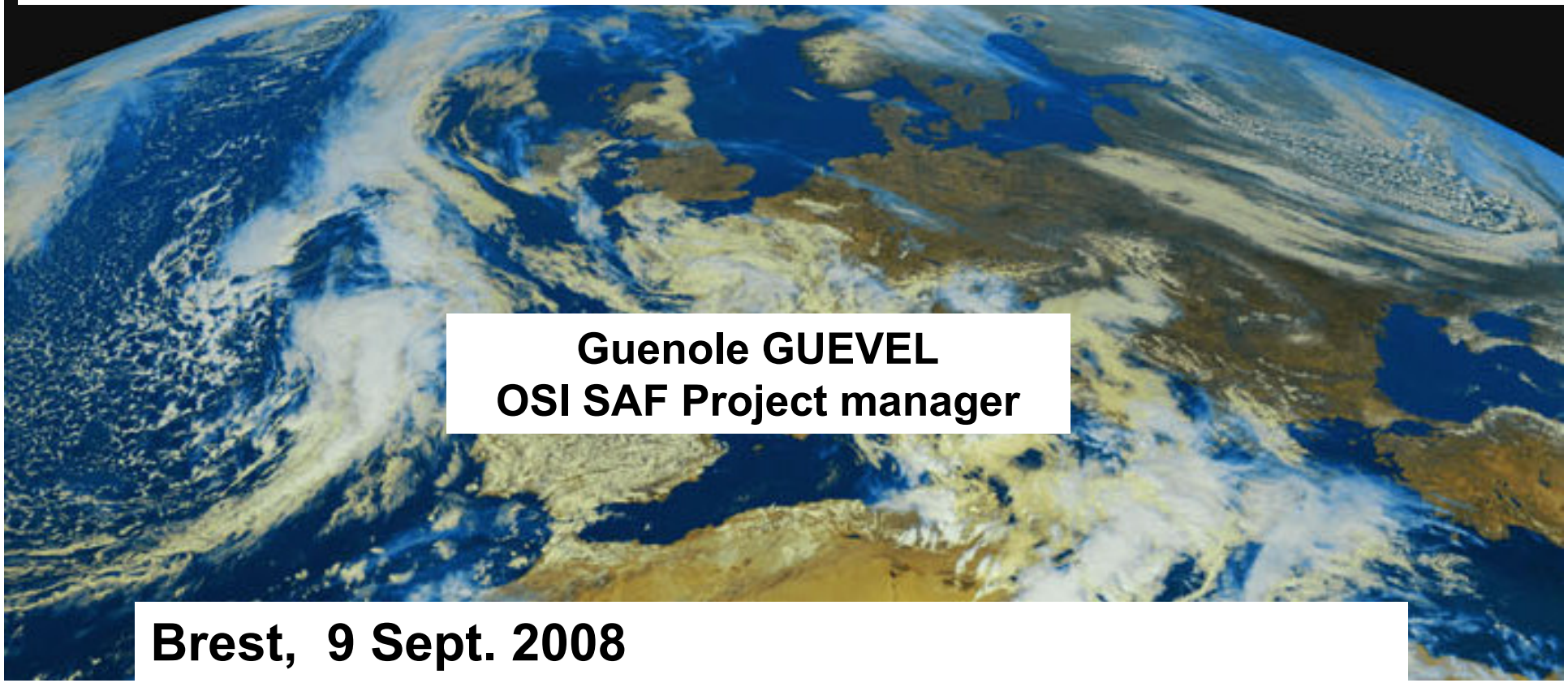
Status of the EUMETSAT OCEAN AND SEA ICE SAF



Guenole GUEVEL
OSI SAF Project manager

Brest, 9 Sept. 2008

OSI SAF OVERVIEW AND STATUS

1- Introduction and presentation

2- Current production
- Products characteristics :
  - Parameters, Satellites…
- Access to products

3- Products Quality and Availability statistics

4- New requirements for the current phase (CDOP)

5- in demonstration and soon operational (MetOp SST)

6-Target Production at the end of the CDOP (2012)

7- Product usage, User support and interactions with Users

1- Introduction, presentation

Brief history

- Development phase from 1997 to 2002
- Initial Operational Phase (IOP) from July 2002 to March 2007
-CDOP (Continuous Development and Operations Phase) from March2007 to February 2012

Host Institute

METEO FRANCE

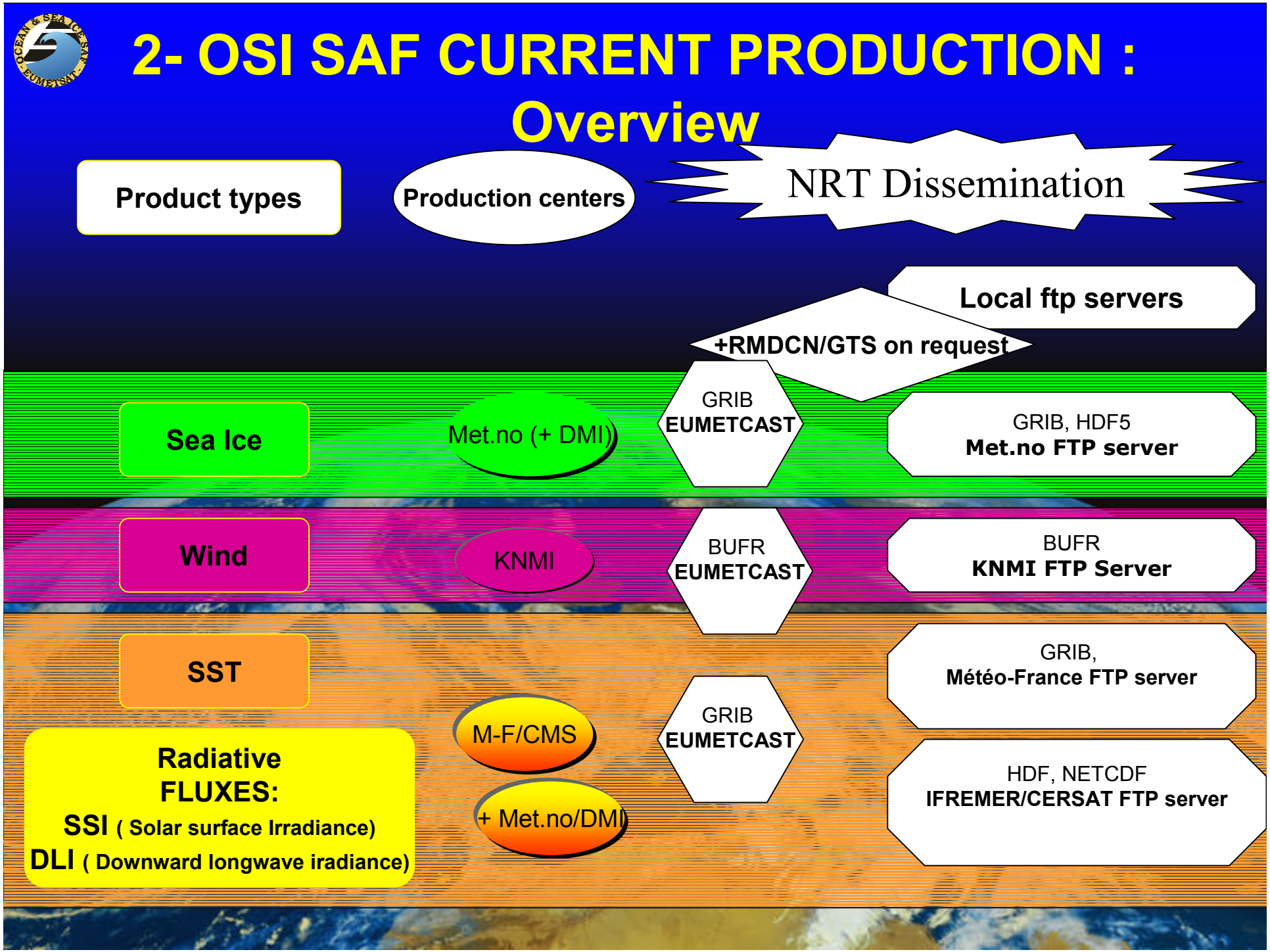
Co-operating institutes

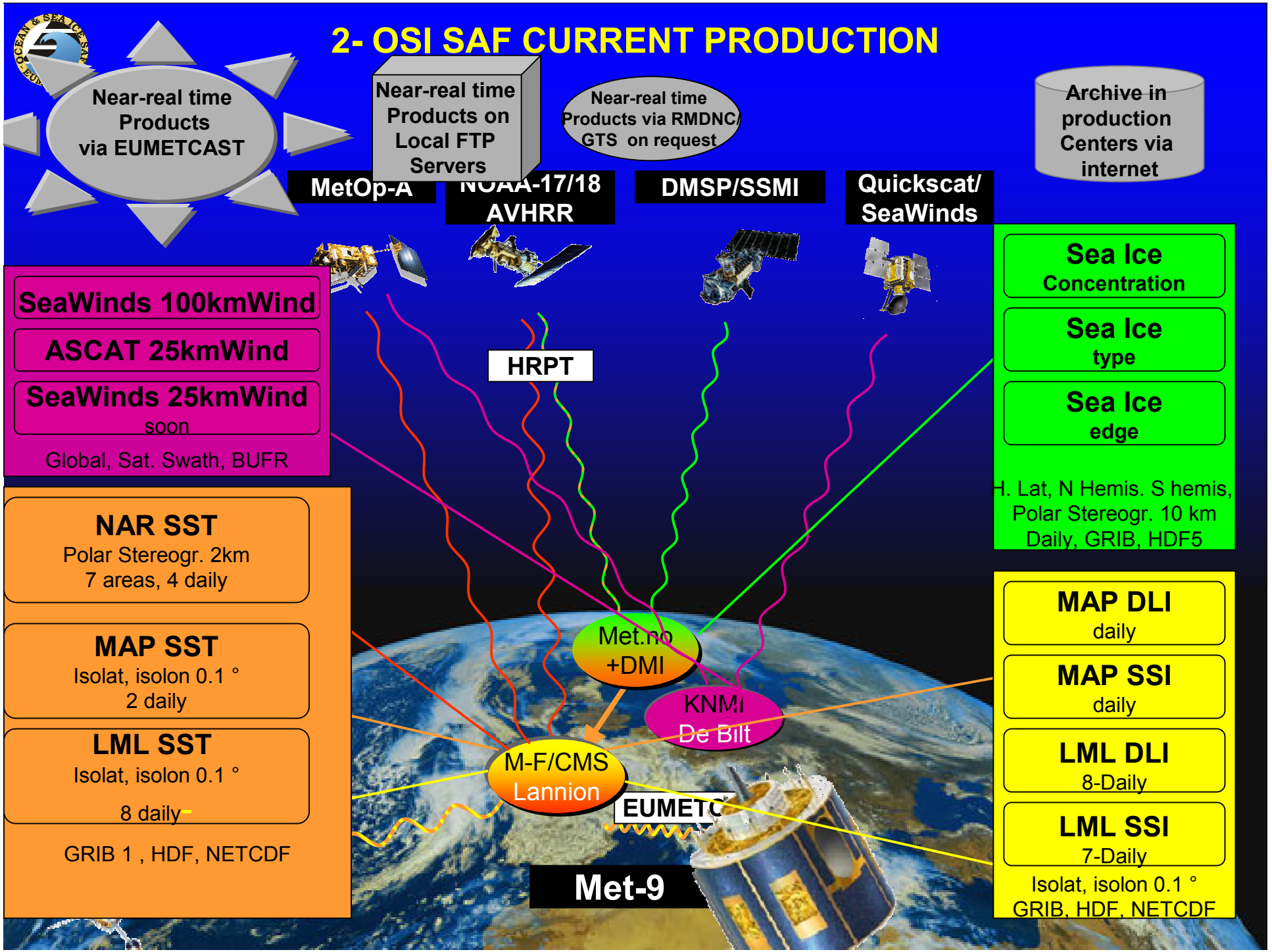
DMI, IFREMER, KNMI, Met.no,
M-F/CMS : R&D and Production
SMHI : R&D

Scope of the current phase (CDOP)

- complete all necessary Verification and Validation activities concerning MetOp-A related products,
- produce, control and distribute operationally in near real-time Quality controled O&SI SAF products using available satellite data, with the necessary Users Support activities,
- consolidate validation activities of operational products,
- conduct necessary R&D activities for the enhancement of current OSI SAF products and for new products, taking into account some new user requirements, including ones from the European operational oceanography centres and GMES initiative,
- prepare for the next generation of meteorological satellites (NPP/NPOESS, GOES-R and MTG).

