



# Internal Assessment

## Introduction and Preparation of Nuernberg

supported by:



Federal Ministry  
of Education  
and Research



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Halfterm Project Review

Marc Behrens, Hardi Hungar

Munich, 14.01.2014

# WP 4 Review Schedule

- 17:00 - 17:20 Introduction and overview of the first V&V Level (Marc Behrens and Hardi Hungar, DLR)
- 17:20 - 17:50 Results on Model V&V (Ana Cavalli, Institute Telecom)  
[Video contribution]
  - 17:50 - 18:00 Coffee Break
- 18:00 - 18:10 Results on Implementation / Code V&V (Jens Gerlach, Fraunhofer FOKUS)
- 18:10 - 18:30 Process and Safety (Jan Welte, TU BS)
- **18:30 - 18:40 Internal Assessment and Preparation of Workshop in Nuernberg (Hardi Hungar, DLR)**
- **18:40 - 19:15 Overall Conclusions & Discussion of upcoming V&V activities (Marc Behrens, DLR)**

- **Each SIL-4 development is to be assessed externally**
- **The internal assessment is to establish that the openETCS approach is viable for SIL-4 developments**
  
- **No results due yet within the task T4.5 (Task leader All4Tec)**
- **The first workshop on ,Internal Assessment‘ is hosted by**
  - Angewandte Eisenbahntechnik GmbH
  - Adam-Klein Straße 28
  - 90429 Nürnberg
- **Aim of the workshop:**
  - **Get official feedback on the current documents under review**

# Workshop Schedule

## Day 1 (18-February-2014) @Aebt

**13:00 - 13:15 Welcome - Norbert Schäfer *not confirmed***

**Introduction into safety activities inside openETCS**

**13:15 - 13:35 Safety Case (D4.3.1 - Safety inside openETCS) - Jan Welte, TU-BS**

**13:40 - 14:00 Internal Assessment – Toni Adriano /Frederique Vallee (All4Tec) *not confirmed***

**14:00 - 14:30 openETCS complete process (Focus tbd)- (Marielle/ Bernd ) - *not confirmed***

■ 14:30 - 14:45 - Break

**14:45 - 15:30 Keynote: Results of the first Internal assessment (Focus-Topic tbd) - Norbert Schäfer (AEbt) *not confirmed***

**15:30 - 16:00 QA- Plan and quality assurance process (SQS) + Discussion *not confirmed***

**16:00 - 16:30 First Results on SRS - Functional decomposition (Alstom - tbr) *not confirmed***

**16:30 - 17:00 VnV Concept - Approach (DLR) + Discussion**

■ Time for check-in

■ 19:00 - Dinner, drinks and networking *not confirmed*

## Day 2 (19-February-2014) @Aebt

**09:00 - 09:45 openETCS complete process (Focus tbd)- (Marielle/ Bernd) *not confirmed***

**09:45 - 10:30 Keynote: Results of the first Internal assessment (Focus-Topic tbd) - Frédérique Valée (All4Tec) *not confirmed***

■ 10:30 - 10:45 - Break

**10:45 - 11:30 Feedback from Manufacturer (tbd)+ Discussion not confirmed**

**11:30 - 12:15 Feedback from Operators (tbd)+ Discussion not confirmed**

■ 12:15 - 13:30 - Lunch Break

**13:30 - 14:15 Feedback from ISA (tbd) + Discussion not confirmed**

**14:15 - 15:00 Feedback from DeBo (tbd) + Discussion not confirmed**

## Specification:

- **CENELEC Standard EN50128**

## Documents under Assessment:

- **Project Quality Assurance Plan (LaTeX, SQS)**
- **Project Quality Assurance Plan - Change/Problem Management Process (LaTeX, SQS)**
- **Project Quality Assurance Plan - Presentation of the Revision and Review Processes**
- **Software Configuration Management Plan (LaTeX, ALSTOM)**
- **Project Quality Assurance Plan – Documentation control Process ()**

## ▪ **Result:**

- **38 issues raised by internal assessors (Norbert Schäfer, Frédérique Valée) , response of author pending**

# Internal Assessment – Workshop preparation

## Requested parties:

AEbt  
All4Tec  
ALSTOM  
CERTIFIER  
Deutsche Bahn  
EBA  
ERA  
ERTMS- Users Group  
General Electric  
Mitsubishi Electric  
National Authorities from Netherlands  
openETCS Foundation (JOS, Klaus)  
SIEMENS  
SNCF  
SQS  
TÜV-Süd RAIL  
Further Supplier or openETCS Safety Stakeholder

## Few feedback until now: !

- **Official invitation by project-office could be helpful**
- **Personal invitations and identification of contact partners could help**