6th ACCORD LTM meeting
Tallinn, 27 March 2023
16:30-18:15 EEST

ACCORD
A Consortium for COnvection-scale modelling Research and Development

Minutes

Participants

(R): means remote participant

ALGERIA	Mohamed Mokhtari	LITHUANIA	Martynas Kazlauskas (R)
AUSTRIA	Christoph Wittmann	MOROCCO	Siham Sbii (R)
BELGIUM	Alex Deckmyn	NETHERLANDS	Wim de Rooy (dep.)
BULGARIA	Boryana Tsenova	NORWAY	Inger-Lise Frogner (dep.)
CROATIA	Antonio Stanesic	POLAND	Piotr Sekuła (dep.)
CZECH REP	Radmila Brožková	PORTUGAL	
DENMARK	Rune Carbuhn Andersen (R)	ROMANIA	Alexandra Craciun
ESTONIA	Ivar Ansper	SLOVAKIA	Maria Derkova
FINLAND	Niko Sokka (dep.)	SLOVENIA	Jure Cedilnik
FRANCE	Ghislain Faure	SPAIN	Javier Calvo
HUNGARY	Gabriella Szépszó	SWEDEN	Jelena Boryanova (R)
ICELAND	Sigurdur Thorsteinsson (dep.)	TUNISIA	Haythem Belghrissi (R)
IRELAND	Saji Varghese (R)	TURKEY	Yelis Cengiz (R)

PM: Claude Fischer, CNA: Maria Derkova (Mariska), CSS: Patricia Pottier
Invited: Integration Leader (Alexandre Mary)
Observers: Martina Tudor, Eric Bazile, Ryad El Khatib
Excused: Maria Monteiro (plane problems)

Adopted agenda

Item	Introduced by
0. Opening and adoption of agenda	CNA
1. Introduction of new LTMs	CNA
2. Reporting in the CMR	PM
3. Detailed Actions Plan 2023	PM
4. Upgrade of ARPEGE LBC	CNA
5. Information about MF progress on e-suites	G. Faure
6. Information about cycles	A. Mary
7. Information from ST besides CMR/DAP - Newsletter - Information LTMs => CSS - Possible host for the next All Staff Workshop(s)	PM
8. A.O.B.	CNA
9. Next meeting(s)	CNA

1. Introduction of new LTMs

Mariska introduced Jure Cedilnik as the new LTM for ARSO (Slovenia) and thanked Neva for her efficient work as ALADIN then ACCORD LTM.

2. Reporting in the CMR

Claude explained that the MG[1] has reviewed the Q3-Q4 manpower figures and made very few comments (LTMs have been contacted directly by MG): the registration data usually is clear and matches the expectations per Area. Claude thanked the LTMs for their registration and kindly reminded:

- to try to describe in a few clear words the activity you register and link to a WP task;
- for COM3.1:
  - to try to specify which ACCORD codes are ported or evaluated, when you register validation or pre-operational tasks on your system,
  - to encourage your team to contribute to the NL with articles about porting, validation and share of experience;
- for COM3.3 (tutorials) and for COM3.4 (conferences): to specify which tutorial, which

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[1] *Claude reminded the LTMs about the newly nominated AL for DA (Beni), for Physics (Meto) and that a progressive handover of responsibility for the Physics Area is planned with Meto and the former Physics-WG members.*

conference and make a link with an activity in the RWP;
- the time-window for the next registration (Q1/2023) is 1-30 April 2023;
- please pay attention to new WPs, tasks, or changes in WPs in RWP2023;
- in case you have questions, have a look at the FAQ-CMR sheet of the shared Information4LTM.

No comments nor questions.

3. Detailed Actions Plan 2023

Claude recalled that the DAP2023 was published on 17 February 2023. It contains the regular governance support (PM, MG & LTM missions, …) and the scientific visits and the participation in WW/WD funded by ACCORD in 2023. The LTMs should indicate (as comments) when an action is completed in the DAP2023_follow-up shared document.

