

Minutes

Date minutes 8 November 2017 **Our reference** 11200242-004-ZWS-0003 **Project** 11200242-004 **Made by** Marcel Ververs

Date meeting 24 October 2017 **Number of pages** 8

Meeting
Eight Community Strategy Board Meeting

Present

Roger de Crook (NL Waterboards), Christophe Hug (FOEN), Bruce Quig (BoM), Chris Leahy (BoM), Marc Philippart (RWS), Trey Flowers (NWS), Amy Tavendale (SEPA), Ben Balk (Deltares USA), Andrew How (NRW), Gerben Boot (Deltares), Marcel Ververs (Deltares), Nadine Sloopjes (Deltares)

Absent

Jeff Perkins (BoM)

Introduction and attendance

On October 24th 2017, Deltares (Delft-FEWS Product Management) organised the eight Delft-FEWS Community Strategy Board (CSB) meeting.

At the time of the meeting the CSB consists of the following members:

| Organisation | Represented by | Present in Delft? |
|--|--|---|
| Bureau of Meteorology in Australia (BoM) | Jeff Perkins | No, apology (filled in by Chris Leahy) |
| Bureau of Meteorology in Australia (BoM) | Bruce Quig | No, remote via GoTo Live Meeting |
| Bureau of Meteorology in Australia (BoM) | Chris Leahy | Yes |
| Dutch Waterboards (DWB) | Roger de Crook | No, remote via GoTo Live Meeting |
| Federal Office for the ENvironment in Switzerland (FOEN) | Martin Ebel | No, apology (filled in by Christophe Hug) |
| Federal Office for the ENvironment in Switzerland (FOEN) | Christophe Hug | Yes |
| Rijkswaterstaat in the Netherlands (RWS) | Marc Philippart | Yes |
| Scottish Environment Protection Agency (SEPA) | Amy Tavendale | Yes |
| Natural Resources Wales (NRW), UK | Andrew How | Yes |
| Deltares-USA | Edwin Welles | No, apology (filled in by Ben Balk) |
| Deltares-USA | Ben Balk | Yes |
| Deltares NL | Nadine Sloopjes Marcel Ververs Gerben Boot | Yes |
| National Weather Service (USA) | Trey Flowers | No, remote via GoTo Live Meeting |

Agenda

The agenda is as follows:

| | |
|-------|---|
| 13:00 | Opening and introductions |
| 13:15 | Minutes & Actions previous meeting |
| 13:25 | Status update of the Delft-FEWS 2020 roadmaps |
| 13:30 | Process of dissemination of patches (FOEN) |
| 13:50 | Topics CSB for 2018 |

| | |
|-------|-------------------------------|
| 14.40 | Summary and Actions |
| 14:45 | Any other business |
| 14.55 | Closure and date next meeting |

Opening and Introductions

On behalf of Deltares, Nadine Slootjes opens and welcomes everybody to the eight CSB meeting with a special welcome to Andrew How from Natural Resources Wales, UK. Andrew is a special guest for this meeting to share their experience with the migration of their flood forecasting system to the Cloud.

Minutes from the previous meeting

There were no comments on minutes of the previous meeting, so they will be finalized and added to the [Delft-FEWS portal page](#).

Actions (and updates on open actions) from the previous meeting

It was agreed to update the actions during the meeting and 'clean' the list. This means that only the open actions will be maintained in the minutes. See updated action list at the end of these minutes. Gerben and Marcel give a status update on the outstanding actions.

Sharing experience with migration of Delft-FEWS to the cloud

Andrew How from Natural Resources Wales shared his experience as the first organisation to migrate their Flood forecasting system to the cloud. He explained that there were some technical challenges (such as synchronisation between two data centres), that were specific to the cloud environment, but that these issues were resolved and the whole migration was completed to schedule. One of the main considerations to this new approach, was the requirement for high availability of the system. Natural Resources Wales' solution to this was to implement both a remote desktop client and a locally installed client; combining the flexibility and functionality of direct database access, with the contingency of locally cached data on a standalone client. This offered an increased level of reliability and robustness to the overall service. Their experience to date of hosting FEWS in the cloud has been extremely positive, they report that they still retain high availability, including multiple levels of contingency, whilst utilising the numerous benefits of the scalable and adaptable cloud environment.

