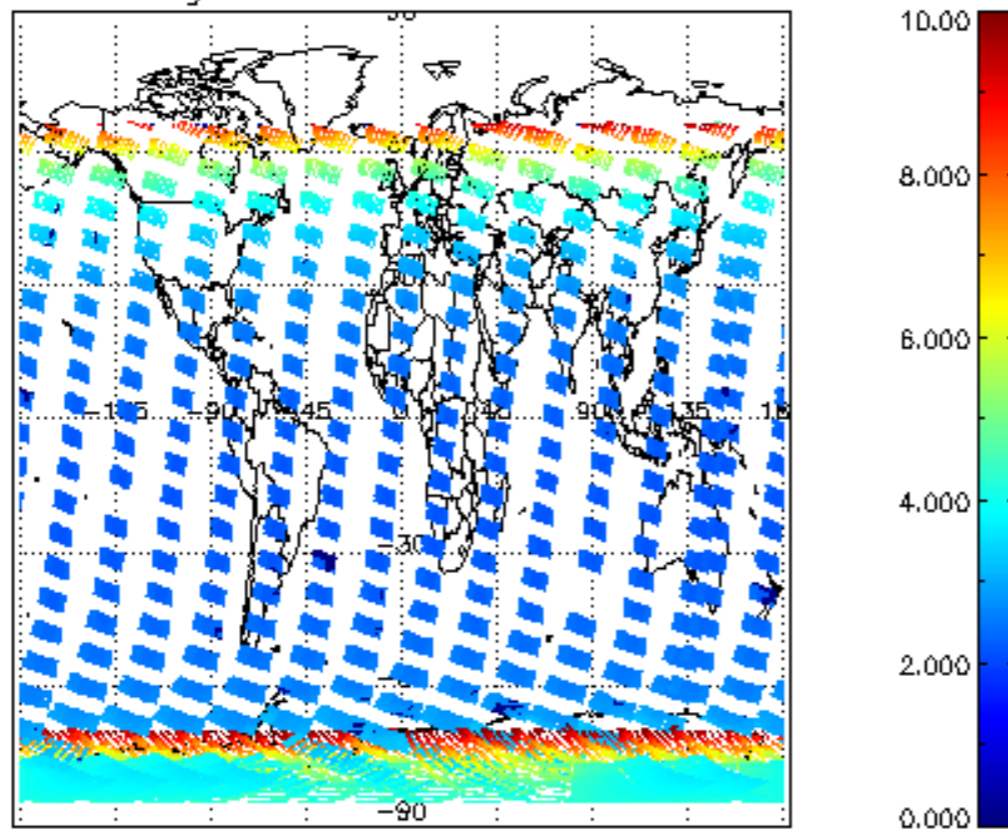
SCIOL2P_NADUV003_vcd for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



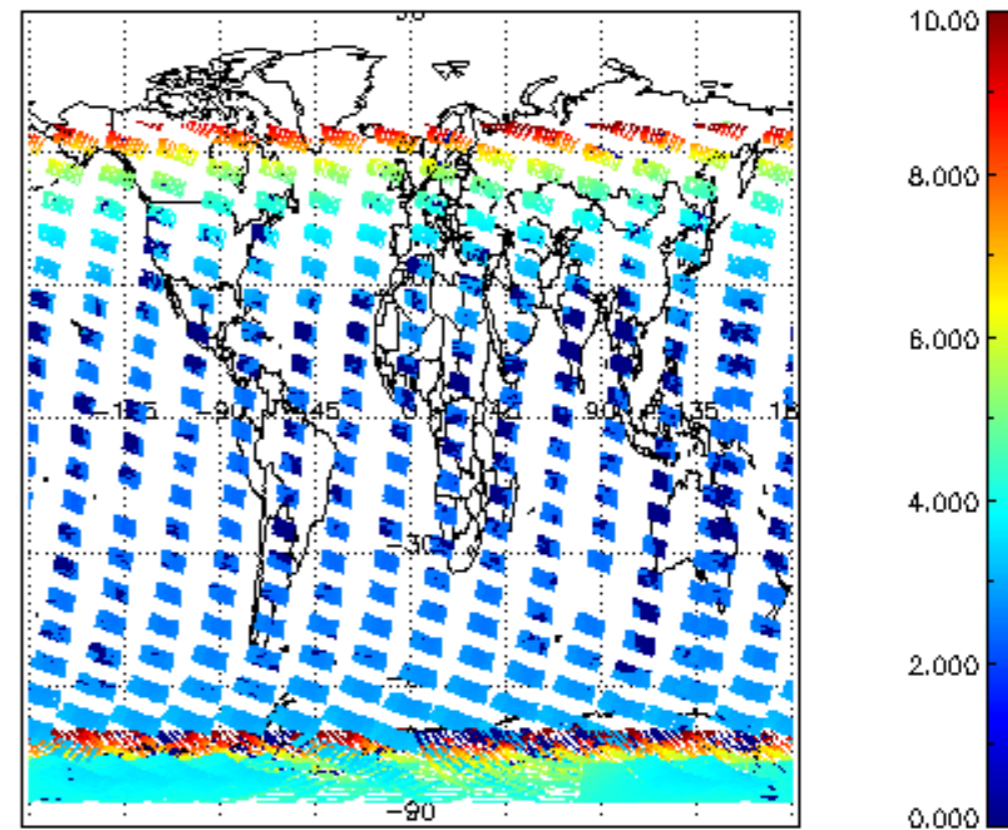