In June, the MG will discuss additional actions (WW/WDs of the autumn, the one or other additional scientific visit). These actions will then be accounted for in the regularization steps of the DAP and the budget for 2024. These actions will be added on the DAP2023_follow-up shared document when approved by MG.

Wim commented that he was surprised to learn that he was funded by ACCORD for traveling to some WW without being asked beforehand. Claude answered that people proposed for fundings had been proposed by a MG member and this MG member should have checked with him before proposing him. Patricia added that the draft DAP is distributed to LTMs for them to check with their team that they agree on the proposed funded actions.

4. Upgrade of ARPEGE LBC

Mariska explained that Météo-France will apply a unified setup for all telecom LBC domains for all networks (00, 06, 12, 18) with hourly LBCs for assimilation up to +6 h and hourly LBCs for production up to +102 h. The requests of Bulgaria, Poland, Tunisia (hourly LBC, more network, prolongation of RR) will be fulfilled; Portugal will change for 90 vertical levels ; the new domain asked by Spain over Antarctica should be checked, completed and sent to MF quickly.
The timing will be announced by Ghislain (expected before summer), and he confirmed that the requests have been validated and approved by MF IT team.

5. Information about MF progress on e-suites

Ghislain recalled that the current operational suite at MF is cy46t1 (since June 2022) and explained that the e-suite cy48t1_op1 is about to start with mixed precision for (uncycled) all Arome forecasts and 2 Arome 500 m in operations. Radmila asked about the meaning of mixed precision (it is the same as single precision). The main changes are:

- OOPS in 3DVar and 4DVar analyses
- Assimilation: 3DEnVAR Arome, hybrid B matrix in Arpege 4Dvar
- Arome EDA: 50 members (instead of 25 currently)
- Physics: EcRad (Arome), use of SST from Mercator-Océan global model and enhancement

of Tiedtke deep convection scheme (both for Arpege), change of aerosol and ozone climatologies (from CAMS, Arome)
- Dynamics : use of WENO interpolations for T and Q in stratosphere (Arpege)
- Observations: *"all sky"* assimilation of microwave obs, Arpege: GOES-17, CrIS mode «FSR», GNSS-RO (GRACE-C, Sentinel-6, Spire), scatterometers HY-2B & HY-2C(Arome), AMV HIMAWARI/AHI, Mode-S from EMADDC (Arome), WIGOS adaptations
- PEARP: revision of singular vectors and of the range of perturbed parameters.

The number of NWP applications (see the figure 1), their complexity and their dependencies lead to almost one year between the very start of the e-suite (ARPEGE DA) and the actual switch to operations.

The next e-suite will be based on CY49T1.

For further information, the LTMs can look at the presentation by Matthieu Plu in the Applications session of the ASW (link to be added later) or at MF poster.
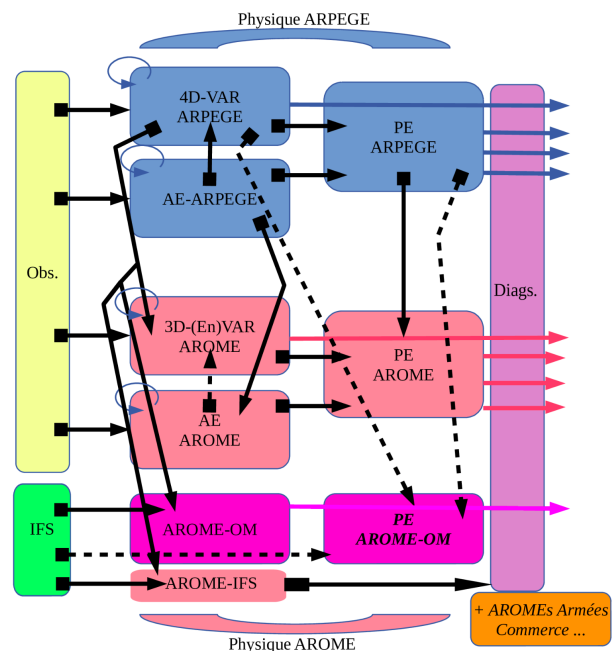