Marc brought up the question of performance. Andrew explained that they did not see any negative impacts on the performance of running Delft-FEWS in the cloud. He also stressed that the performance benefits will become clearer, when automatic scaling becomes available.

Roger asks whether Andrew could provide information about when going to the cloud is beneficial or not. This question is difficult to answer and will have to be made for each client separately. It depends on the business case that you have for your application. Deltares offered to provide support with putting up a business case for this and gathering all information to make this decision.

Ben brought up the question of what was the motivation of going to the cloud. Andrew explained that the strategy of NRW was to migrate all applications to the cloud or justify (why not).

One of the key considerations when designing a system hosted within the cloud, especially one which deals with large data volumes, is the cost of moving that data. Whilst it is comparatively cheap to upload data to the cloud, and also cheap to move it around in the cloud, the costs are significantly more expensive when needing to download the data.

(During the Delft-FEWS User Days, Andrew gave a presentation about the migration of Delft-FEWS to the cloud. His presentation is available via the [Delft-FEWS portal](#)).

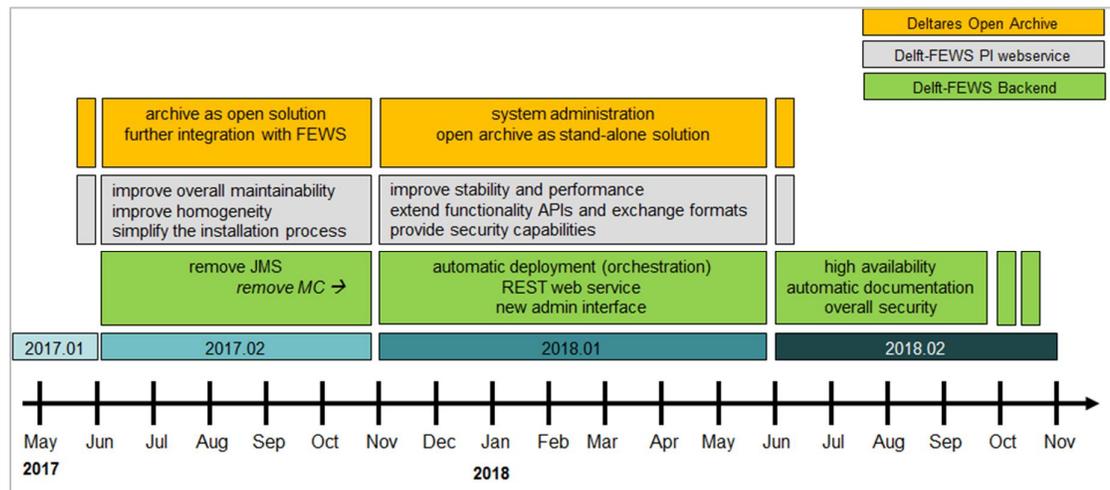
Status update of the Delft-FEWS 2020 roadmaps

Gerben gives a brief presentation on the status of the Delft-FEWS roadmaps and an update of the finances (is available on request):

What did we do since the last CSB meeting in March?

- Wrote a summary of the new developments (focused on the benefits)
- Informed the community during meetings:
 - During Regional User Days (Australia, Netherlands, German speaking)
 - User meeting Dutch waterboards
 - GOTO meeting (other European Users)
 - Individual (NWS, BPA)
 - Individual (Bundesanstalt für Gewässerkunde, SEPA, Natural Resources Wales)

Gerben explained that the original implementation plan for the three roadmaps is mostly intact, apart from the task to remove the Master Controller from the Delft-FEWS code, which will start after completion of the North American enhancements for the 2017.02 release. This means that completion of this task will probably shift a bit towards the 2018.01 release (see picture of implementation plan below). However the final deadline for all three roadmaps will not be affected.



