

# Status of EFAS operation 19-20: experience, issues, challenges

EFAS Forecast Computational team



Emergency Management





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## EFAS - Forecast Commission

- Running **24/7 operations of EFAS and GloFAS**, including maintenance, bug fixes etc...
- Implementing **improvements** on existing workflows, products and services
- **Collaborate** with other centres and the JRC to continuously deliver an improved service
- **Respond** to issues raised by EFAS forecasters
- **Developing, designing, testing and migrating** into operations new models, products and services
- Developing, operating and maintaining the **EFAS web interface**, and operating the GloFAS web interface
- Developing, operating and maintaining EFAS and GloFAS **data services**
- **Documenting** the service, providing support for training and outreach activities



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# Key activities in 2019-20





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# 2019 - 2020 : model upgrade

**EFAS prod v3.1** (11/06/19)  
Product generation workflow

**EFAS v3.3** (8/10/19)  
New reporting point layer

**EFAS v3.4** (10/12/19)  
Sub-seasonal outlook, ERICHA,  
ERIC layer

**EFAS v3.5** (5/03/20)  
New climatology

**EFAS v4.0** (14/11/20)  
Improved hydrology,  
new layers

June 2019

Jan 2020

June 2020

October 2020



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# 2019 - 20 : system upgrade

**EFAS v3.2** (4/07/19)

Bug fix: alert persistence

**EFAS v3.4** (10 Dec 2019)

National flood link layer, EFAS-SOS

**EFAS v3.5** (5/03/20)

EFAS-IS upgrade

**EFAS v3.6** (26/03/20)

ERICHA status, version number  
on layer, feedback form  
workflow

**Bi-weekly release** (minor updates and bug  
fixing)