figure 1

Ghislain recalled the last technical changes:
- The access to ARPEGE LBC file through the new ftp site seems reliable and efficient now (feedback welcome);
- There will be changes for access to MF HPC, with new servers and protocol by September 2023 (ssh will be possible, direct ftp towards hendrix also, with a special executable, various tests are under progress among ACCORD members). On a question by Antonio, Ghislain confirmed that some beta-testers are testing this new tool that will be proposed to everyone when it is fine.

6. Information about cycles

More details can be found in the [presentation by Alexandre](#) in the Code+System session of the ASW, in the pages ["Cycles" of the ACCORD wiki](#) and on [ACCORD github](#).

Recent and upcoming cycles

```
Sep. 3rd, 2020    CY48      •········  Common cycle with ECMWF

Jul. 1st, 2021    CY48T1    •········  Latest open development cycle
                            CY48T1_op
                                    •
                                      •  CY48T1_op0.04 = thorough validation by MF
                                        ⤏  CY48T1_op1 = e-suite @ MF

April 14th, 2022  CY48T2    •········  Cycle dedicated to rephasings of oper/pre-oper ingredients

Aug. 4th, 2022    CY48T3    •········  Field API refactorings in prep for GPU, part 1
                            CY48T3_bf
                                 •-----------⤏  next "export version"

(March 31st, 2023) CY49     •········  Common cycle with ECMWF = 48T3 + 48R1

April 2023        CY49T0    •········  Field API refactorings in prep for GPU, part 2

Oct. 2023 ?       CY49T1    •········  Next development cycle: contribution window April -- August 2023

Q1/2024 ?         CY50      •········  Next common cycle with ECMWF
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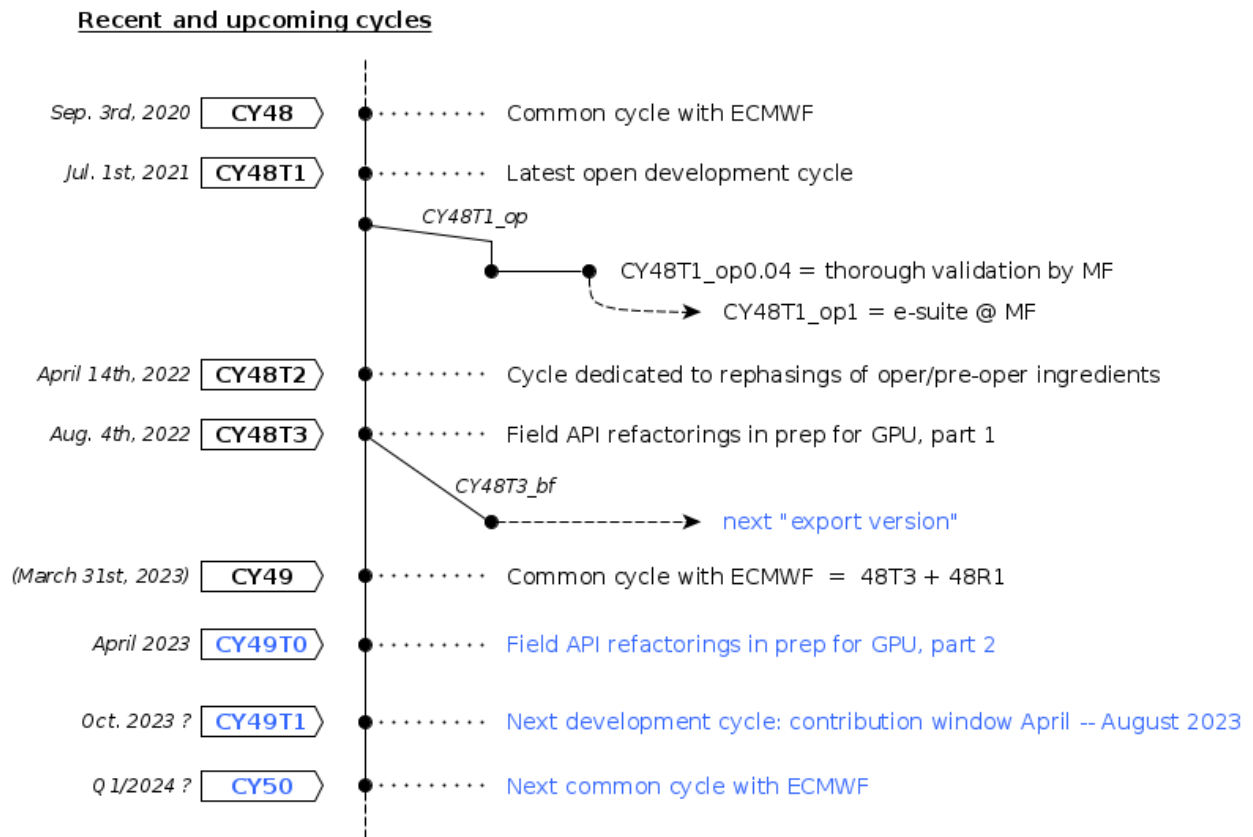
diagramme 2: recent and upcoming cycles

- CY49: Alex gave a few details about CY49: for the first time, convergence of ECMWF and MF/ACCORD Git repositories history. It helps validation for a common cycle. The results are quite good besides some remaining issues that will have to be further investigated.
- CY49T0: the second part of refactorings around CPG in preparation for GPU.
- CY49T1: next ACCORD development cycle, call for contribution from April to August 2023, with target declaration in October 2023.