The following activities are in progress or have been completed:

Delft-FEWS Open Archive

- Seamless integration of *forecast timeseries*
- Robust checks implemented exporting to archive (checksums)
- Requests (through PI web service) to get (net-cdf) data extent/operation

Delft-FEWS PI web service

- New framework ready for hosting different types of web service (single install)

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- Aligning methods between PI SOAP and REST web services
 - Code-cleanup & test environment ready + improved documentation/test page
- Delft-FEWS Backend Simplification
- Removal of JMS
 - New database scheme and snapshot functionality

After that Gerben explains that new development requests will have to be lined up with the roadmaps as much as possible. For the 2017.02 release many front-end developments have been requested. All new requests reported after the 1st of September 2017 will be spread out over the coming releases in 2018.

Process of dissemination of patches

Christophe Hug from FOEN introduced the topic of dissemination of patches and explained the background to this request. Their main point was that they would like Deltares to share information about the availability of patches with fixes for critical software bugs. A discussion took place about how to communicate about fixed issues and important patches. They also shares his thoughts on what the NWS needs with respect to patches during the beta testing process. The wish for more information about critical bug fixes in patches was supported by all other organizations.

At the moment Deltares is keeping track of all critical bug fixes and shares the patches with the organizations that have the same software version and the same configuration elements. The question came up to open up JIRA for the outside world, but Deltares explains that that will not fulfill the client's needs as the information in JIRA is not always self-explaining and requires a specific context. The information from JIRA will have to be translated into something useful and readable for the users.

Action Deltares: to pick up actions 2.3 and 6.2 from the action list and to come up with a plan for sharing information on critical bugfixes in patches now and in the future when the roadmaps have been completed.

Topics CSB for 2018

To gather new ideas for the CSB meetings for 2018, everyone was asked to start writing ideas on post-its and putting them on a big flip-over. First of all ideas were gathered also from the people that joined through the Goto Live meeting.



Later on the post-its with ideas were grouped together (overlap or similarities in topics). Since time was limited the CSB will decide in the next meeting which topics will be picked up first and which will be on the long list of topics to be picked up later.

Roadmaps:

- Share roadmap(s) progress
- Contribute to roadmap developments (impact of decisions / planning)
- Support for 'legacy' systems

Communication:

- General: webinars, FEWS NEWS – including input customers
- Representatives /community interaction
- User Days (attendance, programme)
- Between systems
- How to share information i.e. new developments

Best practices:

- How to organise and share best config practices?
- Example of configs/ different kind of implementations: Video contest 'my favourite feature'?
- Data sharing
- Testing
- Workflow management (Splitting, sharing, approving)

Testing:

- Release management
- Beta/ acceptance testing
- Stability vs Rapid developments

Strategy:

- Vision on (large) gridded data sets to be used by Delft-FEWS

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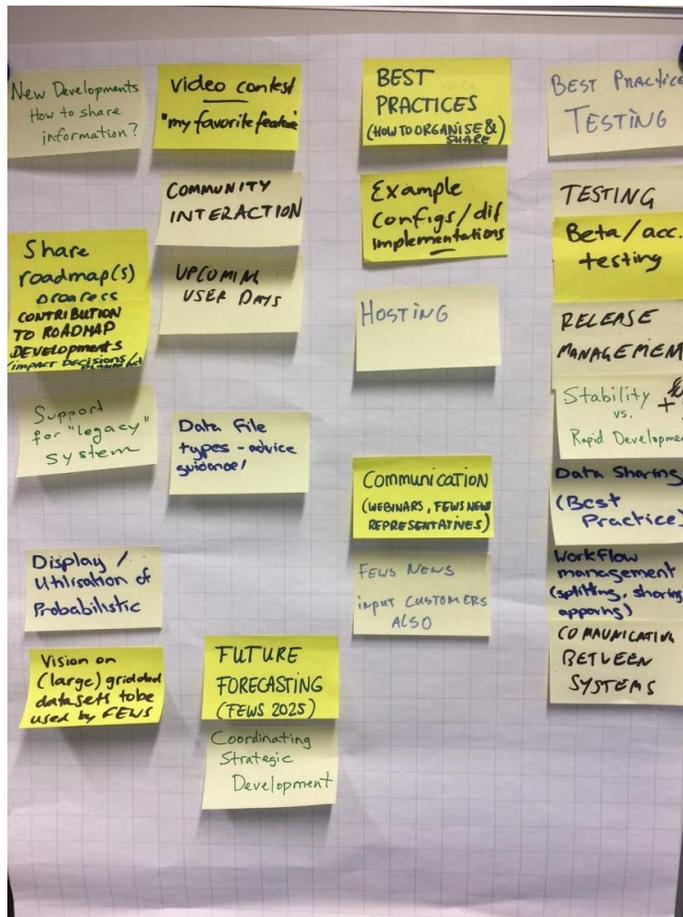
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- Future of forecasting (2025)
- Coordinating strategic development