**7 improvements** (major issues)

**EFAS v4.0** (14/11/20)

Reforecasts and EFAS  
seasonal in CDS

June 2019

Jan 2020

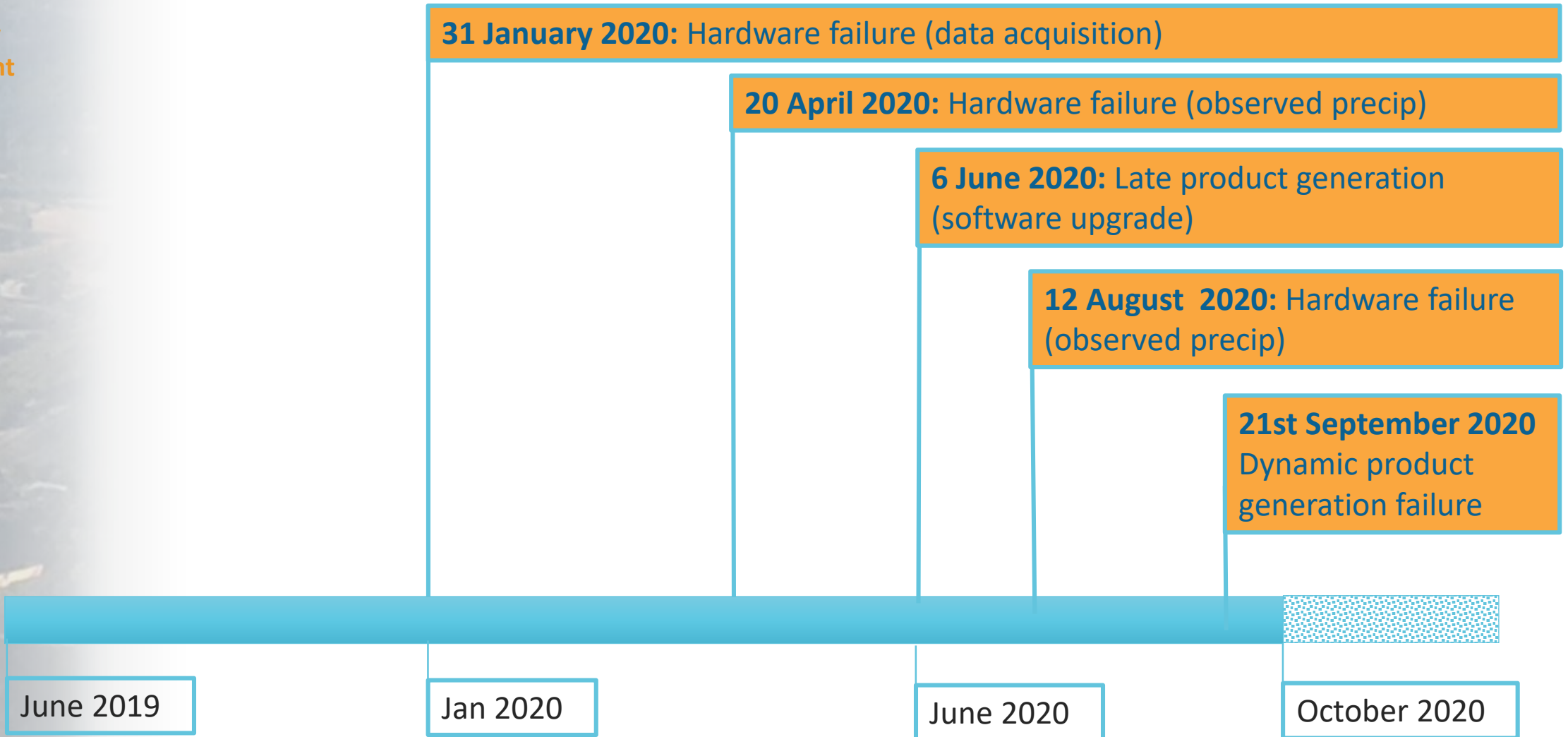
June 2020

October 2020



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# 2019 - 20 : service failure





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# 2019 - 20 : service delivery

32 ECMWF 'high risk periods'  
No impact on EFAS release

16 March 2020: Start of Remote working for Comp Team  
No impact on EFAS release

No cases of missed hard deadlines  
(02:00; 14:00)

No cases of missed soft deadlines  
(11:00; 23:00)

**ECMWF at-risk period  
Today 11:30-14:30 UTC**

June 2019

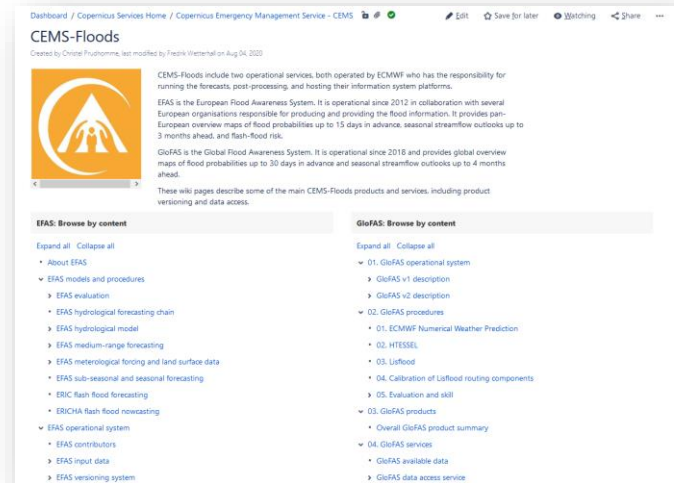
Jan 2020

June 2020




October 2020



- Comprehensive one-stop-site **complementary** to EFAS-IS and GloFAS-IS
- **Accessible** to EFAS partners and the general public
- Detailed description of **data, products and services**
- Information on **new cycles** components and updates
- **Selected detailed analyses** on model performance
- <https://confluence.ecmwf.int/display/COPSRV/CEMS-Floods>



Flood Summary Products

	Product name	Description (established over forecast horizon)	Outputs	Forecasting horizon	Forecast model
Medium-range	Flood Probability <48h	Probability of ECMWF-ENS forecasts exceeding the EFAS 5-year return period threshold. Forecasting range 0-48 hours. 	Map	10 days	ECMWF-ENS (S1) COSMO (up to 5 days only; not full EFAS spatial domain) (Z0) ECMWF-DET (1) DWD-DET (1)
Medium-range	Flood Probability >48h	Probability of ECMWF-ENS forecasts exceeding the EFAS 5-year return period threshold. Forecasting range 2 -10 days. 	Map	10 days	ECMWF-ENS (S1) COSMO (up to 5 days only; not full EFAS spatial domain) (Z0) ECMWF-DET (1) DWD-DET (1)
	National Flood Monitoring		Map		NA





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Thank you!