  - Expected contents: Surfex v8.1++ version of Surfex common to 48T2 and 46H1), PHYEX, rephasings MF e-suite 48T1_op1.
  - For the build of this cycle, we will use continuous Integration on ACCORD forge.
    - As the time window for contribution to CY49T1 is short compared with all the changes, Ryad recommended not to underestimate the work for scientists and for technical support to prepare the contributions.
    - Mariska asked about training for this new way of working: Alexandre explained the training part during his talk at ASW.
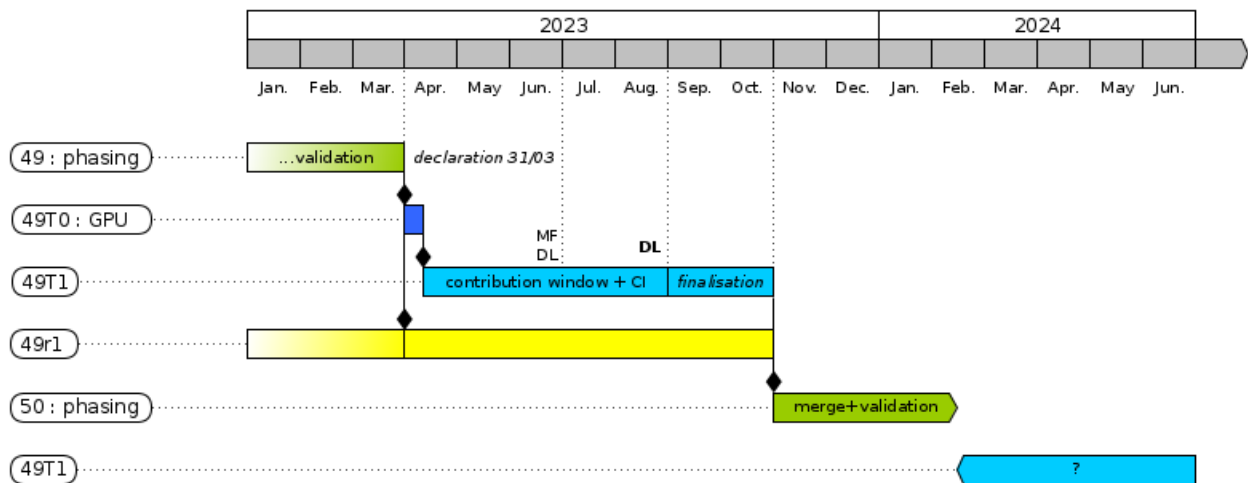 - This cycle will be a basis for the next MF e-suite.

fig 3: latest planning about the cycles

The last export version was based on CY46T1. The next export version will be a kind of hybrid export version: code based on accord_CY48T3_bf.02 with updates on feedback from local implementations; the validation will be performed on CY48T1_op0.04 (that benefited from an extensive validation).

The delivery mode of this export version will change: the code will be on the ACCORD forge (Git repository); validation results on the ACCORD wiki; resources (namelists & co) on the ACCORD wiki; issues and further fixes will be added on the ACCORD forge.

Alexandre proposed to deliver this export version in summer 2023.

7. Information from ST besides CMR/DAP

7.1. Newsletter (NL4)

The contributions should be prepared over April-May, for a publication in June. Last NL for Patricia, may be NL4 may offer the opportunity for a smooth transition with the next CSS.

In link with communication, the PM will discuss with STAC and then the Assembly the definition of a "Communication and Documentation Officer" in ACCORD.

7.2. Information LTMs => CSS

Claude reminded the LTMs to let the CSS know when there are changes of name of their Director (or their representative at the Assembly), name of institute, logo, operational configurations.

It is also important to fill in the missing information on the CMR for your team (email, photo, tel, ...) as the "teams" pages on the website are created automatically from the CMR database.

7.3. Possible host for the next All Staff Workshop(s)

Claude encouraged the LTMs to think about being the possible host(s) for the next All Staff Workshop(s) and check their local possibilities (hybrid meeting is mandatory, expect 90 persons in-situ, 200 participants altogether).