2- OSI SAF CURRENT PRODUCTION : Overview




2- OSI SAF CURRENT PRODUCTION
Near-real time Products via EUMETCAST
Near-real time Products on Local FTP Servers
Near-real time Products via RMDNC/ GTS on request
Archive in production Centers via internet
MetOp-A
NOAA-17/18 AVHRR
DMSP/SSMI
Quickscat/ SeaWinds
HRPT
SeaWinds 100kmWind
ASCAT 25kmWind
SeaWinds 25kmWind
soon
Global, Sat. Swath, BUFR
Sea Ice Concentration
Sea Ice type
Sea Ice edge
H. Lat, N Hemis. S hemis, Polar Stereogr. 10 km
Daily, GRIB, HDF5
NAR SST
Polar Stereogr. 2km
7 areas, 4 daily
MAP SST
Isolat, isolon 0.1 °
2 daily
LML SST
Isolat, isolon 0.1 °
8 daily
GRIB 1 , HDF, NETCDF
Met.no +DMI
KNMI De Bilt
M-F/CMS Lannion
EUMETC
Met-9
MAP DLI
daily
MAP SSI
daily
LML DLI
8-Daily
LML SSI
7-Daily
Isolat, isolon 0.1 °
GRIB, HDF, NETCDF

2- OSI SAF CURRENT PRODUCTION

EUMETCAST in GRIB

M-F FTP server in GRIB, IFREMER FTP Server in HDF and NETCDF

Archive at M-F in GRIB, at IFREMER in HDF and NETCDF

NAR SST
Polar Stereogr. 2km
7 areas, 4 daily

MAP SST
Isolat, isolon 0.1 °
2 daily

LML SST
Isolat, isolon 0.1 °
8 daily

GRIB 1 , HDF, NETCDF

Sea surface Temperature (SST)

Sub-skin temperature,
Inputs :

- Brightness temperatures
- Cloud mask (NWC SAF)
- SDI (Saharian Dust index)

« Split window » algorithm using the following channels :
GOES- 12 : (3.7-3.9 µm) and (10.2-11.2 µm)
(13.3 µm not strict window => not used, and GOES-E SST not calculated by day)
Met-9 : (9.80-11.80 µm), (11.00-13.00 µm)
NOAA-17&18 : (10.2-11.2 µm) and (11.5-12.5 µm)

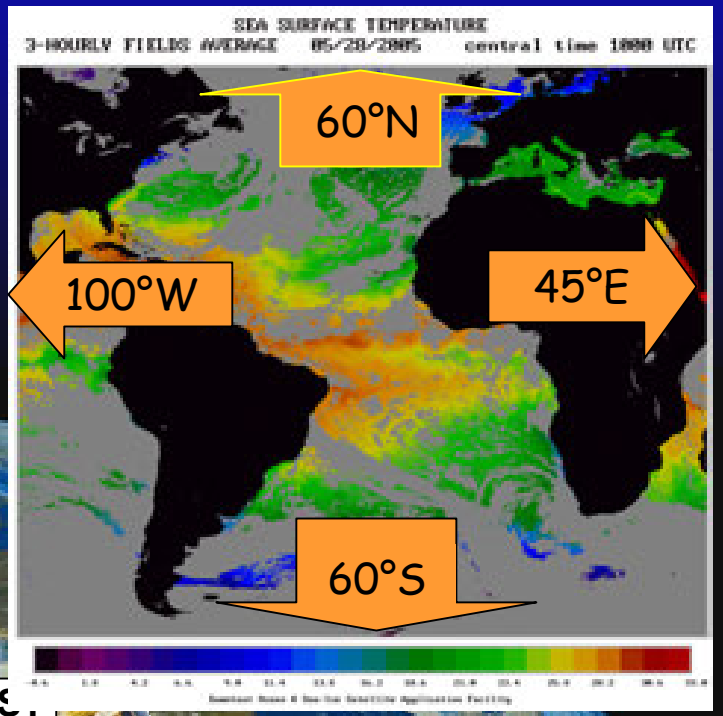
Each product contains a SST field, a time field and a quality index field.

2- OSI SAF CURRENT PRODUCTION

EUMETCAST
in GRIB

M-F FTP server in GRIB,
IFREMER FTP Server
in HDF and NETCDF

Archive at M-F in GRIB,
at IFREMER
in HDF and NETCDF



LML SST
Isolat, isolon 0.1 °
8 daily

GRIB 1 , HDF, NETCDF

M-F/CMS
Lannion

EUMETCAST

GOES-E

Met-9

2- OSI SAF CURRENT PRODUCTION

EUMETCAST
in GRIB

M-F FTP server in GRIB,
IFREMER FTP Server
in HDF and NETCDF

Archive at M-F in GRIB,
at IFREMER
in HDF and NETCDF

NOAA-17/18
AVHRR

HRPT

MAP SST
Isolat, isolon 0.1 °
2 daily

GRIB 1 , HDF, NETCDF

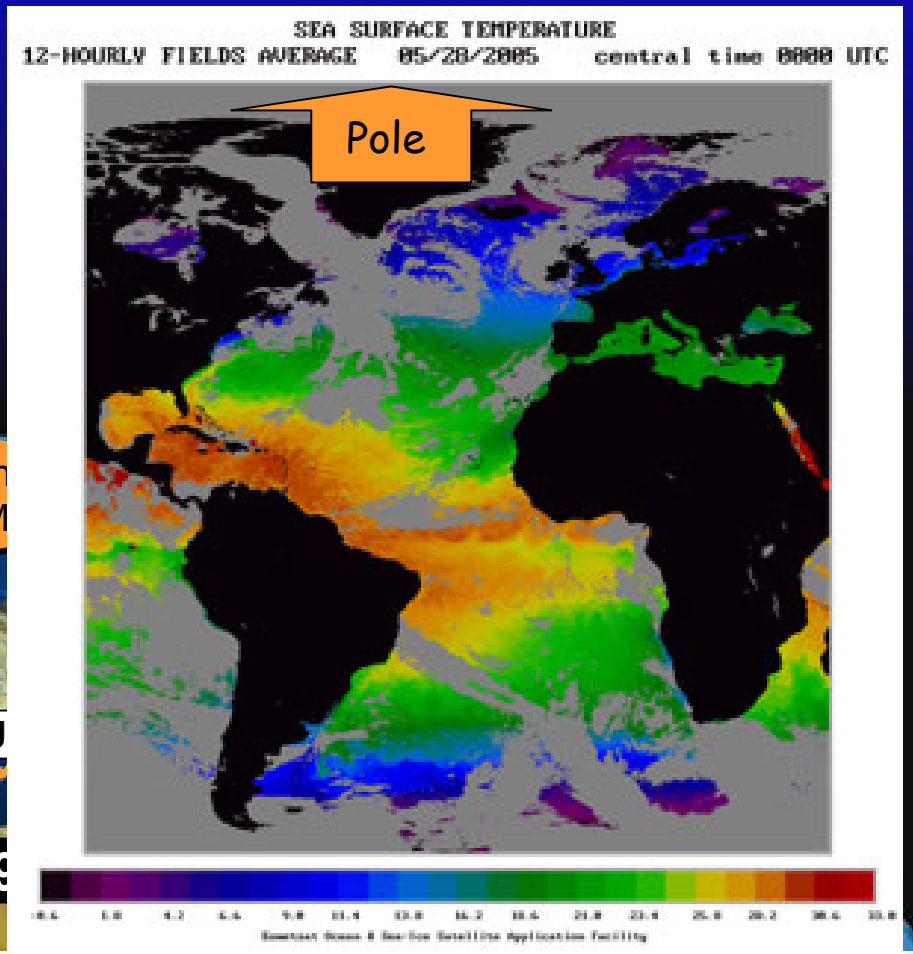
Met.n
+DM

M-F/CMS
Lannion

EU

GOES-E

Met-9



2- OSI SAF CURRENT PRODUCTION

EUMETCAST
in GRIB

M-F FTP server in GRIB,
IFREMER FTP Server
in HDF and NETCDF

Archive at M-F in GRIB,
at IFREMER
in HDF and NETCDF

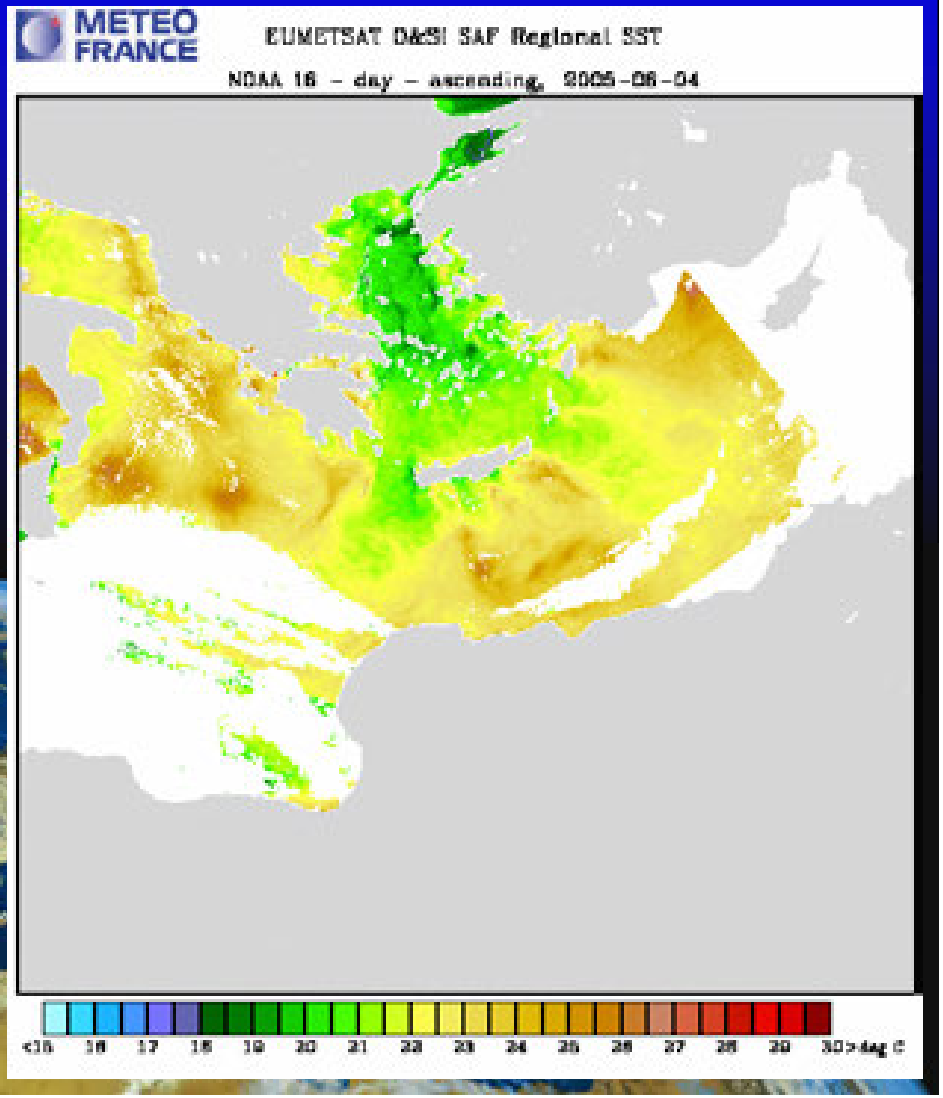
NOAA-17/18
AVHRR

HRPT

NAR SST
Polar Stereogr. 2km
7 areas, 4 daily

GRIB 1 , HDF, NETCDF

M-F/CMS
Lannion



2- OSI SAF CURRENT PRODUCTION

EUMETCAST
in GRIB

M-F FTP server in GRIB,
IFREMER FTP Server
in HDF and NETCDF

Archive at M-F in GRIB,
at IFREMER
in HDF and NETCDF

Solar Surface Irradiance**SSI**

Solar irradiance reaching the earth surface
in the 0.3-4 µm band.

Physical method
INPUTS:

- Visible data (0.6 µm)
- Cloud types (NWC SAF)
- Model output (h2o:Arpege)

LML SSI:7-daily product
MAP SSI: daily product

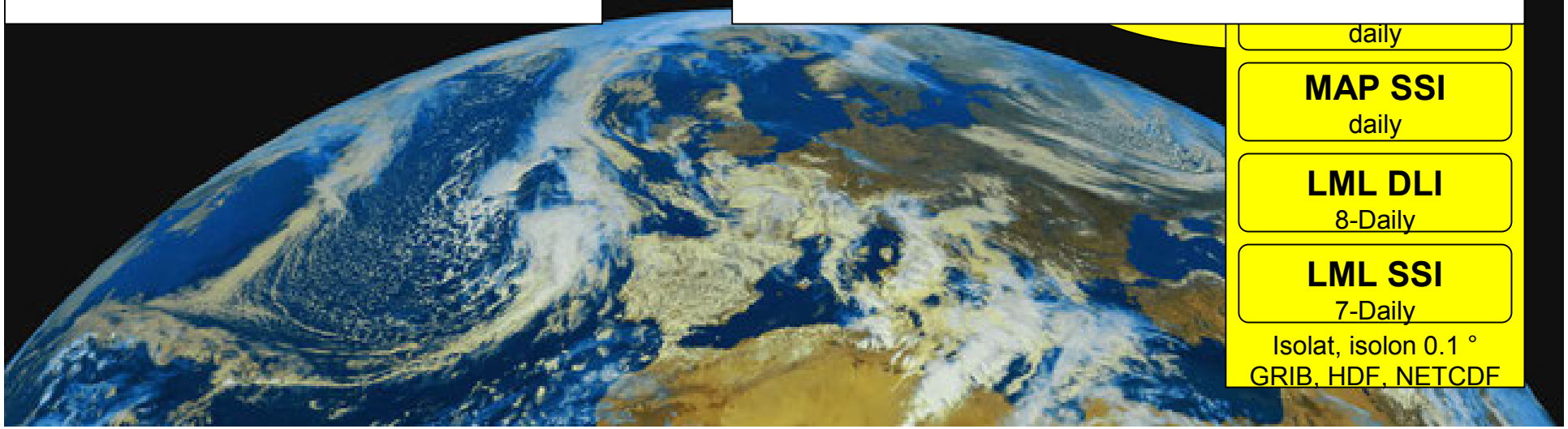
Downward Longwave Irradiance DLI

Longwave irradiance reaching the earth surface
in the 4-100µm band.

bulk parameterization
INPUTS:

- Cloud types (NWC SAF)
- Model outputs (Ta, hu)
- SSI

LML DLI : 8-daily product
MAP DLI : daily product



daily

MAP SSI
daily

LML DLI
8-Daily

LML SSI
7-Daily

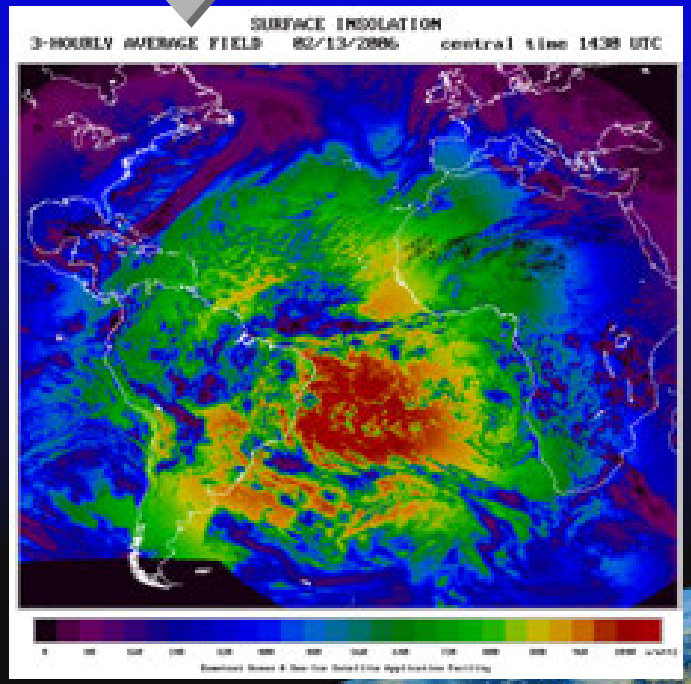
Isolat, isolon 0.1 °
GRIB, HDF, NETCDF

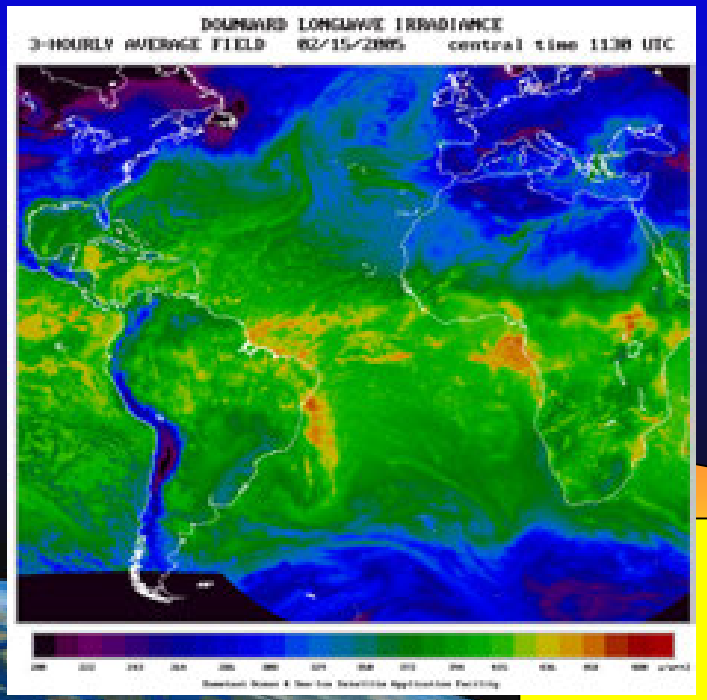
2- OSI SAF CURRENT PRODUCTION

EUMETCAST in GRIB

M-F and IFREMER FTP Servers

Archive at M-F in GRIB, at IFREMER in HDF and NETCDF





M-F/CMS Lannion

EUMETCAST

GOES-E

Met-9

LML DLI
8-Daily

LML SSI
7-Daily

Isolat, isolon 0.1 °
GRIB, HDF, NETCDF

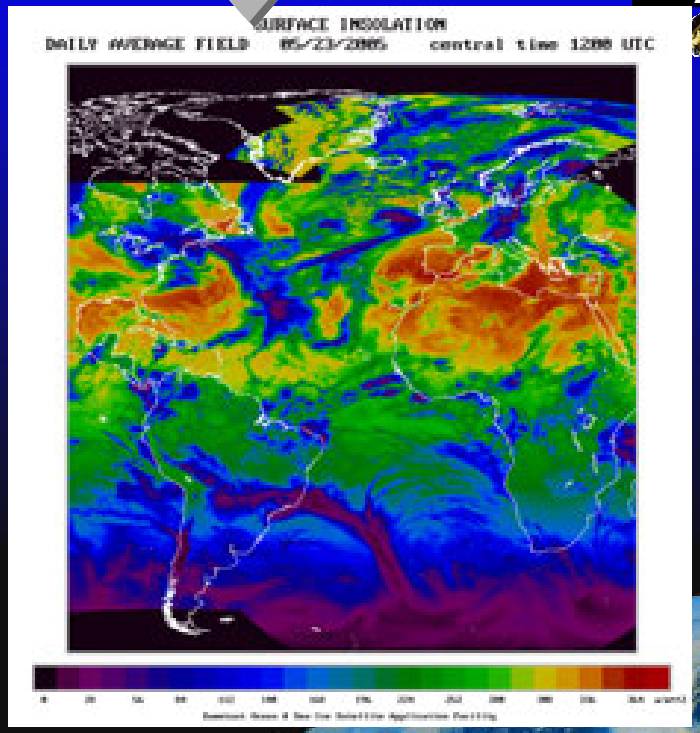
2- OSI SAF CURRENT PRODUCTION

EUMETCAST in GRIB

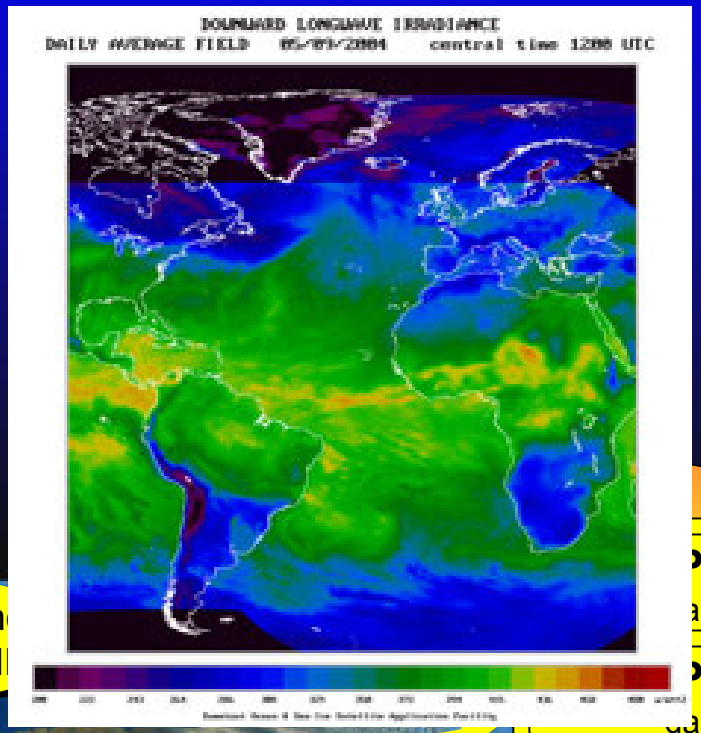
M-F and IFREMER FTP Servers

Archive at M-F in GRIB, at IFREMER in HDF and NETCDF

NOAA-17/18 AVHRR



HRPT



Met.n
+DM

M-F/CMS Lannion

EUMETCAST

GOES-E

Met-9

P DLI
aily

P SSI
daily

Isolat, isolon 0.1 °
GRIB, HDF, NETCDF

2- OSI SAF CURRENT PRODUCTION

EUMETCAST in GRIB

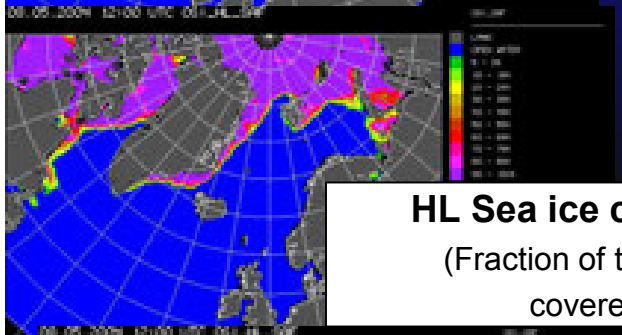
Met.no FTP Server

Sea Ice is being reprocessed back to 1978

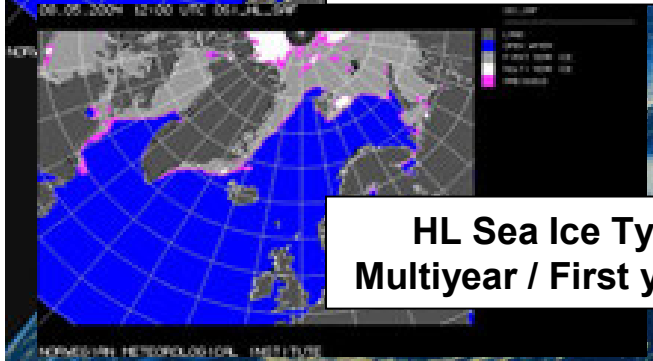
Archive at met.no

DMSP/SSMI

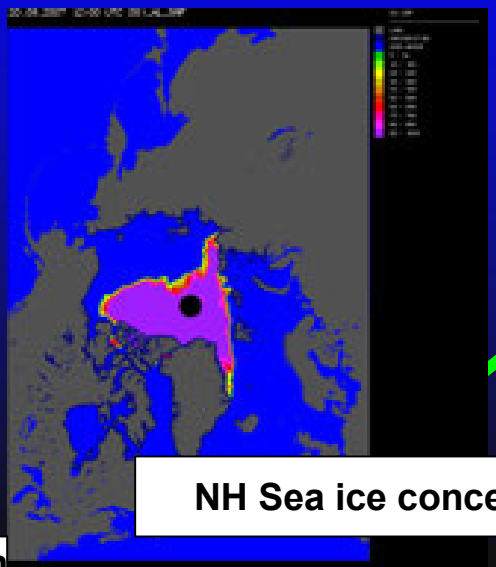
HL Sea ice edge



HL Sea ice concentration
(Fraction of the sea surface covered by ice)