SCIOL2P_NADUV003_vcd_err for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

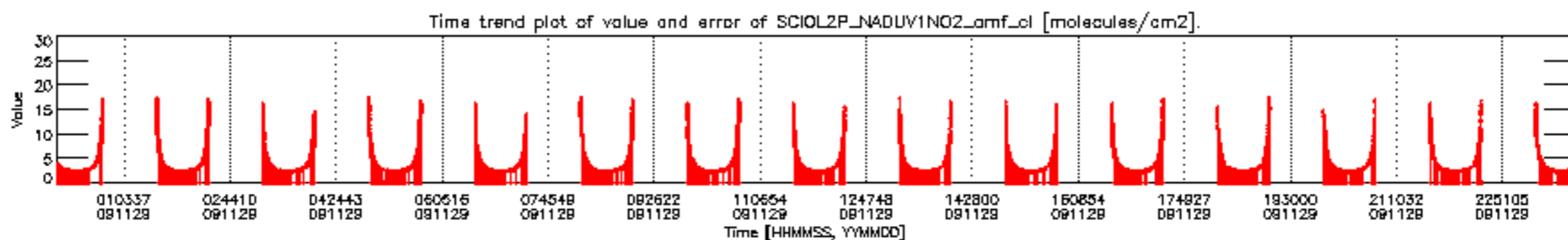
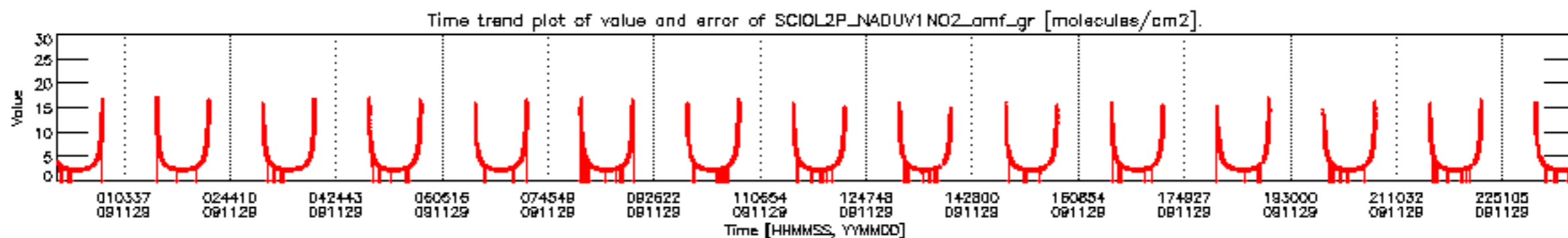
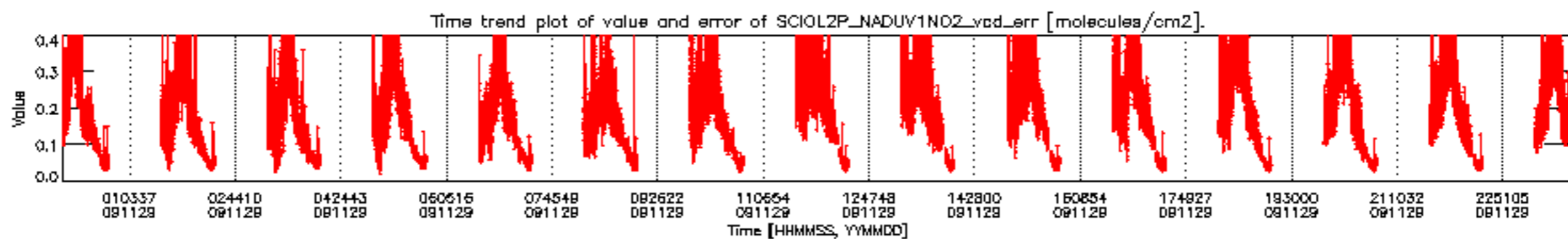