Other:

- Hosting
- Display/ utilisation of probabilistic forecasting
- Data file types – advice, guidance



Action Deltares: To make an overview of the ideas listed and share a summary in the next meeting

Any other business

No one had any other business to report.

Summary and actions

See Action List at the end of these minutes.

Closure and next meeting

The next meeting will be organized at the end of January or beginning of February. Main topic for this CSB meeting is to decide which topics to be picked up in the CSB meetings in 2018 and to plan these meetings.

Action list

| Action | Due by | Completion Status |
|---|-----------------------|------------------------|
| | date | |
| 2.3 Identify a process to share patches in the community, taking into account different levels of urgency. Communication is a key issue here. Update: This action will be combined with action 6.2 | Deltares July 2016 | Dec 2017 Completed |
| 2.4 Draft a plan for community funding and identify Deltares priorities including budgets and allow people to vote and identify their priorities. Discuss in detail in the next meeting. How can people contribute? Update: This action will be combined with action 3.7 | Deltares Dec 2016 | Dec 2016 Completed |
| 2.6 Set-up an overview of webinars to be developed, include a timeline. Include patch, new features, IT aspects. | Deltares July 2016 | Jul 2017 Open |
| 3.6 Deltares to set up a platform to share a list of potential new Delft-FEWS features as a first starting point for the FEWS Feature Starter model approach (including a progress bar representing the already available finances for this feature). Update: This action will be combined with action 3.7 | Deltares Oct 2016 | Dec 2016 Completed |
| 3.7 Deltares to come up with a more detailed plan for this FEWS Feature Starter model, taking into account the different forms of financing as explained by the different organisations. | Deltares Oct 2016 | Feb 2017 Open |
| 6.2 Describe the new process of testing and sharing patches with the implementation of the new Delft-FEWS architecture of automatic updating | Deltares Dec 2017 | Open |
| 6.3 All CSB members should ask feedback from community for input for meetings and on decisions made Update: This action will be converted into a standard agenda item | All July 2017 | June 2017 Completed |

| Action | Due by | Completion Status |
|--------|--|--|
| | | date |
| 6.4 | Start contacting all clients with plans for three roadmaps for Delft-FEWS for coming years and find out if they are interested in contributing | Deltares Dec 2017 Open |
| 7.1 | Share the management summary of the Delft-FEWS roadmaps with the CSB | Deltares October 2017 October 2017 Completed |
| 7.2 | Summarize all benefits/advantages in a list / disadvantages | Deltares October 2017 Open |
| 7.3 | Talk to ICT people of Waterboards that have indicated that they do not see the benefits of the roadmaps just yet | Gerben / Roger October 2017 Open |
| 7.4 | Write recommendation to convince other clients | Edwin / Trey, Marc / Gerben October 2017 Open |
| 7.5 | Contact Amy to discuss possibilities of making specific issues for SEPA and highlight benefits for SEPA. | Marcel October 2017 October 2017 Completed |
| 7.6 | Make sure there is a place to interact with CSB and to announce the presence of the CSB members | Deltares October 2017 October 2017 Completed |
| 7.7 | Share outcome of this CSB meeting with regional users Update: This action will be converted into a standard agenda item | All October 2017 October 2017 Completed |
| 7.8 | Send reminder to CSB for contacting regional users in 3 weeks' time Update: This action will be part of the standard agenda item as suggested in actions 6.3 and 7.7 | Deltares October 2017 November 2017 Completed |
| 8.1 | To make an overview of the ideas listed and share a summary in the next meeting | Deltares January 2018 Open |