HL Sea Ice Type :
Multiyear / First year ice



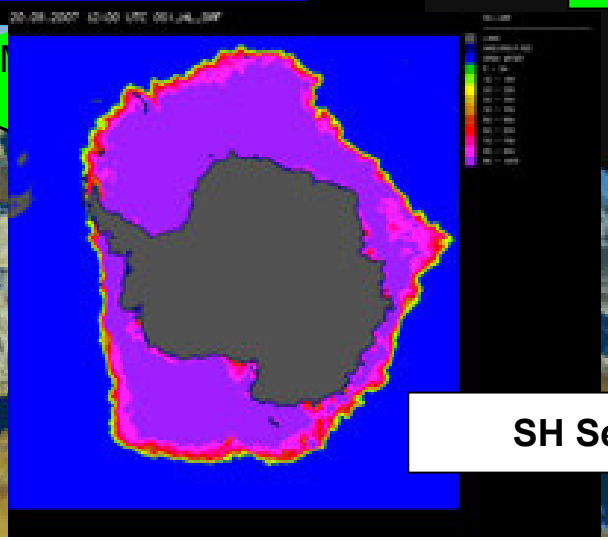
NH Sea ice concentration

Sea Ice
Concentration

Sea Ice
type

Sea Ice
edge

multisensor products
Bayesian approach
Polar Stereogr. 10 km
Daily
GRIB, HDF5



SH Sea ice concentration

2- OSI SAF CURRENT PRODUCTION

EUMETCAST

KNMI FTP Server

Archive at KNMI

MetOp-A/ ASCAT

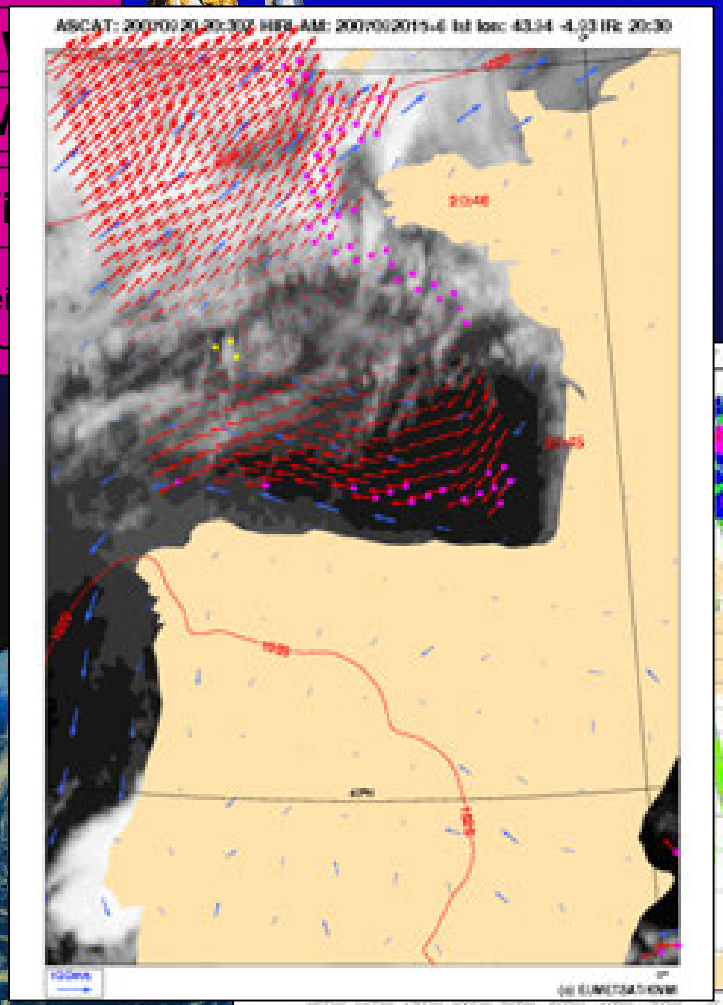
Quickscat/ SeaWinds

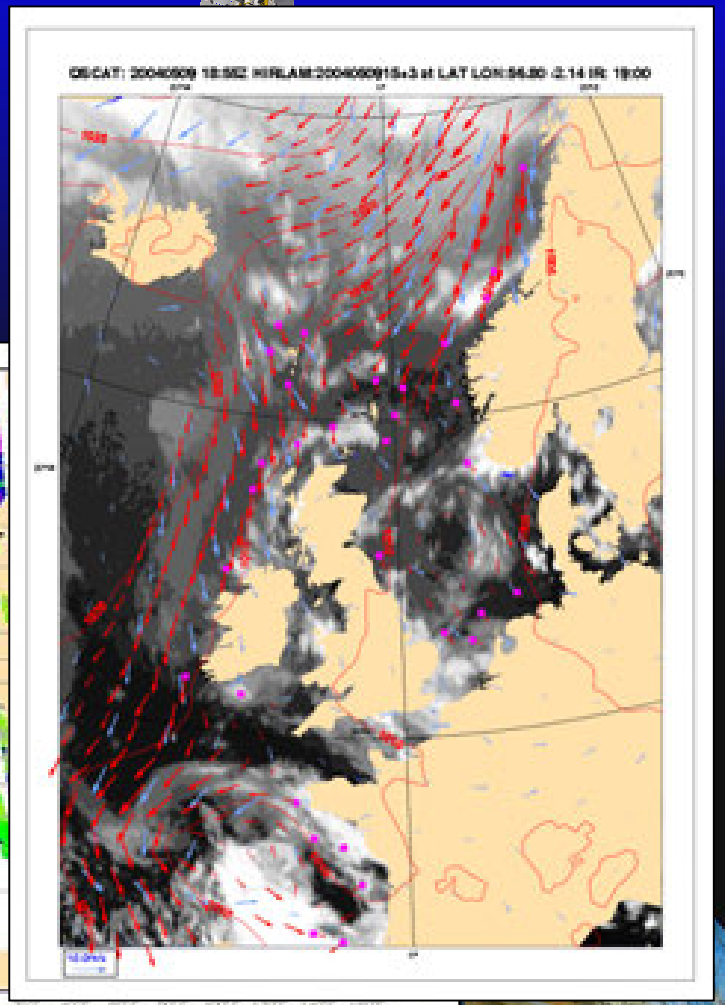
SeaWinds 100km V

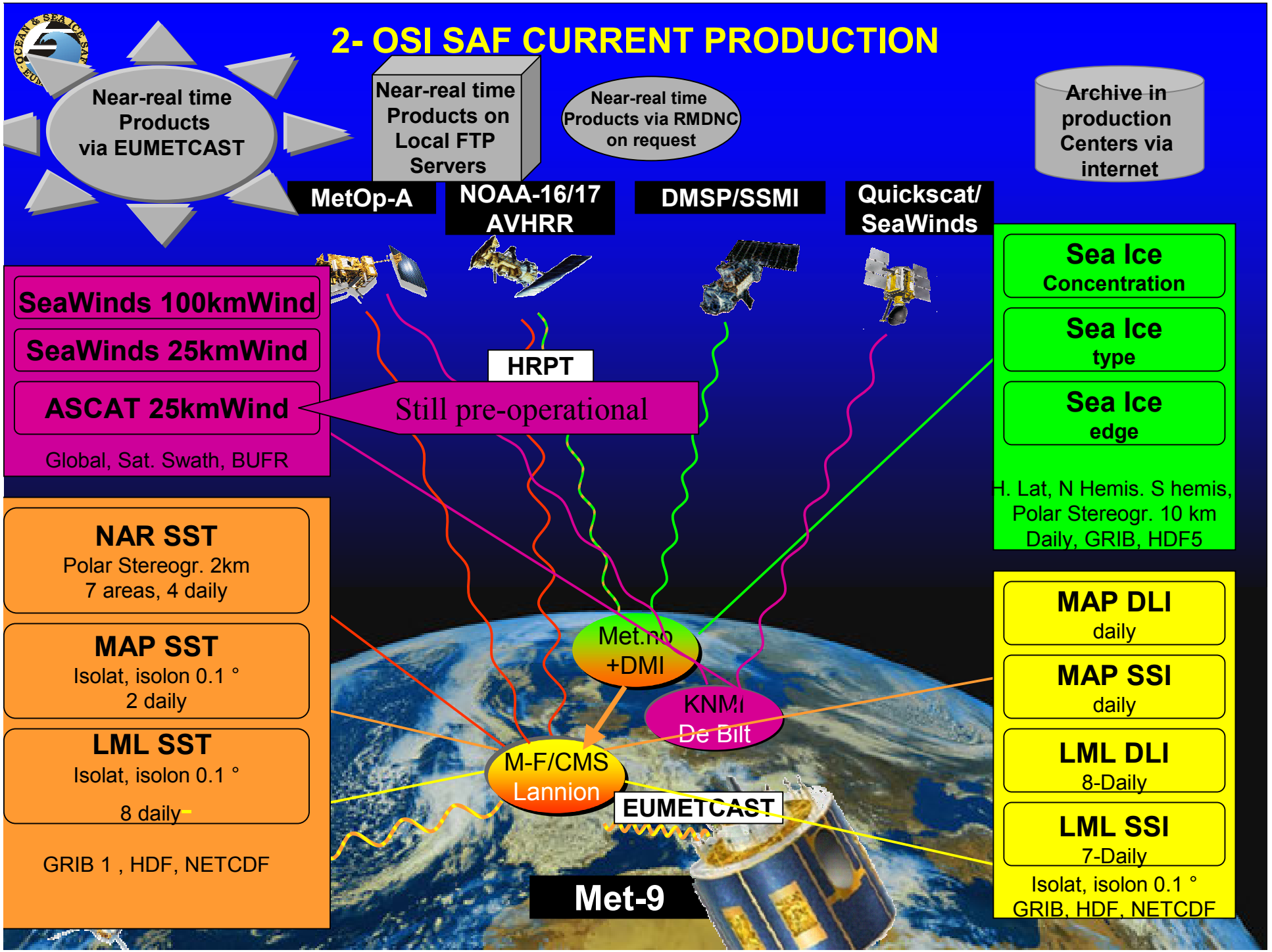
SeaWinds 25km V

ASCAT 25km Wi

Wind vector at 10m hei
Global, Sat. Swath, BU



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Near-real time Products via RMDNC on request
Archive in production Centers via internet
MetOp-A
NOAA-16/17 AVHRR
DMSP/SSMI
Quickscat/ SeaWinds
SeaWinds 100kmWind
SeaWinds 25kmWind
ASCAT 25kmWind
Global, Sat. Swath, BUFR
HRPT
Still pre-operational
Sea Ice Concentration
Sea Ice type
Sea Ice edge
H. Lat, N Hemis. S hemis, Polar Stereogr. 10 km Daily, GRIB, HDF5
NAR SST
Polar Stereogr. 2km
7 areas, 4 daily
MAP SST
Isolat, isolon 0.1 °
2 daily
LML SST
Isolat, isolon 0.1 °
8 daily
GRIB 1 , HDF, NETCDF
Met.no +DMI
KNMI De Bilt
M-F/CMS Lannion
EUMETCAST
Met-9
MAP DLI
daily
MAP SSI
daily
LML DLI
8-Daily
LML SSI
7-Daily
Isolat, isolon 0.1 °
GRIB, HDF, NETCDF

2- OSI SAF CURRENT PRODUCTION

Near-real time Products on Local FTP Servers

SeaWinds 100kmWind — 3h30

SeaWinds 25kmWind — 3h30

ASCAT 25kmWind — 2h45

Global, Sat. Swath, BUFR

NAR SST — 4h
Polar Stereogr. 2km
7 areas, 4 daily

MAP SST — 3h
Isolat, isolon 0.1 °
2 daily

LML SST — 3h
Isolat, isolon 0.1 °
8 daily

GRIB 1 , HDF, NETCDF

Sea Ice Concentration — 5h

Sea Ice type — 5h

Sea Ice edge — 5h

H. Lat, N Hemis. S hemis,
Polar Stereogr. 10 km
Daily, GRIB, HDF5

MAP DLI — 3h
daily

MAP SSI — 3h
daily

LML DLI — 3h
8-Daily

LML SSI — 3h
7-Daily

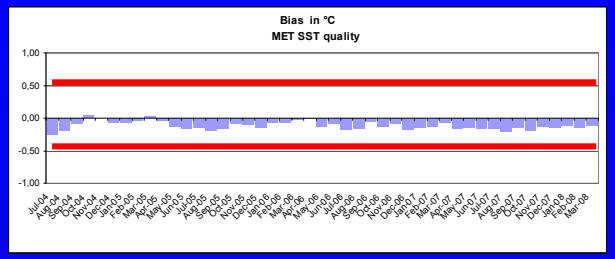
Isolat, isolon 0.1 °
GRIB, HDF, NETCDF

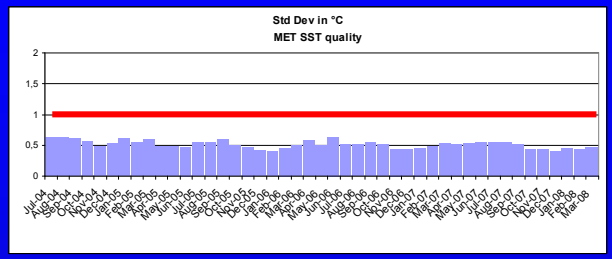
3- Products Quality

SST

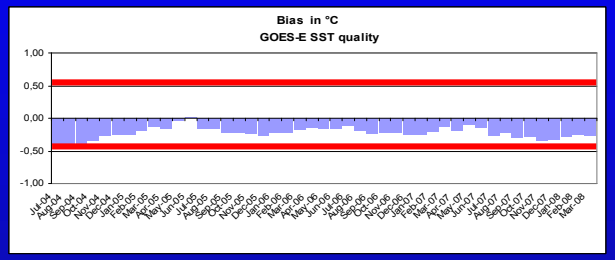
MSG

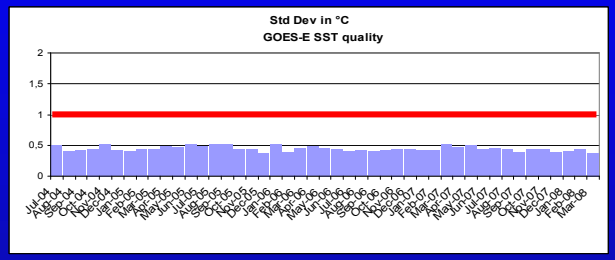
Atlantic SST Req :
Bias<0.5°c
Sdt Dev < 1°c



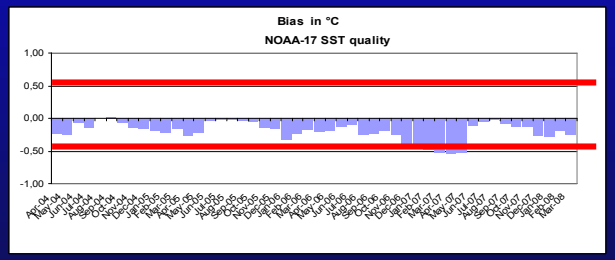


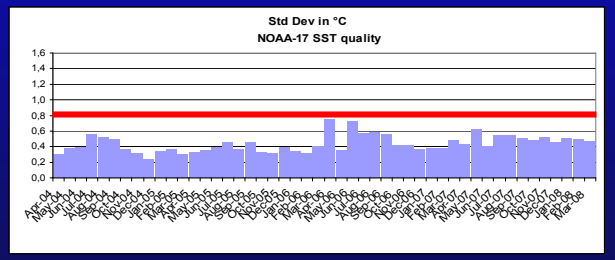
GOES-E





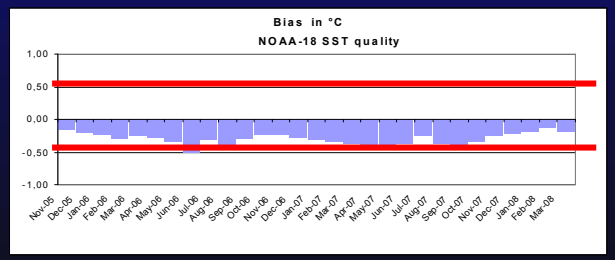
NOAA 17

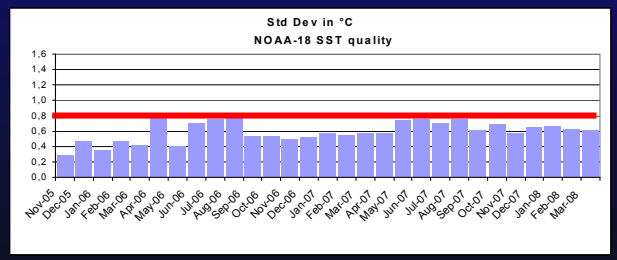




NAR SST Req :
Bias<0.5°c
Sdt Dev < 0.8°c

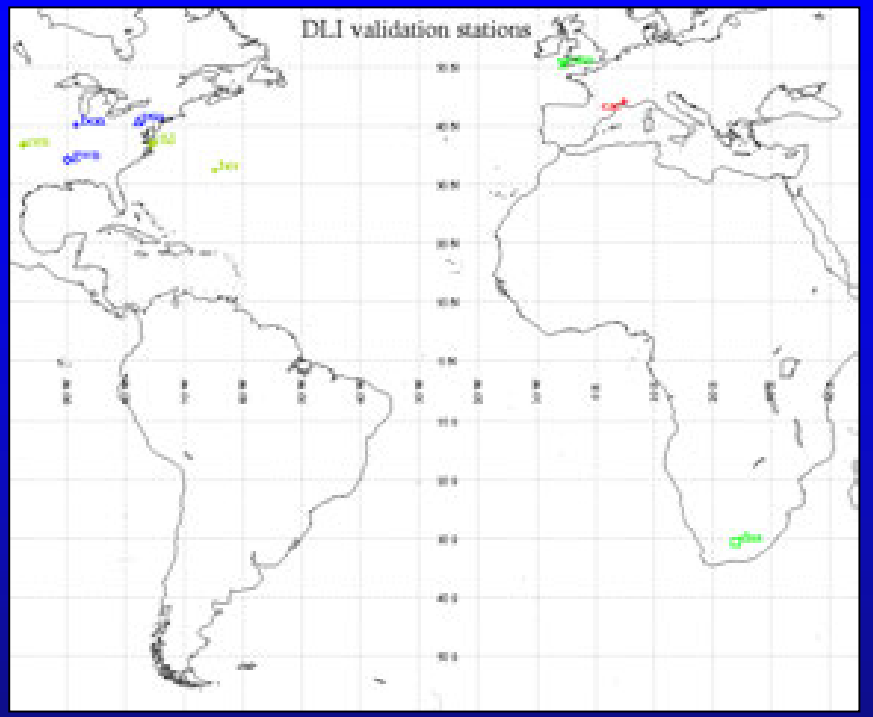
NOAA 18





3- Products Quality

DLI

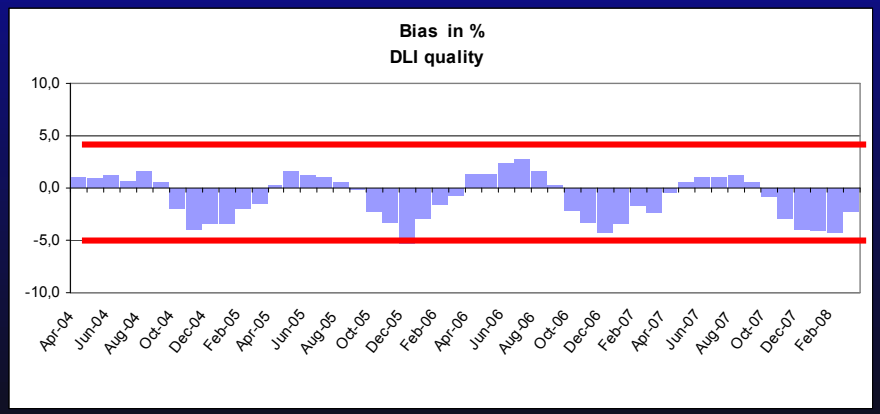


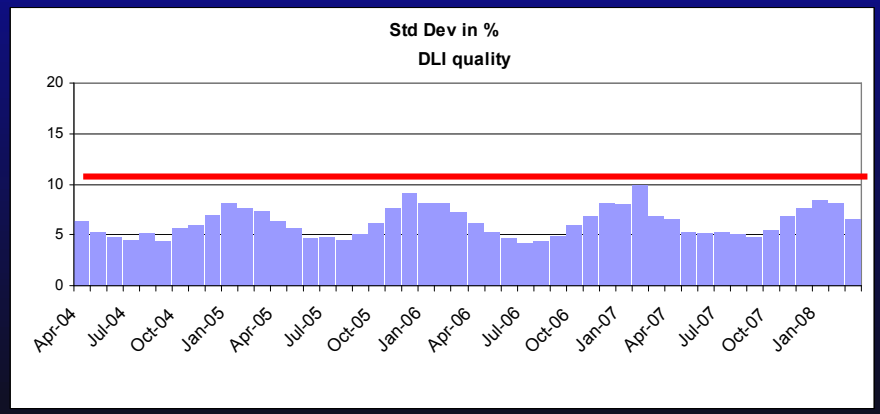
DLI (Downward longwave iradiance)