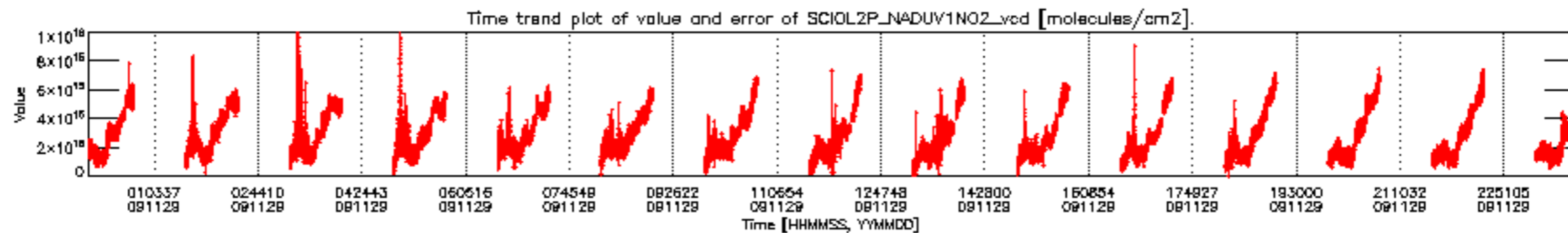


SCIOL2P_NADUV003_amf_gr for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

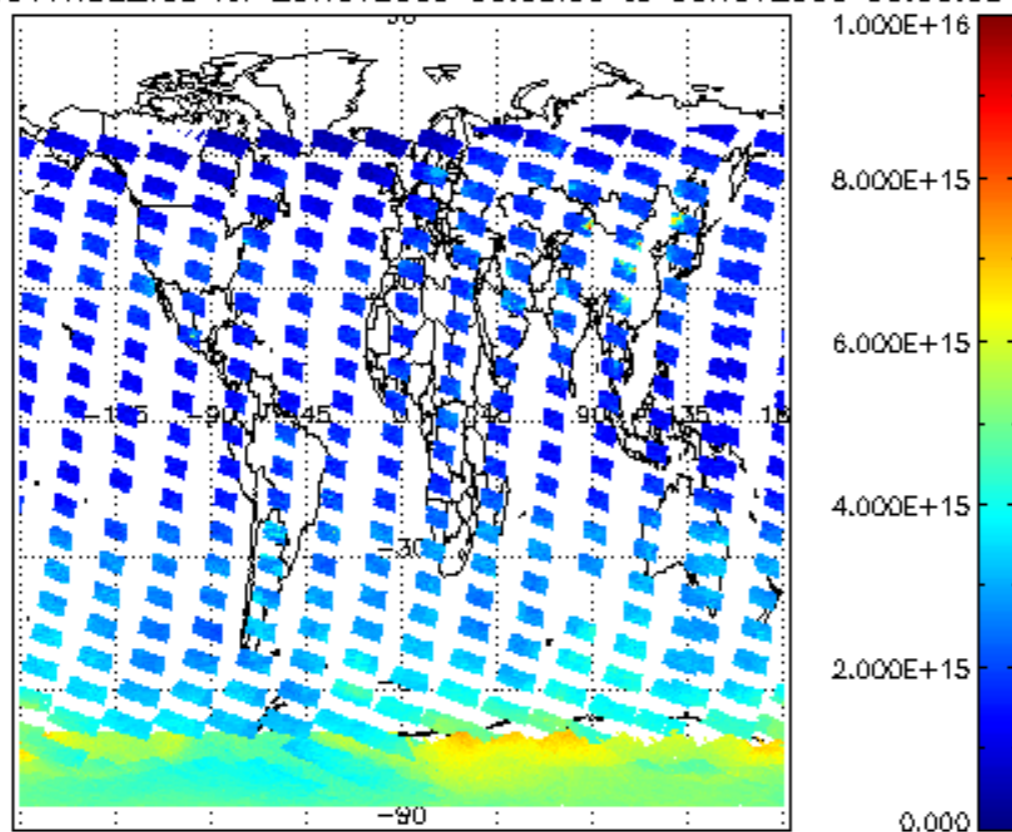


SCIOL2P_NADUV003_amf_cl for 