Patricia added that the CSS&PM take care of the registration form, the agenda, the website, the video-conference (bluejeans) and the recordings. The candidates for hosting may get further information from Patricia, or the former organisers of the hybrid ASW (Slovenian and Estonian colleagues). The "old" ALADIN and HIRLAM rules end with the last planned organisers by ALADIN (Slovenia) and by HIRLAM (Estonia). New rules have to be established for ACCORD. There is already a new financial rule (the ASW organiser is compensated 12000 euros by the ACCORD budget). Martina added that for LACE countries, the payment is realised through LACE, not directly through the NMS.

Jelena proposes SHMI and will check the local possibilities.

Claude thanks Jelena and extends the invitation for possible organisers in 2025 or 2026.

Siham asked for the possibility to have the next ASW (2024) after mid April to avoid the fasting month for muslim people. Haythem supported Siham's proposal. Patricia commented that the period for the ASW is constraint: not too early (the first months of the year are busy with other topics, DAP, ...) and not too late (the ASW is the start of the preparation for the next RWP), thus ideally in a period from the last week of March to mid-April. Each year, the dates are chosen to avoid an unconformable period for some Members but it is not always possible. Claude concluded that dates will be proposed during the closing session, after checking the calendar of Easter(s), Ramadan, NWP events (i.e. EGU) and fine tune with the potential host.

8. A.O.B.

Jure recalled that the former ALADIN verification project was running in Ljubljana but results have not been accessed for several months. Some partners are still sending data but nobody is using them. Jure announced that the processing will be stopped by the 1st April. The data collected since the beginning of the AVP project will be stored.

9. Next meeting(s)

The next (hybrid) meeting will be during the EWGLAM week in Reykjavik, 25-29 September 2023 (assuming we can have a time slot from the C-SRNWP organizer). If needed (and if the LTM meeting is short, due to EWGLAM agenda constraints), it may be complemented by an online meeting one or two weeks later (October), to address specific topics arising by the autumn.
Claude sees no special need for a remote meeting before EWGLAM (of course, if there is a hot topic arising, we will look for a date for an online meeting).

Mariska thanked the LTMs and closed the meeting at 18:10.