Requirements : Hourly LML DLI values accuracy when compared to land pyrgeometer measurements :

monthly relative bias less than **5%**

monthly difference standard deviation less than **10%**





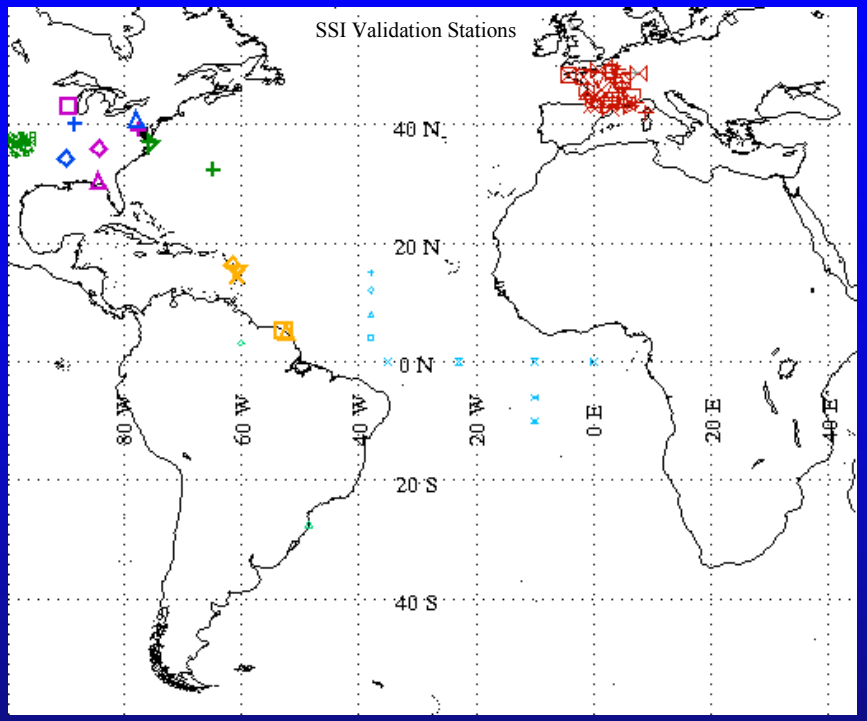
3- Products Quality

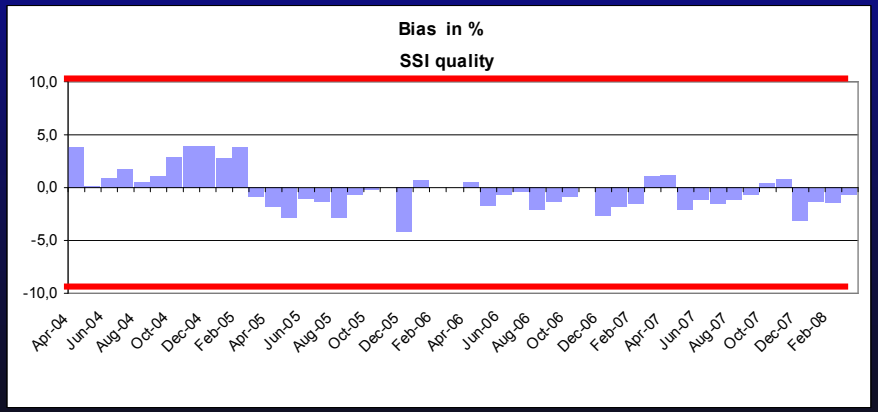
SSI

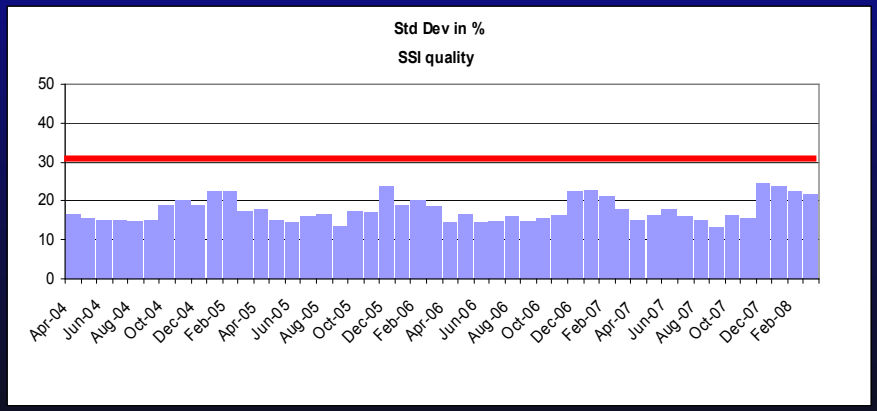
SSI (Surface Solar irradiance)

Requirement : Hourly LML SSI values accuracy when compared to land pyranometer measurements :

- monthly relative bias less than **10%**
- monthly difference standard deviation less than **30%**







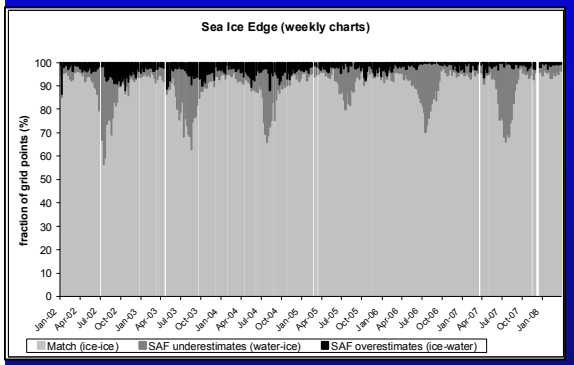
3- Products Quality

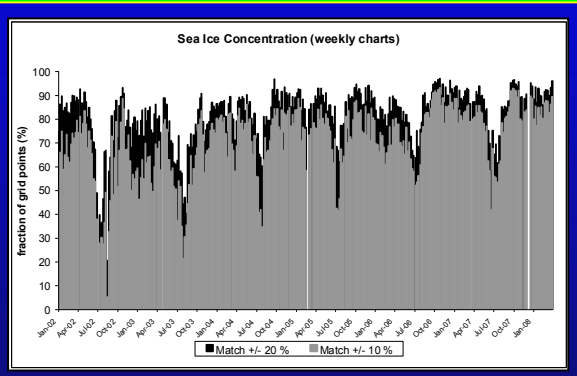
Sea Ice

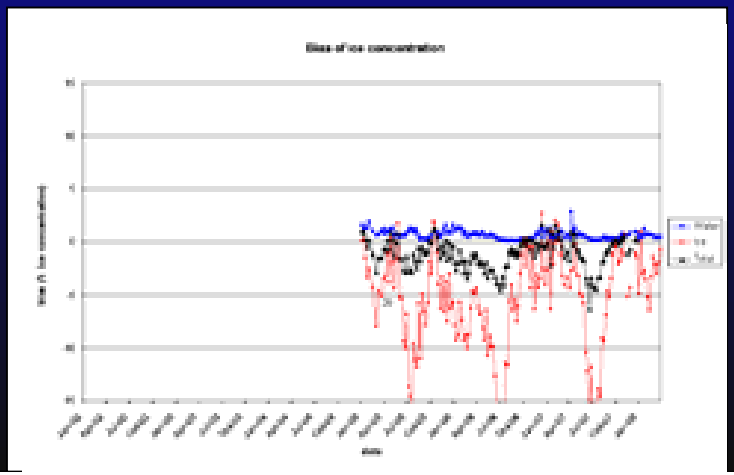
Requirement :

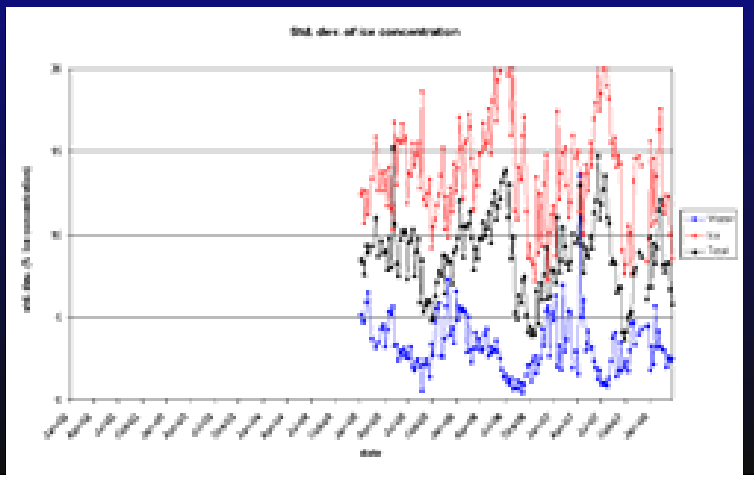
For the weekly validation at the Northern Hemisphere the concentration product is required to have a bias and standard deviation less than 10% on an annual basis.
For the weekly validation at the Southern Hemisphere the concentration product is required to have a bias and standard deviation less than 15% on an annual basis.
The targeted accuracy for ice edge is 20 km on a yearly average.

Northern Hemisphere : Weekly validation by automatic comparison with DMI navigational charts









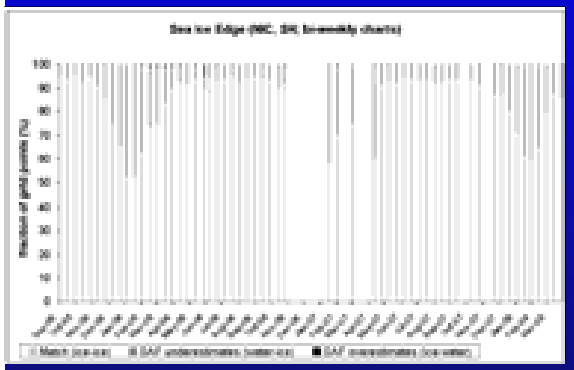
3- Products Quality

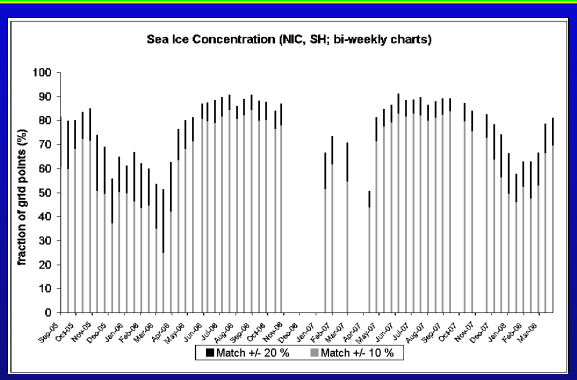
Sea Ice

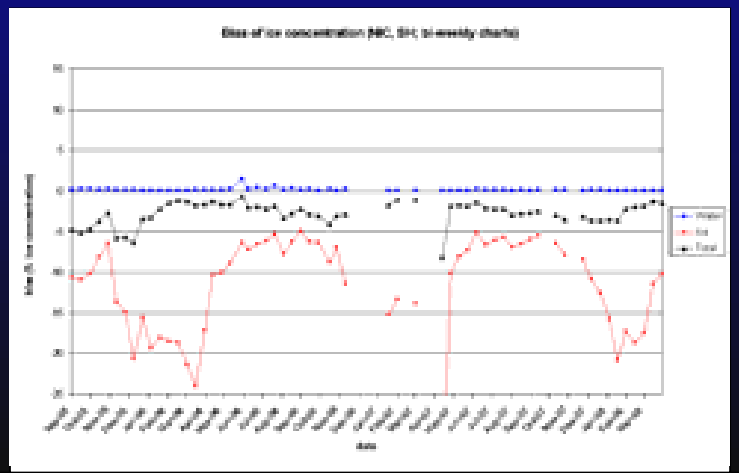
Requirement :

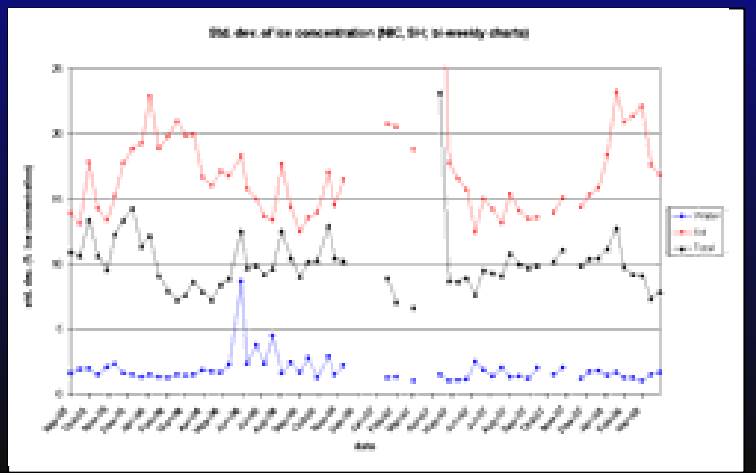
For the weekly validation at the Northern Hemisphere the concentration product is required to have a bias and standard deviation less than 10% on an annual basis.
For the weekly validation at the Southern Hemisphere the concentration product is required to have a bias and standard deviation less than 15% on an annual basis.
The targeted accuracy for ice edge is 20 km on a yearly average.