29NOV2009 00:00:00 to 30NOV2009 00:00:00

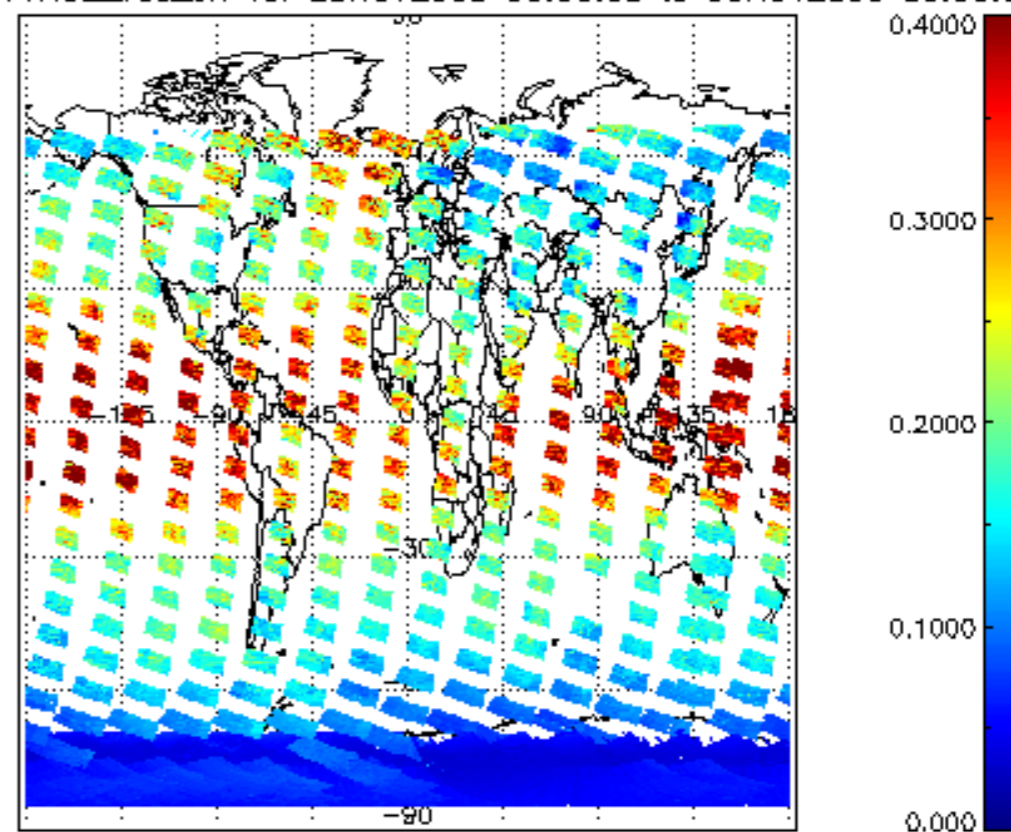




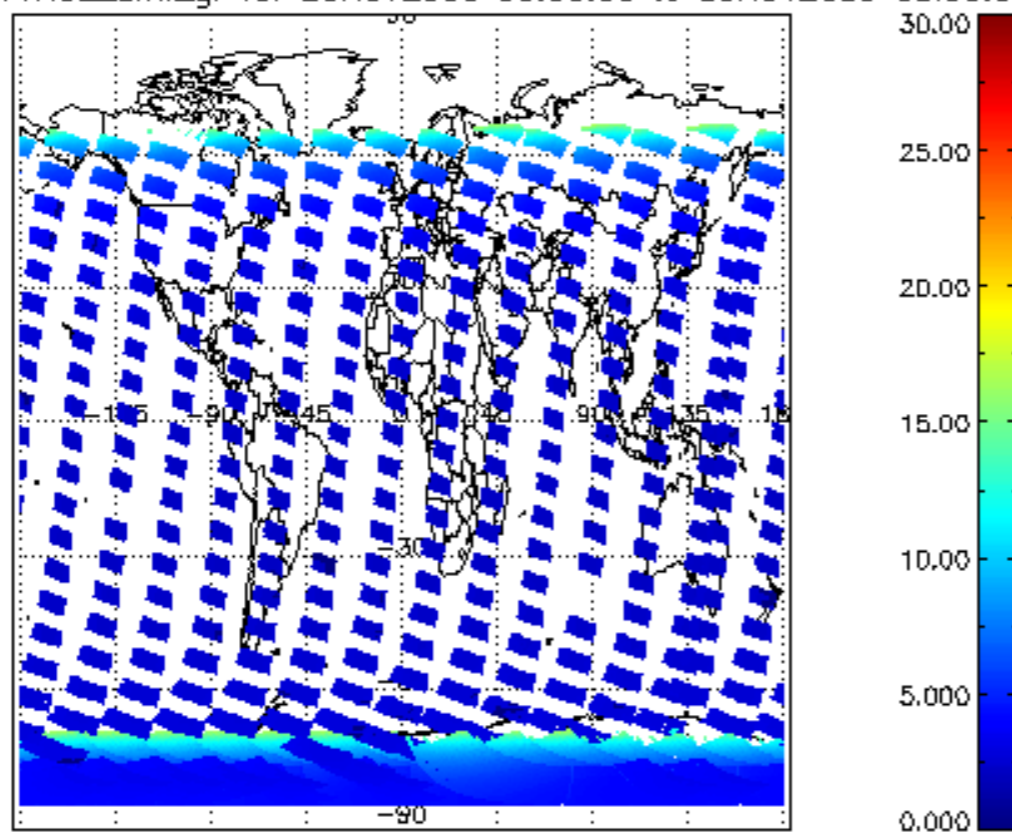
SCIOL2P_NADUV1NO2_vcd for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



