

Annex 4. Work Plan (Amendment 2012)

Action topics are divided in maintenance and consolidation of the BFM System components by

- a) Code maintenance and distribution
- b) Code efficiency and portability
- c) Maintenance, upgrade and addition of examples and configurations

and scientific improvements and/or implementation of new features.

The actions are organized in tables, one for each specific objective, containing a priority code, a description of the activity, and a rank code defined as:

- 0 Urgent: 0-6 months
- 1 Short-term: 0-12 months
- 2 Intermediate: 12-24 months
- 3 Long-term: 24-36 months

In the framework of the work plan, the following glossary is used for software maintenance:

- *Revision*: Equivalent to version.
- *Version*: Any change in form of the software that is stored in a revision control system. A revision is technically the state at a point in time of the entire tree in the repository.
- *Release*: a version of the software that has met a defined quality level and can be distributed publicly. Software releases are defined as:
 - *Alpha*: initial public release of a partially stable revision that has been tested on a selected set of architectures. It does not require thorough testing with all the examples.
 - *Beta*: public release of a revision that is stable on the designated architectures and tested with the planned examples.

Work plan for 2012-2013

The initial work plan is focused on the set up of the BFM System and the tools for its distribution and maintenance.

ACTIVITY 1

Web Tools and Revision Control System (RCS) Duration: 24; Responsible: CMCC	
Rank	Description
0	Opening of the new BFM web site
1-2	Maintenance of RCS web site

ACTIVITY 2

Core Package (STANDALONE) Duration: 24; Responsible: M. Vichi	
Rank	Description
0	Analysis of the standard BFM STANDALONE structure and parameterizations. Definition of tasks, workload sharing and time schedule. Preparation of the alpha release.
1	Definition and set-up of standard examples (pelagic shallow system, laboratory culture, mesocosm, etc.) for the alpha release
1	Documentation of the alpha release
1	Test of the alpha release in the STANDALONE examples
1	Publication of the alpha release of BFM STANDALONE
2	Revision of feedbacks. Publication of the beta release of BFM STANDALONE.

ACTIVITY 3

BFM_POM1D Duration: 24; Responsible: M. Zavatarelli	
Rank	Description
1	Preparation of the technical documentation and standard examples
1	Release of BFM_POM1D with V5 (alpha release)
2	Addition of more examples (including paleoceanography)

ACTIVITY 4

BFM_POM3D Duration: 24; Responsible: M. Zavatarelli	
Rank	Description
1	Preparation of the technical documentation related to coupling issues between BFM and POM
1	Release of BFM_POM3D with BFM V5 (alpha release)
2	Implementation of academic (and realistic) case studies

ACTIVITY 4

BFM_NEMO Duration: 24; Responsible: M. Vichi	
Rank	Description
1	Preparation of the technical documentation and standard examples
1	Release of BFM-NEMO with BFM V5 (alpha version)
2	Implementation of academic case studies

ACTIVITY 5

BFM_OPATM Duration: 24; Responsible: P. Lazzari	
Rank	Description
1	Preparation of the technical documentation and standard examples
1	Release of the OPATM-BFM with BFM V5 (alpha version)
2	Implementation of academic case studies

ACTIVITY 6

New Features to be developed		
Rank	Description	
2	Coupling with GOTM	
2	Benthic System	
2	Sea ice biology	
3	Coupling with SHYFEM	
3	Integration with food web ecological models	