Southern Hemisphere : Weekly validation by automatic comparison with NCI navigational charts









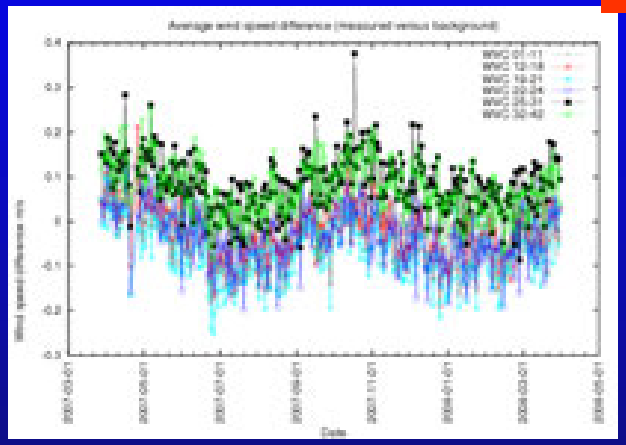
3- Products Quality

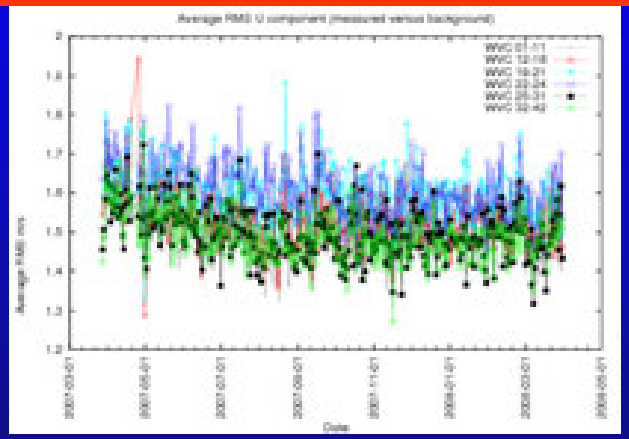
Wind

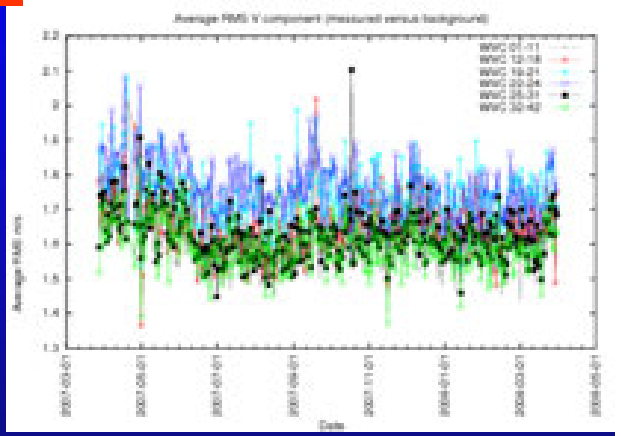
Requirement :
Accuracy better than 2.0 m/s in wind component RMS with a bias of less than 0.5 m/s in wind speed

The scatterometer winds are monitored against NWP model winds

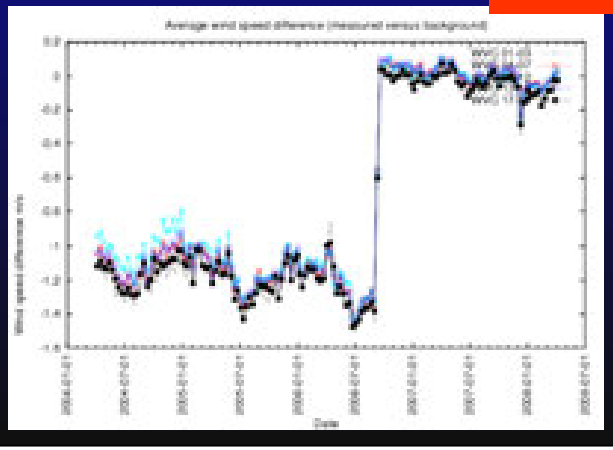
ASCAT 25 Km vs. ECMWF

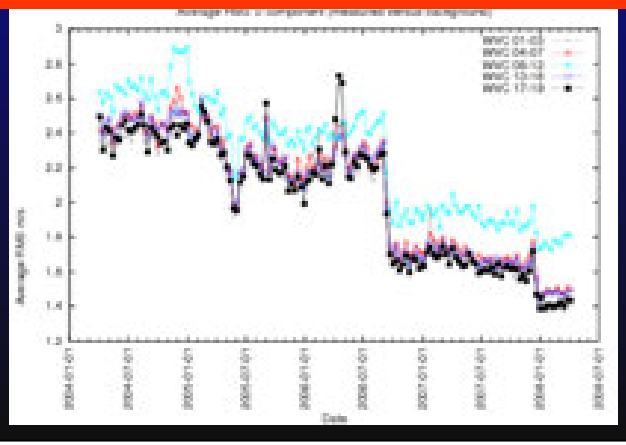


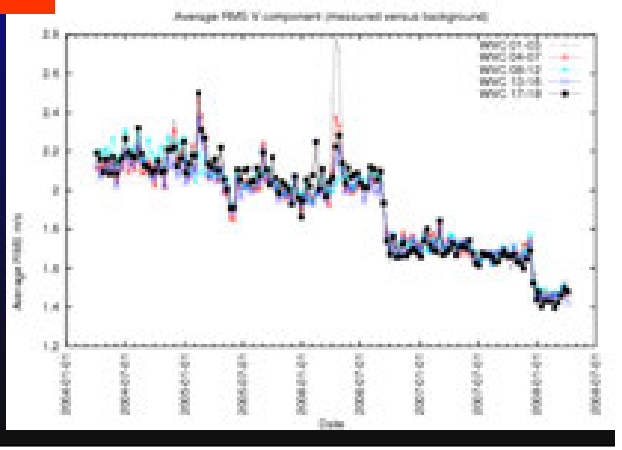




SeaWinds 100Km vs. NCEP and then ECMWF







3- Products Quality

Wind

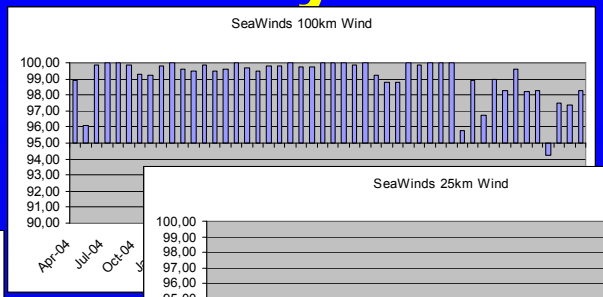
Requirement :
Accuracy better than 2.0 m/s in wind component RMS with a bias of less than 0.5 m/s in wind speed

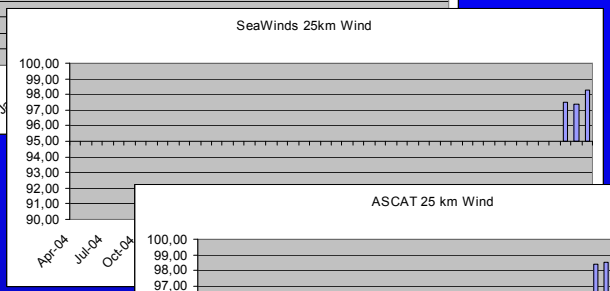
Since November 2007 the scatterometer winds are monitored against Buoys Measurements (monthy averages)

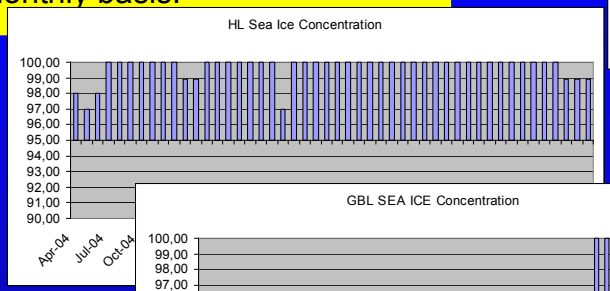
	ASCAT 25-km				SeaWinds 25-km				SeaWinds 100-km			
	speed bias	dir. stdev.	u stdev.	v stdev.	speed bias	dir. stdev.	u stdev.	v stdev.	speed bias	dir. stdev.	u stdev.	v stdev.
Nov-07	-0.19	18.13	1.67	1.69	-0.39	16.19	1.77	1.73	-0.20	20.02	2.10	1.91
Dec-07	-0.20	19.55	1.73	1.90	-0.42	18.91	2.00	1.98	-0.17	20.89	2.34	2.21
Jan-08	-0.28	19.52	1.80	1.83	-0.48	17.27	1.75	1.79	-0.21	19.67	2.14	1.96
Feb-08	-0.28	16.60	1.85	1.74	-0.56	18.61	1.84	1.82	-0.35	20.62	2.16	1.93
Average	-0.24	18.45	1.76	1.79	-0.46	17.75	1.84	1.83	-0.23	20.30	2.19	2.00

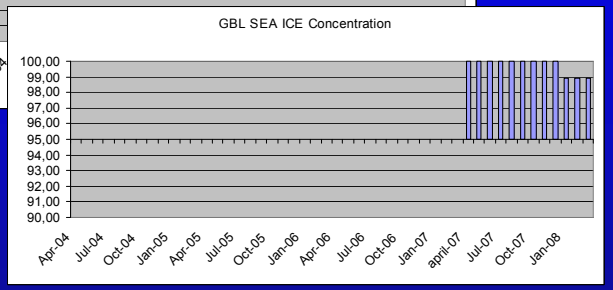
3- Products availability

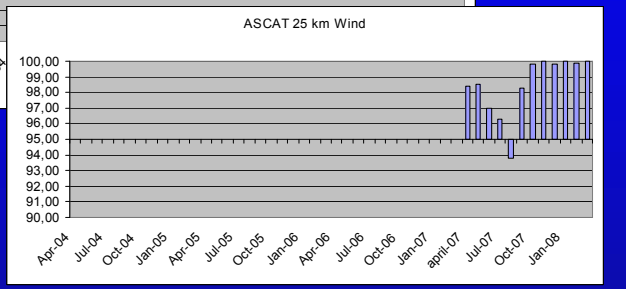
Availability requirement :
Operational O&SI SAF products must be available for distribution within the specified time in more than 95% of the cases where input satellite data are available with the nominal level of quality, on monthly basis.