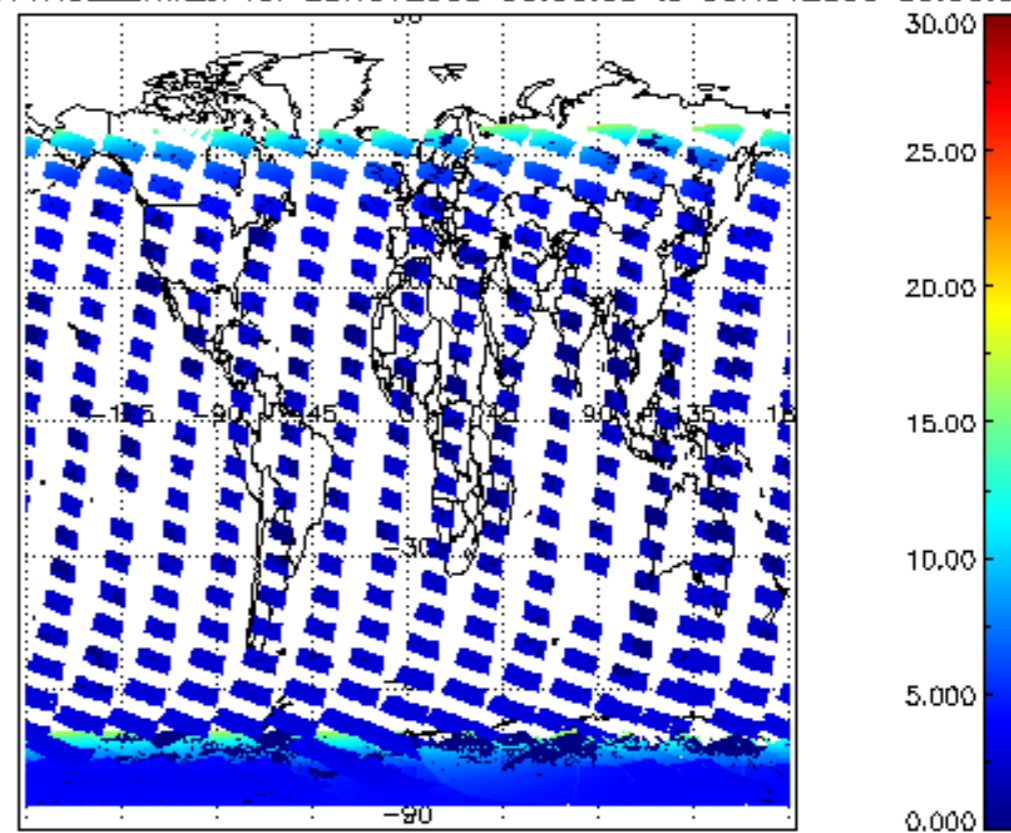
SCIOL2P_NADUV1NO2_vcd_err for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



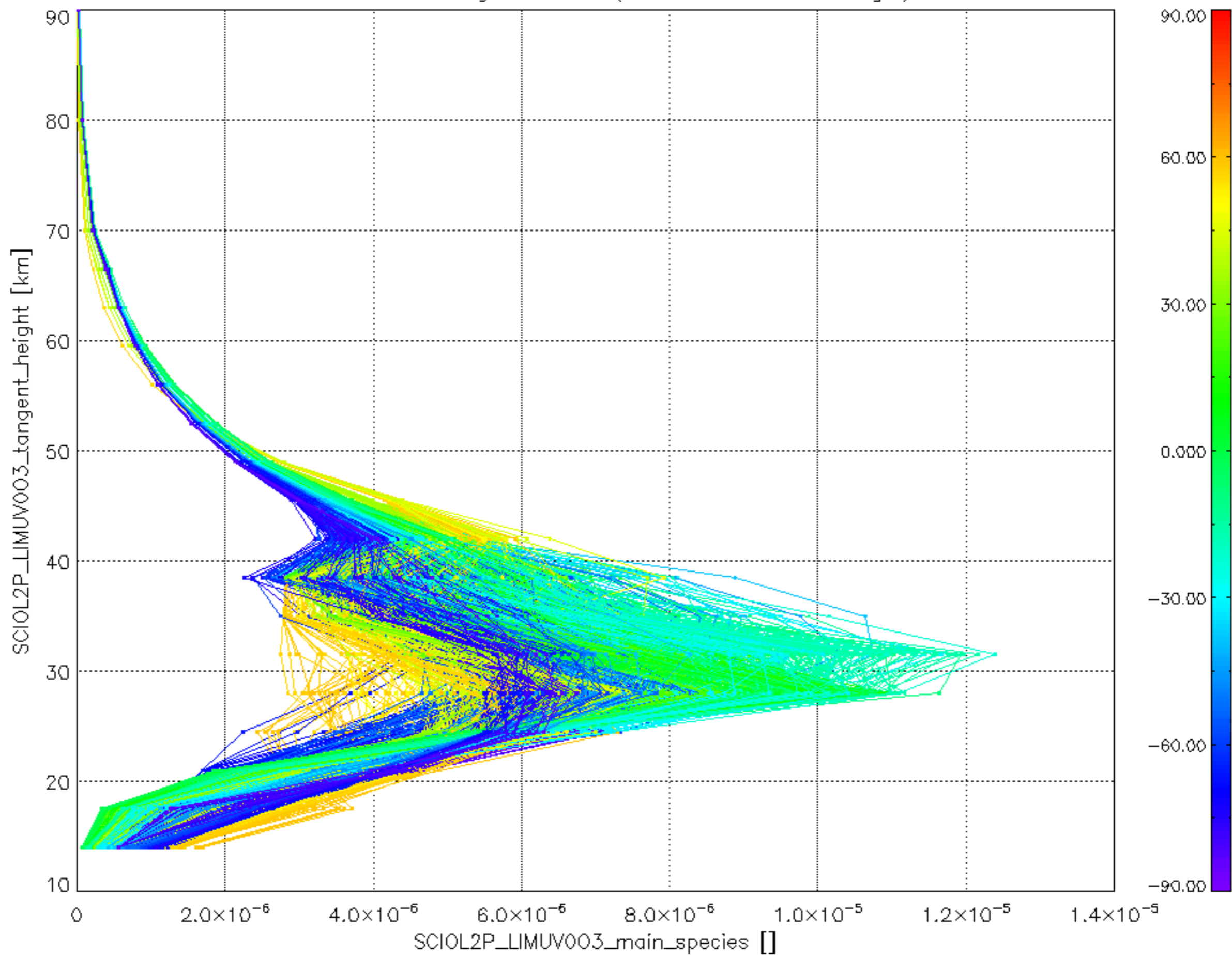
SCIOL2P_NADUV1NO2_amf_gr for 29NOV2009 00:00:00 to 30NOV2009 00:00:00



SCIOL2P_NADUV1NO2_amf_cl for 29NOV2009 00:00:00 to 30NOV2009 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).