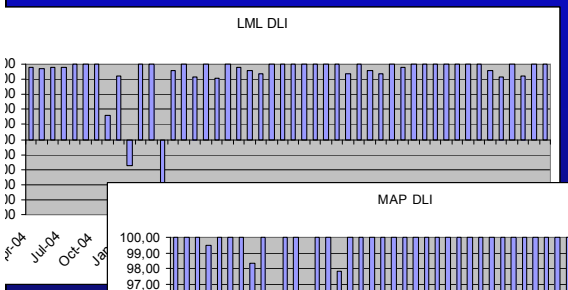


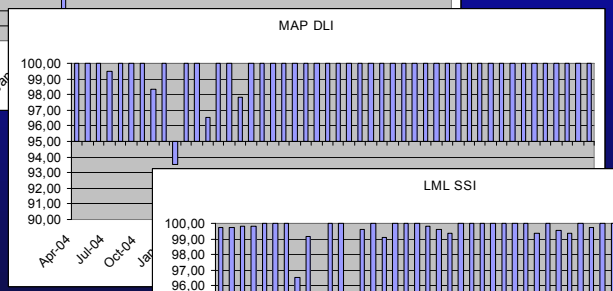


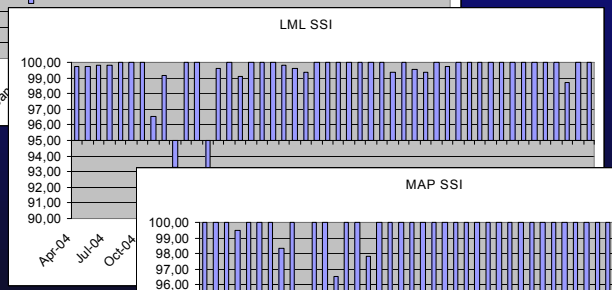


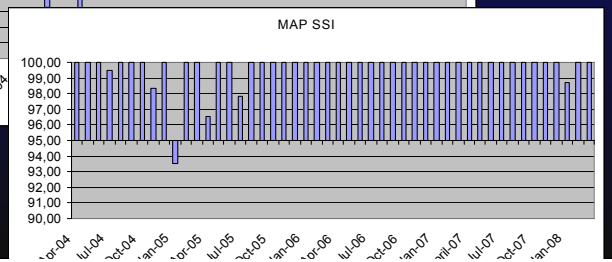


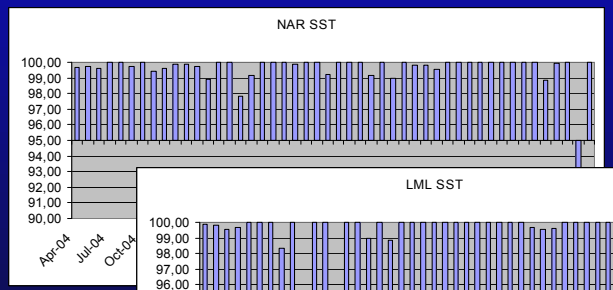


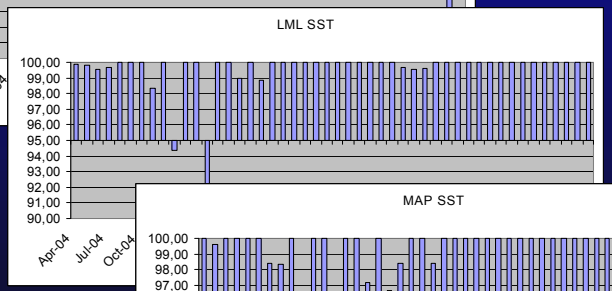


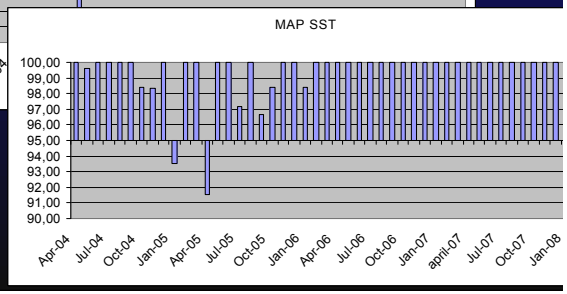






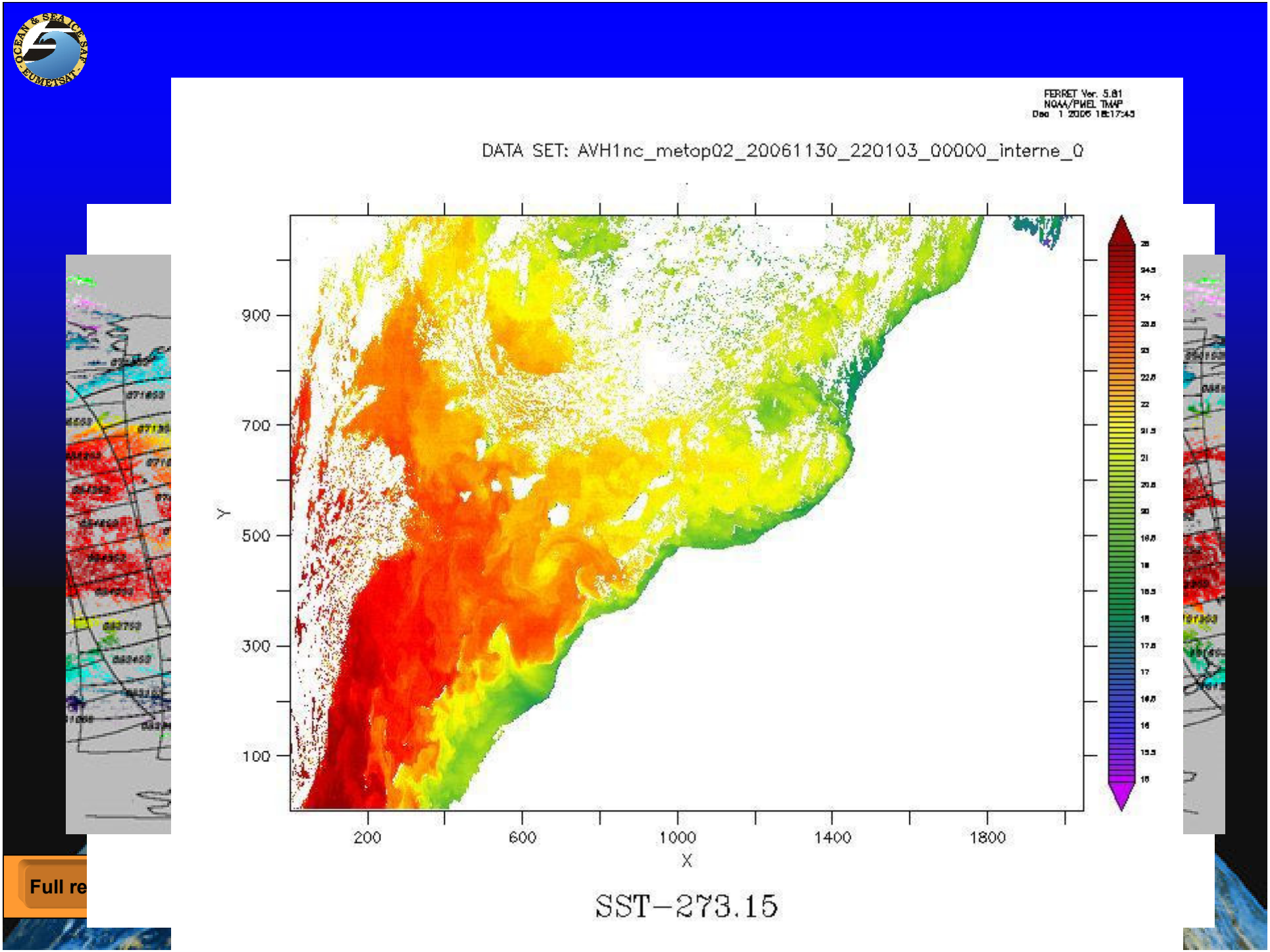






4- new requirements

- Expressed :
    - in the context of GCOS, GMES, GODAE/GHRSST, etc
    - At OSI SAF users workshops (in Perros -Guirec, Brittany, France in 2005, and in Amsterdam in 2007)
- Main requirements are :
    - Improved resolution (temporal and geographical)
    - Geographical extension
    - Access to full satellite resolution products (SST)
    - Specific interfaces allowing flexible access to the products (geographical extraction, remapping …)
    - Using of NETCDF, quite a standard format for the Oceanography community.


FERRET Ver. 5.81
NOAA/PMEL TMAP
DATA SET: AVH1nc_metop02_20061130_220103_00000_interne_0
900
700
500
300
100
Y
200
600
1000
1400
1800
X
SST−273.15

5- In demonstration, and soon operational : the MetOp AVHRR SST

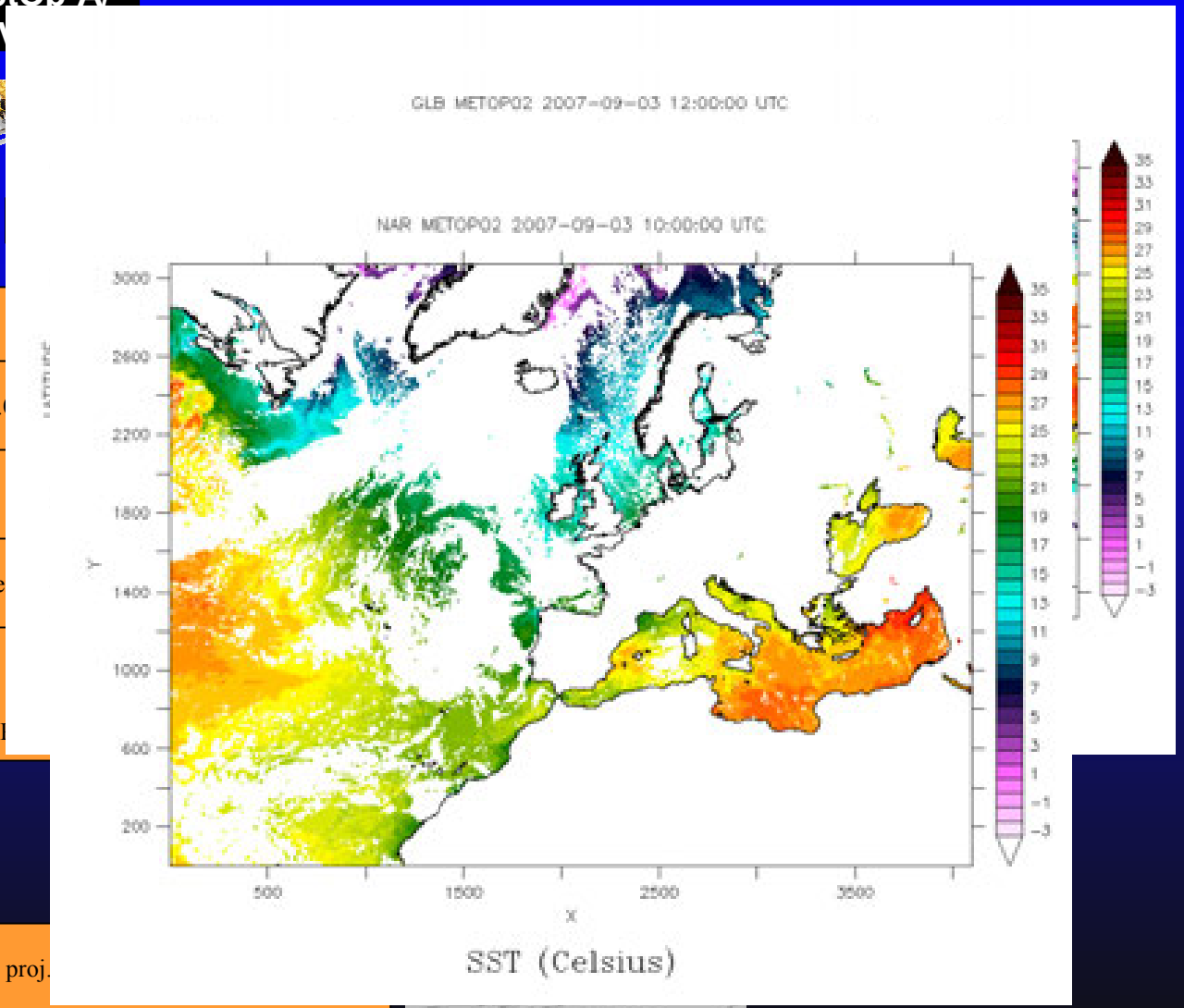
MetOp-A/ AV

Global Metop SST Global, 0.

NAR Metop SST EUR, polar ste

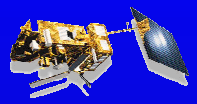
GRIB 2, NETCDF L3

Full res. Metop SST Global, swath proj.



5- In demonstration, and soon operational : the MetOp AVHRR SST

MetOp-A/ AVHRR



EUMETCAST

Global Metop SST — Global, 0.05° lat-lon, 2-daily

NAR Metop SST — EUR, polar stereogr. 2km, 2-daily

NetCDF L3P

GRIB02

M-F/CMS + IFREMER

Full res. Metop SST — Global, swath proj. 1km, conti

NetCDF L2P

Already available in Demonstration

IFREMER FTP Server

Archive at IFREMER

Declared Operational, soon available

EUMETCAST

Archive at UMARF

Already available in Demonstration

IFREMER FTP Server

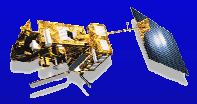
Archive at IFREMER

6 OSI SAF TARGET PRODUCTION at the end of the CDOP

New satellites

NPP

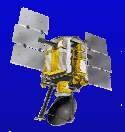
MetOp-A



NOAA-16/17 AVHRR

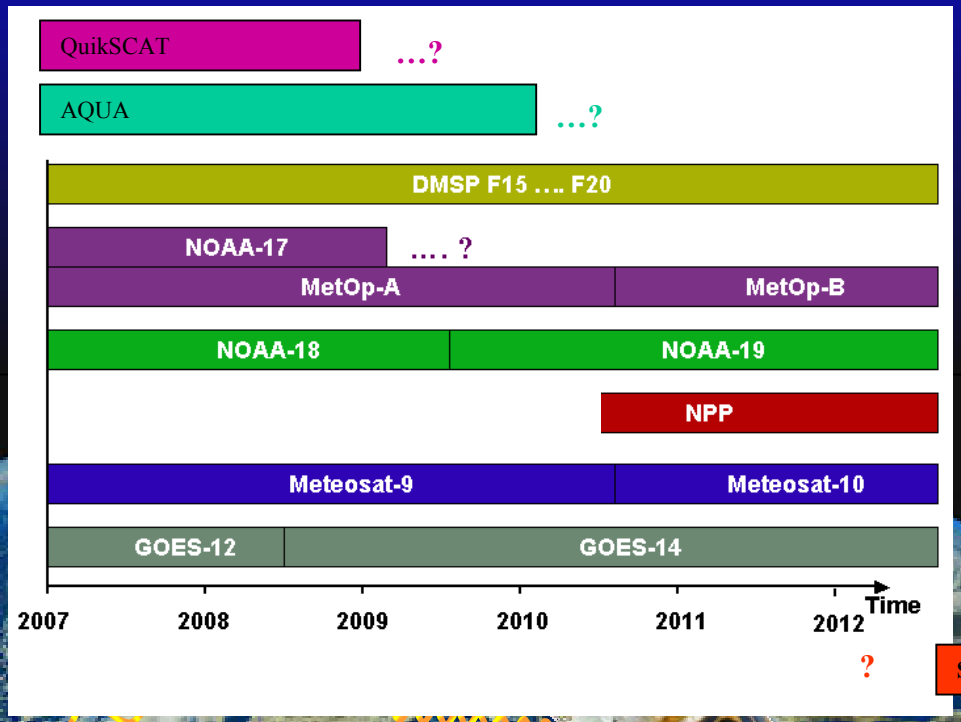
DMSP/SSMI

Quickscat/ SeaWinds



SENTINEL-3

?



GOES-E

Met-9

6 OSI SAF TARGET PRODUCTION at the end of the CDOP

ASCAT 25km Wind

ASCAT 12.5km Wind

SeaWinds 100km Wind

SeaWinds 25km Wind

Satellite swath, BUFR

New products

Global Metop SST	Global, 0.05° lat-lon, 2-daily
NAR Metop SST	EUR, polar stereogr. 2km, 2-daily,
NAR NOAA SST	EUR, polar stereogr. 2km, 2-daily
Atlantic SST	LML, GEO, 0.05° lat-lon, hourly
Atl. High Lat. SST	NOAA, MetOp, ATL HL, polar stereogr. 5km, 2-daily

GRIB 2, NETCDF

Full res. NOAA SST	>50N, swath proj. 1km, EARS, continuous, NetCDF
Full res. Metop SST	Global, swath proj. 1km, continuous, NetCDF

Sea Ice Concentration

Sea Ice Type

Sea Ice Edge

Sea Ice Emissivity

Sea Ice Drift

Global, Polar Stereogr. 10 km, Daily, GRIB, HDF5, NETCDF

Sea Ice Regional Edge

Polar Stereogr. 5 km, 2-Daily, GRIB, HDF5, NETCDF

0.1° lat-lon, hourly +daily, GRIB, NETCDF	**Atlantic Downward Longwave Irradiance**
	Atlantic Surface Solar Irradiance

Polar Stereog. 5km hourly +daily, GRIB, HDF, NETCDF	**Atl. High Lat. Downward Longwave Irradiance**
	Atl. High Lat. Surface Solar Irradiance

6 OSI SAF TARGET PRODUCTION at the end of the CDOP

ASCAT 25km Wind

ASCAT 12.5km Wind

SeaWinds 100km Wind

SeaWinds 25km Wind

Satellite swath, BUFR

Enhanced products

Higher resolution

Global Metop SST	Global, 0.05° lat-lon, 2-daily
NAR Metop SST	EUR, polar stereogr. 2km, 2-daily,
NAR NOAA SST	EUR, polar stereogr. 2km, 2-daily
Atlantic SST	LML, GEO, 0.05° lat-lon, hourly
Atl. High Lat. SST	NOAA, MetOp, ATL HL, polar stereogr. 5km, 2-daily

GRIB 2, NETCDF

Full res. NOAA SST	>50N, swath proj. 1km, EARS, continuous, NetCDF
Full res. Metop SST	Global, swath proj. 1km, continuous, NetCDF

Sea Ice Concentration

Sea Ice Type

Sea Ice Edge

Sea Ice Emissivity

Sea Ice Drift

Global, Polar Stereogr. 10 km, Daily, GRIB, HDF5, NETCDF

Sea Ice Regional Edge

Polar Stereogr. 5 km, 2-Daily, GRIB, HDF5, NETCDF

0.1° lat-lon, hourly +daily, GRIB, NETCDF

Atlantic Downward Longwave Irradiance

Atlantic Surface Solar Irradiance

Polar Stereog 5km hourly +daily, GRIB, HDF, NETCDF

Atl. High Lat. Downward Longwave Irradiance

Atl. High Lat. Surface Solar Irradiance

6 OSI SAF TARGET PRODUCTION at the end of the CDOP

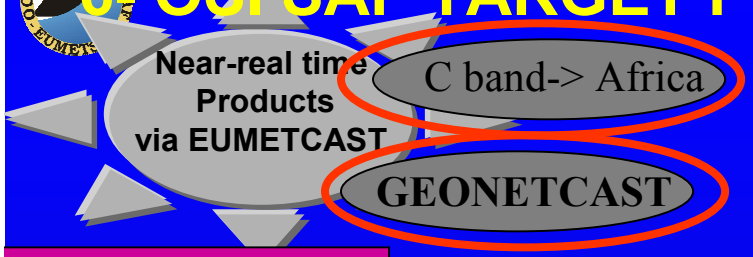
Envisaged

Use of NETCDF

ASCAT 25km Wind	
ASCAT 12.5km Wind	
SeaWinds 100km Win	
SeaWinds 25km Wind	Satellite swath, BUFR
Global Metop SST	Global, 0.05° lat-lon, 2-daily
NAR Metop SST	EUR, polar stereogr. 2km, 2-daily,
NAR NOAA SST	EUR, polar stereogr. 2km, 2-daily
Atlantic SST	LML, GEO, 0.05° lat-lon, hourly
Atl. High Lat. SST	NOAA, MetOp, ATL HL, polar stereogr. 5km, 2-daily
	GRIB 1, NETCDF
Full res. NOAA SST	>50N, swath proj. 1km, EARS, continuous, NetCDF
Full res. Metop SST	Global, swath proj. 1km, continuous, NetCDF

Sea Ice Concentration	
Sea Ice Type	
Sea Ice Edge	
Sea Ice Emissivity	
Sea Ice Drift	
	Global, Polar Stereogr. 10 km, Daily, GRIB, HDF5, NETCDF
Sea Ice Regional Edge	
	Polar Stereogr. 5 km, 2-Daily, GRIB, HDF5, NETCDF
Atlantic Downward Longwave Irradiance	0.1° lat-lon, hourly +daily, GRIB, NETCDF
Atlantic Surface Solar Irradiance	
Atl. High Lat. Downward Longwave Irradiance	Polar Stereog. 5km hourly +daily, GRIB, HDF, NETCDF
Atl. High Lat. Surface Solar Irradiance	

6- OSI SAF TARGET PRODUCTION at the end of the CDOP



ASCAT 25km Wind

ASCAT 12.5km Wind

SeaWinds 100km Wind

SeaWinds 25km Wind

Satellite swath, BUFR

Potential of extended means of Dissemination to be considered

Global Metop SST	Global, 0.05° lat-lon, 2
NAR Metop SST	EUR, polar stereogr. 2km, 2-daily,
NAR NOAA SST	EUR, polar stereogr. 2km, 2-daily
Atlantic SST	LML, GEO, 0.05° lat-lon, hourly
Atl. High Lat. SST	NOAA, MetOp, ATL HL, polar stereogr. 5km, 2-daily

GRIB 2, NETCDF

Full res. NOAA SST	>50N, swath proj. 1km, EARS, continuous, NetCDF
Full res. Metop SST	Global, swath proj. 1km, continuous, NetCDF

Sea Ice Concentration

Sea Ice Type

Sea Ice Edge

Sea Ice Emissivity

Sea Ice Drift

Global, Polar Stereogr. 10 km, Daily, GRIB, HDF5, NETCDF

Sea Ice Regional Edge

Polar Stereogr. 5 km, 2-Daily, GRIB, HDF5, NETCDF

0.1° lat-lon, hourly +daily, GRIB, NETCDF

Atlantic Downward Longwave Irradiance

Atlantic Surface Solar Irradiance

Polar Stereog. 5km hourly +daily, GRIB, HDF, NETCDF

Atl. High Lat. Downward Longwave Irradiance

Atl. High Lat. Surface Solar Irradiance

6 OSI SAF TARGET PRODUCTION at the end of the CDOP

Near-real time Products on Local FTP Servers

ASCAT 25km Wind

ASCAT 12.5km Wind

SeaWinds 100km Wind

SeaWinds 25km Wind

Satellite swath, BUFR

Flexible access to full resolution products (re-mapping,geographical extraction)

Global Metop SST	Global, 0.05° lat-lon, 2
NAR Metop SST	EUR, polar stereogr. 2km, 2-daily,
NAR NOAA SST	EUR, polar stereogr. 2km, 2-daily
Atlantic SST	LML, GEO, 0.05° lat-lon, hourly
Atl. High Lat. SST	NOAA, MetOp, ATL HL, polar stereogr. 5km, 2-daily

GRIB 2, NETCDF

Full res. NOAA SST	>50N, swath proj. 1km, EARS, continuous, NetCDF
Full res. Metop SST	Global, swath proj. 1km, continuous, NetCDF

Sea Ice Concentration

Sea Ice Type

Sea Ice Edge

Sea Ice Emissivity

Sea Ice Drift

Global, Polar Stereogr. 10 km, Daily, GRIB, HDF5, NETCDF

Sea Ice Regional Edge

Polar Stereogr. 5 km, 2-Daily, GRIB, HDF5, NETCDF

0.1° lat-lon, hourly +daily, GRIB, NETCDF

Atlantic Downward Longwave Irradiance

Atlantic Surface Solar Irradiance

Polar Stereog. 5km hourly +daily, GRIB, HDF, NETCDF

Atl. High Lat. Downward Longwave Irradiance

Atl. High Lat. Surface Solar Irradiance

6 OSI SAF TARGET PRODUCTION at the end of the CDOP

Archive at UMARF

Archive in production Centers via internet

ASCAT 25km Wind

ASCAT 12.5km Wind

SeaWinds 100km Wind

SeaWinds 25km Wind

Satellite swath, BUFR

New archive

Sea Ice Concentration

Sea Ice Type

Sea Ice Edge

Sea Ice Emissivity

Sea Ice Drift

Global, Polar Stereogr. 10 km, Daily, GRIB, HDF5, NETCDF

Sea Ice Regional Edge

Polar Stereogr. 5 km, 2-Daily, GRIB, HDF5, NETCDF

Global Metop SST	Global, 0.05° lat-lon, 2-daily
NAR Metop SST	EUR, polar stereogr. 2km, 2-daily,
NAR NOAA SST	EUR, polar stereogr. 2km, 2-daily
Atlantic SST	LML, GEO, 0.05° lat-lon, hourly
Atl. High Lat. SST	NOAA, MetOp, ATL HL, polar stereogr. 5km, 2-daily

GRIB 2, NETCDF

0.1° lat-lon, hourly +daily, GRIB, NETCDF

Atlantic Downward Longwave Irradiance

Atlantic Surface Solar Irradiance

Polar Stereog. 5km hourly +daily, GRIB, HDF, NETCDF

Atl. High Lat. Downward Longwave Irradiance

Atl. High Lat. Surface Solar Irradiance

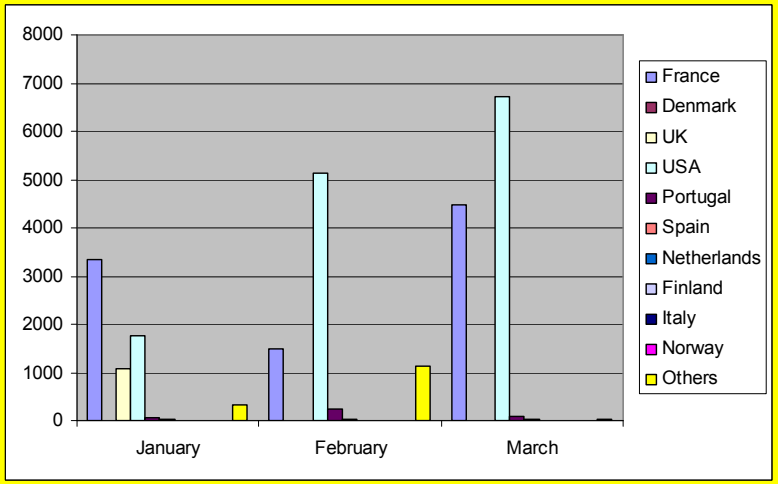
Full res. NOAA SST	>50N, swath proj. 1km, EARS, continuous, NetCDF
Full res. Metop SST	Global, swath proj. 1km, continuous, NetCDF

7- Products usage, User Support and interactions with Users

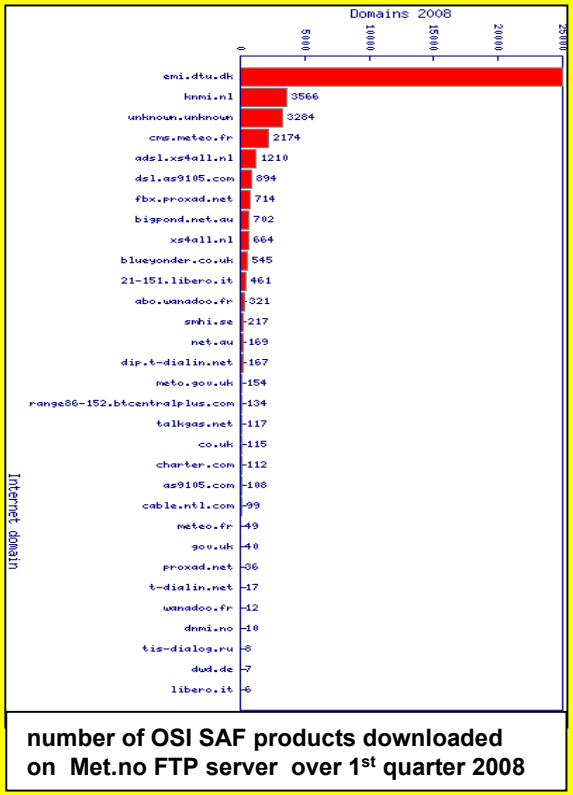
⇒**Products are used for ocean modelling, atmosphere modelling, forecasting, research, security, defense…**
By the meteorological community, mostly National Meteorological Services,
and by the oceanography community, directly or through projects such as
MERSEA, MEDSPIRATION, GHRSST, GMES/MyOcean (where the OSI SAF consortium members are involved), MERCATOR.

⇒**OSI SAF products re-distributed through FTP servers : NASA…**

⇒**Products downloading on the FTP servers is monitored**



number of OSI SAF products downloaded on IFREMER FTP server over 1st quarter 2008



number of OSI SAF products downloaded on Met.no FTP server over 1st quarter 2008

7- Products usage, User Support and interactions with Users

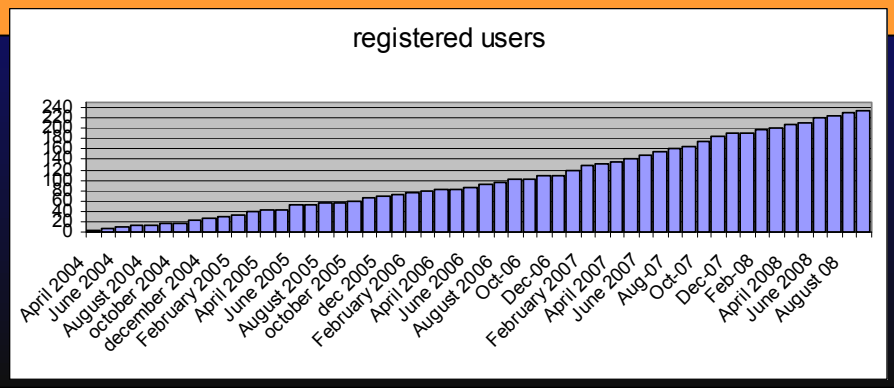
The Web Site : www.osi-saf.org

All public :

general information,
News,
quicklooks,
documentation : Product User Manuals , etc…
Registration function : Account Request

Registrered Users :

Access to the products via the local ftp servers
More documentation
Helpdesk with User request management mechanism
Permanent Enquiry on product usage
Automatic and selective sending of service messages and news



Conclusion

The OSI SAF produces and distributes operationaly quality controled products related to key parameters of the ocean-atmosphere interface

Products maintained and enhanced, in particular for higher resolution, with continuous effort of R&D

New products planned (Sea Ice Drift, Sea Ice emissivity)

(free) access to the products is being improved :
Through EUMETCAST and UMARF: products gridded over pre-defined areas in GRID and BUFR,
On internet FTP servers : products in NETCDF with flexible access to full satellite resolution.

User feedback important, but real product usage and user satisfaction somewhat difficult to assess

Use of future satellites prepared (NPP, GOES-R, MTG, Post EPS) or considered (SENTINEL 3)

OSI SAF open to GMES needs and consortium already involved in GMES MCS through MyOcean

Users are invited to register on : **www.osi-saf.org**

Objectives of Brest Workshop

Ist workshop in 1999 in Perros-Guirec	IInd workshop in 2005 Perros-Guirec	IIIrd workshop in September 2007 in Amsterdam	IVth workshop in October 2008 in Brest

- To present to the Users the status of the OSI SAF, issues, questions…

- To ease discussion with users and gather their recommendations

Some points to be raised at Brest workshop 1/3:

1- follow-up of recommendation from 4th Operational Review (OR-4) : To assess the need for merged products (SST, Winds ..) in the context of deriving the net fluxes over the ocean.

2- Given the capabilities and attractiveness of NetCDF, more and more used not only by the Oceanographic community, but also, more recently, by the Meteorological one (UKMO, ECMWF…), it is envisaged to stop dissemination in GRIB.

3- To assess the need for extension of areas covered by the dissemination via EUMETCAST of some products

4- follow-up of a GHRSST recommendation : To confirm the need for enhancement of the products (geographical coverage …), in particular over Indian Ocean for products derived from geostationnary satellites

Some points to be raised at Brest workshop 2/3:

5- follow-up of a recommendation from GHRSST meeting in June 2008 : confirm the need for geostationnary monosatellite products replacing the current GOES-E MSG merged products.

6- To assess relevancy to replace NOAA-18 NAR SST product over 7 sub-areas by one unique area.

7- To relevancy to abandon NOAA-17, since MetOp is now operational

8- To better specify the need for reprocessing capabilities in view of long term series (for inclusion in CDOP2)

9- Parallel stream ASCAT CMOD5 and CMOD5N sufficient period ?

10- Effort for ASCAT - ERS continuity; priority ?

11- Need for ISCAT at 12:00 LST?

12- Provide winds in case of flags whenever possible: inversion QC and
2D-VAR spatial check; e.g., sea ice

13- Demo hi-resolution and/or coastal products for distribution; priority ?

14- U10N provided and L2 stress guide; software needed ?

Some points to be raised at Brest workshop 3/3:

14- U10N provided and L2 stress guide; software needed ?

15- Archive data format in BUFR/NetCDF/HDF ? Accessibility and compatibility of archives at EUMETSAT, PODAAC

16- User requirements MyOcean Wind TAC ? Higher level wind products to spatially and temporally contain eddy-scale winds

17- To encourage users to cite OSI SAF data in publications and reports and to communicate these publications to the OSI SAF